



Berg™ Master Inch Catalog

HIGH PRECISION PRODUCTS



BERG™

**PRODUCT
CATALOG**

TABLE OF CONTENTS

BELT & CHAIN DRIVES MINIATURE POWER TRANSMISSION SYSTEMS & COMPONENTS	A 1 - A 237
GEARS	B 1 - B 248
ASSEMBLIES GEARBOXES & SPEED REDUCERS, RATCHETS & PAWLS, OTHER GEAR ASSEMBLIES	C 1 - C 17
BREADBOARD COMPONENTS	D 1 - D 19
LINEAR COMPONENTS LEAD SCREWS, BALL & CROSS ROLLER SLIDES, LINEAR BEARINGS, RAILS & MORE	E 1 - E 27
HARDWARE & FASTENERS	F 1 - F 66
COUPLINGS & CLUTCHES	G 1- G 52
VIBRATION DAMPING COMPONENTS	H 1 - H 3
BEARINGS, SHAFTS, CLAMPS, COLLARS, HUBS & KEYS	I 1 - I 47
REFERENCE & TECHNICAL DATA GEAR REFERENCE DATA, TABLES OF PITCH, DIAMETERS, MILITARY SPECIFICATIONS, BEARING & MANUFACTURING TOLERANCES	1 - 26
INDEX	27 - 30
VISIT WWW.REGALREXNORD.COM FOR TERMS & CONDITIONS	

BELT & CHAIN DRIVES

Table of Contents

FLEX-E-GEAR® CABLE DRIVE CHAIN SYSTEM	A2
GEAR DRIVE CHAINS	
.0982 CIRCULAR PITCH - 32 PITCH	A3
.1000 CIRCULAR PITCH - 1/10 PITCH	A9
.1309 CIRCULAR PITCH - 24 PITCH	A12
SPROCKET GEARS	
.0982 CIRCULAR PITCH - 32 PITCH	A4 - A8
.1000 CIRCULAR PITCH - 1/10 PITCH	A10 - A11
.1309 CIRCULAR PITCH - 24 PITCH	A13 - A15
FIELD SPLICE KITS	A16
FLEX-E-BELT® DRIVE SYSTEM	A17
GEAR DRIVE BELTS	
.0982 CIRCULAR PITCH - 32 PITCH	A18
.1000 CIRCULAR PITCH - 1/10 PITCH	A31
.1309 CIRCULAR PITCH - 24 PITCH	A38
E-Z ENTRY BELT PULLEYS	
.0982 CIRCULAR PITCH - 32 PITCH	A19 - A30
.1000 CIRCULAR PITCH - 1/10 PITCH	A32 - A37
.1309 CIRCULAR PITCH - 24 PITCH	A39 - A40
FIELD SPLICE KITS	A41
MIN-E-PITCH® DRIVE SYSTEM	A42
CABLE CHAINS	
.15708 CIRCULAR PITCH - π /20 PITCH	A43
CHAIN SPROCKETS	
.15708 CIRCULAR PITCH - π /20 PITCH - PIN HUB	A44 - A48
.15708 CIRCULAR PITCH - π /20 PITCH - HUBLESS	A49 - A50
.15708 CIRCULAR PITCH - π /20 PITCH - CLAMP HUB	A51
DUAL CHAINS	
.15708 CIRCULAR PITCH - π /20 PITCH	A52
BELTS	
.15708 CIRCULAR PITCH - π /20 PITCH	A53
DOUBLE SPROCKETS	
.15708 CIRCULAR PITCH - π /20 PITCH - PIN HUB	A54 - A57
.15708 CIRCULAR PITCH - π /20 PITCH - HUBLESS	A58 - A59
3-D BELTS	
.15708 CIRCULAR PITCH - π /20 PITCH	A60
3-D PULLEYS	
.15708 CIRCULAR PITCH - π /20 PITCH - PIN HUB	A61 - A64
.15708 CIRCULAR PITCH - π /20 PITCH - HUBLESS	A65 - A66
.15708 CIRCULAR PITCH - π /20 PITCH - IDLER	A67 - A69
FIELD SPLICE KITS	A70
FLEX-E-PITCH® DRIVE SYSTEM	A71
CHAINS	
.1475 CIRCULAR PITCH	A72
.250 CIRCULAR PITCH	A80
.375 CIRCULAR PITCH	A84
.500 CIRCULAR PITCH	A87 - A88
CHAIN SPROCKETS	
PIN HUB - .1475 CIRCULAR PITCH	A73 - A77
PIN HUB - .250 CIRCULAR PITCH	A81, A83
PIN HUB - .375 CIRCULAR PITCH	A86
PIN HUB - .500 CIRCULAR PITCH	A90
HUBLESS - .1475 CIRCULAR PITCH	A78 - A79
HUBLESS - .250 CIRCULAR PITCH	A82
HUBLESS - .375 CIRCULAR PITCH	A85
HUBLESS - .500 CIRCULAR PITCH	A89
FIELD SPLICE KITS	A91
AIRCRAFT CABLES	A92
FIBER CABLES	A93
CABLE THIMBLES	A94
CABLE CRIMP BUSHINGS	A94
CABLE CRIMP TOOLS	A94
ROW-L-ER® CHAINS	A95
LINK CHAINS	
.1475 CIRCULAR PITCH	A96
.250 CIRCULAR PITCH	A105, A120
.375 CIRCULAR PITCH	A113, A123
.500 CIRCULAR PITCH	A117, A126

ROW-L-ER® CHAINS CONT.

SPROCKETS	
PIN HUB - .1475 CIRCULAR PITCH	A97 - A102
PIN HUB - .250 CIRCULAR PITCH	A106, A110 - A112, A121 - A122
PIN HUB - .375 CIRCULAR PITCH	A115 - A116, A124
PIN HUB - .500 CIRCULAR PITCH	A119, A127
HUBLESS - .1475 CIRCULAR PITCH	A103 - A104
HUBLESS - .250 CIRCULAR PITCH	A107 - A109
HUBLESS - .375 CIRCULAR PITCH	A114
HUBLESS - .500 CIRCULAR PITCH	A118
LINK PLATE LUGS	A125, A128

FLEX-E-GRIP® TIMING BELTS A129

TIMING BELTS	
.0816 (XXL) CIRCULAR PITCH - 1/8" WIDTH	A131
.200 (XL) CIRCULAR PITCH - 1/4" WIDTH	A135
.375 (L) CIRCULAR PITCH - 1/2" WIDTH	A139
.500 (H) CIRCULAR PITCH - 3/4" WIDTH	A143
TIMING PULLEYS	
.0816 (XXL) CIRCULAR PITCH - PIN HUB	A132 - A134
.200 (XL) CIRCULAR PITCH - PIN HUB	A136 - A138
.375 (L) CIRCULAR PITCH - PIN HUB	A140 - A142
.500 (H) CIRCULAR PITCH - PIN HUB	A144
FIELD SPLICE KITS	A145

MAX-M-DRIVE® CABLE DRIVE CHAINS A146

TIMING BELTS	
.080 (MXL) CIRCULAR PITCH - 1/8" & 1/4" WIDTH	A147 - A150
.0816 (XXL) CIRCULAR PITCH - 1/8" & 1/4" WIDTH	A166 - A167
.200 (XL) CIRCULAR PITCH - 1/4" & 3/8" WIDTH	A168 - A169
.375 (L) CIRCULAR PITCH - 1/2" & 3/4" WIDTH	A182
.079 (GT) 2MM CIRCULAR PITCH	A187 - A188
.118 (GT) 3MM CIRCULAR PITCH	A189 - A190
TIMING PULLEYS	
.080 (MXL) CIRCULAR PITCH - PIN HUB	A151 - A161
.0816 (XXL) CIRCULAR PITCH - PIN HUB	A162 - A165
.200 (XL) CIRCULAR PITCH - PIN HUB	A170 - A181
.375 (L) CIRCULAR PITCH - PIN HUB	A183 - A184
.079 (GT) 2 MM CIRCULAR PITCH - PIN HUB	A191 - A192, A194
.118 (GT) 3 MM CIRCULAR PITCH - PIN HUB	A191, A193, A195
TIMING PULLEY BAR STOCKS	A185 - A186

POW-R-VEE® BELTS A196

V-BELTS	
2V	A198
3V	A200
4V	A203
5V	A205
V-BELT PULLEYS	
2V	A199
3V	A201 - A202
4V	A204
5V	A206 - A207
FIELD SPLICE KITS	A208

60° V-BELTS A209

60° V-BELT PULLEYS	A212 - A214
60° V-BELT CORDS	A215
FIELD SPLICE KITS	A226

O-RING CORDS A216

O-RING BELTS	
70A DUROMETER	A217 - A221
90A DUROMETER	A222 - A225
FIELD SPLICE KITS	A226

GROOVED PULLEYS A227 - A232

FRICTION DRIVE ROLLERS A233 - A234

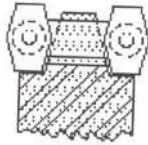
BELT TENSIONER GUIDE A235

BELT & CHAIN TECHNICAL DATA A236 - A237

FLEX-E-GEAR® TECHNICAL DATA

OPERATING NOTES:

Due to the unique design of molded polyurethane over a Stainless Steel cable, the gear drive chains offer a strong, flexible, quiet, lube-free drive system that can obtain zero backlash.



PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	PULLEY
32	.0982	Polyurethane (Blue) 1/64" (0.8 mm) Dia. Stainless Steel Cable	Flex-E-Gear®	Operates with 32B,GG33 and GGF33 series.

32GCF SERIES

- Cable diameter .018" Stainless Steel
- Ultimate tensile 30 lbs., 4 lb./pin
- Recommended Maximum Operating Speed 376 feet/min.
- Recommended Operating Load 6 - 7 lbs. *
- Minimum recommended sprocket diameter 1/2" P.D.
- Weight .13 oz/ft

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	PULLEY
1/10	.1000	Polyurethane (Green) 1/64" Dia. Stainless Steel Cable	Flex-E-Gear®	Operates with 31A and 31B series.

31GCF SERIES

- Cable diameter .018" Stainless Steel
- Ultimate tensile 30 lbs., 4 lb./pin
- Recommended Maximum Operating Speed 376 feet/min.
- Recommended Operating Load 6 - 7 lbs.*
- Minimum recommended sprocket diameter 3/4" P.D.
- Weight .13 oz/ft

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	PULLEY
24	.1309	Polyurethane (Red) 1/32" Dia. Stainless Steel Cable	Flex-E-Gear®	Operates with 24B and 24A series.

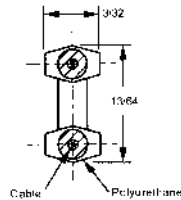
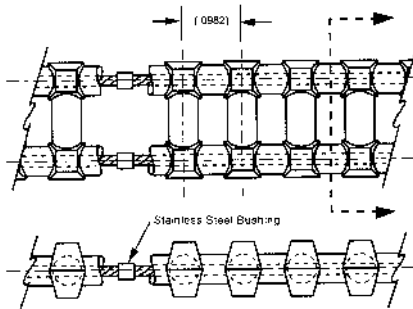
24GCF SERIES

- Cable diameter 1/32" Stainless Steel
- Ultimate tensile 100 lbs., 10 lb./pin
- Recommended Maximum Operating Speed 376 feet/min.
- Recommended Operating Load 20 - 25 lbs.*
- Minimum recommended sprocket diameter 1/2" P.D.
- Weight .14 oz/ft

* Reduce operating load by 50% for field splices.

GEAR DRIVE CHAINS

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	SPROCKET
32	.0982	Polyurethane (Blue) .018 Dia. Stainless Steel Cable*	Flex-E-Gear®	Operates with 32B, GG33 and GGF33 series.



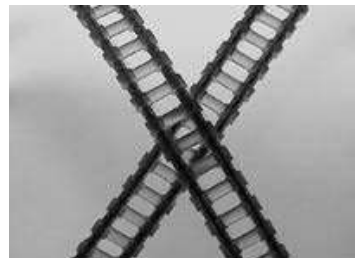
- For Field Splice Kit order 32GCF-7.
- * Available with Aramid Core. See page VII for alternative belt construction or reverse bending applications.
- ** Reduce operating load rating by 50% for field splices.

STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
32GCF-49-E	49	4.811
32GCF-52-E	52	5.105
32GCF-53-E	53	5.203
32GCF-64-E	64	6.283
32GCF-67-E	67	6.577
32GCF-75-E	75	7.363
32GCF-80-E	80	7.854
32GCF-95-E	95	9.327
32GCF-112-E	112	10.996
32GCF-126-E	126	12.370
32GCF-128-E	128	12.566
32GCF-144-E	144	14.137
32GCF-158-E	158	15.512
32GCF-176-E	176	17.279
32GCF-189-E	189	18.555
32GCF-208-E	208	20.420
32GCF-220-E	220	21.598
32GCF-240-E	240	23.562
32GCF-252-E	252	24.740
32GCF-272-E	272	26.704
32GCF-283-E	283	27.783
32GCF-304-E	304	29.845
32GCF-315-E	315	30.925
32GCF-336-E	336	32.987
32GCF-346-E	346	33.968
32GCF-377-E	377	37.012
32GCF-400-E	400	39.270
32GCF-408-E	408	40.055
32GCF-432-E	432	42.412
32GCF-440-E	440	43.197
32GCF-464-E	464	45.553
32GCF-471-E	471	46.240
32GCF-480-E	480	47.124
32GCF-512-E	512	50.265
32GCF-544-E	544	53.407
32GCF-592-E	592	58.119
32GCF-608-E	608	59.690

BULK LENGTH - NOT SPLICED	
STOCK NO.	LENGTH
32GCF-5FT	5 FT
32GCF-10FT	10 FT
32GCF-25FT	25 FT
32GCF-50FT	50 FT
32GCF-100FT	100 FT

- Infinite Lengths
- Silent Drive
- Weight .13 oz./ft
- Positive Drive
- Zero Backlash
- No Lubrication
- 90A Durometer
- Ultimate Tensile Strength 30 lbs. (4 lbs./Pin) when belt is used in open loop configuration (without splice, no crimp bushing)
- Temperature Range +180°F to -15°F
- Recommended Operating Load 8 lbs.
- Recommended Max. Operating Speed 376 feet/min.

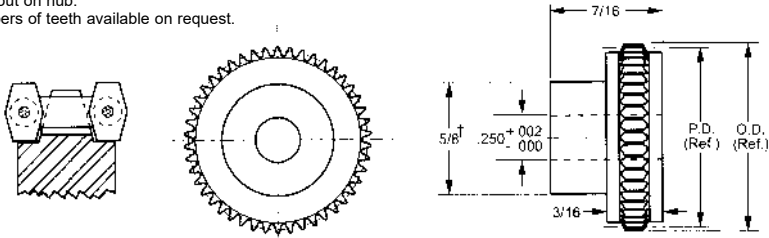
Other numbers of pitches available on request.



SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
32	.0982	1/4"	PIN HUB	Delrin®	Flex-E-Gear® Chain Drive	Operates with 32GCF Series

† Teeth runout on hub.
Other numbers of teeth available on request.



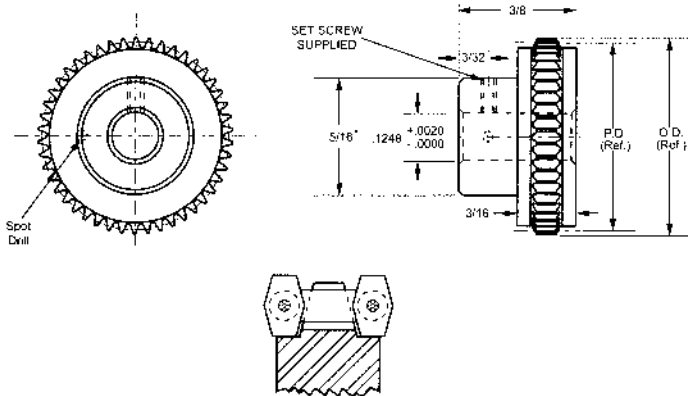
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
32B4M-18	18†	.5625	.625
32B4M-20	20†	.6250	.688
32B4M-22	22	.6875	.750
32B4M-24	24	.7500	.813
32B4M-26	26	.8125	.875
32B4M-28	28	.8750	.938
32B4M-30	30	.9375	1.000
32B4M-32	32	1.0000	1.063
32B4M-36	36	1.1250	1.188
32B4M-40	40	1.2500	1.313
32B4M-48	48	1.5000	1.563
32B4M-56	56	1.7500	1.813
32B4M-64	64	2.0000	2.063
32B4M-72	72	2.2500	2.313
32B4M-80	80	2.5000	2.563



SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
32	.0982	1/8"	PIN HUB	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 32GCF Series

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303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GG33S14-13	GG33A14-13	13**	.4063	.469
GG33S14-14	GG33A14-14	14**	.4375	.500
GG33S14-15	GG33A14-15	15**	.4688	.531
GG33S14-16	GG33A14-16	16**	.5000	.563
GG33S14-18	GG33A14-18	18	.5625	.625
GG33S14-20	GG33A14-20	20	.6250	.688
GG33S14-22	GG33A14-22	22	.6875	.750
GG33S14-24	GG33A14-24	24	.7500	.813
GG33S14-26	GG33A14-26	26	.8125	.875
GG33S14-28	GG33A14-28	28	.8750	.938
GG33S14-30	GG33A14-30	30	.9375	1.000
GG33S14-32	GG33A14-32	32	1.0000	1.063
GG33S14-36	GG33A14-36	36	1.1250	1.188
GG33S14-40	GG33A14-40	40	1.2500	1.313
GG33S14-48	GG33A14-48	48	1.5000	1.563
GG33S14-56	GG33A14-56	56*	1.7500	1.813
GG33S14-64	GG33A14-64	64*	2.0000	2.063
GG33S14-72	GG33A14-72	72*	2.2500	2.313
GG33S14-80	GG33A14-80	80*	2.5000	2.563
GG33S14-88	GG33A14-88	88*	2.7500	2.813
GG33S14-96	GG33A14-96	96*	3.0000	3.063
GG33S14-112	GG33A14-112	112*	3.5000	3.563
GG33S14-128	GG33A14-128	128*	4.0000	4.063

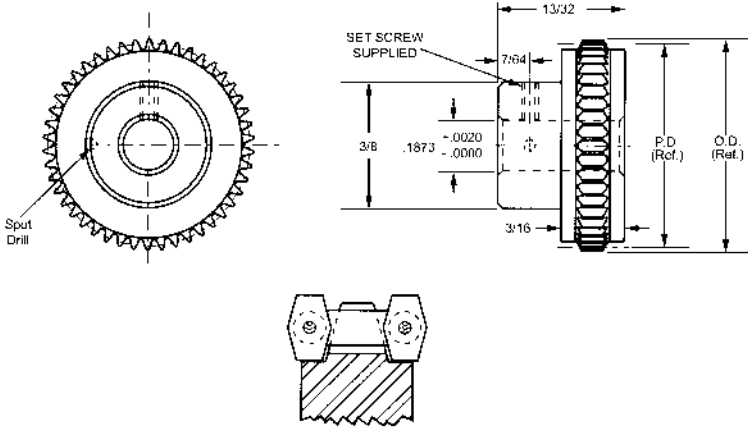


* Alternative in 2 piece construction with 303 Stainless Steel Hub.
Outline and overall dimensions change slightly.
** Sprockets .500 P.D. and smaller for idler use only.
• For 13-14 teeth, hub diameter equals .31.

Other numbers of teeth available on request.
Teeth could be anodized.

SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
32	.0982	3/16"	PIN HUB	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 32GCF Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GG33S21-15	GG33A21-15	15**	.4688	.531
GG33S21-16	GG33A21-16	16**	.5000	.563
GG33S21-18	GG33A21-18	18	.5625	.625
GG33S21-20	GG33A21-20	20	.6250	.688
GG33S21-22	GG33A21-22	22	.6875	.750
GG33S21-24	GG33A21-24	24	.7500	.813
GG33S21-26	GG33A21-26	26	.8125	.875
GG33S21-28	GG33A21-28	28	.8750	.938
GG33S21-30	GG33A21-30	30	.9375	1.000
GG33S21-32	GG33A21-32	32	1.0000	1.063
GG33S21-36	GG33A21-36	36	1.1250	1.188
GG33S21-40	GG33A21-40	40	1.2500	1.313
GG33S21-48	GG33A21-48	48	1.5000	1.563
GG33S21-56	GG33A21-56	56	1.7500	1.813
GG33S21-64	GG33A21-64	64	2.0000	2.063
GG33S21-72	GG33A21-72	72	2.2500	2.313
GG33S21-80	GG33A21-80	80	2.5000	2.563
GG33S21-88	GG33A21-88	88	2.7500	2.813
GG33S21-96	GG33A21-96	96	3.0000	3.063
GG33S21-112	GG33A21-112	112	3.5000	3.563
GG33S21-128	GG33A21-128	128	4.0000	4.063

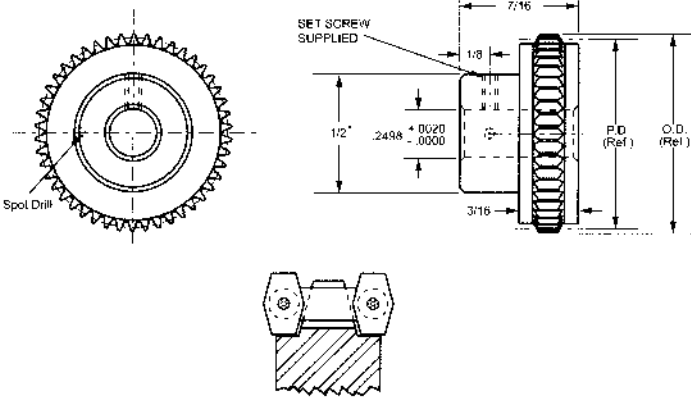


** Sprockets .500 P.D. and smaller for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
32	.0982	1/4"	PIN HUB	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 32GCF Series

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303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GG33S28-18	GG33A28-18	18*	.5625	.625
GG33S28-20	GG33A28-20	20	.6250	.688
GG33S28-22	GG33A28-22	22	.6875	.750
GG33S28-24	GG33A28-24	24	.7500	.813
GG33S28-26	GG33A28-26	26	.8125	.875
GG33S28-28	GG33A28-28	28	.8750	.938
GG33S28-30	GG33A28-30	30	.9375	1.000
GG33S28-32	GG33A28-32	32	1.0000	1.063
GG33S28-36	GG33A28-36	36	1.1250	1.188
GG33S28-40	GG33A28-40	40	1.2500	1.313
GG33S28-48	GG33A28-48	48	1.5000	1.563
GG33S28-56	GG33A28-56	56	1.7500	1.813
GG33S28-64	GG33A28-64	64	2.0000	2.063
GG33S28-72	GG33A28-72	72	2.2500	2.313
GG33S28-80	GG33A28-80	80	2.5000	2.563
GG33S28-88	GG33A28-88	88	2.7500	2.813
GG33S28-96	GG33A28-96	96	3.0000	3.063
GG33S28-112	GG33A28-112	112	3.5000	3.563
GG33S28-128	GG33A28-128	128	4.0000	4.063



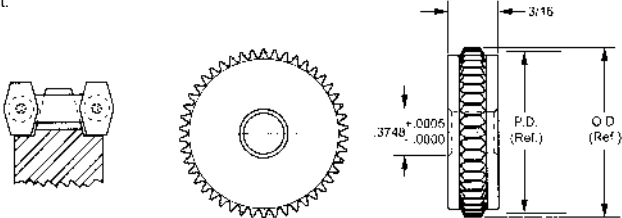
• For 18 teeth, hub diameter equals .47.
Other numbers of teeth available on request.
Teeth could be anodized.

SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
32	.0982	3/8"	HUBLESS	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 32GCF Series

Other numbers of teeth available on request.
Pin or Clamp Hubs assembled on request.

Teeth could be anodized.



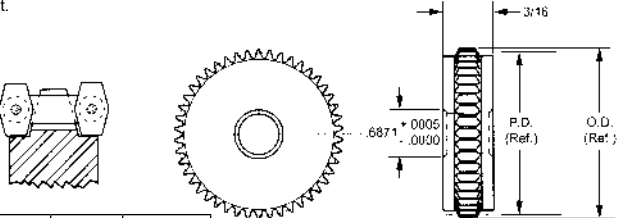
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GGF33S5-32	GGF33A5-32	32	1.0000	1.063
GGF33S5-36	GGF33A5-36	36	1.1250	1.188
GGF33S5-40	GGF33A5-40	40	1.2500	1.313
GGF33S5-48	GGF33A5-48	48	1.5000	1.563
GGF33S5-50	GGF33A5-50	50	1.5625	1.625
GGF33S5-56	GGF33A5-56	56	1.7500	1.813
GGF33S5-64	GGF33A5-64	64	2.0000	2.063
GGF33S5-72	GGF33A5-72	72	2.2500	2.313
GGF33S5-80	GGF33A5-80	80	2.5000	2.563
GGF33S5-88	GGF33A5-88	88	2.7500	2.813
GGF33S5-90	GGF33A5-90	90	2.8125	2.875
GGF33S5-96	GGF33A5-96	96	3.0000	3.063
GGF33S5-100	GGF33A5-100	100	3.1250	3.188
GGF33S5-112	GGF33A5-112	112	3.5000	3.563
GGF33S5-120	GGF33A5-120	120	3.7500	3.813
GGF33S5-128	GGF33A5-128	128	4.0000	4.063



PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
32	.0982	11/16"	HUBLESS	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 32GCF Series

Other numbers of teeth available on request.
Pin or Clamp Hubs assembled on request.

Teeth could be anodized.

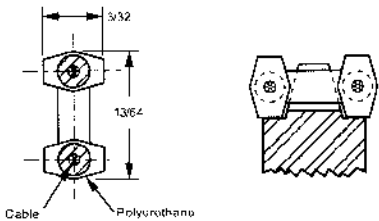
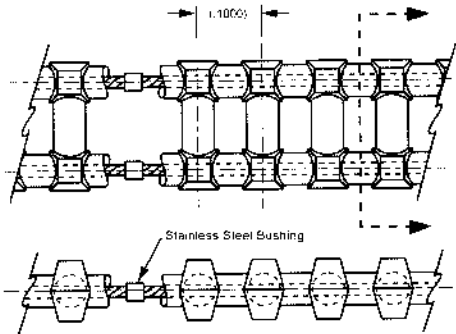


STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GGF33S19-32	GGF33A19-32	32	1.0000	1.063
GGF33S19-36	GGF33A19-36	36	1.1250	1.188
GGF33S19-40	GGF33A19-40	40	1.2500	1.313
GGF33S19-48	GGF33A19-48	48	1.5000	1.563
GGF33S19-50	GGF33A19-50	50	1.5625	1.625
GGF33S19-56	GGF33A19-56	56	1.7500	1.813
GGF33S19-64	GGF33A19-64	64	2.0000	2.063
GGF33S19-72	GGF33A19-72	72	2.2500	2.313
GGF33S19-80	GGF33A19-80	80	2.5000	2.563
GGF33S19-88	GGF33A19-88	88	2.7500	2.813
GGF33S19-90	GGF33A19-90	90	2.8125	2.875
GGF33S19-96	GGF33A19-96	96	3.0000	3.063
GGF33S19-100	GGF33A19-100	100	3.1250	3.188
GGF33S19-112	GGF33A19-112	112	3.5000	3.563
GGF33S19-120	GGF33A19-120	120	3.7500	3.813
GGF33S19-128	GGF33A19-128	128	4.0000	4.063



GEAR DRIVE CHAINS

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	SPROCKET
1/10	.1000	Polyurethane (Green) .018 Dia. Stainless Steel Cable*	Flex-E-Gear®	Operates with 31A and 31B series.

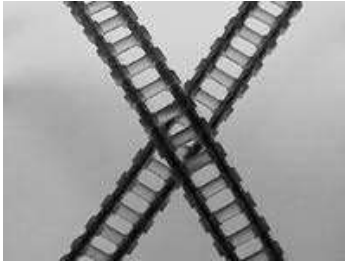


- For Field Splice Kit order 32GCF-7.
- * Available with Aramid Core. See page VII for alternative belt construction or reverse bending applications.
- ** Reduce operating load rating by 50% for field splices.

STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
31GCF-45-E	45	4.50
31GCF-50-E	50	5.00
31GCF-55-E	55	5.50
31GCF-60-E	60	6.00
31GCF-65-E	65	6.50
31GCF-70-E	70	7.00
31GCF-75-E	75	7.50
31GCF-80-E	80	8.00
31GCF-85-E	85	8.50
31GCF-90-E	90	9.00
31GCF-95-E	95	9.50
31GCF-100-E	100	10.00
31GCF-105-E	105	10.50
31GCF-110-E	110	11.00
31GCF-115-E	115	11.50
31GCF-120-E	120	12.00
31GCF-125-E	125	12.50
31GCF-130-E	130	13.00
31GCF-135-E	135	13.50
31GCF-140-E	140	14.00
31GCF-150-E	150	15.00
31GCF-160-E	160	16.00
31GCF-170-E	170	17.00
31GCF-180-E	180	18.00
31GCF-190-E	190	19.00
31GCF-200-E	200	20.00
31GCF-210-E	210	21.00
31GCF-220-E	220	22.00
31GCF-230-E	230	23.00
31GCF-240-E	240	24.00
31GCF-250-E	250	25.00
31GCF-300-E	300	30.00
31GCF-360-E	360	36.00
31GCF-420-E	420	42.00
31GCF-480-E	480	48.00
31GCF-540-E	540	54.00
31GCF-600-E	600	60.00

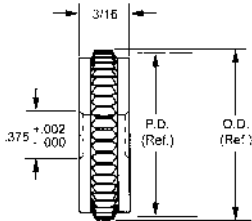
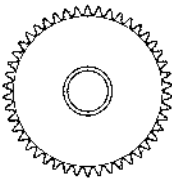
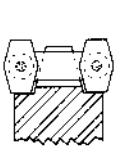
- Infinite Lengths
 - Silent Drive
 - Weight .13 oz./ft.
 - Positive Drive
 - Zero Backlash
 - No Lubrication
 - 90A Durometer
 - Ultimate Tensile Strength 30 lbs. (4 lbs./Pin) when belt is used in open loop configuration (without splice, no crimp bushing)
 - Temperature Range +180°F to -15°F
 - Recommended Operating Load 8 lbs.
 - Recommended Max. Operating Speed 376 feet/min.
- Other numbers of pitches available on request.

BULK LENGTH - NOT SPLICED	
STOCK NO.	LENGTH
31GCF-5FT	5 FT
31GCF-10FT	10 FT
31GCF-25FT	25 FT
31GCF-50FT	50 FT
31GCF-100FT	100 FT



SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
1/10	.1000	3/8"	HUBLESS	2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 31GCF Series



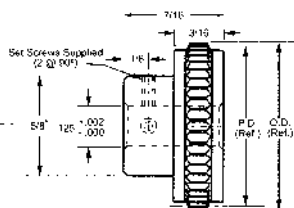
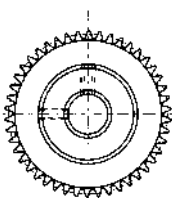
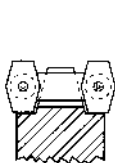
Other numbers of teeth available on request.
Pin or clamp hub assembled on request.
Teeth could be anodized.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
31A6-22	22	.7003	.764
31A6-24	24	.7639	.828
31A6-26	26	.8276	.891
31A6-28	28	.8913	.955
31A6-30	30	.9549	1.019
31A6-32	32	1.0186	1.083
31A6-36	36	1.1459	1.210
31A6-40	40	1.2732	1.337
31A6-48	48	1.5279	1.592
31A6-56	56	1.7825	1.846
31A6-64	64	2.0372	2.101
31A6-72	72	2.2918	2.356
31A6-96	96	3.0558	3.119
31A6-112	112	3.5651	3.629

SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
1/10	.1000	1/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 31GCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
31B2-14	14*	.4456	.509
31B2-16	16*	.5093	.573
31B2-20	20*	.6366	.700
31B2-22	22*	.7003	.764
31B2-24	24	.7639	.828
31B2-26	26	.8276	.891
31B2-28	28	.8913	.955
31B2-30	30	.9549	1.019
31B2-32	32	1.0186	1.083
31B2-36	36	1.1459	1.210
31B2-40	40	1.2732	1.337
31B2-48	48	1.5279	1.592
31B2-56	56	1.7825	1.846
31B2-64	64	2.0372	2.101
31B2-72	72	2.2918	2.356
31B2-96	96	3.0558	3.119
31B2-112	112	3.5651	3.629



* Sprocket .500 P.D. and smaller are recommended for idler use only.

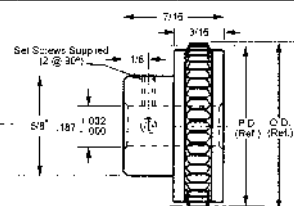
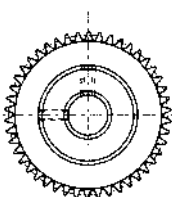
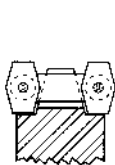
• For 14-22 teeth, hub diameter equals .35.

Teeth could be anodized.

Other numbers of teeth available on request.

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
1/10	.1000	3/16"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 31GCF Series

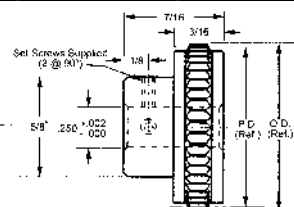
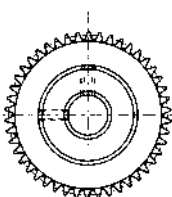
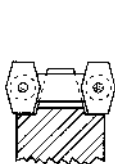
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
31B3-20	20*	.6366	.700
31B3-22	22*	.7003	.764
31B3-24	24	.7639	.828
31B3-26	26	.8276	.891
31B3-28	28	.8913	.955
31B3-30	30	.9549	1.019
31B3-32	32	1.0186	1.083
31B3-36	36	1.1459	1.210
31B3-40	40	1.2732	1.337
31B3-48	48	1.5279	1.592
31B3-56	56	1.7825	1.846
31B3-64	64	2.0372	2.101
31B3-72	72	2.2918	2.356
31B3-96	96	3.0558	3.119
31B3-112	112	3.5651	3.629



.55. Other numbers of teeth available on request.

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
1/10	.1000	1/4"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 31GCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
31B4-20	20*	.6366	.700
31B4-22	22*	.7003	.764
31B4-24	24	.7639	.828
31B4-26	26	.8276	.891
31B4-28	28	.8913	.955
31B4-30	30	.9549	1.0189
31B4-32	32	1.0186	1.083
31B4-36	36	1.1459	1.210
31B4-40	40	1.2732	1.337
31B4-48	48	1.5279	1.592
31B4-56	56	1.7825	1.846
31B4-64	64	2.0372	2.101
31B4-72	72	2.2918	2.356
31B4-96	96	3.0558	3.119
31B4-112	112	3.5651	3.629

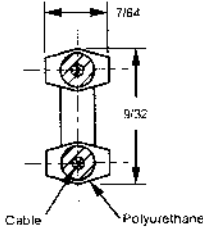
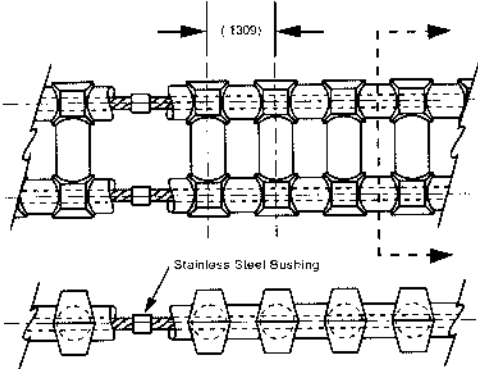


• For 20-22 teeth, hub diameter equals .55. Other numbers of teeth available on request.

Teeth could be anodized.

GEAR DRIVE CHAINS

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	SPROCKET
24	.1309	Polyurethane (Red) 1/32" Dia. Stainless Steel Cable*	Flex-E-Gear®	Operates with 24A and 24B series.



- For Field Splice Kit order 24GCF-7.
- * Available with Aramid Core. See page VII for alternative belt construction or reverse bending applications.
- ** Reduce operating load rating by 50% for field splices.

STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
24GCF-50-E	50	6.545
24GCF-52-E	52	6.807
24GCF-54-E	54	7.069
24GCF-56-E	56	7.330
24GCF-58-E	58	7.592
24GCF-60-E	60	7.854
24GCF-62-E	62	8.116
24GCF-64-E	64	8.378
24GCF-66-E	66	8.639
24GCF-68-E	68	8.901
24GCF-70-E	70	9.163
24GCF-75-E	75	9.817
24GCF-80-E	80	10.472
24GCF-85-E	85	11.126
24GCF-90-E	90	11.781
24GCF-95-E	95	12.435
24GCF-100-E	100	13.090
24GCF-105-E	105	13.744
24GCF-110-E	110	14.399
24GCF-115-E	115	15.053
24GCF-120-E	120	15.708
24GCF-130-E	130	17.017
24GCF-140-E	140	18.326
24GCF-150-E	150	19.635
24GCF-160-E	160	20.944
24GCF-170-E	170	22.253
24GCF-180-E	180	23.562
24GCF-190-E	190	24.871
24GCF-200-E	200	26.180
24GCF-220-E	220	28.798
24GCF-240-E	240	31.416
24GCF-260-E	260	34.034
24GCF-280-E	280	36.652
24GCF-300-E	300	39.270
24GCF-320-E	320	41.888
24GCF-380-E	380	49.742
24GCF-420-E	420	54.978

- Infinite Lengths
- Weight .14 oz./ft
- Positive Drive
- Zero Backlash
- No Lubrication
- Silent Drive
- Extra Strong
- 90A Durometer
- Ultimate Tensile Strength 100 lbs. (10 lbs./Pin) when belt is used in open loop configuration (without splice, no crimp bushing).
- Temperature Range +180°F to -15°F
- Recommended Operating Load 25 lbs.
- Recommended Max. Operating Speed 376 ft./min.

Other numbers of pitches available on request.

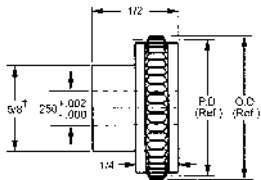
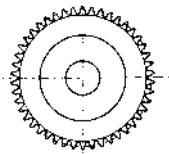
BULK LENGTH - NOT SPLICED	
STOCK NO.	LENGTH
24GCF-5FT	5 FT
24GCF-10FT	10 FT
24GCF-25FT	25 FT
24GCF-50FT	50 FT
24GCF-100FT	100 FT



SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
24	.1309	1/4"	PIN HUB	Delrin®	Flex-E-Gear® Chain Drive	Operates with 24GCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24B4M-15	15†	.6243	.708
24B4M-16	16†	.6659	.749
24B4M-18	18	.7492	.832
24B4M-20	20	.8324	.916
24B4M-21	21	.8740	.957
24B4M-24	24	.9989	1.082
24B4M-30	30	1.2486	1.332
24B4M-36	36	1.4983	1.582
24B4M-42	42	1.7480	1.831
24B4M-48	48	1.9978	2.081
24B4M-60	60	2.4972	2.581



† Teeth runout on hub.
Other numbers of teeth available on request.

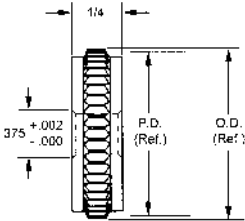
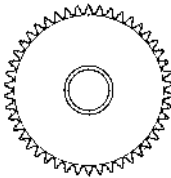
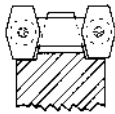


SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
24	.1309	3/8"	HUBLESS	2024-T4 Aluminum Anodized	Flex-E-Gear® Chain Drive	Operates with 24GCF Series

* Sprockets .750 P.D. and smaller for idler use only.
Other numbers of teeth available on request.

Teeth could be anodized.



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24A6-15	15*	.6243	.708
24A6-16	16*	.6659	.749
24A6-18	18*	.7492	.832
24A6-20	20	.8324	.916
24A6-21	21	.8740	.957
24A6-24	24	.9989	1.082
24A6-30	30	1.2486	1.332
24A6-36	36	1.4983	1.582
24A6-42	42	1.7480	1.831
24A6-48	48	1.9978	2.081
24A6-60	60	2.4972	2.581
24A6-72	72	2.9966	3.080
24A6-96	96	3.9955	4.079
24A6-120	120	4.9944	5.078
24A6-144	144	5.9933	6.077

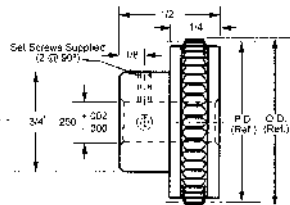
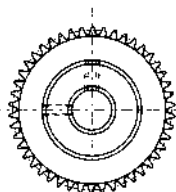
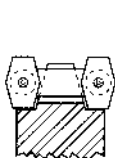
Teeth could be anodized.



SPROCKET GEARS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
24	.1309	1/4"	PIN HUB	2024-T4 Aluminum Red Anodized	Flex-E-Gear® Chain Drive	Operates with 24GCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24B4-14	14*	.5827	.666
24B4-15	15*	.6243	.708
24B4-16	16*	.6659	.749
24B4-18	18*	.7492	.832
24B4-20	20*	.8324	.916
24B4-21	21	.8740	.957
24B4-24	24	.9989	1.082
24B4-30	30	1.2486	1.332
24B4-36	36	1.4983	1.582
24B4-42	42	1.7480	1.831
24B4-48	48	1.9978	2.081
24B4-60	60	2.4972	2.581
24B4-72	72	2.9966	3.080
24B4-96	96	3.9955	4.079
24B4-120	120	4.9944	5.078
24B4-144	144	5.9933	6.077



• For 14-20 teeth, hub diameter equals .47.

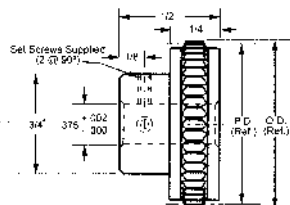
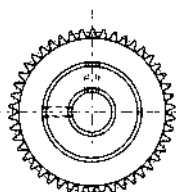
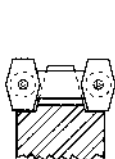
Teeth could be anodized.

* Sprockets .750 P.D. and smaller for idler use only.

Other numbers of teeth available on request.

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
24	.1309	3/8"	PIN HUB	2024-T4 Aluminum Red Anodized	Flex-E-Gear® Chain Drive	Operates with 24GCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24B6-18	18*	.7492	.832
24B6-20	20*	.8324	.916
24B6-21	21	.8740	.957
24B6-24	24	.9989	1.082
24B6-30	30	1.2486	1.332
24B6-36	36	1.4983	1.582
24B6-42	42	1.7480	1.831
24B6-48	48	1.9978	2.081
24B6-60	60	2.4972	2.581
24B6-72	72	2.9966	3.080
24B6-96	96	3.9955	4.079
24B6-120	120	4.9944	5.078
24B6-144	144	5.9933	6.077



• For 18-20 teeth, hub diameter equals .64.

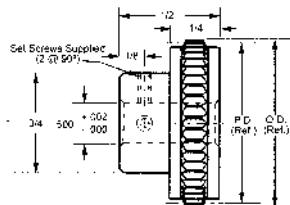
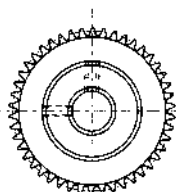
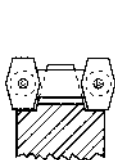
Teeth could be anodized.

* Sprockets .750 P.D. and smaller for idler use only.

Other numbers of teeth available on request.

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
24	.1309	1/2"	PIN HUB	2024-T4 Aluminum Red Anodized	Flex-E-Gear® Chain Drive	Operates with 24GCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24B8-20	20*	.8324	.916
24B8-21	21	.8740	.957
24B8-24	24	.9989	1.082
24B8-30	30	1.2486	1.332
24B8-36	36	1.4983	1.582
24B8-42	42	1.7480	1.831
24B8-48	48	1.9978	2.081
24B8-60	60	2.4972	2.581
24B8-72	72	2.9966	3.080
24B8-96	96	3.9955	4.079
24B8-120	120	4.9944	5.078
24B8-144	144	5.9933	6.077



• For 20 teeth, hub diameter equals .72.

Teeth could be anodized.

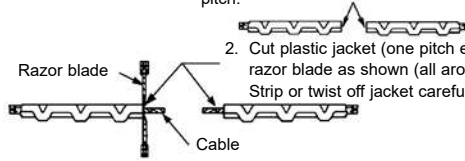
* Sprockets .750 P.D. and smaller for idler use only.

Other numbers of teeth available on request.

FIELD SPLICE KITS

Splicing Procedures:

1. Cut "BERG" *FLEX-GEAR*® sharp and square as shown, using cutter, to desired number of pitches, plus one pitch.

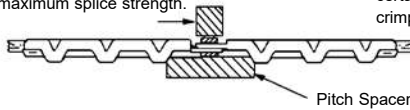


2. Cut plastic jacket (one pitch each side) lightly with a sharp razor blade as shown (all around). Caution: do not nick wire. Strip or twist off jacket carefully.

3. Slide stripped cable into oval splice bushing carefully. **Caution:** Do not fray cable. Feed cable into chamfered end of bushing last.



5. Position crimp tool over splice bushing and squeeze tightly for maximum splice strength.

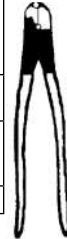


4. Center bushing and be certain chain is straight before crimping.

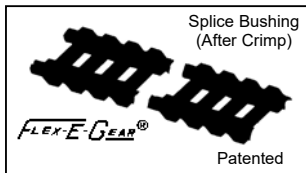
CHAIN SERIES	STOCK NO.	FIELD SPLICE KIT AND ACCESSORIES
31 & 32GCF 24GCF 16GCF	32GCF-7 24GCF-7 16GCF-7	Complete Kit Consists of: Crimp tool, Pitch Spacer, Cable Cutter, Bushings, Razor Blades & Instructions
	TL-4 TL-3	Crimp Tool For 31GCF & 32GCF Crimp Tool for 24GC
	BU-018-S BU-032-S	Extra Splice Bushings for: 31GCF & 32GCF (1/64" Cable) 24GCF (1/32" Cable)
	TL-1	Cable Cutter for up to 3/64" Cable



Cable Cutter



Crimp Tool



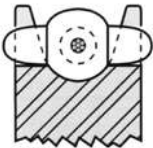
Field Splices offer only 50% of Catalog Rated Loads

W. M. BERG, INC. will factory splice to order any length chain at a nominal charge.

FLEX-E-BELT® TECHNICAL DATA

OPERATING NOTES:

Due to the single steel cable/polyurethane construction, this series offers a flexible, quiet, lube-free drive that can obtain zero backlash and up to 7° of sprocket misalignment.



PITCH	CIRCULAR PITCH	MATERIALS	BERG'S® NAME	PULLEY
32	.0982	Polyurethane (Blue) 1/32" (0.8 mm) Dia. Stainless Steel Cable	Flex-E-Belt®	Operates with 32C, 32D, GPS, GP32, GF32 and GC32 series.

32GBF SERIES

- Weight .11 oz./ft.
- Ultimate tensile 50 lbs., 9 lb./pin (222N, 40N/PIN) - when belt is used in open loop configuration (without splice, no crimp bushing).
- Recommended Maximum Operating Speed 376 feet/min. (1800 rpm)
- Recommended Operating Load 12 lbs.
- Minimum recommended pulley diameter 1/2" P.D.

** Reduce operating load rating by 50% for field splices.

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S® NAME	PULLEY
1/10	.1000	Polyurethane (Red) 1/32" Dia. Stainless Steel Cable	Flex-E-Belt®	Operates with GP31 and GF31 series.

31GBF SERIES

- Weight 11 oz./ft.
- Ultimate tensile 50 lbs., 9 lb./pin - when belt is used in open loop configuration (without splice, no crimp bushing).
- Recommended Maximum Operating Speed 376 feet/min. (1800 rpm)
- Recommended Operating Load 12 lbs.
- Minimum recommended pulley diameter 3/4" P.D.

** Reduce operating load rating by 50% for field splices.

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S® NAME	PULLEY
24	.1309	Polyurethane (Red) 1/32" (0.8 mm) Dia. Stainless Steel Cable	Flex-E-Belt®	Operates with 24C and 24D series.

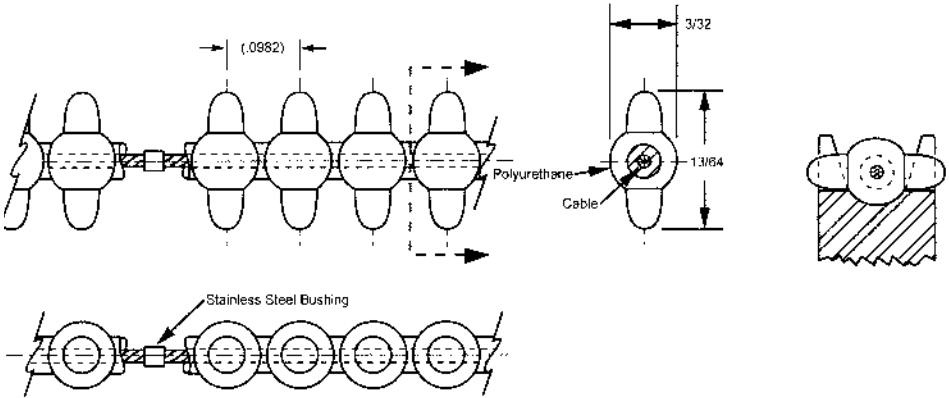
24GBF SERIES

- Weight 13 oz./ft.
- Ultimate tensile 50 lbs., 9 lb./pin - when belt is used in open loop configuration (without splice, no crimp bushing)
- Recommended Maximum Operating Speed 376 feet/min. (1800 rpm)
- Recommended Operating Load 12 lbs.
- Minimum recommended pulley diameter 3/4" P.D.

** Reduce operating load rating by 50% for field splices.

GEAR DRIVE BELTS

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S® NAME	PULLEY
32	.0982	Polyurethane (Blue) 1/32" Dia. Stainless Steel Cable*	Flex-E-Belt®	Operates with 32C, 32D, GPS, GP32, GF32 and GC32 series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
32GBF-49-E	49	4.811
32GBF-52-E	52	5.105
32GBF-53-E	53	5.203
32GBF-64-E	64	6.283
32GBF-67-E	67	6.577
32GBF-75-E	75	7.363
32GBF-80-E	80	7.854
32GBF-95-E	95	9.327
32GBF-112-E	112	10.996
32GBF-126-E	126	12.370
32GBF-128-E	128	12.566
32GBF-144-E	144	14.137
32GBF-158-E	158	15.512
32GBF-176-E	176	17.279
32GBF-189-E	189	18.555
32GBF-208-E	208	20.420
32GBF-220-E	220	21.598
32GBF-240-E	240	23.562
32GBF-252-E	252	24.740
32GBF-272-E	272	26.704
32GBF-283-E	283	27.783
32GBF-304-E	304	29.845
32GBF-315-E	315	30.925
32GBF-336-E	336	32.987
32GBF-346-E	346	33.968
32GBF-377-E	377	37.012
32GBF-400-E	400	39.270
32GBF-408-E	408	40.055
32GBF-432-E	432	42.412
32GBF-440-E	440	43.197
32GBF-464-E	464	45.553
32GBF-471-E	471	46.240
32GBF-480-E	480	47.124
32GBF-496-E	496	48.694
32GBF-512-E	512	50.265
32GBF-544-E	544	53.407
32GBF-560-E	560	54.978
32GBF-576-E	576	56.549
32GBF-640-E	640	62.832

- For Field Splice Kit order 32GBF-7.
 - * Available with Aramid Core. See page VII for alternative belt construction or reverse bending applications.
 - ** Reduce operating load rating by 50% for field splices.
- Other numbers of pitches available on request.

- Accommodates twists and turns
- Odd Angles
- Infinite Lengths
- Silent Drive
- Weight .11 oz./ft.
- Positive Drive
- Zero Backlash
- No Lubrication
- 90A Durometer
- Ultimate Tensile Strength 50 lbs. - 9 lbs./Pin when belt is used in open loop configuration (without splice, no crimp bushing).
- Temperature Range +180°F to -15°F
- Recommended Operating Load 12 lbs.
- Recommended Max. Operating Speed 376 feet/min.

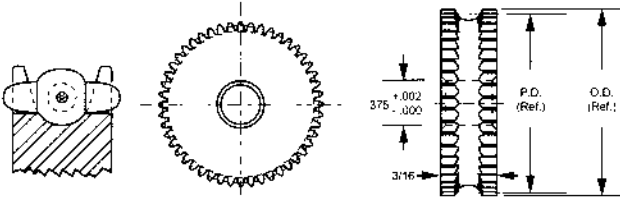
BULK FOOTAGE - NOT SPICED	
STOCK NO.	LENGTH
32GBF-5FT	5 FT
32GBF-10FT	10 FT
32GBF-25FT	25 FT
32GBF-50FT	50 FT
32GBF-100FT	100 FT



E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
32	.0982	3/8"	HUBLESS	2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
32C6-20	20 •	.6250	.688
32C6-22	22 •	.6875	.750
32C6-24	24 •	.7500	.813
32C6-26	26	.8125	.875
32C6-28	28	.8750	.938
32C6-30	30	.9375	1.000
32C6-32	32	1.0000	1.063
32C6-36	36	1.1250	1.188
32C6-40	40	1.2500	1.313
32C6-48	48	1.5000	1.563
32C6-56	56	1.7500	1.813
32C6-64	64	2.0000	2.063
32C6-72	72	2.2500	2.313
32C6-80	80	2.5000	2.563
32C6-88	88	2.7500	2.813
32C6-96	96	3.0000	3.063
32C6-112	112	3.5000	3.563
32C6-128	128	4.0000	4.063



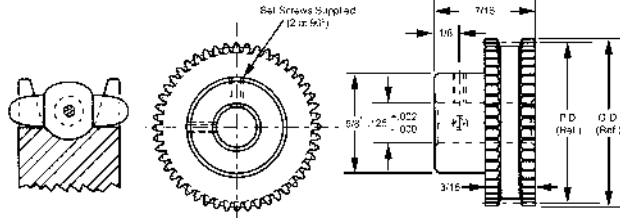
When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.

Teeth could be anodized.



PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
32	.0982	1/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
32D2-16	16 *	.5000	.563
32D2-18	18 *	.5625	.625
32D2-20	20 *	.6250	.688
32D2-22	22 *	.6875	.750
32D2-24	24 *	.7500	.813
32D2-26	26	.8125	.875
32D2-28	28	.8750	.938
32D2-30	30	.9375	1.000
32D2-32	32	1.0000	1.062
32D2-36	36	1.1250	1.187
32D2-40	40	1.2500	1.313
32D2-48	48	1.5000	1.563
32D2-56	56	1.7500	1.813
32D2-64	64	2.0000	2.063
32D2-72	72	2.2500	2.313
32D2-80	80	2.5000	2.563
32D2-88	88	2.7500	2.813
32D2-96	96	3.0000	3.063
32D2-112	112	3.5000	3.563
32D2-128	128	4.0000	4.063



• For 16-22 teeth, hub diameter equals .41.
When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.

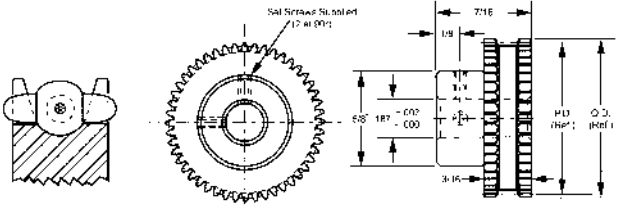
Teeth could be anodized.



E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
32	.0982	3/16"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series

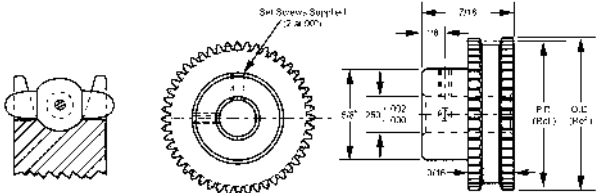
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
32D3-16	16 *	.5000	.563
32D3-18	18 *	.5625	.625
32D3-20	20 *	.6250	.688
32D3-22	22 *	.6875	.750
32D3-24	24 *	.7500	.813
32D3-26	26	.8125	.875
32D3-28	28	.8750	.938
32D3-30	30	.9375	1.000
32D3-32	32	1.0000	1.063
32D3-36	36	1.1250	1.188
32D3-40	40	1.2500	1.313
32D3-48	48	1.5000	1.563
32D3-56	56	1.7500	1.813
32D3-64	64	2.0000	2.063
32D3-72	72	2.2500	2.313
32D3-80	80	2.5000	2.563
32D3-88	88	2.7500	2.813
32D3-96	96	3.0000	3.063
32D3-112	112	3.5000	3.563
32D3-128	128	4.0000	4.063



• For 16-22 teeth, hub diameter equals .41.
When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.
Teeth could be anodized.

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
32	.0982	1/4"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
32D4-16	16 *	.5000	.563
32D4-18	18 *	.5625	.625
32D4-20	20 *	.6250	.688
32D4-22	22 *	.6875	.750
32D4-24	24 *	.7500	.813
32D4-26	26	.8125	.875
32D4-28	28	.8750	.9378
32D4-30	30	.9375	1.000
32D4-32	32	1.0000	1.063
32D4-36	36	1.1250	1.1878
32D4-40	40	1.2500	1.313
32D4-48	48	1.5000	1.563
32D4-56	56	1.7500	1.813
32D4-64	64	2.0000	2.063
32D4-72	72	2.2500	2.313
32D4-80	80	2.5000	2.563
32D4-88	88	2.7500	2.813
32D4-96	96	3.0000	3.063
32D4-112	112	3.5000	3.563
32D4-128	128	4.0000	4.063

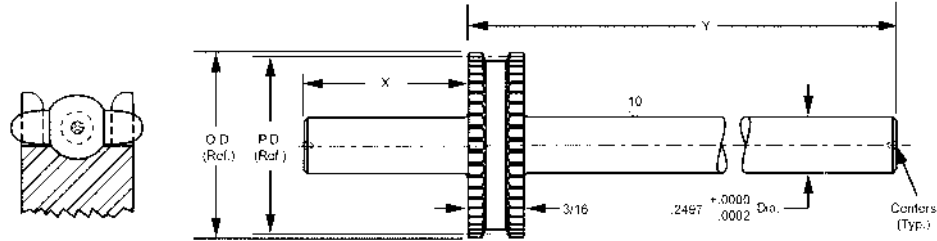


• For 16-22 teeth, hub diameter equals .41.
When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.
Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	SHAFT DIAMETER	STYLE	MATERIALS	BERG'S ® NAME	BELT
32	.0982	.2497	PINION SHAFT	303 Stainless Steel	Flex-E-Belt®	Operates with 32GBF Series

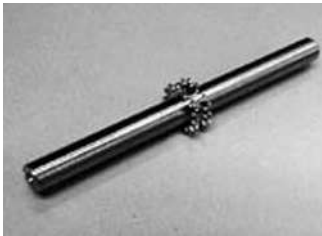
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STOCK NO.	NO. OF TEETH	X	Y	PITCH DIA.	OUTSIDE DIA.
GPS-1	14 *	—	3.187	.4375	.500
GPS-2	15 *	—	3.187	.4687	.531
GPS-3	16 *	—	3.187	.5000	.562
GPS-4	14 *	1.500	1.687	.4375	.500
GPS-5	15 *	1.500	1.687	.4687	.531
GPS-6	16 *	1.500	1.687	.5000	.562

- * For idler use only.
- * When used with 32GBF belt, use as an idler only.

Other numbers of teeth available on request.



E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
32	.0982	1/8"	CLUSTER HUB	303 Stainless Steel	Flex-E-Belt®	Operates with 32GBF Series

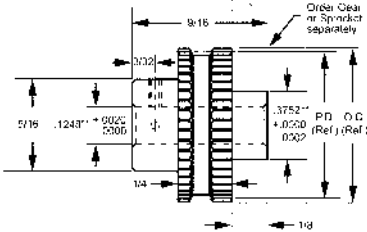
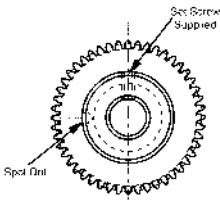
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GPS-7	14 *	.4375	.500
GPS-8	15 *	.4688	.531
GPS-9	16 *	.5000	.563

Drive Belt Cluster Hubs

- * For idler use only.
- When used with 32GBF belt, use as an idler only.

** Bore and shoulder concentric within .0005.

Other numbers of teeth available on request.



PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
32	.0982	3/16"	CLUSTER HUB	303 Stainless Steel	Flex-E-Belt®	Operates with 32GBF Series

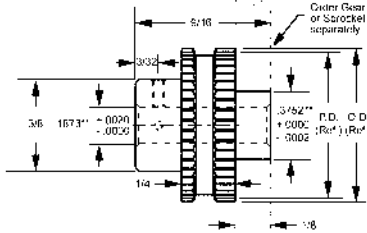
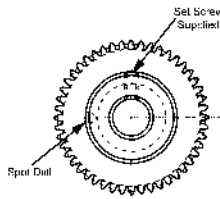
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GPS-10	14 *	.4375	.500
GPS-11	15 *	.4688	.531
GPS-12	16 *	.5000	.563

Drive Belt Cluster Hubs

- * For idler use only.
- When used with 32GBF belt, use as an idler only.

** Bore and shoulder concentric within .0005.

Other numbers of teeth available on request.



E-Z ENTRY BELT PULLEYS

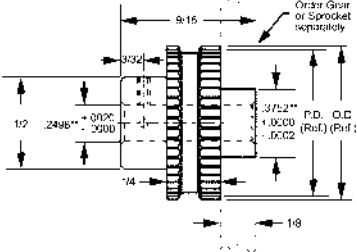
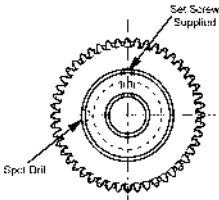
PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
32	.0982	1/4"	CLUSTER HUB	303 Stainless Steel	Flex-E-Belt®	Operates with 32GBF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GPS-23	14 *	.4375	.500
GPS-24	15 *	.4688	.531
GPS-25	16 *	.5000	.563

Drive Belt Cluster Hubs

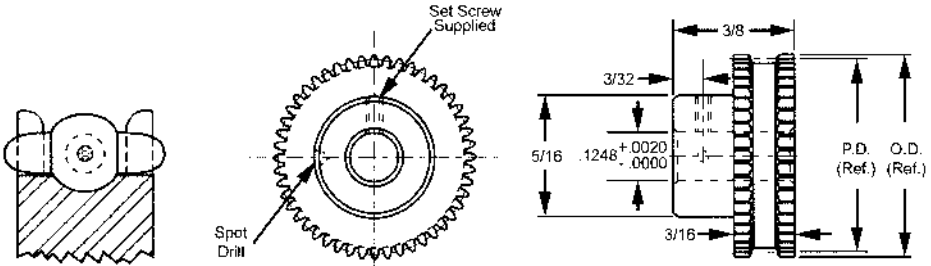
- * For idler use only.
- When used with 32GBF belt, use as an idler only.
- ** Bore and shoulder concentric within .0005.

Other numbers of teeth available on request.



E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
32	.0982	1/8"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GP32S14-14	GP32A14-14	14**	.4375	.500
GP32S14-15	GP32A14-15	15**	.4688	.531
GP32S14-16	GP32A14-16	16•	.5000	.563
GP32S14-18	GP32A14-18	18•	.5625	.625
GP32S14-20	GP32A14-20	20•	.6250	.688
GP32S14-22	GP32A14-22	22•	.6875	.750
GP32S14-24	GP32A14-24	24•	.7500	.813
GP32S14-26	GP32A14-26	26	.8125	.875
GP32S14-28	GP32A14-28	28	.8750	.938
GP32S14-30	GP32A14-30	30	.9375	1.000
GP32S14-32	GP32A14-32	32	1.0000	1.063
GP32S14-36	GP32A14-36	36	1.1250	1.188
GP32S14-40	GP32A14-40	40	1.2500	1.313
GP32S14-48	GP32A14-48	48	1.5000	1.563
GP32S14-56	GP32A14-56	56 *	1.7500	1.813
GP32S14-64	GP32A14-64	64 *	2.0000	2.063
GP32S14-72	GP32A14-72	72 *	2.2500	2.313
GP32S14-80	GP32A14-80	80 *	2.5000	2.563
GP32S14-88	GP32A14-88	88 *	2.7500	2.813
GP32S14-96	GP32A14-96	96 *	3.0000	3.063
GP32S14-112	GP32A14-112	112 *	3.5000	3.563
GP32S14-128	GP32A14-128	128 *	4.0000	4.063



* May be 2 piece construction with Stainless Steel Hub, outline and overall dimensions change slightly.

** For idler use only.

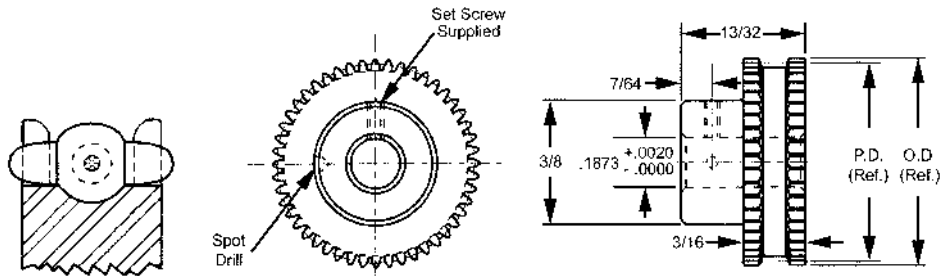
• When used with 32GBF, use as an idler only.
Other numbers of teeth available on request.

Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
32	.0982	3/16"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series

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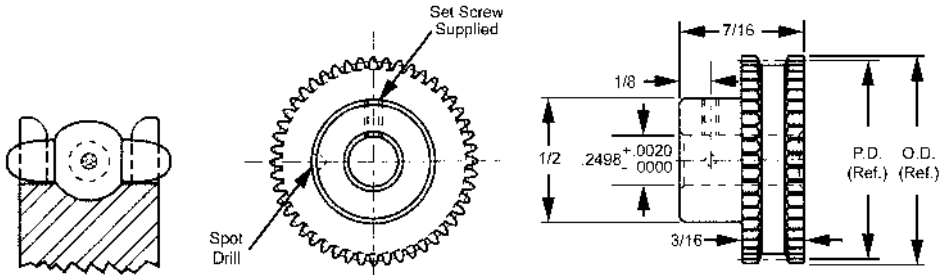
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GP32S21-15	GP32A21-15	15*	.4688	.531
GP32S21-16	GP32A21-16	16*	.5000	.563
GP32S21-18	GP32A21-18	18*	.5625	.625
GP32S21-20	GP32A21-20	20*	.6250	.688
GP32S21-22	GP32A21-22	22*	.6875	.750
GP32S21-24	GP32A21-24	24*	.7500	.813
GP32S21-26	GP32A21-26	26	.8125	.875
GP32S21-28	GP32A21-28	28	.8750	.938
GP32S21-30	GP32A21-30	30	.9375	1.000
GP32S21-32	GP32A21-32	32	1.0000	1.063
GP32S21-36	GP32A21-36	36	1.1250	1.188
GP32S21-40	GP32A21-40	40	1.2500	1.313
GP32S21-48	GP32A21-48	48	1.5000	1.563
GP32S21-56	GP32A21-56	56	1.7500	1.813
GP32S21-64	GP32A21-64	64	2.0000	2.063
GP32S21-72	GP32A21-72	72	2.2500	2.313
GP32S21-80	GP32A21-80	80	2.5000	2.563
GP32S21-88	GP32A21-88	88	2.7500	2.813
GP32S21-96	GP32A21-96	96	3.0000	3.063
GP32S21-112	GP32A21-112	112	3.5000	3.563
GP32S21-128	GP32A21-128	128	4.0000	4.063



* For idler use only.
• When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.
Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
32	.0982	1/4"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GP32S28-20	GP32A28-20	20•	.6250	.688
GP32S28-22	GP32A28-22	22•	.6875	.750
GP32S28-24	GP32A28-24	24•	.7500	.813
GP32S28-26	GP32A28-26	26	.8125	.875
GP32S28-28	GP32A28-28	28	.8750	.938
GP32S28-30	GP32A28-30	30	.9375	1.000
GP32S28-32	GP32A28-32	32	1.0000	1.063
GP32S28-36	GP32A28-36	36	1.1250	1.188
GP32S28-40	GP32A28-40	40	1.2500	1.313
GP32S28-48	GP32A28-48	48	1.5000	1.563
GP32S28-56	GP32A28-56	56	1.7500	1.813
GP32S28-64	GP32A28-64	64	2.0000	2.063
GP32S28-72	GP32A28-72	72	2.2500	2.313
GP32S28-80	GP32A28-80	80	2.5000	2.563
GP32S28-88	GP32A28-88	88	2.7500	2.813
GP32S28-96	GP32A28-96	96	3.0000	3.063
GP32S28-112	GP32A28-112	112	3.5000	3.563
GP32S28-128	GP32A28-128	128	4.0000	4.063



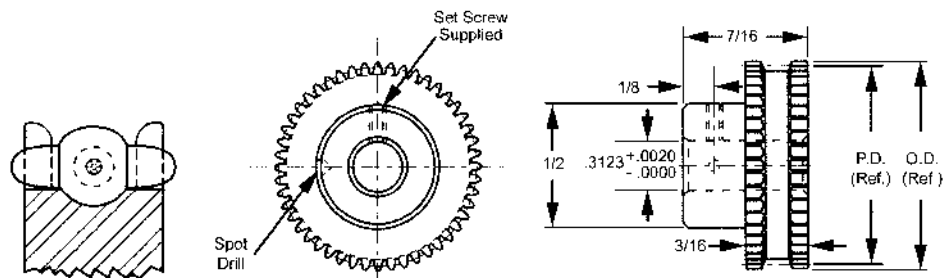
• When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.

Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
32	.0982	5/16"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series

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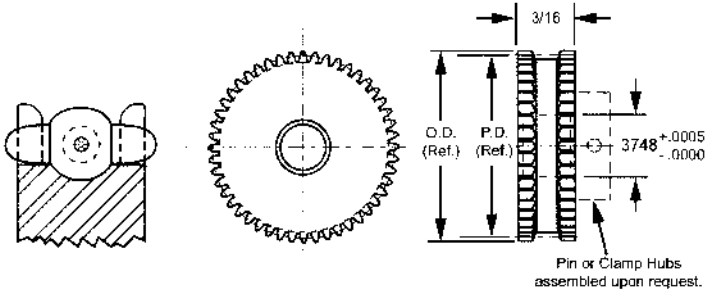
303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GP32S32-20	GP32A32-20	20•	.6250	.688
GP32S32-22	GP32A32-22	22•	.6875	.750
GP32S32-24	GP32A32-24	24•	.7500	.813
GP32S32-26	GP32A32-26	26	.8125	.875
GP32S32-28	GP32A32-28	28	.8750	.938
GP32S32-30	GP32A32-30	30	.9375	1.000
GP32S32-32	GP32A32-32	32	1.0000	1.063
GP32S32-36	GP32A32-36	36	1.1250	1.188
GP32S32-40	GP32A32-40	40	1.2500	1.313
GP32S32-48	GP32A32-48	48	1.5000	1.563
GP32S32-56	GP32A32-56	56	1.7500	1.813
GP32S32-64	GP32A32-64	64	2.0000	2.063
GP32S32-72	GP32A32-72	72	2.2500	2.313
GP32S32-80	GP32A32-80	80	2.5000	2.563
GP32S32-88	GP32A32-88	88	2.7500	2.813
GP32S32-96	GP32A32-96	96	3.0000	3.063
GP32S32-112	GP32A32-112	112	3.5000	3.563
GP32S32-128	GP32A32-128	128	4.0000	4.063



• When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.
Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
32	.0982	3/8"	HUBLESS	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GF32S5-24	GF32A5-24	24•	.7500	.813
GF32S5-25	GF32A5-25	25	.7813	.844
GF32S5-26	GF32A5-26	26	.8125	.875
GF32S5-27	GF32A5-27	27	.8438	.906
GF32S5-28	GF32A5-28	28	.8750	.938
GF32S5-29	GF32A5-29	29	.9063	.969
GF32S5-30	GF32A5-30	30	.9375	1.000
GF32S5-32	GF32A5-32	32	1.0000	1.063
GF32S5-36	GF32A5-36	36	1.1250	1.188
GF32S5-40	GF32A5-40	40	1.2500	1.313
GF32S5-48	GF32A5-48	48	1.5000	1.563
GF32S5-50	GF32A5-50	50	1.5625	1.625
GF32S5-56	GF32A5-56	56	1.7500	1.813
GF32S5-64	GF32A5-64	64	2.0000	2.063
GF32S5-72	GF32A5-72	72	2.2500	2.313
GF32S5-80	GF32A5-80	80	2.5000	2.563
GF32S5-88	GF32A5-88	88	2.7500	2.813
GF32S5-90	GF32A5-90	90	2.8125	2.875
GF32S5-96	GF32A5-96	96	3.0000	3.063
GF32S5-100	GF32A5-100	100	3.1250	3.188
GF32S5-112	GF32A5-112	112	3.5000	3.563
GF32S5-120	GF32A5-120	120	3.7500	3.813
GF32S5-128	GF32A5-128	128	4.0000	4.063

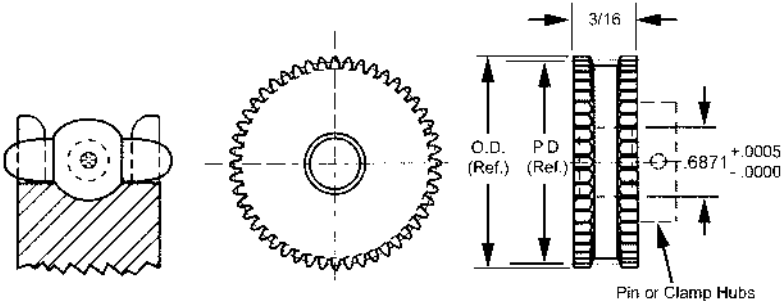
For hubs, see section I.



• When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.
Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	NOTE
32	.0982	11/16"	HUBLESS	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series Belt



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GF32S19-24	GF32A19-24	24•	.7500	.813
GF32S19-25	GF32A19-25	25	.7813	.844
GF32S19-26	GF32A19-26	26	.8125	.875
GF32S19-27	GF32A19-27	27	.8438	.906
GF32S19-28	GF32A19-28	28	.8750	.938
GF32S19-29	GF32A19-29	29	.9063	.969
GF32S19-30	GF32A19-30	30	.9375	1.000
GF32S19-32	GF32A19-32	32	1.0000	1.063
GF32S19-36	GF32A19-36	36	1.1250	1.188
GF32S19-40	GF32A19-40	40	1.2500	1.313
GF32S19-48	GF32A19-48	48	1.5000	1.563
GF32S19-50	GF32A19-50	50	1.5625	1.625
GF32S19-56	GF32A19-56	56	1.7500	1.813
GF32S19-64	GF32A19-64	64	2.0000	2.063
GF32S19-72	GF32A19-72	72	2.2500	2.313
GF32S19-80	GF32A19-80	80	2.5000	2.563
GF32S19-88	GF32A19-88	88	2.7500	2.813
GF32S19-90	GF32A19-90	90	2.8125	2.875
GF32S19-96	GF32A19-96	96	3.0000	3.063
GF32S19-100	GF32A19-100	100	3.1250	3.188
GF32S19-112	GF32A19-112	112	3.5000	3.563
GF32S19-120	GF32A19-120	120	3.7500	3.813
GF32S19-128	GF32A19-128	128	4.0000	4.063

For hubs, see section I.

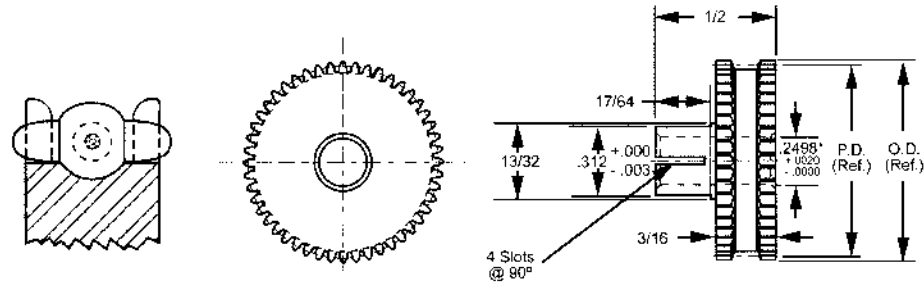


• When used with 32GBF belt, use as an idler only.
Other numbers of teeth available on request.

Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	NOTE
32	.0982	1/4"	CLAMP HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 32GBF Series Belt



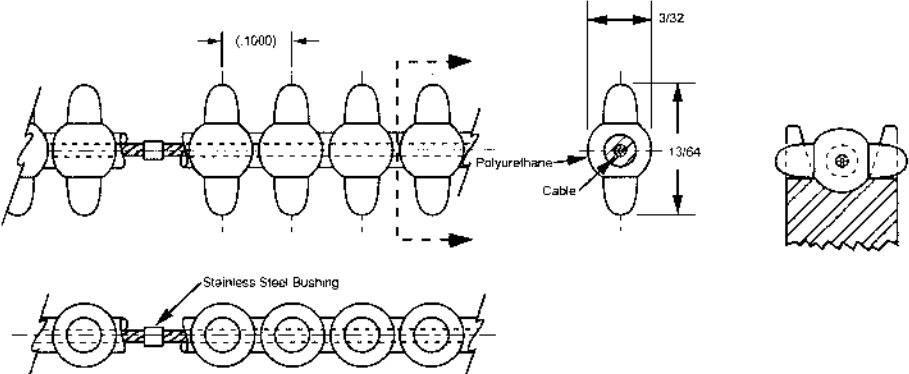
For clamps, see section I.

303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GC32S28-14	GC32A28-14	14**	.4375	.500
GC32S28-15	GC32A28-15	15**	.4688	.531
GC32S28-16	GC32A28-16	16•	.5000	.563
GC32S28-18	GC32A28-18	18•	.5625	.625
GC32S28-20	GC32A28-20	20•	.6250	.688
GC32S28-22	GC32A28-22	22•	.6875	.750
GC32S28-24	GC32A28-24	24•	.7500	.813
GC32S28-26	GC32A28-26	26	.8125	.875
GC32S28-28	GC32A28-28	28	.8750	.938
GC32S28-30	GC32A28-30	30	.9375	1.000
GC32S28-32	GC32A28-32	32	1.0000	1.063
GC32S28-36	GC32A28-36	36	1.1250	1.188
GC32S28-40	GC32A28-40	40	1.2500	1.313
GC32S28-48	GC32A28-48	48	1.5000	1.563
GC32S28-56	GC32A28-56	56	1.7500	1.813
GC32S28-64	GC32A28-64	64	2.0000	2.063
GC32S28-72	GC32A28-72	72	2.2500	2.313
GC32S28-80	GC32A28-80	80	2.5000	2.563
GC32S28-88	GC32A28-88	88	2.7500	2.813
GC32S28-96	GC32A28-96	96	3.0000	3.063
GC32S28-112	GC32A28-112	112	3.5000	3.563
GC32S28-128	GC32A28-128	128	4.0000	4.063

* NOTE: 3/16" and 1/8" bores available on request.
** For idler use only.
• When used with 32GBF belt, use as an idler only.
Other numbers of teeth available upon request.
Teeth could be anodized.

GEAR DRIVE BELTS

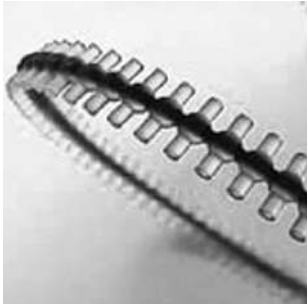
PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	PULLEY
1/10	.1000	Polyurethane (Red) 1/32" Dia. Stainless Steel Cable*	Flex-E-Belt®	Operates with GP31 and GF31 series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
31GBF-50-E	50	5.000
31GBF-52-E	52	5.200
31GBF-54-E	54	5.400
31GBF-56-E	56	5.600
31GBF-58-E	58	5.800
31GBF-60-E	60	6.000
31GBF-65-E	65	6.500
31GBF-70-E	70	7.000
31GBF-75-E	75	7.500
31GBF-80-E	80	8.000
31GBF-85-E	85	8.500
31GBF-90-E	90	9.000
31GBF-100-E	100	10.000
31GBF-110-E	110	11.000
31GBF-120-E	120	12.000
31GBF-130-E	130	13.000
31GBF-140-E	140	14.000
31GBF-150-E	150	15.000
31GBF-160-E	160	16.000
31GBF-170-E	170	17.000
31GBF-180-E	180	18.000
31GBF-190-E	190	19.000
31GBF-200-E	200	20.000
31GBF-210-E	210	21.000
31GBF-220-E	220	22.000
31GBF-230-E	230	23.000
31GBF-240-E	240	24.000
31GBF-250-E	250	25.000
31GBF-260-E	260	26.000
31GBF-270-E	270	27.000
31GBF-280-E	280	28.000
31GBF-300-E	300	30.000
31GBF-350-E	350	35.000
31GBF-400-E	400	40.000
31GBF-480-E	480	48.000
31GBF-500-E	500	50.000
31GBF-800-E	800	80.000

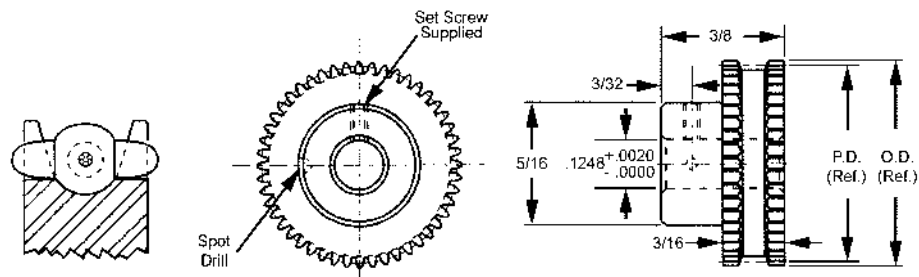
- For Field Splice Kit order 32GBF-7.
- * Available with Aramid Core. See page VII for alternative belt construction or reverse bending applications.
- ** Reduce operating load rating by 50% for field splices.
- Odd Angles
- Infinite Lengths
- Accommodates twists and turns
- Positive Drive
- Zero Backlash
- No Lubrication
- Weight .11 oz./ft.
- 90A Durometer
- Ultimate Tensile Strength 50 lbs. - 8 lbs./Pin when belt is used in open loop configuration (without splice, no crimp bushing).
- Temperature Range +180°F to -15°F
- Recommended Operating Load 12 lbs.
- Recommended Max. Operating Speed 376 feet/min.

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
31GBF-5FT	5 FT
31GBF-10FT	10 FT
31GBF-25FT	25 FT
31GBF-50FT	50 FT
31GBF-100FT	100 FT



E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
1/10	.1000	1/8"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 31GBF Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GP31S14-14	GP31A14-14	14**	.4456	.510
GP31S14-15	GP31A14-15	15**	.4775	.541
GP31S14-16	GP31A14-16	16**	.5093	.573
GP31S14-18	GP31A14-18	18**	.5729	.637
GP31S14-20	GP31A14-20	20**	.6366	.701
GP31S14-22	GP31A14-22	22**	.7003	.764
GP31S14-24	GP31A14-24	24	.7639	.828
GP31S14-26	GP31A14-26	26	.8276	.892
GP31S14-28	GP31A14-28	28	.8912	.955
GP31S14-30	GP31A14-30	30	.9549	1.019
GP31S14-32	GP31A14-32	32	1.0186	1.083
GP31S14-36	GP31A14-36	36	1.1459	1.210
GP31S14-40	GP31A14-40	40	1.2732	1.337
GP31S14-48	GP31A14-48	48	1.5278	1.592
GP31S14-56	GP31A14-56	56*	1.7825	1.846
GP31S14-64	GP31A14-64	64*	2.0371	2.101
GP31S14-72	GP31A14-72	72*	2.2918	2.356
GP31S14-80	GP31A14-80	80*	2.5464	2.610
GP31S14-88	GP31A14-88	88*	2.8010	2.865
GP31S14-96	GP31A14-96	96*	3.0557	3.120
GP31S14-112	GP31A14-112	112*	3.5650	3.629
GP31S14-128	GP31A14-128	128*	4.0742	4.138

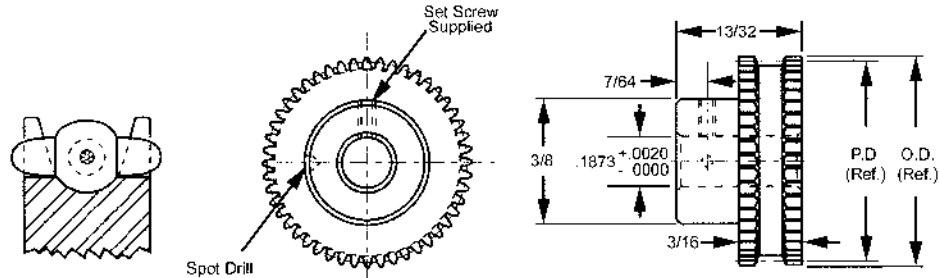


* May be 2 piece construction with 303 Stainless Steel Hub, outline and overall dimensions change slightly.
** Pulleys with .750 P.D. and smaller are for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
1/10	.1000	3/16"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 31GBF Series

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303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GP31S21-15	GP31A21-15	15**	.4775	.541
GP31S21-16	GP31A21-16	16**	.5093	.573
GP31S21-18	GP31A21-18	18**	.5729	.637
GP31S21-20	GP31A21-20	20**	.6366	.701
GP31S21-22	GP31A21-22	22**	.7003	.764
GP31S21-24	GP31A21-24	24	.7639	.828
GP31S21-26	GP31A21-26	26	.8276	.892
GP31S21-28	GP31A21-28	28	.8912	.955
GP31S21-30	GP31A21-30	30	.9549	1.019
GP31S21-32	GP31A21-32	32	1.0186	1.083
GP31S21-36	GP31A21-36	36	1.1459	1.210
GP31S21-40	GP31A21-40	40	1.2732	1.337
GP31S21-48	GP31A21-48	48	1.5278	1.592
GP31S21-56	GP31A21-56	56	1.7825	1.846
GP31S21-64	GP31A21-64	64	2.0371	2.101
GP31S21-72	GP31A21-72	72	2.2918	2.356
GP31S21-80	GP31A21-80	80	2.5464	2.610
GP31S21-88	GP31A21-88	88	2.8010	2.865
GP31S21-96	GP31A21-96	96	3.0557	3.120
GP31S21-112	GP31A21-112	112	3.5650	3.629
GP31S21-128	GP31A21-128	128	4.0742	4.138

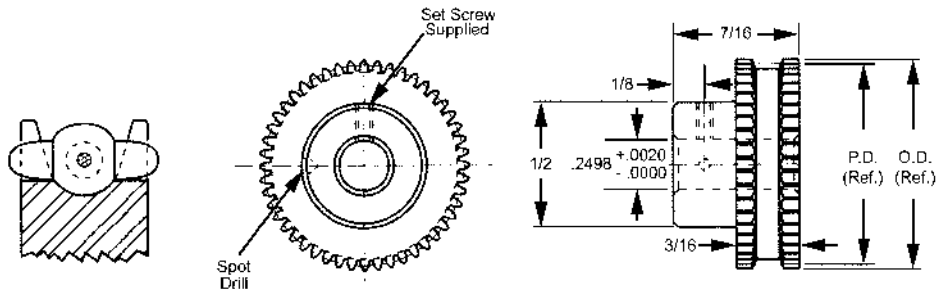


** Pulleys with .750 P.D. and smaller are for idler use only.
Other numbers of pitches are available on request.

Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
1/10	.1000	1/4"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 31GBF Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GP31S28-20	GP31A28-20	20**	.6366	.701
GP31S28-22	GP31A28-22	22**	.7003	.764
GP31S28-24	GP31A28-24	24	.7639	.828
GP31S28-26	GP31A28-26	26	.8276	.892
GP31S28-28	GP31A28-28	28	.8912	.955
GP31S28-30	GP31A28-30	30	.9549	1.019
GP31S28-32	GP31A28-32	32	1.0186	1.083
GP31S28-36	GP31A28-36	36	1.1459	1.210
GP31S28-40	GP31A28-40	40	1.2732	1.337
GP31S28-48	GP31A28-48	48	1.5278	1.592
GP31S28-56	GP31A28-56	56	1.7825	1.846
GP31S28-64	GP31A28-64	64	2.0371	2.101
GP31S28-72	GP31A28-72	72	2.2918	2.356
GP31S28-80	GP31A28-80	80	2.5464	2.610
GP31S28-88	GP31A28-88	88	2.8010	2.865
GP31S28-96	GP31A28-96	96	3.0557	3.120
GP31S28-112	GP31A28-112	112	3.5650	3.629
GP31S28-128	GP31A28-128	128	4.0742	4.138

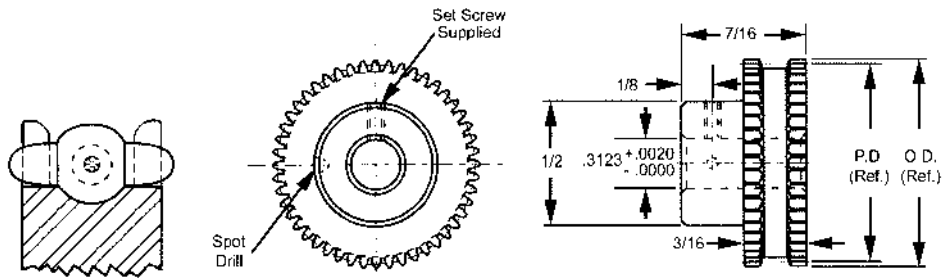


** Pulleys with .750 P.D. and smaller for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
1/10	.1000	5/16"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 31GBF Series

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303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GP31S32-20	GP31A32-20	20**	.6366	.701
GP31S32-22	GP31A32-22	22**	.7003	.764
GP31S32-24	GP31A32-24	24	.7639	.828
GP31S32-26	GP31A32-26	26	.8276	.892
GP31S32-28	GP31A32-28	28	.8912	.955
GP31S32-30	GP31A32-30	30	.9549	1.019
GP31S32-32	GP31A32-32	32	1.0186	1.083
GP31S32-36	GP31A32-36	36	1.1459	1.210
GP31S32-40	GP31A32-40	40	1.2732	1.337
GP31S32-48	GP31A32-48	48	1.5278	1.592
GP31S32-56	GP31A32-56	56	1.7825	1.846
GP31S32-64	GP31A32-64	64	2.0371	2.101
GP31S32-72	GP31A32-72	72	2.2918	2.356
GP31S32-80	GP31A32-80	80	2.5464	2.610
GP31S32-88	GP31A32-88	88	2.8010	2.865
GP31S32-96	GP31A32-96	96	3.0557	3.120
GP31S32-112	GP31A32-112	112	3.5650	3.629
GP31S32-128	GP31A32-128	128	4.0742	4.138

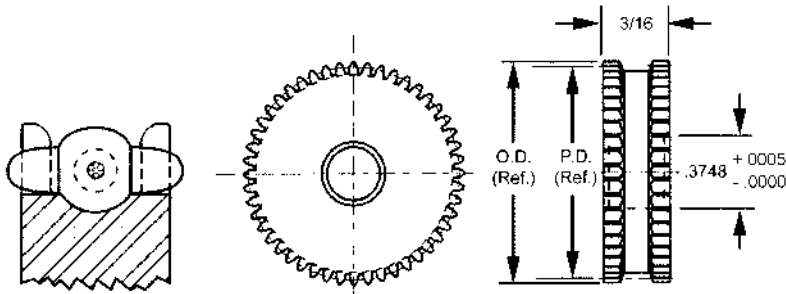


** Pulleys with .750 P.D. and smaller for idler use only.
Other numbers of teeth are available on request.

Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
1/10	.1000	3/8"	HUBLESS	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 31GBF Series



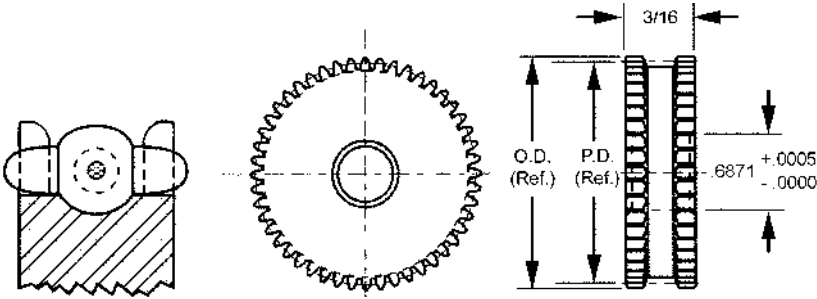
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GF31S5-24	GF31A5-24	24	.7639	.828
GF31S5-25	GF31A5-25	25	.7958	.860
GF31S5-26	GF31A5-26	26	.8276	.892
GF31S5-27	GF31A5-27	27	.8594	.923
GF31S5-28	GF31A5-28	28	.8912	.955
GF31S5-29	GF31A5-29	29	.9231	.987
GF31S5-30	GF31A5-30	30	.9549	1.019
GF31S5-32	GF31A5-32	32	1.0185	1.083
GF31S5-36	GF31A5-36	36	1.1459	1.210
GF31S5-40	GF31A5-40	40	1.2732	1.337
GF31S5-48	GF31A5-48	48	1.5278	1.592
GF31S5-50	GF31A5-50	50	1.5915	1.656
GF31S5-56	GF31A5-56	56	1.7825	1.846
GF31S5-64	GF31A5-64	64	2.0371	2.101
GF31S5-72	GF31A5-72	72	2.2918	2.355
GF31S5-80	GF31A5-80	80	2.5464	2.610
GF31S5-88	GF31A5-88	88	2.8010	2.865
GF31S5-90	GF31A5-90	90	2.8647	2.929
GF31S5-96	GF31A5-96	96	3.0557	3.120
GF31S5-100	GF31A5-100	100	3.1830	3.247
GF31S5-112	GF31A5-112	112	3.5650	3.629
GF31S5-120	GF31A5-120	120	3.8196	3.884
GF31S5-128	GF31A5-128	128	4.0743	4.138



Other numbers of teeth available on request.
Pin or Clamp hubs assembled on request.
Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
1/10	.1000	11/16"	HUBLESS	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 31GBF Series



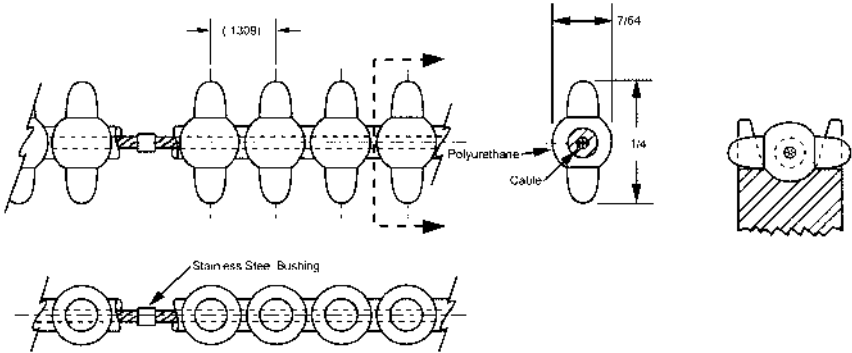
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
GF31S19-27	GF31A19-27	27	.8594	.923
GF31S19-28	GF31A19-28	28	.8912	.955
GF31S19-29	GF31A19-29	29	.9231	.987
GF31S19-30	GF31A19-30	30	.9549	1.019
GF31S19-32	GF31A19-32	32	1.0185	1.083
GF31S19-36	GF31A19-36	36	1.1459	1.210
GF31S19-40	GF31A19-40	40	1.2732	1.337
GF31S19-48	GF31A19-48	48	1.5278	1.592
GF31S19-50	GF31A19-50	50	1.5915	1.656
GF31S19-56	GF31A19-56	56	1.7825	1.846
GF31S19-64	GF31A19-64	64	2.0371	2.101
GF31S19-72	GF31A19-72	72	2.2918	2.356
GF31S19-80	GF31A19-80	80	2.5464	2.610
GF31S19-88	GF31A19-88	88	2.8010	2.865
GF31S19-90	GF31A19-90	90	2.8647	2.929
GF31S19-96	GF31A19-96	96	3.0557	3.120
GF31S19-100	GF31A19-100	100	3.1830	3.247
GF31S19-112	GF31A19-112	112	3.5650	3.629
GF31S19-120	GF31A19-120	120	3.8196	3.884
GF31S19-128	GF31A19-128	128	4.0743	4.138



Other numbers of teeth available on request.
Pin or Clamp hubs assembled on request.
Teeth could be anodized.

GEAR DRIVE BELTS

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	PULLEY
24	.1309	Polyurethane (Red) 1/32" Dia. Stainless Steel Cable	Flex-E-Belt®	Operates with 24C and 24D series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
24GBF-50-E	50	6.545
24GBF-52-E	52	6.807
24GBF-54-E	54	7.069
24GBF-56-E	56	7.330
24GBF-58-E	58	7.592
24GBF-60-E	60	7.854
24GBF-62-E	62	8.116
24GBF-64-E	64	8.378
24GBF-66-E	66	8.639
24GBF-68-E	68	8.901
24GBF-70-E	70	9.163
24GBF-75-E	75	9.817
24GBF-80-E	80	10.472
24GBF-85-E	85	11.126
24GBF-90-E	90	11.781
24GBF-95-E	95	12.435
24GBF-100-E	100	13.090
24GBF-105-E	105	13.744
24GBF-110-E	110	14.399
24GBF-115-E	115	15.053
24GBF-120-E	120	15.708
24GBF-130-E	130	17.017
24GBF-140-E	140	18.326
24GBF-150-E	150	19.635
24GBF-160-E	160	20.944
24GBF-170-E	170	22.253
24GBF-180-E	180	23.562
24GBF-190-E	190	24.870
24GBF-200-E	200	26.180
24GBF-220-E	220	28.798
24GBF-240-E	240	31.416
24GBF-260-E	260	34.034
24GBF-280-E	280	36.652
24GBF-300-E	300	39.270
24GBF-320-E	320	41.888
24GBF-360-E	360	47.124
24GBF-420-E	420	54.978

For Field Splice Kit order 24GBF-7.

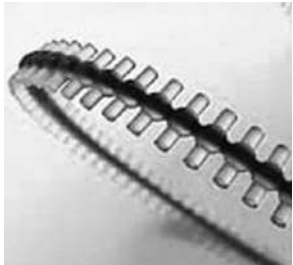
* Available with Aramid Core. See page VII for alternative belt construction or reverse bending applications.

** Reduce operating load rating by 50% for field splices.

- Positive Drive
- Accommodates twists and turns
- Odd Angles
- No Lubrication
- Infinite Lengths
- Zero Backlash
- Weight .13 oz./ft.
- 90A Durometer
- Ultimate Tensile Strength 50 lbs. - 9 lbs./Pin when belt is used in open loop configuration (without splice, no crimp bushing)
- Recommended Operating Load 12 lbs.
- Recommended Max. Operating Speed 376 feet/min.
- Temperature Range +180°F to -15°F

Other numbers of pitches available on request.

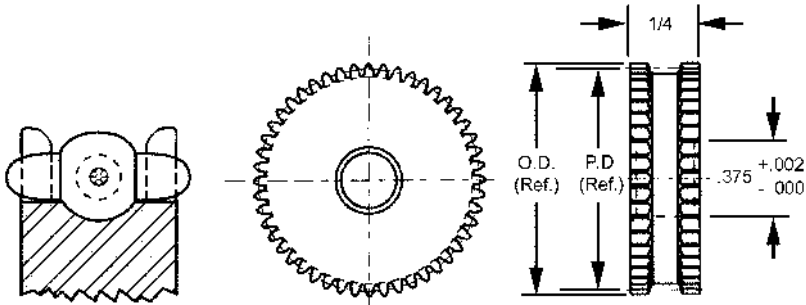
BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
24GBF-5FT	5 FT
24GBF-10FT	10 FT
24GBF-25FT	25 FT
24GBF-50FT	50 FT
24GBF-100FT	100 FT



E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
24	.1309	3/8"	HUBLESS	2024-T4 Aluminum Red Anodized	Flex-E-Belt®	Operates with 24GBF Series

A



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24C6-15	15**	.6250	.708
24C6-16	16**	.6667	.750
24C6-18	18**	.7500	.833
24C6-20	20	.8333	.917
24C6-21	21	.8750	.958
24C6-24	24	1.0000	1.083
24C6-30	30	1.2500	1.333
24C6-36	36	1.5000	1.583
24C6-42	42	1.7500	1.833
24C6-48	48	2.0000	2.083
24C6-60	60	2.5000	2.583
24C6-72	72	3.0000	3.083
24C6-96	96	4.0000	4.083
24C6-120	120	5.0000	5.083
24C6-144	144	6.0000	6.083



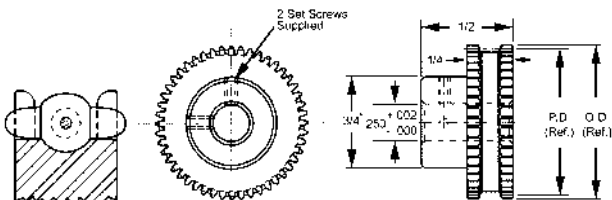
** Pulleys with .750 P.D. and smaller for idler use only.

Teeth could be anodized.

E-Z ENTRY BELT PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
24	.1309	1/4"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 24GBF Series

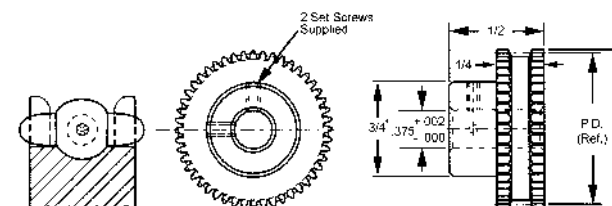
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24D4-14	14*	.5833	.667
24D4-15	15*	.6250	.708
24D4-16	16*	.6667	.750
24D4-18	18*	.7500	.833
24D4-20	20*	.8333	.917
24D4-21	21	.8750	.958
24D4-24	24	1.0000	1.083
24D4-30	30	1.2500	1.333
24D4-36	36	1.5000	1.583
24D4-42	42	1.7500	1.833
24D4-48	48	2.0000	2.083
24D4-60	60	2.5000	2.583
24D4-72	72	3.0000	3.083
24D4-96	96	4.0000	4.083
24D4-120	120	5.0000	5.083
24D4-144	144	6.0000	6.083



- * For 14-20 teeth, hub diameter equals .47.
 - * Pulleys with .750 P.D. and smaller for idler use only.
- Teeth could be anodized.

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
24	.1309	3/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 24GBF Series

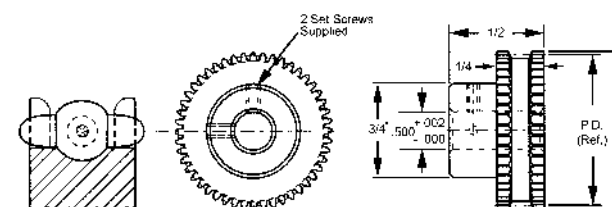
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24D6-18	18*	.7500	.833
24D6-20	20*	.8333	.917
24D6-21	21	.8750	.958
24D6-24	24	1.0000	1.083
24D6-30	30	1.2500	1.333
24D6-36	36	1.5000	1.583
24D6-42	42	1.7500	1.833
24D6-48	48	2.0000	2.083
24D6-60	60	2.5000	2.583
24D6-72	72	3.0000	3.083
24D6-96	96	4.0000	4.083
24D6-120	120	5.0000	5.083
24D6-144	144	6.0000	6.083



- * For 18-20 teeth, hub diameter equals .64.
 - * Pulleys with .750 P.D. and smaller for idler use only.
- Teeth could be anodized.

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
24	.1309	1/2"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Belt®	Operates with 24GBF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
24D8-20	20*	.8333	.917
24D8-21	21	.8750	.958
24D8-24	24	1.0000	1.083
24D8-30	30	1.2500	1.333
24D8-36	36	1.5000	1.583
24D8-42	42	1.7500	1.833
24D8-48	48	2.0000	2.083
24D8-60	60	2.5000	2.583
24D8-72	72	3.0000	3.083
24D8-96	96	4.0000	4.083
24D8-120	120	5.0000	5.083
24D8-144	144	6.0000	6.083



- * For 20 teeth, hub diameter equals .72.
 - * Pulleys with .750 P.D. and smaller for idler use only.
- Teeth could be anodized.

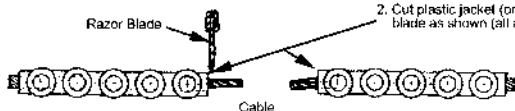
FIELD SPLICE KITS

Splicing Procedures:

1. Cut Berg Flex-E-Belt sharp and square as shown using cutter, to desired number of pitches, plus one pitch.



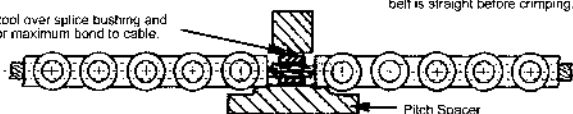
2. Cut plastic jacket (one pitch each side) lightly with a sharp razor blade as shown (all around). Strip or twist off jacket carefully.



3. Slide stripped cable into oval splice bushing carefully. **Caution:** Do not fray cable. Feed cable into chamfered end of bushing last.



5. Assemble crimp tool over splice bushing and squeeze lightly for maximum bond to cable.



4. Center bushing and be certain belt is straight before crimping.

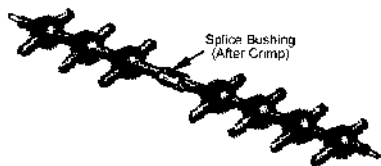
STOCK NO.	FIELD SPLICE KIT AND ACCESSORIES	BELT SERIES
32GBF-7 24GBF-7	Complete Kit consists of: Crimp Tool, Pitch Spacer, Cable Cutter, Bushing, Razor Blades & Instructions	31 & 32GBF 24GBF
TL-3	Crimp Tool for 24GBF, 31GBF, 32GBF	
BU-032-S	Extra Splice Bushings for: 24GBF, 31GBF, 32GBF (1/32" Cable)	
TL-1	Cable Cutter for up to 3/64" Cable	



Cable Cutter



Crimp Tool



Splice Bushing
(After Crimp)

Field Splices offer only 50% of catalog rated loads.

W.M. Berg will factory splice to order any length at a nominal charge.

MIN-E-PITCH® TECHNICAL DATA

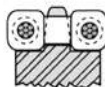
Stainless Steel or Kevlar® with Polyurethane cover.
Zero Backlash
Silent Drive
Positive Drive
Infinite Length
No Lubrication
Non-magnetic

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S® NAME	SPROCKET
$\pi/20$	.15708	Polyurethane (Red) 1/32" Dia. Stainless Steel Cable	Min-E-Pitch® Chain Drive	Operates with 3CC, 3MP, 3MF and 3MC series.

3CCF Series

- Ultimate tensile 100 lbs., 20 lb./pin
when belt is used in open loop configuration (without splice, no crimp bushing).
- Recommended Maximum Operating Speed 376 Feet/Min. (1800 rpm)
- Recommended Operating Load 25 lbs.
- Minimum Recommended Pulley Diameter .750" P.D.
- Parallel Shaft Drives

** Reduce Operating Load Rating by 50% for field splices.

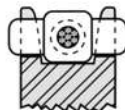


PITCH	CIRCULAR PITCH	MATERIALS	BERG'S® NAME	SPROCKET
$\pi/20$	.15708	Polyurethane (Yellow) 1/32" Dia. Stainless Steel Cable	Min-E-Pitch® Chain Drive	Operates with 3MDP and 3MDF series.

3CBF Series

- Ultimate tensile 50 lbs., 9 lb./pin
when belt is used in open loop configuration (without splice, no crimp bushing).
- Recommended Maximum Operating Speed 376 Feet/Min. (1800 rpm)
- Recommended Operating Load 12 lbs.
- Minimum Recommended Pulley Diameter .750" P.D.
- Odd Angle Shaft Drive
- Twists & Turns
- Non-parallel Shafts

** Reduce Operating Load Rating by 50% for field splices.

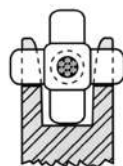


PITCH	CIRCULAR PITCH	MATERIALS	BERG'S® NAME	SPROCKET
$\pi/20$	.15708	Polyurethane (Green) 1/32" Dia. Stainless Steel Cable	Min-E-Pitch® Chain Drive	Operates with 3TDP, 3TF and 3MTB series.

3TDF Series

- Ultimate tensile 50 lbs., 9 lb./pin
when belt is used in open loop configuration (without splice, no crimp bushing).
- Recommended Maximum Operating Speed 376 Feet/Min. (1800 rpm)
- Recommended Operating Load 12 lbs.
- Minimum Recommended Pulley Diameter .750" P.D.
- Three Dimensional Drives
- Odd Angles and 90°
- X, Y & Z Axis Drive

** Reduce Operating Load Rating by 50% for field splices.

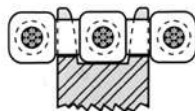


PITCH	CIRCULAR PITCH	MATERIALS	BERG'S® NAME	SPROCKET
$\pi/20$	.15708	Polyurethane (Brown) 1/32" Dia. Stainless Steel Cable	Min-E-Pitch® Chain Drive	Operates with 3MDP and 3MDF series.

3DCF Series

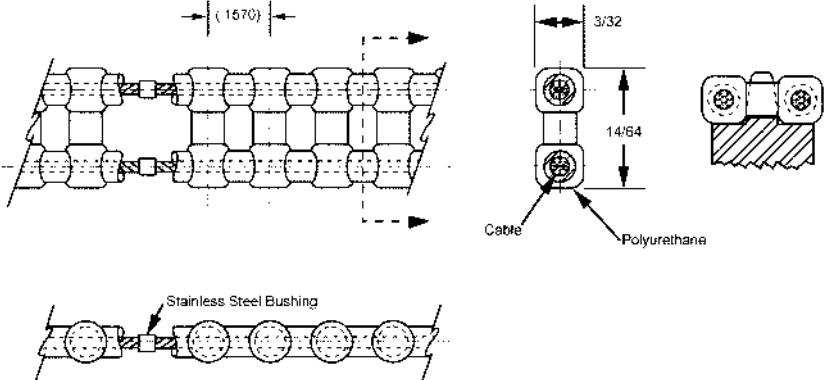
- Ultimate tensile 120 lbs., 30 lb./pin
when belt is used in open loop configuration (without splice, no crimp bushing).
- Recommended Maximum Operating Speed 376 Feet/Min. (1800 rpm)
- Recommended Operating Load 30 lbs.
- Minimum Recommended Pulley Diameter .750" P.D.
- Parallel Shaft Drives
- 3 Cable Strand Strength

** Reduce Operating Load Rating by 50% for field splices.



CABLE CHAINS

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	SPROCKET
π/20	.15708	Polyurethane (Red) 1/32" Dia. Stainless Steel Cable*	Min-E-Pitch®	Operates with 3CC, 3MP, 3MF and 3MC series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
3CCF-30-E	30	4.712
3CCF-35-E	35	5.498
3CCF-40-E	40	6.283
3CCF-45-E	45	7.069
3CCF-50-E	50	7.854
3CCF-55-E	55	8.639
3CCF-60-E	60	9.425
3CCF-70-E	70	10.996
3CCF-80-E	80	12.566
3CCF-90-E	90	14.137
3CCF-100-E	100	15.708
3CCF-110-E	110	17.279
3CCF-120-E	120	18.850
3CCF-130-E	130	20.420
3CCF-140-E	140	21.991
3CCF-150-E	150	23.562
3CCF-160-E	160	25.133
3CCF-170-E	170	26.704
3CCF-180-E	180	28.274
3CCF-190-E	190	29.845
3CCF-200-E	200	31.416
3CCF-210-E	210	32.987
3CCF-220-E	220	34.558
3CCF-230-E	230	36.128
3CCF-240-E	240	37.699
3CCF-250-E	250	39.270
3CCF-260-E	260	40.840
3CCF-270-E	270	42.412
3CCF-280-E	280	43.982
3CCF-290-E	290	45.553
3CCF-300-E	300	47.124
3CCF-310-E	310	48.695
3CCF-320-E	320	50.265
3CCF-330-E	330	51.836
3CCF-340-E	340	53.407
3CCF-350-E	350	54.978
3CCF-370-E	370	58.119
3CCF-400-E	400	62.832
3CCF-440-E	440	69.115

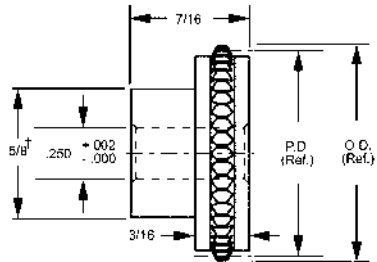
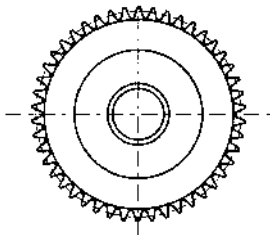
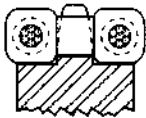
BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
3CCF-5FT	5 FT
3CCF-10FT	10 FT
3CCF-25FT	25 FT
3CCF-50FT	50 FT
3CCF-100FT	100 FT

- For Field Splice Kit order 3CCR-7.
- * Available with Aramid Core. See page VII for alternative belt construction or reverse bending applications.
- ** Reduce Operating Load Rating by 50% for field splices.
- Infinite Lengths
- Silent Drive
- Weight .13 oz./ft.
- Non-Magnetic
- Positive Drive
- Zero Backlash
- No Lubrication
- 90A Durometer
- Ultimate Tensile Strength 100 lbs., 20 lbs./Pin when belt is used in open loop configuration (without splice, no crimp bushings).
- Temperature Range +180°F to -15°F
- Recommended Operating Load 25 lbs.
- Recommended Max. Operating Speed 376 Feet/Min.
- Other numbers of pitches available on request.



CHAIN SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
π/20	.15708	1/4"	PIN HUB	Delrin®	Min-E-Pitch® Chain Drive	Operates with 3CCF Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3CC4M-13	13*†	.6492	.711
3CC4M-14	14*†	.6991	.761
3CC4M-15	15	.7490	.811
3CC4M-16	16	.7990	.861
3CC4M-18	18	.8988	.961
3CC4M-20	20	.9987	1.061
3CC4M-22	22	1.0986	1.161
3CC4M-24	24	1.1985	1.260
3CC4M-26	26	1.2983	1.360
3CC4M-28	28	1.3982	1.460
3CC4M-30	30	1.4981	1.560
3CC4M-32	32	1.5980	1.660
3CC4M-35	35	1.7478	1.810
3CC4M-36	36	1.7977	1.860
3CC4M-40	40	1.9974	2.059
3CC4M-45	45	2.2471	2.309
3CC4M-50	50	2.4968	2.559
3CC4M-55	55	2.7465	2.808



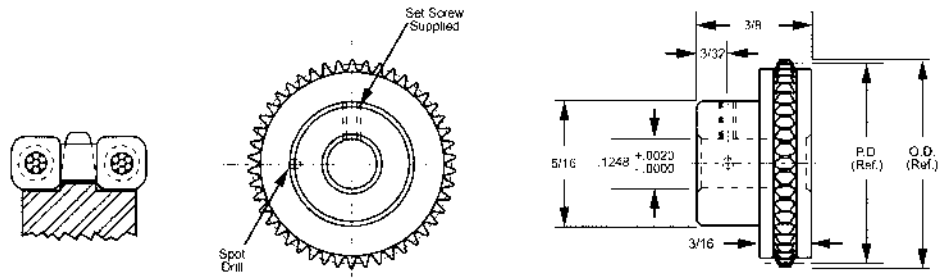
† Teeth runout on hub.
 * Sprockets .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth available on request.

CHAIN SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
π/20	.15708	1/8"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Chain Drive	Operates with 3CCF Series

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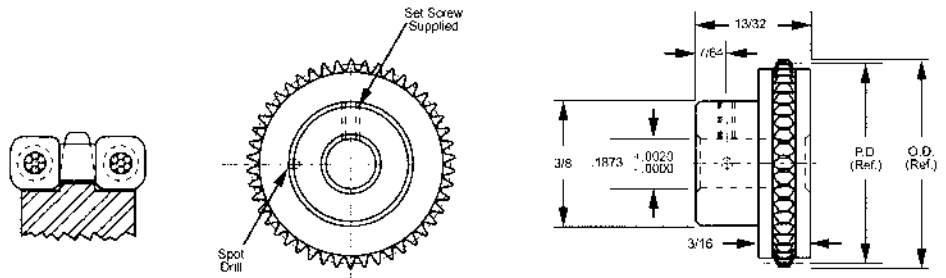
303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MP14S-10	3MP14A-10	10*	.4994	.561
3MP14S-11	3MP14A-11	11*	.5493	.611
3MP14S-12	3MP14A-12	12*	.5992	.661
3MP14S-13	3MP14A-13	13*	.6492	.711
3MP14S-14	3MP14A-14	14*	.6991	.761
3MP14S-15	3MP14A-15	15*	.7490	.811
3MP14S-16	3MP14A-16	16	.7990	.861
3MP14S-17	3MP14A-17	17	.8489	.911
3MP14S-18	3MP14A-18	18	.8988	.960
3MP14S-19	3MP14A-19	19	.9488	1.011
3MP14S-20	3MP14A-20	20	.9987	1.061
3MP14S-22	3MP14A-22	22	1.0986	1.161
3MP14S-24	3MP14A-24	24	1.1985	1.260
3MP14S-25	3MP14A-25	25	1.2484	1.310
3MP14S-26	3MP14A-26	26	1.2983	1.360
3MP14S-28	3MP14A-28	28	1.3982	1.460
3MP14S-30	3MP14A-30	30	1.4981	1.560
3MP14S-32	3MP14A-32	32	1.5980	1.660
3MP14S-35	3MP14A-35	35**	1.7478	1.810
3MP14S-36	3MP14A-36	36**	1.7977	1.860
3MP14S-40	3MP14A-40	40**	1.9974	2.059
3MP14S-45	3MP14A-45	45**	2.2471	2.309
3MP14S-50	3MP14A-50	50**	2.4968	2.559
3MP14S-55	3MP14A-55	55**	2.7465	2.808
3MP14S-60	3MP14A-60	60**	2.9962	3.058
3MP14S-65	3MP14A-65	65**	3.2458	3.308
3MP14S-70	3MP14A-70	70**	3.4955	3.558
3MP14S-75	3MP14A-75	75**	3.7452	3.807
3MP14S-80	3MP14A-80	80**	3.9949	4.057



** May be 2 piece construction with 303 stainless steel hub.
Outline and overall dimensions change slightly.
* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Teeth could be anodized.

CHAIN SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
π/20	.15708	3/16"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Chain Drive	Operates with 3CCF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MP21S-10	3MP21A-10	10*	.4994	.561
3MP21S-11	3MP21A-11	11*	.5493	.611
3MP21S-12	3MP21A-12	12*	.5992	.661
3MP21S-13	3MP21A-13	13*	.6492	.711
3MP21S-14	3MP21A-14	14*	.6991	.761
3MP21S-15	3MP21A-15	15*	.7490	.811
3MP21S-16	3MP21A-16	16	.7990	.861
3MP21S-17	3MP21A-17	17	.8489	.911
3MP21S-18	3MP21A-18	18	.8988	.961
3MP21S-19	3MP21A-19	19	.9488	1.011
3MP21S-20	3MP21A-20	20	.9987	1.061
3MP21S-22	3MP21A-22	22	1.0986	1.161
3MP21S-24	3MP21A-24	24	1.1985	1.260
3MP21S-25	3MP21A-25	25	1.2484	1.310
3MP21S-26	3MP21A-26	26	1.2983	1.360
3MP21S-28	3MP21A-28	28	1.3982	1.460
3MP21S-30	3MP21A-30	30	1.4981	1.560
3MP21S-32	3MP21A-32	32	1.5980	1.660
3MP21S-35	3MP21A-35	35	1.7478	1.810
3MP21S-36	3MP21A-36	36	1.7977	1.860
3MP21S-40	3MP21A-40	40	1.9974	2.060
3MP21S-45	3MP21A-45	45	2.2471	2.309
3MP21S-50	3MP21A-50	50	2.4968	2.559
3MP21S-55	3MP21A-55	55	2.7465	2.808
3MP21S-60	3MP21A-60	60	2.9962	3.058
3MP21S-65	3MP21A-65	65	3.2458	3.308
3MP21S-70	3MP21A-70	70	3.4955	3.558
3MP21S-75	3MP21A-75	75	3.7452	3.807
3MP21S-80	3MP21A-80	80	3.9949	4.057



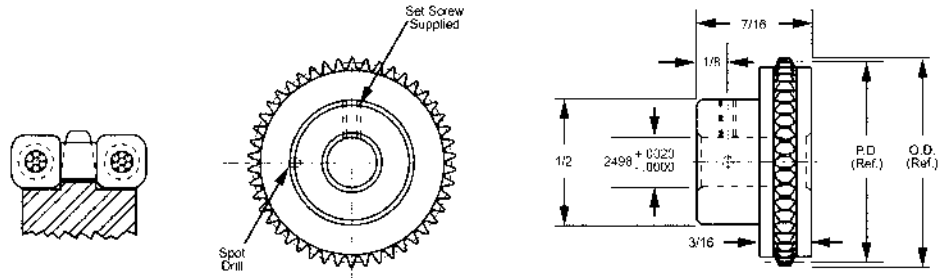
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth are available on request.

Teeth could be anodized.

CHAIN SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
π/20	.15708	1/4"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Chain Drive	Operates with 3CCF Series



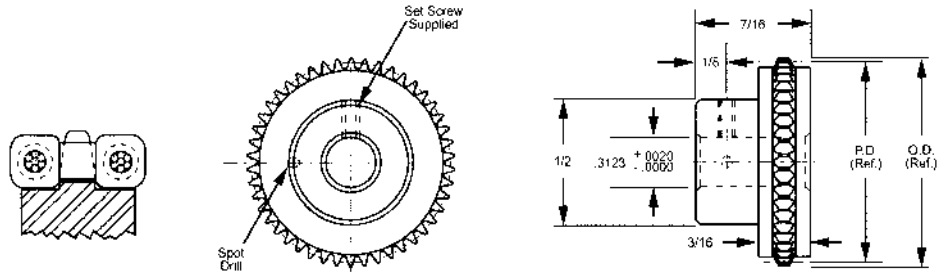
303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MP28S-12	3MP28A-12	12*	.5992	.661
3MP28S-13	3MP28A-13	13*	.6492	.711
3MP28S-14	3MP28A-14	14*	.6991	.761
3MP28S-15	3MP28A-15	15*	.7490	.811
3MP28S-16	3MP28A-16	16	.7990	.861
3MP28S-17	3MP28A-17	17	.8489	.911
3MP28S-18	3MP28A-18	18	.8988	.961
3MP28S-19	3MP28A-19	19	.9488	1.011
3MP28S-20	3MP28A-20	20	.9987	1.061
3MP28S-22	3MP28A-22	22	1.0986	1.161
3MP28S-24	3MP28A-24	24	1.1985	1.260
3MP28S-25	3MP28A-25	25	1.2484	1.310
3MP28S-26	3MP28A-26	26	1.2983	1.360
3MP28S-28	3MP28A-28	28	1.3982	1.460
3MP28S-30	3MP28A-30	30	1.4981	1.560
3MP28S-32	3MP28A-32	32	1.5980	1.660
3MP28S-35	3MP28A-35	35	1.7478	1.810
3MP28S-36	3MP28A-36	36	1.7977	1.860
3MP28S-40	3MP28A-40	40	1.9974	2.059
3MP28S-45	3MP28A-45	45	2.2471	2.309
3MP28S-50	3MP28A-50	50	2.4968	2.559
3MP28S-55	3MP28A-55	55	2.7465	2.808
3MP28S-60	3MP28A-60	60	2.9962	3.058
3MP28S-65	3MP28A-65	65	3.2458	3.308
3MP28S-70	3MP28A-70	70	3.4955	3.558
3MP28S-75	3MP28A-75	75	3.7452	3.807
3MP28S-80	3MP28A-80	80	3.9949	4.057



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

CHAIN SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
π/20	.15708	5/16"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Chain Drive	Operates with 3CCF Series



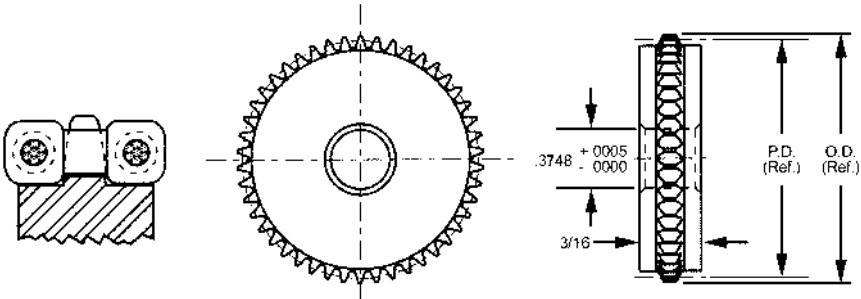
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MP32S-12	3MP32A-12	12*	.5992	.661
3MP32S-13	3MP32A-13	13*	.6492	.711
3MP32S-14	3MP32A-14	14*	.6991	.761
3MP32S-15	3MP32A-15	15*	.7490	.810
3MP32S-16	3MP32A-16	16	.7990	.861
3MP32S-17	3MP32A-17	17	.8489	.910
3MP32S-18	3MP32A-18	18	.8988	.960
3MP32S-19	3MP32A-19	19	.9488	1.010
3MP32S-20	3MP32A-20	20	.9987	1.060
3MP32S-22	3MP32A-22	22	1.0986	1.160
3MP32S-24	3MP32A-24	24	1.1985	1.260
3MP32S-25	3MP32A-25	25	1.2484	1.310
3MP32S-26	3MP32A-26	26	1.2983	1.360
3MP32S-28	3MP32A-28	28	1.3982	1.460
3MP32S-30	3MP32A-30	30	1.4981	1.560
3MP32S-32	3MP32A-32	32	1.5980	1.660
3MP32S-35	3MP32A-35	35	1.7478	1.809
3MP32S-36	3MP32A-36	36	1.7977	1.859
3MP32S-40	3MP32A-40	40	1.9974	2.059
3MP32S-45	3MP32A-45	45	2.2471	2.309
3MP32S-50	3MP32A-50	50	2.4968	2.558
3MP32S-55	3MP32A-55	55	2.7465	2.808
3MP32S-60	3MP32A-60	60	2.9962	3.058
3MP32S-65	3MP32A-65	65	3.2458	3.307
3MP32S-70	3MP32A-70	70	3.4955	3.557
3MP32S-75	3MP32A-75	75	3.7452	3.807
3MP32S-80	3MP32A-80	80	3.9949	4.056



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

CHAIN SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
π/20	.15708	3/8"	HUBLESS	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Chain Drive	Operates with 3CCF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MF5S-14	3MF5A-14	14*	.6991	.761
3MF5S-15	3MF5A-15	15*	.7490	.811
3MF5S-16	3MF5A-16	16	.7990	.861
3MF5S-17	3MF5A-17	17	.8489	.911
3MF5S-18	3MF5A-18	18	.8988	.961
3MF5S-19	3MF5A-19	19	.9488	1.011
3MF5S-20	3MF5A-20	20	.9987	1.061
3MF5S-22	3MF5A-22	22	1.0986	1.161
3MF5S-24	3MF5A-24	24	1.1985	1.260
3MF5S-25	3MF5A-25	25	1.2484	1.310
3MF5S-26	3MF5A-26	26	1.2983	1.360
3MF5S-28	3MF5A-28	28	1.3982	1.460
3MF5S-30	3MF5A-30	30	1.4981	1.560
3MF5S-32	3MF5A-32	32	1.5980	1.660
3MF5S-35	3MF5A-35	35	1.7478	1.809
3MF5S-36	3MF5A-36	36	1.7977	1.859
3MF5S-40	3MF5A-40	40	1.9974	2.059
3MF5S-45	3MF5A-45	45	2.2471	2.309
3MF5S-50	3MF5A-50	50	2.4986	2.559
3MF5S-55	3MF5A-55	55	2.7465	2.808
3MF5S-60	3MF5A-60	60	2.9962	3.058
3MF5S-65	3MF5A-65	65	3.2458	3.308
3MF5S-70	3MF5A-70	70	3.4955	3.558
3MF5S-75	3MF5A-75	75	3.7452	3.807
3MF5S-80	3MF5A-80	80	3.9949	4.057



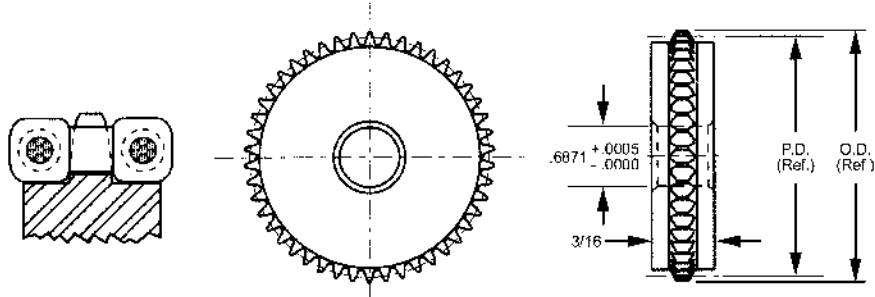
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth are available on request.

Teeth could be anodized.

CHAIN SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
π/20	.15708	11/16"	HUBLESS	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Chain Drive	Operates with 3CCF Series



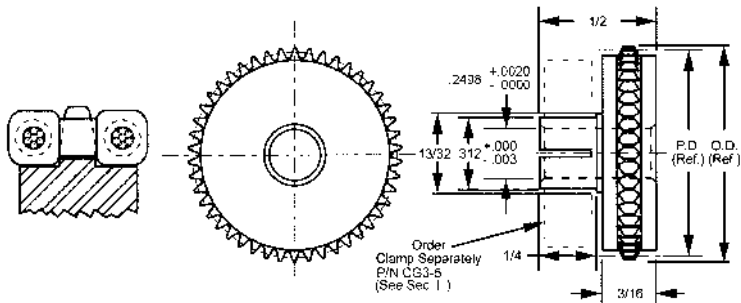
303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.			
3MF19S-17	3MF19A-17	17	.8489	.911		
3MF19S-18	3MF19A-18	18	.8988	.961		
3MF19S-19	3MF19A-19	19	.9488	1.011		
3MF19S-20	3MF19A-20	20	.9987	1.061		
3MF19S-22	3MF19A-22	22	1.0986	1.161		
3MF19S-24	3MF19A-24	24	1.1985	1.260		
3MF19S-25	3MF19A-25	25	1.2484	1.310		
3MF19S-26	3MF19A-26	26	1.2983	1.360		
3MF19S-28	3MF19A-28	28	1.3982	1.460		
3MF19S-30	3MF19A-30	30	1.4981	1.560		
3MF19S-32	3MF19A-32	32	1.5980	1.660		
3MF19S-35	3MF19A-35	35	1.7478	1.809		
3MF19S-36	3MF19A-36	36	1.7977	1.859		
3MF19S-40	3MF19A-40	40	1.9974	2.059		
3MF19S-45	3MF19A-45	45	2.2471	2.309		
3MF19S-50	3MF19A-50	50	2.4968	2.559		
3MF19S-55	3MF19A-55	55	2.7465	2.808		
3MF19S-60	3MF19A-60	60	2.9962	3.058		
3MF19S-65	3MF19A-65	65	3.2458	3.308		
3MF19S-70	3MF19A-70	70	3.4955	3.558		
3MF19S-75	3MF19A-75	75	3.7452	3.807		
3MF19S-80	3MF19A-80	80	3.9949	4.057		



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

CHAIN SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
π/20	.15708	1/4"	CLAMP HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Chain Drive	Operates with 3CCF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MC20S-12	3MC20A-12	12*	.5992	.661
3MC20S-13	3MC20A-13	13*	.6492	.711
3MC20S-14	3MC20A-14	14*	.6991	.761
3MC20S-15	3MC20A-15	15*	.7490	.811
3MC20S-16	3MC20A-16	16	.7990	.861
3MC20S-17	3MC20A-17	17	.8489	.911
3MC20S-18	3MC20A-18	18	.8988	.961
3MC20S-19	3MC20A-19	19	.9488	1.011
3MC20S-20	3MC20A-20	20	.9987	1.061
3MC20S-22	3MC20A-22	22	1.0986	1.161
3MC20S-24	3MC20A-24	24	1.1985	1.260
3MC20S-25	3MC20A-25	25	1.2484	1.310
3MC20S-26	3MC20A-26	26	1.2983	1.360
3MC20S-28	3MC20A-28	28	1.3982	1.460
3MC20S-30	3MC20A-30	30	1.4981	1.560
3MC20S-32	3MC20A-32	32	1.5980	1.660
3MC20S-35	3MC20A-35	35	1.7478	1.810
3MC20S-36	3MC20A-36	36	1.7977	1.860
3MC20S-40	3MC20A-40	40	1.9974	2.059
3MC20S-45	3MC20A-45	45	2.2471	2.309
3MC20S-50	3MC20A-50	50	2.4968	2.559
3MC20S-55	3MC20A-55	55	2.7465	2.808
3MC20S-60	3MC20A-60	60	2.9962	3.058
3MC20S-65	3MC20A-65	65	3.2458	3.308
3MC20S-70	3MC20A-70	70	3.4955	3.558
3MC20S-75	3MC20A-75	75	3.7452	3.807
3MC20S-80	3MC20A-80	80	3.9949	4.057



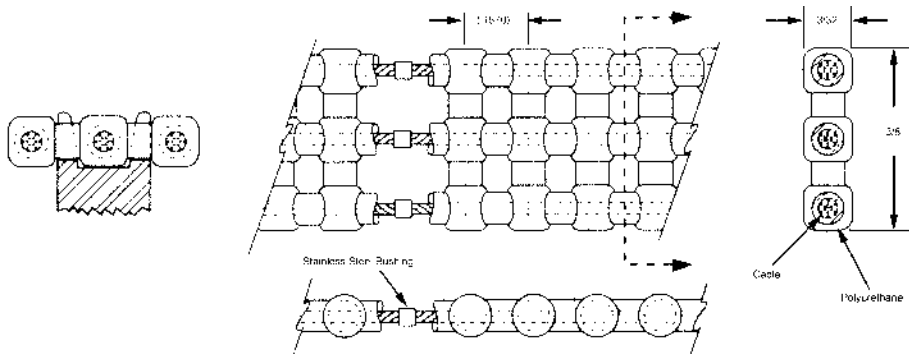
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth are available on request.

Teeth could be anodized.

DUAL CHAINS

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	SPROCKET
$\pi/20$	.15708	Polyurethane (Brown) 1/32" Dia. Stainless Steel Cable*	Min-E-Pitch®	Operates with 3MDP and 3MDF series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
3DCF-30-E	30	4.712
3DCF-35-E	35	5.498
3DCF-40-E	40	6.283
3DCF-45-E	45	7.069
3DCF-50-E	50	7.854
3DCF-55-E	55	8.639
3DCF-60-E	60	9.425
3DCF-70-E	70	10.996
3DCF-80-E	80	12.566
3DCF-90-E	90	14.137
3DCF-100-E	100	15.708
3DCF-110-E	110	17.279
3DCF-120-E	120	18.850
3DCF-130-E	130	20.420
3DCF-140-E	140	21.991
3DCF-150-E	150	23.562
3DCF-160-E	160	25.133
3DCF-170-E	170	26.704
3DCF-180-E	180	28.274
3DCF-190-E	190	29.845
3DCF-200-E	200	31.416
3DCF-210-E	210	32.987
3DCF-220-E	220	34.558
3DCF-230-E	230	36.128
3DCF-240-E	240	37.699
3DCF-250-E	250	39.270
3DCF-260-E	260	40.840
3DCF-270-E	270	42.412
3DCF-280-E	280	43.982
3DCF-290-E	290	45.553
3DCF-300-E	300	47.124
3DCF-310-E	310	48.695
3DCF-320-E	320	50.265
3DCF-330-E	330	51.836
3DCF-340-E	340	53.407
3DCF-350-E	350	54.978
3DCF-370-E	370	58.119
3DCF-400-E	400	62.832
3DCF-440-E	440	69.115

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
3DCF-5FT	5 FT
3DCF-10FT	10 FT
3DCF-25FT	25 FT
3DCF-50FT	50 FT
3DCF-100FT	100 FT

* This series is not available with alternate core configuration.

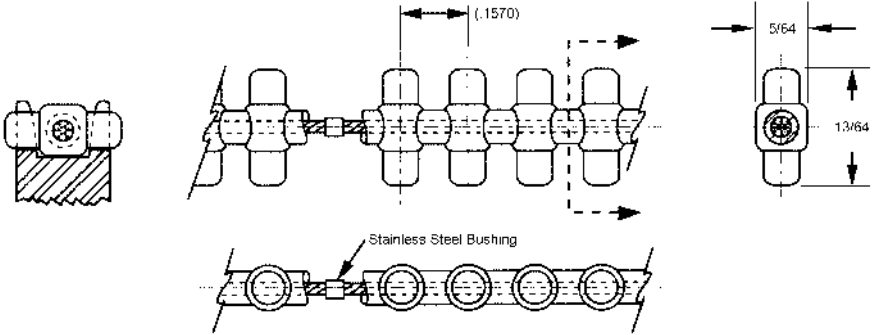
** Reduce Operating Load Rating by 50% for field splices.

- For Field Splice Kit order 3CCR-7.
- Zero Backlash
- Weight .21 oz./ft.
- Silent Drive
- No Lubrication
- Infinite Lengths
- 90A Durometer
- Positive Drive
- Non-Magnetic
- Ultimate Tensile Strength 120 lbs. - 30 lbs./Pin when belt is used in open loop configuration (without splice, no crimp bushing)
- Temperature Range +180°F to -15°F
- Recommended Operating Load 30 lbs.
- Recommended Max. Operating Speed 376 Feet/Min.



BELTS

PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	SPROCKET
π/20	.15708	Polyurethane (Yellow) 1/32" Dia. Stainless Steel Cable*	Min-E-Pitch®	Operates with 3MDP and 3MDF series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
3CBF-30-E	30	4.712
3CBF-35-E	35	5.498
3CBF-40-E	40	6.283
3CBF-45-E	45	7.069
3CBF-50-E	50	7.854
3CBF-55-E	55	8.639
3CBF-60-E	60	9.425
3CBF-70-E	70	10.996
3CBF-80-E	80	12.566
3CBF-90-E	90	14.137
3CBF-100-E	100	15.708
3CBF-110-E	110	17.279
3CBF-120-E	120	18.850
3CBF-130-E	130	20.420
3CBF-140-E	140	21.991
3CBF-150-E	150	23.562
3CBF-160-E	160	25.133
3CBF-170-E	170	26.704
3CBF-180-E	180	28.274
3CBF-190-E	190	29.845
3CBF-200-E	200	31.416
3CBF-210-E	210	32.987
3CBF-220-E	220	34.558
3CBF-230-E	230	36.128
3CBF-240-E	240	37.699
3CBF-250-E	250	39.270
3CBF-260-E	260	40.840
3CBF-270-E	270	42.412
3CBF-280-E	280	43.982
3CBF-290-E	290	45.553
3CBF-300-E	300	47.124
3CBF-310-E	310	48.695
3CBF-320-E	320	50.265
3CBF-330-E	330	51.836
3CBF-340-E	340	53.407
3CBF-350-E	350	54.978
3CBF-370-E	370	58.119
3CBF-400-E	400	62.832
3CBF-440-E	440	69.115

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
3CBF-5FT	5 FT
3CBF-10FT	10 FT
3CBF-25FT	25 FT
3CBF-50FT	50 FT
3CBF-100FT	100 FT

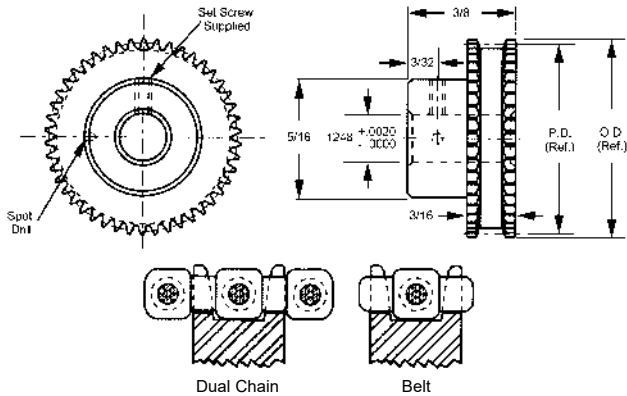
* This series is not available with alternate core configuration.
 ** Reduce Operating Load Rating by 50% for field splices.

- For Field Splice Kit order 3CCR-7.
- Zero Backlash
- Odd Angles
- Silent Drive
- Infinite Lengths
- 90A Durometer
- No Lubrication
- Weight .12 oz./ft.
- Positive Drive
- Ultimate Tensile Strength 50 lbs. - 9 lbs./Pin when belt is used in open loop configuration (without splice, no crimp bushing)
- Temperature Range +180°F to -15°F
- Recommended Operating Load 12 lbs.
- Recommended Max. Operating Speed 376 Feet/Min.



DOUBLE SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT/CHAIN
π/20	.15708	1/8"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch®	Operates with 3CBF & 3DCF Series



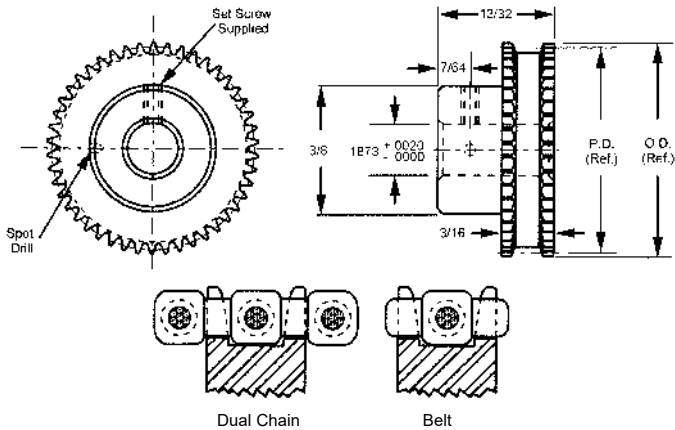
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED				
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	
3MDP14S-10	3MDP14A-10	10*	.4994	.561	
3MDP14S-11	3MDP14A-11	11*	.5493	.611	
3MDP14S-12	3MDP14A-12	12*	.5992	.661	
3MDP14S-13	3MDP14A-13	13*	.6492	.711	
3MDP14S-14	3MDP14A-14	14*	.6991	.761	
3MDP14S-15	3MDP14A-15	15*	.7490	.811	
3MDP14S-16	3MDP14A-16	16	.7990	.861	
3MDP14S-17	3MDP14A-17	17	.8489	.910	
3MDP14S-18	3MDP14A-18	18	.8988	.960	
3MDP14S-19	3MDP14A-19	19	.9488	1.011	
3MDP14S-20	3MDP14A-20	20	.9987	1.061	
3MDP14S-22	3MDP14A-22	22	1.0986	1.161	
3MDP14S-24	3MDP14A-24	24	1.1985	1.260	
3MDP14S-25	3MDP14A-25	25	1.2484	1.310	
3MDP14S-26	3MDP14A-26	26	1.2983	1.360	
3MDP14S-28	3MDP14A-28	28	1.3982	1.460	
3MDP14S-30	3MDP14A-30	30	1.4981	1.560	
3MDP14S-32	3MDP14A-32	32	1.5980	1.660	
3MDP14S-35	3MDP14A-35	35	1.7478	1.810	
3MDP14S-36	3MDP14A-36	36	1.7977	1.860	
3MDP14S-40	3MDP14A-40	40	1.9974	2.059	
3MDP14S-45	3MDP14A-45	45	2.2471	2.309	
3MDP14S-50	3MDP14A-50	50	2.4968	2.559	
3MDP14S-55	3MDP14A-55	55	2.7465	2.808	
3MDP14S-60	3MDP14A-60	60	2.9962	3.058	
3MDP14S-65	3MDP14A-65	65	3.2458	3.308	
3MDP14S-70	3MDP14A-70	70	3.4955	3.558	
3MDP14S-75	3MDP14A-75	75	3.7452	3.807	
3MDP14S-80	3MDP14A-80	80	3.9949	4.057	



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

DOUBLE SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT/CHAIN
π/20	.15708	3/16"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch®	Operates with 3CBF & 3DCF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MDP21S-10	3MDP21A-10	10*	.4994	.561
3MDP21S-11	3MDP21A-11	11*	.5493	.611
3MDP21S-12	3MDP21A-12	12*	.5992	.661
3MDP21S-13	3MDP21A-13	13*	.6492	.711
3MDP21S-14	3MDP21A-14	14*	.6991	.761
3MDP21S-15	3MDP21A-15	15*	.7490	.811
3MDP21S-16	3MDP21A-16	16	.7990	.861
3MDP21S-17	3MDP21A-17	17	.8489	.911
3MDP21S-18	3MDP21A-18	18	.8988	.961
3MDP21S-19	3MDP21A-19	19	.9488	1.011
3MDP21S-20	3MDP21A-20	20	.9987	1.061
3MDP21S-22	3MDP21A-22	22	1.0986	1.161
3MDP21S-24	3MDP21A-24	24	1.1985	1.260
3MDP21S-26	3MDP21A-26	26	1.2983	1.360
3MDP21S-28	3MDP21A-28	28	1.3982	1.460
3MDP21S-30	3MDP21A-30	30	1.4981	1.560
3MDP21S-32	3MDP21A-32	32	1.5980	1.660
3MDP21S-35	3MDP21A-35	35	1.7478	1.810
3MDP21S-36	3MDP21A-36	36	1.7977	1.860
3MDP21S-40	3MDP21A-40	40	1.9974	2.059
3MDP21S-45	3MDP21A-45	45	2.2471	2.309
3MDP21S-50	3MDP21A-50	50	2.4968	2.559
3MDP21S-55	3MDP21A-55	55	2.7465	2.808
3MDP21S-60	3MDP21A-60	60	2.9962	3.058
3MDP21S-65	3MDP21A-65	65	3.2458	3.308
3MDP21S-70	3MDP21A-70	70	3.4955	3.558
3MDP21S-75	3MDP21A-75	75	3.7452	3.807
3MDP21S-80	3MDP21A-80	80	3.9949	4.057



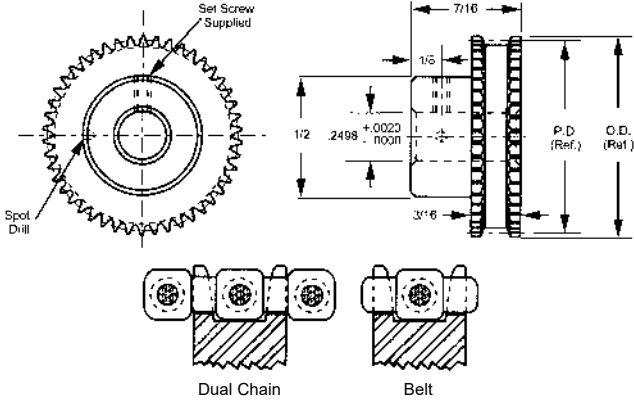
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth are available on request.

Teeth could be anodized.

DOUBLE SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT/CHAIN
π/20	.15708	1/4"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch®	Operates with 3CBF & 3DCF Series



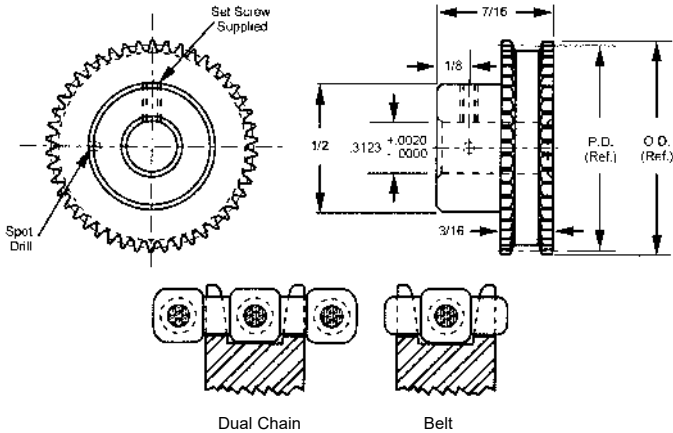
303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	
3MDP28S-12	3MDP28A-12	12*	.5992	.661	
3MDP28S-13	3MDP28A-13	13*	.6492	.711	
3MDP28S-14	3MDP28A-14	14*	.6991	.761	
3MDP28S-15	3MDP28A-15	15*	.7490	.811	
3MDP28S-16	3MDP28A-16	16	.7990	.861	
3MDP28S-17	3MDP28A-17	17	.8489	.911	
3MDP28S-18	3MDP28A-18	18	.8988	.961	
3MDP28S-19	3MDP28A-19	19	.9488	1.011	
3MDP28S-20	3MDP28A-20	20	.9987	1.061	
3MDP28S-22	3MDP28A-22	22	1.0986	1.161	
3MDP28S-24	3MDP28A-24	24	1.1985	1.260	
3MDP28S-25	3MDP28A-25	25	1.2484	1.310	
3MDP28S-26	3MDP28A-26	26	1.2983	1.360	
3MDP28S-28	3MDP28A-28	28	1.3982	1.460	
3MDP28S-30	3MDP28A-30	30	1.4981	1.560	
3MDP28S-32	3MDP28A-32	32	1.5980	1.660	
3MDP28S-35	3MDP28A-35	35	1.7478	1.810	
3MDP28S-36	3MDP28A-36	36	1.7977	1.860	
3MDP28S-40	3MDP28A-40	40	1.9974	2.059	
3MDP28S-45	3MDP28A-45	45	2.2471	2.309	
3MDP28S-50	3MDP28A-50	50	2.4968	2.559	
3MDP28S-55	3MDP28A-55	55	2.7465	2.808	
3MDP28S-60	3MDP28A-60	60	2.9962	3.058	
3MDP28S-65	3MDP28A-65	65	3.2458	3.308	
3MDP28S-70	3MDP28A-70	70	3.4955	3.558	
3MDP28S-75	3MDP28A-75	75	3.7452	3.807	
3MDP28S-80	3MDP28A-80	80	3.9949	4.057	



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

DOUBLE SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT/CHAIN
π/20	.15708	5/16"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch®	Operates with 3CBF & 3DCF Series



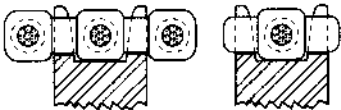
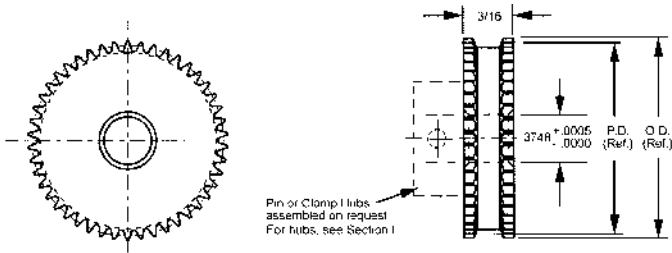
303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
STOCK NO.	STOCK NO.					
3MDP32S-12	3MDP32A-12	12*	.5992	.661		
3MDP32S-13	3MDP32A-13	13*	.6492	.711		
3MDP32S-14	3MDP32A-14	14*	.6991	.761		
3MDP32S-15	3MDP32A-15	15*	.7490	.810		
3MDP32S-16	3MDP32A-16	16	.7990	.861		
3MDP32S-17	3MDP32A-17	17	.8489	.911		
3MDP32S-18	3MDP32A-18	18	.8988	.961		
3MDP32S-19	3MDP32A-19	19	.9488	1.011		
3MDP32S-20	3MDP32A-20	20	.9987	1.061		
3MDP32S-22	3MDP32A-22	22	1.0986	1.161		
3MDP32S-24	3MDP32A-24	24	1.1985	1.260		
3MDP32S-25	3MDP32A-25	25	1.2484	1.310		
3MDP32S-26	3MDP32A-26	26	1.2983	1.360		
3MDP32S-28	3MDP32A-28	28	1.3982	1.460		
3MDP32S-30	3MDP32A-30	30	1.4981	1.560		
3MDP32S-32	3MDP32A-32	32	1.5980	1.660		
3MDP32S-35	3MDP32A-35	35	1.7478	1.810		
3MDP32S-36	3MDP32A-36	36	1.7977	1.860		
3MDP32S-40	3MDP32A-40	40	1.9974	2.059		
3MDP32S-45	3MDP32A-45	45	2.2471	2.309		
3MDP32S-50	3MDP32A-50	50	2.4968	2.559		
3MDP32S-55	3MDP32A-55	55	2.7465	2.808		
3MDP32S-60	3MDP32A-60	60	2.9962	3.058		
3MDP32S-65	3MDP32A-65	65	3.2458	3.308		
3MDP32S-70	3MDP32A-70	70	3.4955	3.558		
3MDP32S-75	3MDP32A-75	75	3.7452	3.807		
3MDP32S-80	3MDP32A-80	80	3.9949	4.057		



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

DOUBLE SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT/CHAIN
π/20	.15708	3/8"	HUBLESS	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch®	Operates with 3CBF & 3DCF Series



Dual Chain

Belt

303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MDF5S-14	3MDF5A-14	14*	.6991	.761
3MDF5S-15	3MDF5A-15	15*	.7490	.811
3MDF5S-16	3MDF5A-16	16	.7990	.861
3MDF5S-17	3MDF5A-17	17	.8489	.911
3MDF5S-18	3MDF5A-18	18	.8988	.961
3MDF5S-19	3MDF5A-19	19	.9488	1.011
3MDF5S-20	3MDF5A-20	20	.9987	1.061
3MDF5S-22	3MDF5A-22	22	1.0986	1.161
3MDF5S-24	3MDF5A-24	24	1.1985	1.260
3MDF5S-26	3MDF5A-26	26	1.2983	1.360
3MDF5S-28	3MDF5A-28	28	1.3982	1.460
3MDF5S-30	3MDF5A-30	30	1.4981	1.560
3MDF5S-32	3MDF5A-32	32	1.5980	1.660
3MDF5S-35	3MDF5A-35	35	1.7478	1.810
3MDF5S-36	3MDF5A-36	36	1.7977	1.860
3MDF5S-40	3MDF5A-40	40	1.9974	2.059
3MDF5S-45	3MDF5A-45	45	2.2471	2.309
3MDF5S-50	3MDF5A-50	50	2.4968	2.559
3MDF5S-55	3MDF5A-55	55	2.7465	2.808
3MDF5S-60	3MDF5A-60	60	2.9962	3.058
3MDF5S-65	3MDF5A-65	65	3.2458	3.308
3MDF5S-70	3MDF5A-70	70	3.4955	3.558
3MDF5S-75	3MDF5A-75	75	3.7452	3.807
3MDF5S-80	3MDF5A-80	80	3.9949	4.057



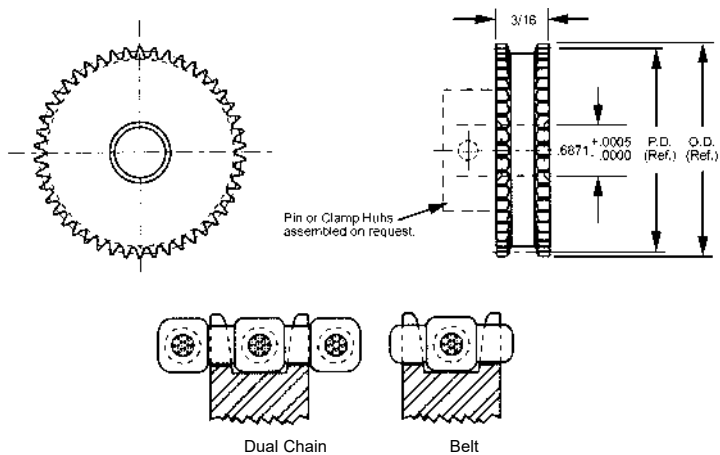
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth are available on request.

Teeth could be anodized.

DOUBLE SPROCKETS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT/CHAIN
π/20	.15708	11/16"	HUBLESS	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch®	Operates with 3CBF & 3DCF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MDF19S-18	3MDF19A-18	18	.8988	.961
3MDF19S-19	3MDF19A-19	19	.9488	1.011
3MDF19S-20	3MDF19A-20	20	.9987	1.061
3MDF19S-22	3MDF19A-22	22	1.0986	1.161
3MDF19S-24	3MDF19A-24	24	1.1985	1.260
3MDF19S-26	3MDF19A-26	26	1.2983	1.360
3MDF19S-28	3MDF19A-28	28	1.3982	1.460
3MDF19S-30	3MDF19A-30	30	1.4981	1.560
3MDF19S-32	3MDF19A-32	32	1.5980	1.660
3MDF19S-35	3MDF19A-35	35	1.7478	1.810
3MDF19S-36	3MDF19A-36	36	1.7977	1.860
3MDF19S-40	3MDF19A-40	40	1.9974	2.059
3MDF19S-45	3MDF19A-45	45	2.2471	2.309
3MDF19S-50	3MDF19A-50	50	2.4968	2.559
3MDF19S-55	3MDF19A-55	55	2.7465	2.808
3MDF19S-60	3MDF19A-60	60	2.9962	3.058
3MDF19S-65	3MDF19A-65	65	3.2458	3.308
3MDF19S-70	3MDF19A-70	70	3.4955	3.558
3MDF19S-75	3MDF19A-75	75	3.7452	3.807
3MDF19S-80	3MDF19A-80	80	3.9949	4.057

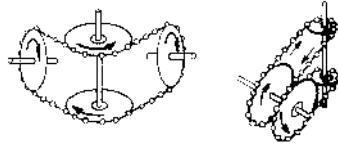
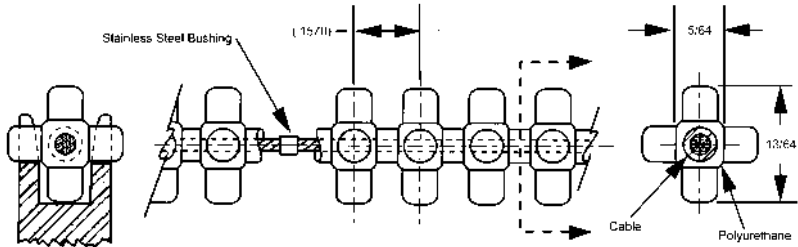


Other numbers of teeth are available on request.

Teeth could be anodized.

3-D BELTS

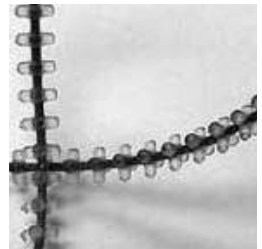
PITCH	CIRCULAR PITCH	MATERIALS	BERG'S ® NAME	PULLEY
π/20	.15708	Polyurethane (Green) 1/32" Dia. Stainless Steel Cable*	Min-E-Pitch®	Operates with 3TDP, 3TF and 3MTB series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
3TDF-30-E	30	4.712
3TDF-35-E	36	5.655
3TDF-40-E	40	6.283
3TDF-45-E	46	7.226
3TDF-50-E	50	7.854
3TDF-55-E	56	8.796
3TDF-60-E	60	9.425
3TDF-70-E	70	10.996
3TDF-80-E	80	12.566
3TDF-90-E	90	14.137
3TDF-100-E	100	15.708
3TDF-110-E	110	17.279
3TDF-120-E	120	18.850
3TDF-130-E	130	20.420
3TDF-140-E	140	21.991
3TDF-150-E	150	23.562
3TDF-160-E	160	25.133
3TDF-170-E	170	26.704
3TDF-180-E	180	28.274
3TDF-190-E	190	29.845
3TDF-200-E	200	31.416
3TDF-210-E	210	32.987
3TDF-220-E	220	34.558
3TDF-230-E	230	36.128
3TDF-240-E	240	37.699
3TDF-250-E	250	39.270
3TDF-260-E	260	40.840
3TDF-270-E	270	42.412
3TDF-280-E	280	43.982
3TDF-290-E	290	45.553
3TDF-300-E	300	47.124
3TDF-310-E	310	48.695
3TDF-320-E	320	50.265
3TDF-330-E	330	51.836
3TDF-340-E	340	53.407
3TDF-350-E	350	54.978
3TDF-370-E	360	56.549
3TDF-400-E	400	62.832
3TDF-440-E	440	69.115

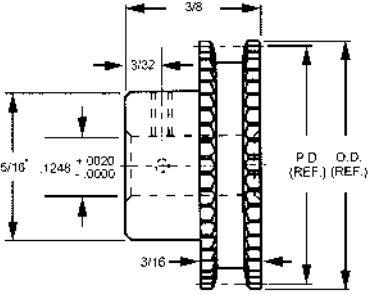
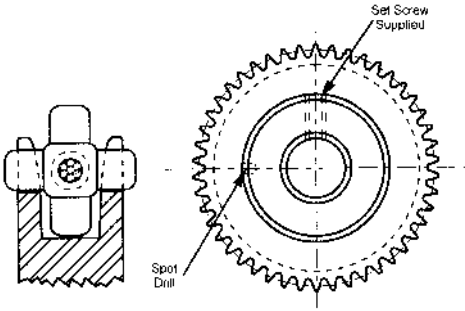
- For Field Splice Kit order 3CCR-7
- * Available with Aramid Core. See page VII for alternate belt construction and reverse bending applications.
- ** Reduce Operating Load Rating by 50% for field splices.
- Three Dimensional Drive
- Zero Backlash
- Silent Drive
- Infinite Lengths
- 90A Durometer
- No Lubrication
- Weight .12 oz./ft.
- Positive Drive
- Ultimate Tensile Strength 50 lbs. - 9 lbs./Pin when belt is used in open loop configuration (without splice, no crimp bushing).
- Temperature Range +180°F to -15°F
- Recommended Operating Load 12 lbs.
- Recommended Max. Operating Speed 376 Feet/Min.

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
3TDF-5FT	5 FT
3TDF-10FT	10 FT
3TDF-25FT	25 FT
3TDF-50FT	50 FT
3TDF-100FT	100 FT



3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
$\pi/20$	.15708	1/8"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



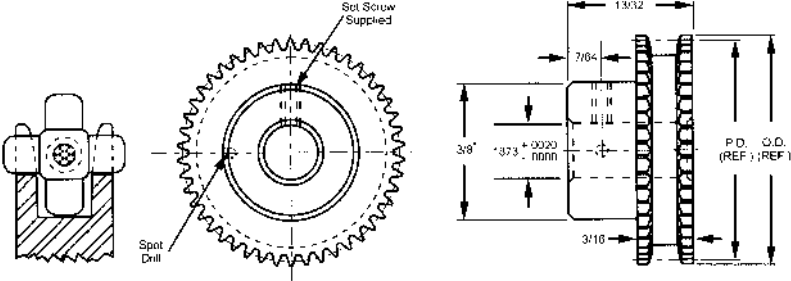
303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3TDP14S-10	3TDP14A-10	10*	.4994	.561
3TDP14S-11	3TDP14A-11	11*	.5493	.611
3TDP14S-12	3TDP14A-12	12*	.5992	.661
3TDP14S-13	3TDP14A-13	13*	.6492	.711
3TDP14S-14	3TDP14A-14	14*	.6991	.761
3TDP14S-15	3TDP14A-15	15*	.7490	.811
3TDP14S-16	3TDP14A-16	16	.7990	.861
3TDP14S-17	3TDP14A-17	17	.8489	.911
3TDP14S-18	3TDP14A-18	18	.8988	.961
3TDP14S-19	3TDP14A-19	19	.9488	1.011
3TDP14S-20	3TDP14A-20	20	.9987	1.061
3TDP14S-22	3TDP14A-22	22	1.0986	1.161
3TDP14S-24	3TDP14A-24	24	1.1985	1.260
3TDP14S-25	3TDP14A-25	25	1.2484	1.310
3TDP14S-26	3TDP14A-26	26	1.2983	1.360
3TDP14S-28	3TDP14A-28	28	1.3982	1.460
3TDP14S-30	3TDP14A-30	30	1.4981	1.560
3TDP14S-32	3TDP14A-32	32	1.5980	1.660
3TDP14S-35	3TDP14A-35	35**	1.7478	1.810
3TDP14S-36	3TDP14A-36	36**	1.7977	1.860
3TDP14S-40	3TDP14A-40	40**	1.9974	2.059
3TDP14S-45	3TDP14A-45	45**	2.2471	2.309
3TDP14S-50	3TDP14A-50	50**	2.4968	2.559
3TDP14S-55	3TDP14A-55	55**	2.7465	2.808
3TDP14S-60	3TDP14A-60	60**	2.9962	3.058
3TDP14S-65	3TDP14A-65	65**	3.2458	3.308
3TDP14S-70	3TDP14A-70	70**	3.4955	3.558
3TDP14S-75	3TDP14A-75	75**	3.7452	3.807
3TDP14S-80	3TDP14A-80	80**	3.9949	4.057



** May be 2 piece construction 303 Stainless Steel hub.
Outline and overall length change slightly.
• For 10 teeth, hub diameter equals .29.
* Pulleys with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
π/20	.15708	3/16"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



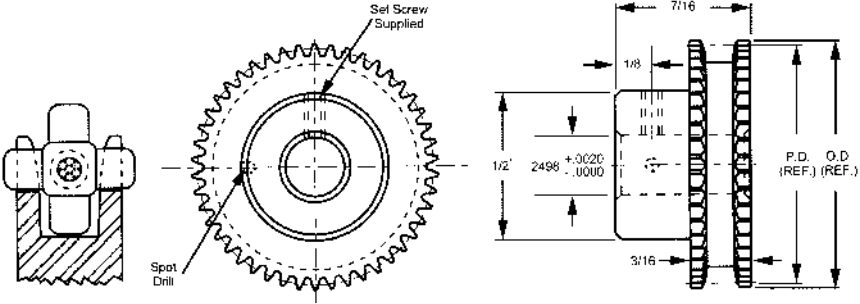
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3TDP21S-11	3TDP21A-11	11*	.5493	.611
3TDP21S-12	3TDP21A-12	12*	.5992	.661
3TDP21S-13	3TDP21A-13	13*	.6492	.711
3TDP21S-14	3TDP21A-14	14*	.6991	.761
3TDP21S-15	3TDP21A-15	15*	.7490	.811
3TDP21S-16	3TDP21A-16	16	.7990	.861
3TDP21S-17	3TDP21A-17	17	.8489	.911
3TDP21S-18	3TDP21A-18	18	.8988	.961
3TDP21S-19	3TDP21A-19	19	.9488	1.011
3TDP21S-20	3TDP21A-20	20	.9987	1.061
3TDP21S-22	3TDP21A-22	22	1.0986	1.161
3TDP21S-24	3TDP21A-24	24	1.1985	1.260
3TDP21S-25	3TDP21A-25	25	1.2484	1.310
3TDP21S-26	3TDP21A-26	26	1.2983	1.360
3TDP21S-28	3TDP21A-28	28	1.3982	1.460
3TDP21S-30	3TDP21A-30	30	1.4981	1.560
3TDP21S-32	3TDP21A-32	32	1.5980	1.660
3TDP21S-35	3TDP21A-35	35	1.7478	1.810
3TDP21S-36	3TDP21A-36	36	1.7977	1.860
3TDP21S-40	3TDP21A-40	40	1.9974	2.059
3TDP21S-45	3TDP21A-45	45	2.2471	2.309
3TDP21S-50	3TDP21A-50	50	2.4968	2.559
3TDP21S-55	3TDP21A-55	55	2.7465	2.808
3TDP21S-60	3TDP21A-60	60	2.9962	3.058
3TDP21S-65	3TDP21A-65	65	3.2458	3.308
3TDP21S-70	3TDP21A-70	70	3.4955	3.558
3TDP21S-75	3TDP21A-75	75	3.7452	3.807
3TDP21S-80	3TDP21A-80	80	3.9949	4.057



* Pulleys with .750 P.D. and smaller are recommended for idler use only.
• For 11 teeth, hub diameter equals .34.
Other numbers of teeth are available on request.
Teeth could be anodized.

3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
π/20	.15708	1/4"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	
3TDP28S-13	3TDP28A-13	13**	.6492	.711	
3TDP28S-14	3TDP28A-14	14**	.6991	.761	
3TDP28S-15	3TDP28A-15	15*	.7490	.810	
3TDP28S-16	3TDP28A-16	16	.7990	.861	
3TDP28S-17	3TDP28A-17	17	.8489	.911	
3TDP28S-18	3TDP28A-18	18	.8988	.961	
3TDP28S-19	3TDP28A-19	19	.9488	1.011	
3TDP28S-20	3TDP28A-20	20	.9987	1.061	
3TDP28S-22	3TDP28A-22	22	1.0986	1.161	
3TDP28S-24	3TDP28A-24	24	1.1985	1.260	
3TDP28S-25	3TDP28A-25	25	1.2484	1.310	
3TDP28S-26	3TDP28A-26	26	1.2983	1.360	
3TDP28S-28	3TDP28A-28	28	1.3982	1.460	
3TDP28S-30	3TDP28A-30	30	1.4981	1.560	
3TDP28S-32	3TDP28A-32	32	1.5980	1.660	
3TDP28S-35	3TDP28A-35	35	1.7478	1.810	
3TDP28S-36	3TDP28A-36	36	1.7977	1.860	
3TDP28S-40	3TDP28A-40	40	1.9974	2.059	
3TDP28S-45	3TDP28A-45	45	2.2471	2.309	
3TDP28S-50	3TDP28A-50	50	2.4968	2.558	
3TDP28S-55	3TDP28A-55	55	2.7465	2.808	
3TDP28S-60	3TDP28A-60	60	2.9962	3.058	
3TDP28S-65	3TDP28A-65	65	3.2458	3.308	
3TDP28S-70	3TDP28A-70	70	3.4955	3.558	
3TDP28S-75	3TDP28A-75	75	3.7452	3.807	
3TDP28S-80	3TDP28A-80	80	3.9949	4.057	



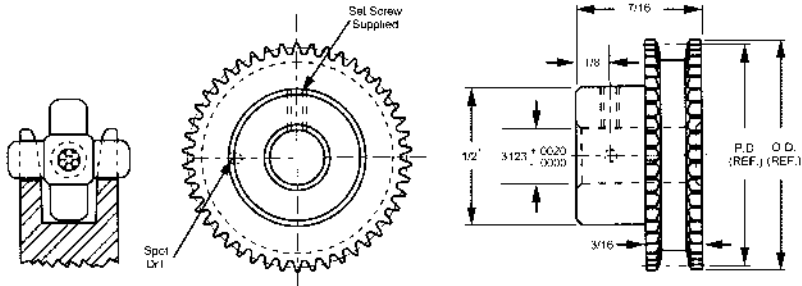
* Pulleys with .750 P.D. and smaller are recommended for idler use only.

- For 13-14 teeth, hub diameter equals .44.
- Other numbers of teeth are available on request.

Teeth could be anodized.

3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
π/20	.15708	5/16"	PIN HUB	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



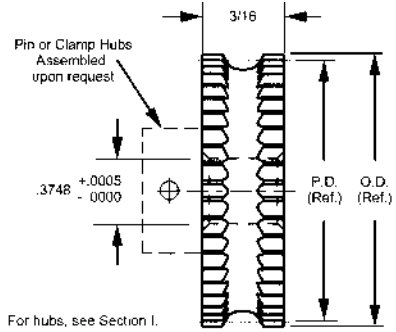
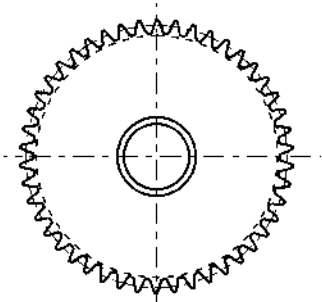
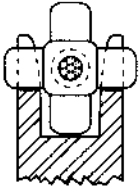
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3TDP32S-15	3TDP32A-15	15*	.7490	.811
3TDP32S-16	3TDP32A-16	16	.7990	.861
3TDP32S-17	3TDP32A-17	17	.8489	.911
3TDP32S-18	3TDP32A-18	18	.8988	.961
3TDP32S-19	3TDP32A-19	19	.9488	1.011
3TDP32S-20	3TDP32A-20	20	.9987	1.061
3TDP32S-22	3TDP32A-22	22	1.0986	1.161
3TDP32S-24	3TDP32A-24	24	1.1985	1.260
3TDP32S-25	3TDP32A-25	25	1.2484	1.310
3TDP32S-26	3TDP32A-26	26	1.2983	1.360
3TDP32S-28	3TDP32A-28	28	1.3982	1.460
3TDP32S-30	3TDP32A-30	30	1.4981	1.560
3TDP32S-32	3TDP32A-32	32	1.5980	1.660
3TDP32S-35	3TDP32A-35	35	1.7478	1.810
3TDP32S-36	3TDP32A-36	36	1.7977	1.860
3TDP32S-40	3TDP32A-40	40	1.9974	2.059
3TDP32S-45	3TDP32A-45	45	2.2471	2.309
3TDP32S-50	3TDP32A-50	50	2.4968	2.559
3TDP32S-55	3TDP32A-55	55	2.7465	2.808
3TDP32S-60	3TDP32A-60	60	2.9962	3.058
3TDP32S-65	3TDP32A-65	65	3.2458	3.308
3TDP32S-70	3TDP32A-70	70	3.4955	3.558
3TDP32S-75	3TDP32A-75	75	3.7452	3.807
3TDP32S-80	3TDP32A-80	80	3.9949	4.057



* Pulleys with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth are available on request.
Teeth could be anodized.

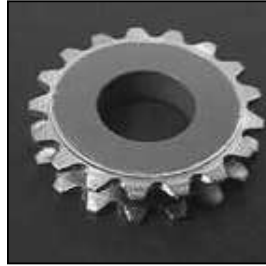
3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
$\pi/20$	.15708	3/8"	HUBLESS	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



For hubs, see Section I.

303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3TF5S-14	3TF5A-14	14*	.6991	.761
3TF5S-15	3TF5A-15	15*	.7490	.811
3TF5S-16	3TF5A-16	16	.7990	.861
3TF5S-17	3TF5A-17	17	.8489	.911
3TF5S-18	3TF5A-18	18	.8988	.961
3TF5S-19	3TF5A-19	19	.9488	1.011
3TF5S-20	3TF5A-20	20	.9987	1.061
3TF5S-22	3TF5A-22	22	1.0986	1.161
3TF5S-24	3TF5A-24	24	1.1985	1.260
3TF5S-25	3TF5A-25	25	1.2484	1.310
3TF5S-26	3TF5A-26	26	1.2983	1.360
3TF5S-28	3TF5A-28	28	1.3982	1.460
3TF5S-30	3TF5A-30	30	1.4981	1.560
3TF5S-32	3TF5A-32	32	1.5980	1.660
3TF5S-35	3TF5A-35	35	1.7478	1.810
3TF5S-36	3TF5A-36	36	1.7977	1.860
3TF5S-40	3TF5A-40	40	1.9974	2.059
3TF5S-45	3TF5A-45	45	2.2471	2.309
3TF5S-50	3TF5A-50	50	2.4968	2.559
3TF5S-55	3TF5A-55	55	2.7465	2.808
3TF5S-60	3TF5A-60	60	2.9962	3.058
3TF5S-65	3TF5A-65	65	3.2458	3.308
3TF5S-70	3TF5A-70	70	3.4955	3.558
3TF5S-75	3TF5A-75	75	3.7452	3.807
3TF5S-80	3TF5A-80	80	3.9949	4.057



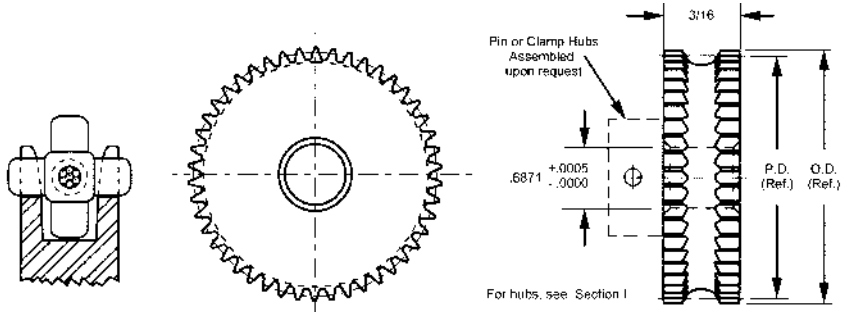
* Pulleys with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth are available on request.

Teeth could be anodized.

3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	BELT
$\pi/20$	.15708	11/16"	HUBLESS	303 Stainless Steel or 2024-T4 Anodized Aluminum	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3TF19S-20	3TF19A-20	20	.9987	1.061
3TF19S-22	3TF19A-22	22	1.0986	1.161
3TF19S-24	3TF19A-24	24	1.1985	1.260
3TF19S-25	3TF19A-25	25	1.2484	1.310
3TF19S-26	3TF19A-26	26	1.2983	1.360
3TF19S-28	3TF19A-28	28	1.3982	1.460
3TF19S-30	3TF19A-30	30	1.4981	1.560
3TF19S-32	3TF19A-32	32	1.5980	1.660
3TF19S-35	3TF19A-35	35	1.7478	1.810
3TF19S-36	3TF19A-36	36	1.7977	1.860
3TF19S-40	3TF19A-40	40	1.9974	2.059
3TF19S-45	3TF19A-45	45	2.2471	2.309
3TF19S-50	3TF19A-50	50	2.4968	2.559
3TF19S-55	3TF19A-55	55	2.7465	2.808
3TF19S-60	3TF19A-60	60	2.9962	3.058
3TF19S-65	3TF19A-65	65	3.2458	3.308
3TF19S-70	3TF19A-70	70	3.4955	3.558
3TF19S-75	3TF19A-75	75	3.7452	3.807
3TF19S-80	3TF19A-80	80	3.9949	4.057



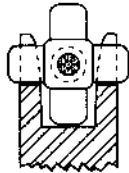
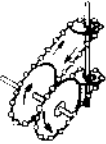
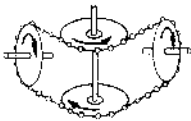
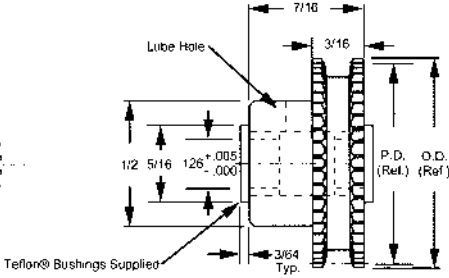
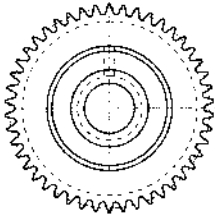
* Pulleys with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth are available on request.

Teeth could be anodized.

3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
$\pi/20$	.15708	1/8"	IDLER	303 Stainless Steel w/Teflon® Bushings	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



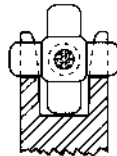
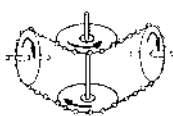
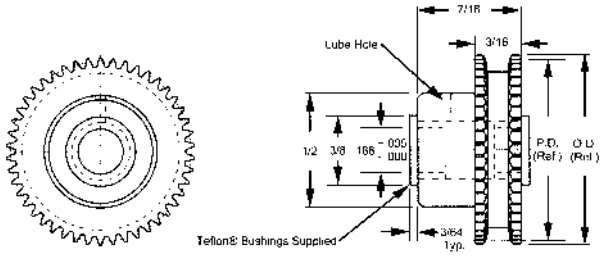
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MTB28S-25	25	1.2484	1.310
3MTB28S-26	26	1.2983	1.360
3MTB28S-28	28	1.3982	1.460
3MTB28S-30	30	1.4981	1.560
3MTB28S-32	32	1.5980	1.660
3MTB28S-34	34	1.6978	1.760
3MTB28S-35	35	1.7478	1.810
3MTB28S-36	36	1.7977	1.860
3MTB28S-38	38	1.8976	1.960
3MTB28S-40	40	1.9974	2.059
3MTB28S-44	44	2.1972	2.259
3MTB28S-45	45	2.2471	2.309
3MTB28S-50	50	2.4968	2.559
3MTB28S-55	55	2.7465	2.808
3MTB28S-60	60	2.9962	3.058
3MTB28S-65	65	3.2458	3.308
3MTB28S-70	70	3.4955	3.558
3MTB28S-75	75	3.7452	3.807
3MTB28S-80	80	3.9949	4.057



Other numbers of teeth are available on request.

3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
$\pi/20$	.15708	3/16"	IDLER	303 Stainless Steel w/Teflon® Bushings	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



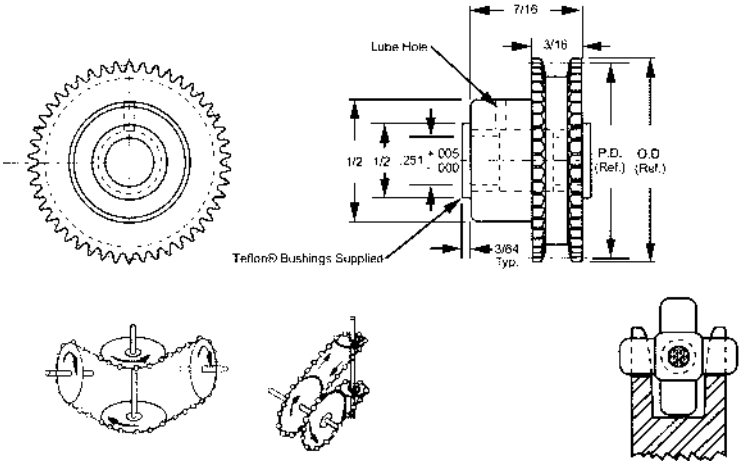
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MTB32S-25	25	1.2484	1.310
3MTB32S-26	26	1.2983	1.360
3MTB32S-28	28	1.3982	1.460
3MTB32S-30	30	1.4981	1.560
3MTB32S-32	32	1.5980	1.660
3MTB32S-34	34	1.6978	1.760
3MTB32S-35	35	1.7478	1.810
3MTB32S-36	36	1.7977	1.860
3MTB32S-38	38	1.8976	1.960
3MTB32S-40	40	1.9974	2.059
3MTB32S-44	44	2.1972	2.259
3MTB32S-45	45	2.2471	2.309
3MTB32S-50	50	2.4968	2.559
3MTB32S-55	55	2.7465	2.808
3MTB32S-60	60	2.9962	3.058
3MTB32S-65	65	3.2458	3.308
3MTB32S-70	70	3.4955	3.558
3MTB32S-75	75	3.7452	3.807
3MTB32S-80	80	3.9949	4.057



Other numbers of teeth are available on request.

3-D PULLEYS

PITCH	CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
$\pi/20$	.15708	1/4"	IDLER	303 Stainless Steel w/Teflon® Bushings	Min-E-Pitch® Three D Drive	Operates with 3TDF Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3MTB42S-25	25	1.2484	1.310
3MTB42S-26	26	1.2983	1.360
3MTB42S-28	28	1.3982	1.460
3MTB42S-30	30	1.4981	1.560
3MTB42S-32	32	1.5980	1.660
3MTB42S-34	34	1.6978	1.760
3MTB42S-35	35	1.7478	1.810
3MTB42S-36	36	1.7977	1.860
3MTB42S-38	38	1.8976	1.960
3MTB42S-40	40	1.9974	2.059
3MTB42S-44	44	2.1972	2.259
3MTB42S-45	45	2.2471	2.309
3MTB42S-50	50	2.4968	2.559
3MTB42S-55	55	2.7465	2.808
3MTB42S-60	60	2.9962	3.058
3MTB42S-65	65	3.2458	3.308
3MTB42S-70	70	3.4955	3.558
3MTB42S-75	75	3.7452	3.807
3MTB42S-80	80	3.9949	4.057

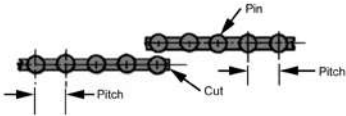


Other numbers of teeth are available on request.

FIELD SPLICE KITS

Splicing Procedures:

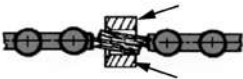
1. Cut "Berg" Min-E-Pitch sharp and square as shown, using cutter TL-1 to desired number of pitches, plus one pitch.



2. Cut plastic jacket (one pitch each side) lightly with sharp razor blade as shown all around. Strip or twist off jacket carefully. Caution: do not cut or fray the cable.

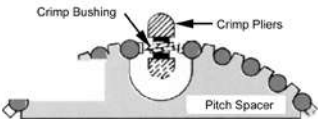


3. Slide stripped cable into oval splice bushing carefully. Caution: do not fray cable. Feed cable into chamfered end of bushing last.



4. Center bushing and be certain chain or belt is straight before crimping.

5. Position crimp tool over bushing and squeeze tightly for maximum splice strength.



FIELD SPLICES OFFER ONLY 50% OF CATALOG RATED LOADS.

CHAIN SERIES	STOCK NO.	FIELD SPLICE KIT AND ACCESSORIES
3CCF 3DCF 3CBF 3TDF	3CCR-7	COMPLETE KIT CONSISTS OF: CRIMP TOOL, PITCH SPACER, SAMPLE CHAINS & BELTS, CABLE CUTTER, BUSHINGS, RAZOR BLADES & INSTRUCTIONS
	BU-032-S	EXTRA SPLICE BUSHING
	TL-3	CRIMP TOOL
	TL-1	CABLE CUTTER FOR UP TO 3/64" CABLE



W.M. Berg will factory splice to order any length chain at a nominal charge.

Field splices offer only 50% of catalog rated loads.

FLEX-E-PITCH® TECHNICAL DATA

Operating Notes:

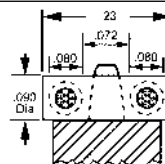
This chain offers zero backlash and extremely smooth operation. Always use as large a sprocket as possible for maximum cable life. *No Lubrication Required.*

CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.1475	.090	Polyurethane (Blue) 1/32" Stainless Steel Cable	Flex-E-Pitch®	Operates with 14LC and 14LP series.

14CCF Series

- Ultimate tensile 100 lbs., 12 lb./pin - when belt is used in open loop configuration (without splice, no crimp bushing).
- Minimum Recommended Sprocket Diameter .750 P.D.
- Recommended Maximum Operating Speed 376 Feet/Min.
- Recommended Operating Load 25 lbs.

** Reduce Operating Load Rating by 50% for field splices.

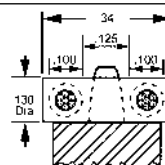


CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.250	.130	Polyurethane (Yellow) 1/32" Stainless Steel Cable	Flex-E-Pitch®	Operates with 25LC, 25CF and 25CP series.

25CCF Series

- Ultimate tensile 100 lbs., 22 lb./pin - when belt is used in open loop
- Minimum Recommended Sprocket Diameter .750 P.D.
- Recommended Maximum Operating Speed 376 Feet/Min.
- Recommended Operating Load 25 lbs.

** Reduce Operating Load Rating by 50% for field splices.

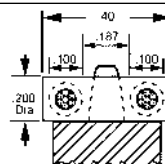


CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.375	.200	Polyurethane (Brown) 3/64" Stainless Steel Cable	Flex-E-Pitch®	Operates with 35CF series.

35CCF Series

- Ultimate tensile 200 lbs., 50 lb./pin - when belt is used in open loop
- Minimum Recommended Sprocket Diameter 1.375" P.D.
- Recommended Maximum Operating Speed 376 Feet/Min.
- Recommended Operating Load 55 lbs.

** Reduce Operating Load Rating by 50% for field splices.

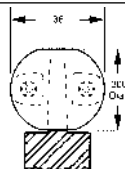


CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.500	.306	Polyurethane (Red) 1/16" Stainless Steel Cable	Flex-E-Pitch®	Operates with 7CF series.

7CCF Series

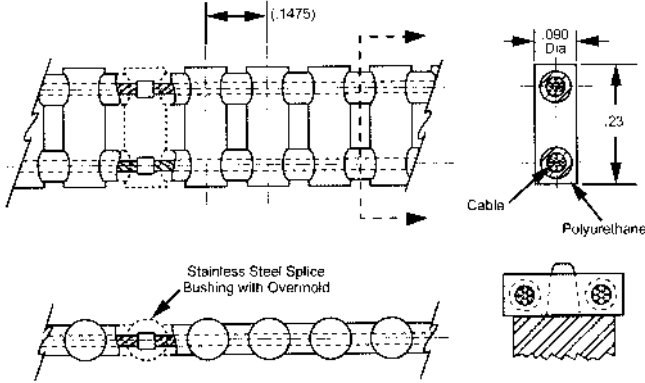
- Ultimate tensile 300 lbs., 70 lb./pin - when belt is used in open loop
- Minimum Recommended Sprocket Diameter 1.760" P.D.
- Recommended Maximum Operating Speed 376 Feet/Min.
- Recommended Operating Load 75 lbs.

** Reduce Operating Load Rating by 50% for field splices.



CHAINS

CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.1475	.090	Polyurethane (Blue) 1/32" Stainless Steel Cable*	Flex-E-Pitch®	Operates with 14LC and 14LP series.



- For Field Splice Kit order 14CCF-7.

* Available with Aramid Core construction. See page VII for alternate belt construction and reverse belt bending applications.

** Reduce Operating Load Rating by 50% for field splices.

Designed to replace standard metal roller chain systems:

- No multiple link joints to bind.
- Lubrication is never required.
- Easily modified to any length.
- Large selection of mating sprockets.
- Infinite Lengths
- Silent Drive
- Rust Proof
- 90A Durometer
- Non-Magnetic
- Positive Drive
- Zero Backlash
- Weight .15 oz./ft.
- Ultimate Tensile Strength 100 lbs. - 12 lbs./Pin when belt is used in an open configuration (without splice, no crimp bushing)
- Temperature Range +180°F to -15°F
- Recommended Operating Load 25 lbs.
- Recommended Max. Operating Speed 376 Feet/Min

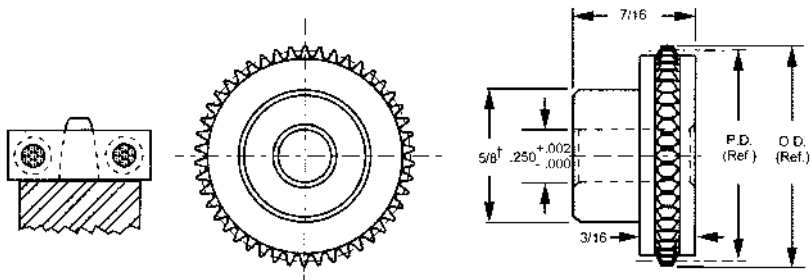
STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
14CCF-40-E	40	5.900
14CCF-50-E	50	7.375
14CCF-60-E	60	8.850
14CCF-70-E	70	10.325
14CCF-80-E	80	11.800
14CCF-90-E	90	13.275
14CCF-100-E	100	14.750
14CCF-110-E	110	16.225
14CCF-120-E	120	17.700
14CCF-130-E	130	19.175
14CCF-140-E	140	20.650
14CCF-150-E	150	22.125
14CCF-160-E	160	23.600
14CCF-170-E	170	25.075
14CCF-180-E	180	26.550
14CCF-190-E	190	28.025
14CCF-200-E	200	29.500
14CCF-210-E	210	30.975
14CCF-220-E	220	32.450
14CCF-230-E	230	33.925
14CCF-240-E	240	35.400
14CCF-250-E	250	36.875
14CCF-260-E	260	38.350
14CCF-270-E	270	39.825
14CCF-280-E	280	41.300
14CCF-290-E	290	42.775
14CCF-300-E	300	44.250
14CCF-310-E	310	45.725
14CCF-320-E	320	47.200
14CCF-330-E	330	48.675
14CCF-340-E	340	50.150
14CCF-370-E	370	54.575
14CCF-390-E	390	57.525

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
14CCF-5FT	5 FT
14CCF-10FT	10 FT
14CCF-25FT	25 FT
14CCF-50FT	50 FT
14CCF-100FT	100 FT



CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	1/4"	PIN HUB	Delrin®	Flex-E-Pitch®	Operates with 14CCF Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14LC4M-14	14†	.6613	.741
14LC4M-15	15†	.7086	.789
14LC4M-16	16	.7558	.836
14LC4M-18	18	.8503	.930
14LC4M-20	20	.9448	1.025
14LC4M-22	22	1.0392	1.119
14LC4M-24	24	1.1337	1.214
14LC4M-26	26	1.2282	1.308
14LC4M-30	30	1.4171	1.497
14LC4M-32	32	1.5116	1.592
14LC4M-36	36	1.7006	1.781
14LC4M-40	40	1.8895	1.970
14LC4M-42	42	1.9840	2.064
14LC4M-44	44	2.0785	2.158
14LC4M-45	45	2.1257	2.206
14LC4M-50	50	2.3619	2.442
14LC4M-55	55	2.5981	2.678
14LC4M-60	60	2.8343	2.914

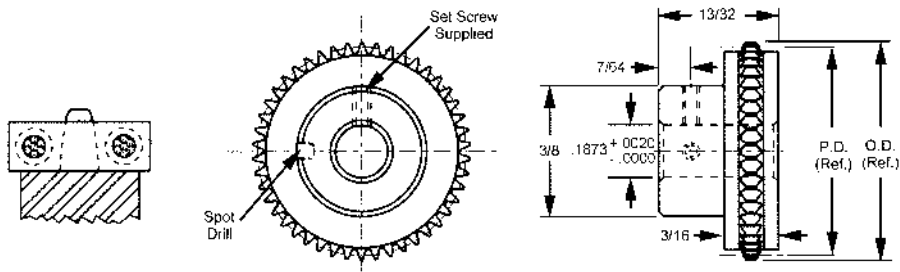


† Teeth runout on hub.
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth available on request.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	3/16"	PIN HUB	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 14CCF Series



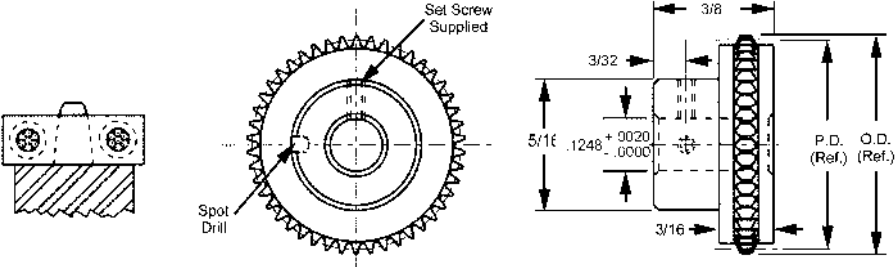
303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.			
14LC21S-10	14LC21A-10	10*	.4724	.552		
14LC21S-11	14LC21A-11	11*	.5196	.600		
14LC21S-12	14LC21A-12	12*	.5669	.647		
14LC21S-13	14LC21A-13	13*	.6141	.694		
14LC21S-14	14LC21A-14	14*	.6613	.741		
14LC21S-15	14LC21A-15	15*	.7086	.789		
14LC21S-16	14LC21A-16	16	.7558	.836		
14LC21S-17	14LC21A-17	17	.8030	.883		
14LC21S-18	14LC21A-18	18	.8503	.930		
14LC21S-19	14LC21A-19	19	.8975	.978		
14LC21S-20	14LC21A-20	20	.9448	1.025		
14LC21S-21	14LC21A-21	21	.9920	1.072		
14LC21S-22	14LC21A-22	22	1.0392	1.119		
14LC21S-23	14LC21A-23	23	1.0865	1.166		
14LC21S-24	14LC21A-24	24	1.1337	1.214		
14LC21S-25	14LC21A-25	25	1.1809	1.261		
14LC21S-26	14LC21A-26	26	1.2282	1.308		
14LC21S-27	14LC21A-27	27	1.2754	1.355		
14LC21S-28	14LC21A-28	28	1.3227	1.403		
14LC21S-29	14LC21A-29	29	1.3699	1.450		
14LC21S-30	14LC21A-30	30	1.4171	1.497		
14LC21S-31	14LC21A-31	31	1.4644	1.544		
14LC21S-32	14LC21A-32	32	1.5116	1.592		
14LC21S-33	14LC21A-33	33	1.5588	1.639		
14LC21S-34	14LC21A-34	34	1.6061	1.686		
14LC21S-35	14LC21A-35	35	1.6533	1.733		
14LC21S-36	14LC21A-36	36	1.7006	1.781		
14LC21S-38	14LC21A-38	38	1.7950	1.875		



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	1/8"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 14CCF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	
14LC14S-10	14LC14A-10	10*	.4724	.552	
14LC14S-11	14LC14A-11	11*	.5196	.600	
14LC14S-12	14LC14A-12	12*	.5669	.647	
14LC14S-13	14LC14A-13	13*	.6141	.694	
14LC14S-14	14LC14A-14	14*	.6613	.741	
14LC14S-15	14LC14A-15	15*	.7086	.789	
14LC14S-16	14LC14A-16	16	.7558	.836	
14LC14S-17	14LC14A-17	17	.8030	.883	
14LC14S-18	14LC14A-18	18	.8503	.930	
14LC14S-19	14LC14A-19	19	.8975	.978	
14LC14S-20	14LC14A-20	20	.9448	1.025	
14LC14S-21	14LC14A-21	21	.9920	1.072	
14LC14S-22	14LC14A-22	22	1.0392	1.119	
14LC14S-23	14LC14A-23	23	1.0865	1.166	
14LC14S-24	14LC14A-24	24	1.1337	1.214	
14LC14S-25	14LC14A-25	25	1.1809	1.261	
14LC14S-26	14LC14A-26	26	1.2282	1.308	
14LC14S-27	14LC14A-27	27	1.2754	1.355	
14LC14S-28	14LC14A-28	28	1.3227	1.403	
14LC14S-29	14LC14A-29	29	1.3699	1.450	
14LC14S-30	14LC14A-30	30	1.4171	1.497	
14LC14S-31	14LC14A-31	31	1.4644	1.544	
14LC14S-32	14LC14A-32	32	1.5116	1.592	
14LC14S-33	14LC14A-33	33	1.5588	1.639	
14LC14S-34	14LC14A-34	34	1.6061	1.686	
14LC14S-35	14LC14A-35	35	1.6533	1.733	
14LC14S-36	14LC14A-36	36	1.7006	1.781	
14LC14S-38	14LC14A-38	38	1.7950	1.875	



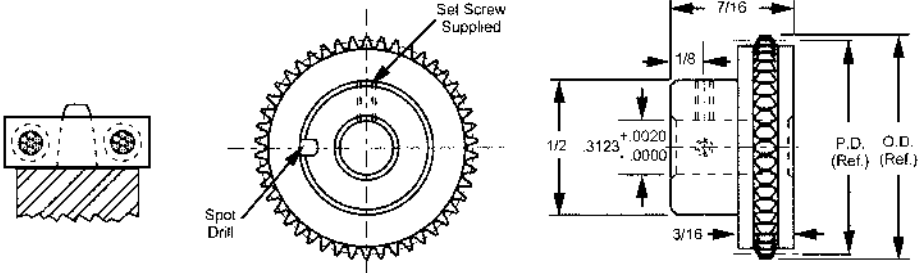
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth available on request.

Teeth could be anodized.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
.1475	5/16"	PIN HUB	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 14CCF Series



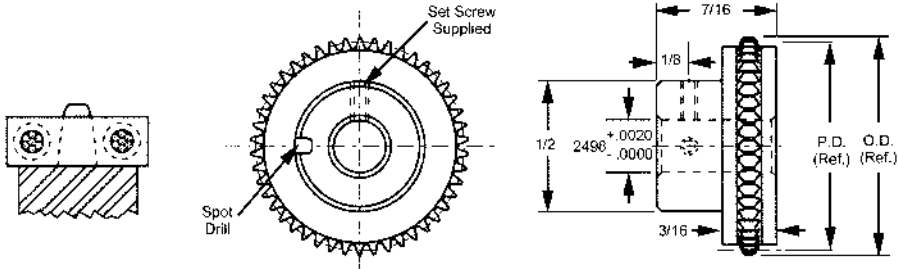
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14LC32S-13	14LC32A-13	13*	.6141	.694
14LC32S-14	14LC32A-14	14*	.6613	.741
14LC32S-15	14LC32A-15	15*	.7086	.789
14LC32S-16	14LC32A-16	16	.7558	.836
14LC32S-17	14LC32A-17	17	.8030	.883
14LC32S-18	14LC32A-18	18	.8503	.930
14LC32S-19	14LC32A-19	19	.8975	.978
14LC32S-20	14LC32A-20	20	.9448	1.025
14LC32S-21	14LC32A-21	21	.9920	1.072
14LC32S-22	14LC32A-22	22	1.0392	1.119
14LC32S-23	14LC32A-23	23	1.0865	1.166
14LC32S-24	14LC32A-24	24	1.1337	1.214
14LC32S-25	14LC32A-25	25	1.1809	1.261
14LC32S-26	14LC32A-26	26	1.2282	1.308
14LC32S-27	14LC32A-27	27	1.2754	1.355
14LC32S-28	14LC32A-28	28	1.3227	1.403
14LC32S-29	14LC32A-29	29	1.3699	1.450
14LC32S-30	14LC32A-30	30	1.4171	1.497
14LC32S-31	14LC32A-31	31	1.4644	1.544
14LC32S-32	14LC32A-32	32	1.5116	1.592
14LC32S-33	14LC32A-33	33	1.5588	1.639
14LC32S-34	14LC32A-34	34	1.6061	1.686
14LC32S-35	14LC32A-35	35	1.6533	1.733
14LC32S-36	14LC32A-36	36	1.7006	1.781
14LC32S-38	14LC32A-38	38	1.7950	1.875
14LC32S-40	14LC32A-40	40	1.8895	1.970
14LC32S-42	14LC32A-42	42	1.9840	2.064
14LC32S-44	14LC32A-44	44	2.0785	2.158



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	1/4"	PIN HUB	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 14CCF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.			
14LC28S-13	14LC28A-13	13*	.6141	.694		
14LC28S-14	14LC28A-14	14*	.6613	.741		
14LC28S-15	14LC28A-15	15*	.7086	.789		
14LC28S-16	14LC28A-16	16	.7558	.836		
14LC28S-17	14LC28A-17	17	.8030	.883		
14LC28S-18	14LC28A-18	18	.8503	.930		
14LC28S-19	14LC28A-19	19	.8975	.978		
14LC28S-20	14LC28A-20	20	.9448	1.025		
14LC28S-21	14LC28A-21	21	.9920	1.072		
14LC28S-22	14LC28A-22	22	1.0392	1.119		
14LC28S-23	14LC28A-23	23	1.0865	1.166		
14LC28S-24	14LC28A-24	24	1.1337	1.214		
14LC28S-25	14LC28A-25	25	1.1809	1.261		
14LC28S-26	14LC28A-26	26	1.2282	1.308		
14LC28S-27	14LC28A-27	27	1.2754	1.355		
14LC28S-28	14LC28A-28	28	1.3227	1.403		
14LC28S-29	14LC28A-29	29	1.3699	1.450		
14LC28S-30	14LC28A-30	30	1.4171	1.497		
14LC28S-31	14LC28A-31	31	1.4644	1.544		
14LC28S-32	14LC28A-32	32	1.5116	1.592		
14LC28S-33	14LC28A-33	33	1.5588	1.639		
14LC28S-34	14LC28A-34	34	1.6061	1.686		
14LC28S-35	14LC28A-35	35	1.6533	1.733		
14LC28S-36	14LC28A-36	36	1.7006	1.781		
14LC28S-38	14LC28A-38	38	1.7950	1.875		
14LC28S-40	14LC28A-40	40	1.8895	1.970		
14LC28S-42	14LC28A-42	42	1.9840	2.064		
14LC28S-44	14LC28A-44	44	2.0785	2.158		



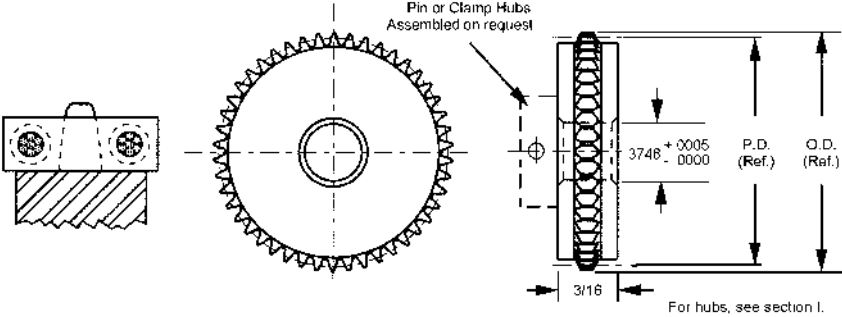
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth available on request.

Teeth could be anodized.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
.1475	3/8"	HUBLESS	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 14CCF Series



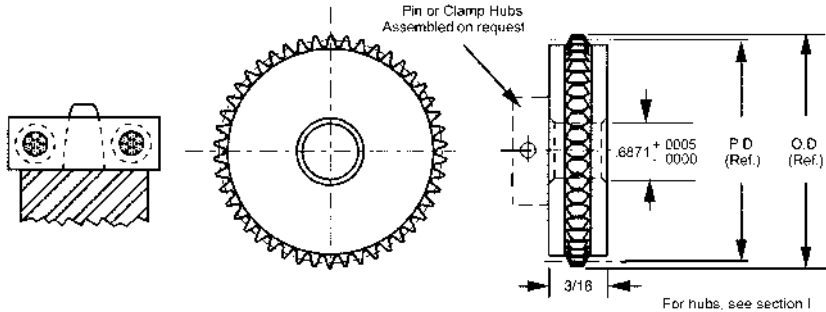
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14LP5S-13	14LP5A-13	13*	.6141	.694
14LP5S-14	14LP5A-14	14*	.6613	.741
14LP5S-15	14LP5A-15	15*	.7086	.789
14LP5S-16	14LP5A-16	16	.7558	.836
14LP5S-17	14LP5A-17	17	.8030	.883
14LP5S-18	14LP5A-18	18	.8503	.930
14LP5S-19	14LP5A-19	19	.8975	.978
14LP5S-20	14LP5A-20	20	.9448	1.025
14LP5S-21	14LP5A-21	21	.9920	1.072
14LP5S-22	14LP5A-22	22	1.0392	1.119
14LP5S-23	14LP5A-23	23	1.0865	1.166
14LP5S-24	14LP5A-24	24	1.1337	1.214
14LP5S-25	14LP5A-25	25	1.1809	1.261
14LP5S-26	14LP5A-26	26	1.2282	1.308
14LP5S-27	14LP5A-27	27	1.2754	1.355
14LP5S-28	14LP5A-28	28	1.3227	1.403
14LP5S-29	14LP5A-29	29	1.3699	1.450
14LP5S-30	14LP5A-30	30	1.4171	1.497
14LP5S-31	14LP5A-31	31	1.4644	1.544
14LP5S-32	14LP5A-32	32	1.5116	1.592
14LP5S-33	14LP5A-33	33	1.5588	1.639
14LP5S-34	14LP5A-34	34	1.6061	1.686
14LP5S-35	14LP5A-35	35	1.6533	1.733
14LP5S-36	14LP5A-36	36	1.7006	1.781
14LP5S-38	14LP5A-38	38	1.7950	1.875
14LP5S-40	14LP5A-40	40	1.8895	1.970
14LP5S-42	14LP5A-42	42	1.9840	2.064
14LP5S-44	14LP5A-44	44	2.0785	2.158



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
.1475	11/16"	HUBLESS	303 Stainless Steel 2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 14CCF Series



303 STAINLESS STEEL		2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	
14LP19S-13	14LP19A-13	13*	.6141	.694	
14LP19S-14	14LP19A-14	14*	.6613	.741	
14LP19S-15	14LP19A-15	15*	.7086	.789	
14LP19S-16	14LP19A-16	16	.7558	.836	
14LP19S-17	14LP19A-17	17	.8030	.883	
14LP19S-18	14LP19A-18	18	.8503	.930	
14LP19S-19	14LP19A-19	19	.8975	.978	
14LP19S-20	14LP19A-20	20	.9448	1.025	
14LP19S-21	14LP19A-21	21	.9920	1.072	
14LP19S-22	14LP19A-22	22	1.0392	1.119	
14LP19S-23	14LP19A-23	23	1.0865	1.166	
14LP19S-24	14LP19A-24	24	1.1337	1.214	
14LP19S-25	14LP19A-25	25	1.1809	1.261	
14LP19S-26	14LP19A-26	26	1.2282	1.308	
14LP19S-27	14LP19A-27	27	1.2754	1.355	
14LP19S-28	14LP19A-28	28	1.3227	1.403	
14LP19S-29	14LP19A-29	29	1.3699	1.450	
14LP19S-30	14LP19A-30	30	1.4171	1.497	
14LP19S-31	14LP19A-31	31	1.4644	1.544	
14LP19S-32	14LP19A-32	32	1.5116	1.592	
14LP19S-33	14LP19A-33	33	1.5588	1.639	
14LP19S-34	14LP19A-34	34	1.6061	1.686	
14LP19S-35	14LP19A-35	35	1.6533	1.733	
14LP19S-36	14LP19A-36	36	1.7006	1.781	
14LP19S-38	14LP19A-38	38	1.7950	1.875	
14LP19S-40	14LP19A-40	40	1.8895	1.970	
14LP19S-42	14LP19A-42	42	1.9840	2.064	
14LP19S-44	14LP19A-44	44	2.0785	2.158	



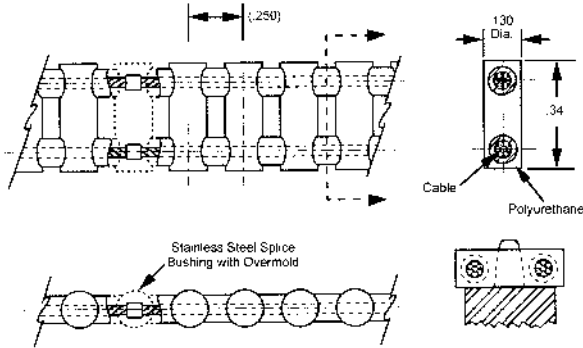
* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth available on request.

Teeth could be anodized.

CHAINS

CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.250	.130	Polyurethane (Yellow) 1/32" Dia. Stainless Steel Cable*	Flex-E-Pitch®	Operates with 25LC, 25CF and 25CP series.



- For Field Splice Kit order 25CCF-7.
- * Available with Aramid Core construction.
- ** Reduce Operating Load Rating by 50% for Field Splices.
See page VII for alternate belt construction and reverse belt bending applications.

Designed to replace standard metal roller chain systems:

- No multiple link joints to bind.
- Lubrication is never required.
- Easily modified to any length.
- Large selection of mating sprockets.
- Infinite Lengths
- Silent Drive
- Rust Proof
- 90A Durometer
- Non-Magnetic
- Positive Drive
- Zero Backlash
- Weight .30 oz./ft.
- Ultimate Tensile Strength 100 lbs. - 22 lbs./Pin
when belt is used in open loop configuration (without splice, no crimp bushing)
- Temperature Range +180°F to -15°F
- Recommended Operating Load 25 lbs.
- Recommended Max. Operating Speed 376 Feet/Min

STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
25CCF-40-E	40	10.000
25CCF-50-E	50	12.500
25CCF-60-E	60	15.000
25CCF-70-E	70	17.500
25CCF-80-E	80	20.000
25CCF-90-E	90	22.500
25CCF-100-E	100	25.000
25CCF-110-E	110	27.500
25CCF-120-E	120	30.000
25CCF-130-E	130	32.500
25CCF-140-E	140	35.000
25CCF-150-E	150	37.500
25CCF-160-E	160	40.000
25CCF-170-E	170	42.500
25CCF-180-E	180	45.000
25CCF-190-E	190	47.500
25CCF-200-E	200	50.000
25CCF-210-E	210	52.500
25CCF-220-E	220	55.000
25CCF-230-E	230	57.500
25CCF-240-E	240	60.000
25CCF-250-E	250	62.500
25CCF-260-E	260	65.000
25CCF-270-E	270	67.500
25CCF-280-E	280	70.000
25CCF-290-E	290	72.500
25CCF-300-E	300	75.000
25CCF-310-E	310	77.500
25CCF-320-E	320	80.000
25CCF-330-E	330	82.500
25CCF-370-E	370	92.500
25CCF-380-E	380	95.000
25CCF-390-E	390	97.500

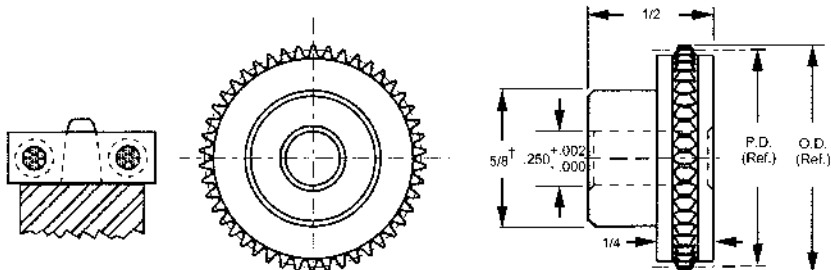
BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
25CCF-5FT	5 FT
25CCF-10FT	10 FT
25CCF-25FT	25 FT
25CCF-50FT	50 FT
25CCF-100FT	100 FT



CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/4"	PIN HUB	Delrin®	Flex-E-Pitch®	Operates with 25CCF Series

A



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25LC4M-9	9†	.7162	.836
25LC4M-10	10	.7958	.916
25LC4M-12	12	.9549	1.075
25LC4M-13	13	1.0345	1.155
25LC4M-14	14	1.1141	1.234
25LC4M-15	15	1.1937	1.314
25LC4M-16	16	1.2732	1.393
25LC4M-18	18	1.4324	1.552
25LC4M-20	20	1.5916	1.712
25LC4M-24	24	1.9099	2.030
25LC4M-25	25	1.9894	2.109
25LC4M-28	28	2.2282	2.348
25LC4M-30	30	2.3873	2.507
25LC4M-36	36	2.8648	2.985



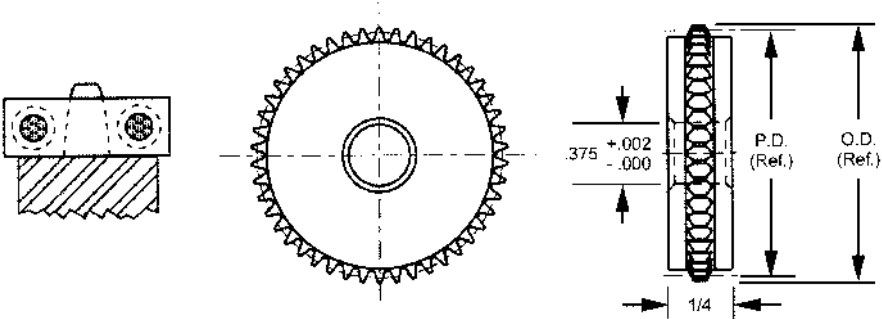
† Teeth runout on hub.

* Sprockets with .750 P.D. and smaller are recommended for idler use only.

Other numbers of teeth available on request.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	3/8"	HUBLESS	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 25CCF Series



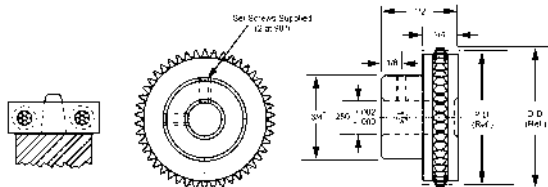
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25CF77A-9	9*	.7162	.836
25CF77A-10	10	.7958	.916
25CF77A-12	12	.9549	1.075
25CF77A-13	13	1.0345	1.155
25CF77A-14	14	1.1141	1.234
25CF77A-15	15	1.1937	1.314
25CF77A-16	16	1.2732	1.393
25CF77A-18	18	1.4324	1.552
25CF77A-20	20	1.5916	1.712
25CF77A-24	24	1.9099	2.030
25CF77A-25	25	1.9894	2.109
25CF77A-28	28	2.2282	2.348
25CF77A-30	30	2.3873	2.507
25CF77A-36	36	2.8648	2.985
25CF77A-40	40	3.1831	3.303
25CF77A-48	48	3.8197	3.940
25CF77A-60	60	4.7747	4.895
25CF77A-72	72	5.7296	5.850



* Sprockets with .750 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

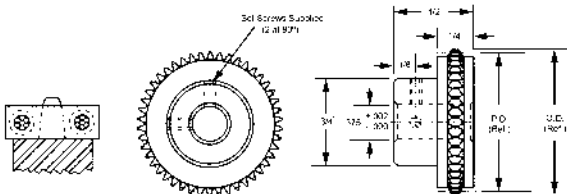
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STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25CP66A-9	9*	.7162	.836
25CP66A-10	10	.7958	.916
25CP66A-12	12	.9549	1.075
25CP66A-13	13	1.0345	1.155
25CP66A-14	14	1.1141	1.234
25CP66A-15	15	1.1937	1.314
25CP66A-16	16	1.2732	1.393
25CP66A-18	18	1.4324	1.552
25CP66A-20	20	1.5916	1.712
25CP66A-24	24	1.9099	2.109
25CP66A-25	25	1.9894	2.030
25CP66A-28	28	2.2282	2.348
25CP66A-30	30	2.3873	2.507
25CP66A-36	36	2.8648	2.985
25CP66A-40	40	3.1831	3.303
25CP66A-48	48	3.8197	3.940
25CP66A-60	60	4.7747	4.895
25CP66A-72	72	5.7296	5.850



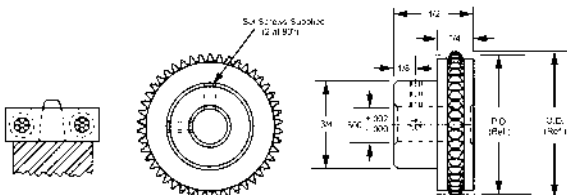
- Teeth could be anodized.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25CP67A-9	9**	.7162	.836
25CP67A-10	10**	.7958	.916
25CP67A-12	12	.9549	1.075
25CP67A-13	13	1.0345	1.155
25CP67A-14	14	1.1141	1.234
25CP67A-15	15	1.1937	1.314
25CP67A-16	16	1.2732	1.393
25CP67A-18	18	1.4324	1.552
25CP67A-20	20	1.5916	1.712
25CP67A-24	24	1.9099	2.109
25CP67A-25	25	1.9894	2.030
25CP67A-28	28	2.2282	2.348
25CP67A-30	30	2.3873	2.547
25CP67A-36	36	2.8648	2.985
25CP67A-40	40	3.1831	3.303
25CP67A-48	48	3.8197	3.940
25CP67A-60	60	4.7747	4.895
25CP67A-72	72	5.7296	5.850



- Teeth could be anodized.

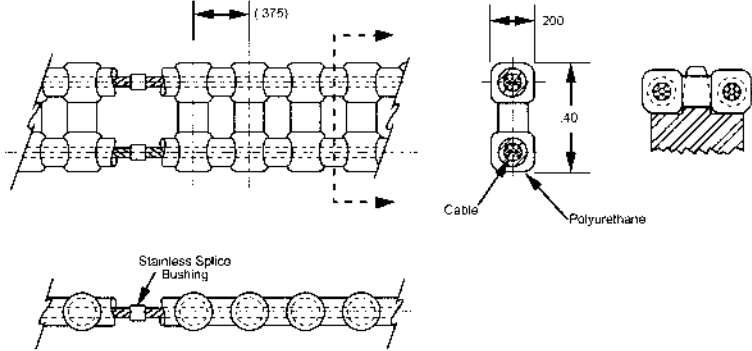
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25CP68A-12	12	.9549	1.075
25CP68A-13	13	1.0345	1.155
25CP68A-14	14	1.1141	1.234
25CP68A-15	15	1.1937	1.314
25CP68A-16	16	1.2732	1.393
25CP68A-18	18	1.4324	1.552
25CP68A-20	20	1.5916	1.712
25CP68A-24	24	1.9099	2.109
25CP68A-25	25	1.9894	2.030
25CP68A-28	28	2.2281	2.348
25CP68A-30	30	2.3873	2.587
25CP68A-36	36	2.8648	2.985
25CP68A-40	40	3.1831	3.303
25CP68A-48	48	3.8197	3.940
25CP68A-60	60	4.7747	4.895
25CP68A-72	72	5.7296	5.850



Teeth could be anodized.

CHAINS

CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.375	.200	Polyurethane (Brown) 3/64" Dia. Stainless Steel Cable*	Flex-E-Pitch®	Operates with 35CF and 35CP series.



- For Field Splice Kit order 35CCF-7.
 - * Available with Aramid Core construction.
 - ** Reduce Operating Load Rating by 50% for Field Splices.
- See page VII for alternate belt construction and reverse belt bending applications.

Designed to replace standard metal roller chain systems:

- No multiple link joints to bind.
- Lubrication is never required.
- Easily modified to any length.
- Large selection of mating sprockets.
- Infinite Lengths
- Silent Drive
- Rust Proof
- 90A Durometer
- Non-Magnetic
- Positive Drive
- Zero Backlash
- Weight .50 oz./ft.
- Ultimate Tensile Strength 200 lbs. - 50 lbs./Pin when belt is used in open loop configuration (without splice, no crimp bushing)
- Temperature Range +180°F to -15°F
- Recommended Operating Load 55 lbs.
- Recommended Max. Operating Speed 376 Feet/Min.

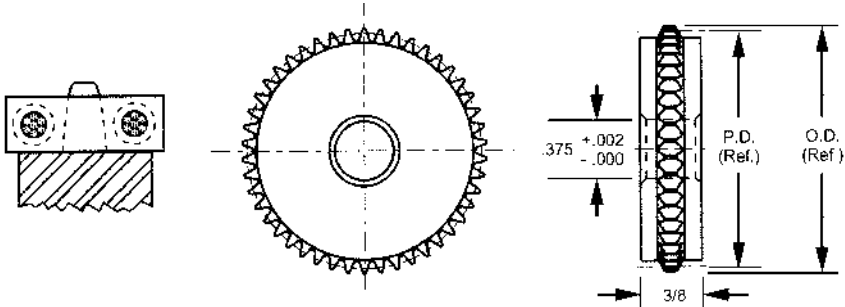
STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
35CCF-40-E	40	15.000
35CCF-50-E	50	18.750
35CCF-60-E	60	22.500
35CCF-70-E	70	26.250
35CCF-80-E	80	30.000
35CCF-90-E	90	33.750
35CCF-100-E	100	37.500
35CCF-110-E	110	41.250
35CCF-120-E	120	45.000
35CCF-130-E	130	48.750
35CCF-140-E	140	52.500
35CCF-150-E	150	56.250
35CCF-160-E	160	60.000
35CCF-170-E	170	63.750
35CCF-180-E	180	67.500
35CCF-190-E	190	71.250
35CCF-200-E	200	75.000
35CCF-210-E	210	78.750
35CCF-220-E	220	82.500
35CCF-230-E	230	86.250
35CCF-240-E	240	90.000
35CCF-250-E	250	93.750
35CCF-260-E	260	97.500
35CCF-270-E	270	101.250
35CCF-280-E	280	105.000
35CCF-290-E	290	108.750
35CCF-300-E	300	112.500
35CCF-310-E	310	116.250
35CCF-320-E	320	120.000
35CCF-330-E	330	123.750
35CCF-360-E	360	135.000
35CCF-370-E	370	138.750
35CCF-390-E	390	146.250

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
35CCF-5FT	5 FT
35CCF-10FT	10 FT
35CCF-25FT	25 FT
35CCF-50FT	50 FT
35CCF-100FT	100 FT



CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	3/8"	HUBLESS	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 35CCF Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35CF74A-8	8*	.9525	1.152
35CF74A-9	9*	1.0715	1.271
35CF74A-10	10*	1.1906	1.390
35CF74A-11	11*	1.3097	1.509
35CF74A-12	12	1.4287	1.628
35CF74A-14	14	1.6668	1.866
35CF74A-15	15	1.7859	1.985
35CF74A-16	16	1.9050	2.104
35CF74A-18	18	2.1431	2.343
35CF74A-20	20	2.3812	2.581
35CF74A-24	24	2.8574	3.057
35CF74A-25	25	2.9765	3.175
35CF74A-30	30	3.5718	3.771
35CF74A-32	32	3.8099	4.009
35CF74A-36	36	4.2862	4.486
35CF74A-40	40	4.7624	4.962
35CF74A-48	48	5.7149	5.914

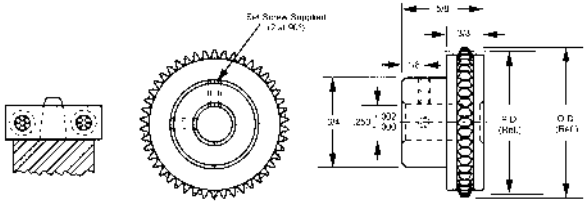


* Sprockets with 1.375 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	1/4"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 35CCF Series

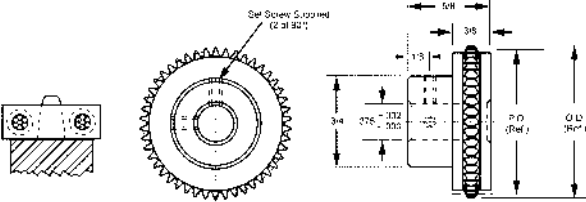
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35CP57A-8	8*	.9525	1.152
35CP57A-9	9*	1.0715	1.271
35CP57A-10	10*	1.1906	1.390
35CP57A-11	11*	1.3097	1.509
35CP57A-12	12	1.4287	1.628
35CP57A-14	14	1.6668	1.866
35CP57A-15	15	1.7859	1.985
35CP57A-16	16	1.9050	2.104
35CP57A-18	18	2.1431	2.343
35CP57A-20	20	2.3812	2.581
35CP57A-24	24	2.8574	3.057
35CP57A-25	25	2.9765	3.175
35CP57A-30	30	3.5718	3.771
35CP57A-32	32	3.8099	4.009
35CP57A-36	36	4.2862	4.486
35CP57A-40	40	4.7624	4.962
35CP57A-48	48	5.7149	5.914



* Sprockets with 1.375 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	3/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 35CCF Series

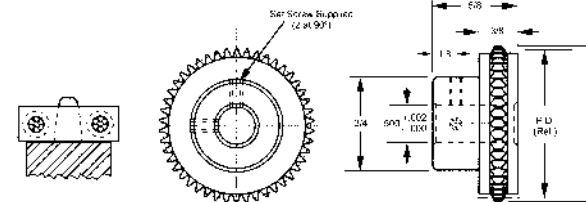
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35CP58A-8	8*	.9525	1.152
35CP58A-9	9*	1.0715	1.271
35CP58A-10	10*	1.1906	1.390
35CP58A-11	11*	1.3097	1.509
35CP58A-12	12	1.4287	1.628
35CP58A-14	14	1.6668	1.866
35CP58A-15	15	1.7859	1.985
35CP58A-16	16	1.9050	2.104
35CP58A-18	18	2.1431	2.343
35CP58A-20	20	2.3812	2.581
35CP58A-24	24	2.8574	3.057
35CP58A-25	25	2.9765	3.175
35CP58A-30	30	3.5718	3.771
35CP58A-32	32	3.8099	4.009
35CP58A-36	36	4.2862	4.486
35CP58A-40	40	4.7624	4.962
35CP58A-48	48	5.7149	5.914



* Sprockets with 1.375 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	1/2"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 35CCF Series

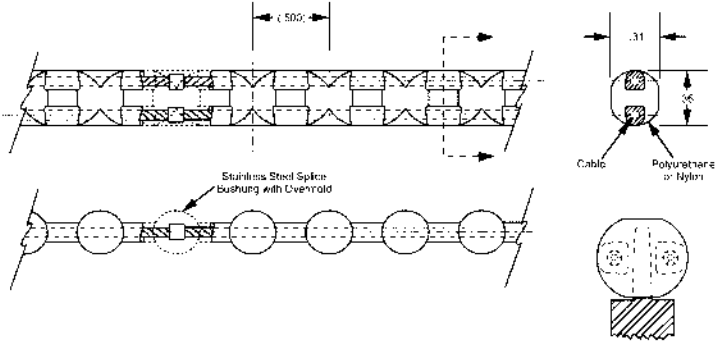
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35CP59A-8	8*	.9525	1.152
35CP59A-9	9*	1.0715	1.271
35CP59A-10	10*	1.1906	1.390
35CP59A-11	11*	1.3097	1.509
35CP59A-12	12	1.4287	1.628
35CP59A-14	14	1.6668	1.866
35CP59A-15	15	1.7859	1.985
35CP59A-16	16	1.9050	2.104
35CP59A-18	18	2.1431	2.343
35CP59A-20	20	2.3812	2.581
35CP59A-24	24	2.8574	3.057
35CP59A-25	25	2.9765	3.175
35CP59A-30	30	3.5718	3.771
35CP59A-32	32	3.8099	4.009
35CP59A-36	36	4.2862	4.486
35CP59A-40	40	4.7624	4.962
35CP59A-48	48	5.7149	5.914



* Sprockets with 1.375 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.
Teeth could be anodized.

CHAINS

CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.500	.306	Polyurethane (Red) 1/16" Dia. Stainless Steel Cable*	Flex-E-Pitch®	Operates with 7CF and 7CP series.



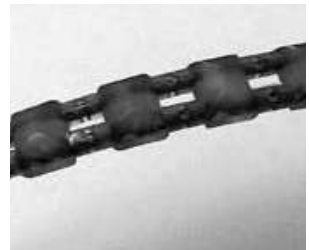
STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
7CCF-20-U	20	10.000
7CCF-22-U	22	11.000
7CCF-24-U	24	12.000
7CCF-26-U	26	13.000
7CCF-28-U	28	14.000
7CCF-30-U	30	15.000
7CCF-32-U	32	16.000
7CCF-34-U	34	17.000
7CCF-36-U	36	18.000
7CCF-38-U	38	19.000
7CCF-40-U	40	20.000
7CCF-42-U	42	21.000
7CCF-44-U	44	22.000
7CCF-46-U	46	23.000
7CCF-48-U	48	24.000
7CCF-50-U	50	25.000
7CCF-52-U	52	26.000
7CCF-54-U	54	27.000
7CCF-56-U	56	28.000
7CCF-60-U	60	30.000
7CCF-64-U	64	32.000
7CCF-68-U	68	34.000
7CCF-72-U	72	36.000
7CCF-76-U	76	38.000
7CCF-80-U	80	40.000
7CCF-84-U	84	42.000
7CCF-88-U	88	44.000
7CCF-92-U	92	46.000
7CCF-96-U	96	48.000
7CCF-100-U	100	50.000
7CCF-104-U	104	52.000
7CCF-108-U	108	54.000
7CCF-112-U	112	56.000
7CCF-116-U	116	58.000
7CCF-130-U	130	65.000
7CCF-140-U	140	70.000
7CCF-200-U	200	100.000

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
7CCF-U-5FT	5 FT
7CCF-U-10FT	10 FT
7CCF-U-25FT	25 FT
7CCF-U-50FT	50 FT
7CCF-U-100FT	100 FT

- Aramid & Anti-Static alternate construction available. See page VII for information about Aramid Core and/or Anti-Static Materials, and reverse belt bending applications.

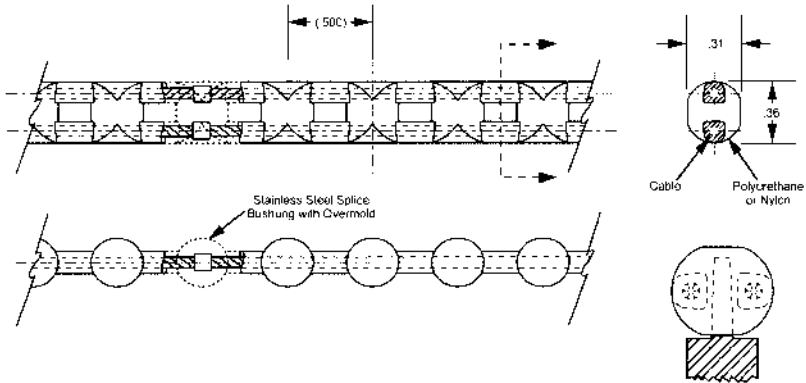
- For Field Splice Kit order 7CCF-7.
- Infinite Lengths
- Rust Proof
- Non-Magnetic
- Zero Backlash
- No Lubrication Required
- Positive Drive
- Weight 1.20 oz./ft.
- 90A Durometer
- Ultimate Tensile Strength 300 lbs. - 70 lbs./Pin when belt is used in an open loop configuration (without splice, no crimp bushing)
- Temperature Range +180°F to -15°F
- Recommended Operating Load 75 lbs.
- Recommended Operating Speed 376 Feet/Min.

Other lengths available on request.



CHAIN CABLES

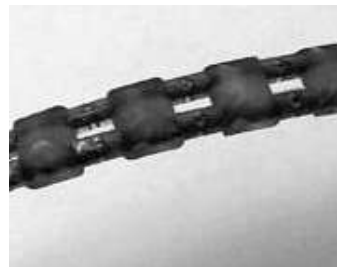
CIRCULAR PITCH	PIN DIAMETER	MATERIALS	BERG'S ® NAME	SPROCKET
.500	.306	Nylon (Green) 1/16" Dia. Stainless Steel Cable*	Flex-E-Pitch®	Operates with 7CF and 7CP series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
7CCF-20-N	20	10.000
7CCF-22-N	22	11.000
7CCF-24-N	24	12.000
7CCF-26-N	26	13.000
7CCF-28-N	28	14.000
7CCF-30-N	30	15.000
7CCF-32-N	32	16.000
7CCF-34-N	34	17.000
7CCF-36-N	36	18.000
7CCF-38-N	38	19.000
7CCF-40-N	40	20.000
7CCF-42-N	42	21.000
7CCF-44-N	44	22.000
7CCF-46-N	46	23.000
7CCF-48-N	48	24.000
7CCF-50-N	50	25.000
7CCF-52-N	52	26.000
7CCF-54-N	54	27.000
7CCF-56-N	56	28.000
7CCF-60-N	60	30.000
7CCF-64-N	64	32.000
7CCF-68-N	68	34.000
7CCF-72-N	72	36.000
7CCF-76-N	76	38.000
7CCF-80-N	80	40.000
7CCF-84-N	84	42.000
7CCF-88-N	88	44.000
7CCF-92-N	92	46.000
7CCF-96-N	96	48.000
7CCF-100-N	100	50.000
7CCF-104-N	104	52.000
7CCF-108-N	108	54.000
7CCF-112-N	112	56.000
7CCF-116-N	116	58.000
7CCF-130-N	130	65.000
7CCF-140-N	140	70.000
7CCF-200-N	200	100.000

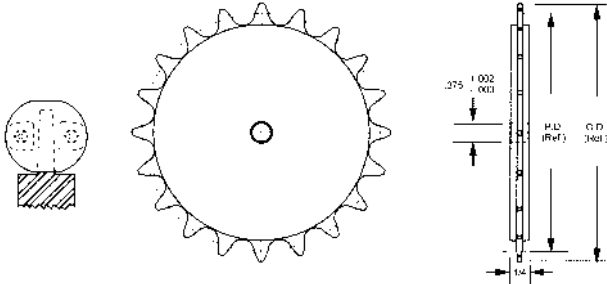
BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
7CCF-N-5FT	5 FT
7CCF-N-10FT	10 FT
7CCF-N-25FT	25 FT
7CCF-N-50FT	50 FT
7CCF-N-100FT	100 FT

- Aramid & Anti-Static alternate construction available.
 - Aramid Core and/or Anti-Static Materials, and reverse belt bending applications available.
 - For Field Splice Kit order 7CCF-7.
 - Infinite Lengths
 - Rust Proof
 - Non-Magnetic
 - Zero Backlash
 - No Lubrication Required
 - Positive Drive
 - Weight 1.20 oz./ft.
 - 90A Durometer
 - Ultimate Tensile Strength 300 lbs. - 70 lbs./Pin when belt is used in an open loop configuration (without splice, no crimp bushing)
 - Temperature Range +250°F to -40°F
 - Recommended Operating Load 75 lbs.
 - Recommended Operating Speed 376 Feet/Min.
- Other lengths available on request.



CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	3/8"	HUBLESS	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 7CCF Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
7CF77A-8	8*	1.2800	1.529
7CF77A-9	9*	1.4400	1.689
7CF77A-10	10*	1.6000	1.850
7CF77A-11	11*	1.7600	2.009
7CF77A-12	12	1.9200	2.169
7CF77A-13	13	2.0800	2.330
7CF77A-14	14	2.2400	2.490
7CF77A-15	15	2.4000	2.650
7CF77A-16	16	2.5600	2.809
7CF77A-18	18	2.8800	3.129
7CF77A-20	20	3.2000	3.450
7CF77A-22	22	3.5000	3.769
7CF77A-24	24	3.8400	4.089
7CF77A-25	25	4.0000	4.250
7CF77A-28	28	4.4800	4.730
7CF77A-30	30	4.8000	5.050
7CF77A-32	32	5.1200	5.369
7CF77A-34	34	5.4400	5.689
7CF77A-36	36	5.7600	6.009
7CF77A-38	38	6.0800	6.330

* Sprockets with 1.760 P.D. and smaller are recommended for idler use only.

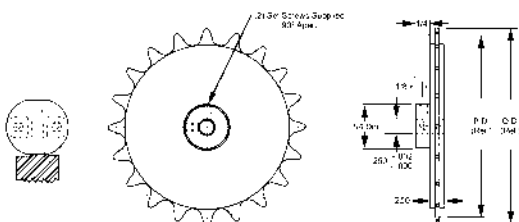
Other numbers of teeth available on request.

Teeth could be anodized.

CHAIN SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	1/4"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 7CCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
7CP66A-8	8*	1.2800	1.529
7CP66A-9	9*	1.4400	1.689
7CP66A-10	10*	1.6000	1.850
7CP66A-11	11*	1.7600	2.009
7CP66A-12	12	1.9200	2.169
7CP66A-13	13	2.0800	2.330
7CP66A-14	14	2.2400	2.490
7CP66A-15	15	2.4000	2.650
7CP66A-16	16	2.5600	2.809
7CP66A-18	18	2.8800	3.129
7CP66A-20	20	3.2000	3.450
7CP66A-22	22	3.5000	3.769
7CP66A-24	24	3.8400	4.089
7CP66A-25	25	4.0000	4.250
7CP66A-28	28	4.4800	4.730
7CP66A-30	30	4.8000	5.050
7CP66A-32	32	5.1200	5.369
7CP66A-34	34	5.4400	5.689
7CP66A-36	36	5.7600	6.009
7CP66A-38	38	6.0800	6.330

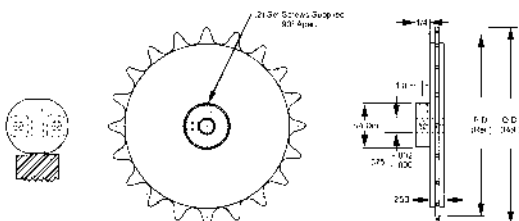


Teeth could be anodized.

* Sprockets with 1.760 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	3/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 7CCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
7CP67A-8	8*	1.2800	1.529
7CP67A-9	9*	1.4400	1.689
7CP67A-10	10*	1.6000	1.850
7CP67A-11	11*	1.7600	2.009
7CP67A-12	12	1.9200	2.169
7CP67A-13	13	2.0800	2.330
7CP67A-14	14	2.2400	2.490
7CP67A-15	15	2.4000	2.650
7CP67A-16	16	2.5600	2.809
7CP67A-18	18	2.8800	3.129
7CP67A-20	20	3.2000	3.450
7CP67A-22	22	3.5000	3.769
7CP67A-24	24	3.8400	4.089
7CP67A-25	25	4.0000	4.250
7CP67A-28	28	4.4800	4.730
7CP67A-30	30	4.8000	5.050
7CP67A-32	32	5.1200	5.369
7CP67A-34	34	5.4400	5.689
7CP67A-36	36	5.7600	6.009
7CP67A-38	38	6.0800	6.330

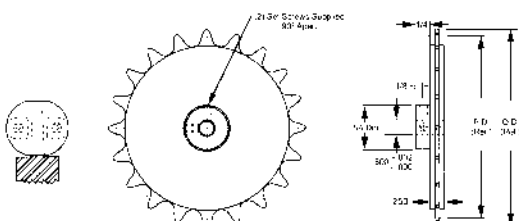


Teeth could be anodized.

* Sprockets with 1.760 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	1/2"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Pitch®	Operates with 7CCF Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
7CP68A-8	8*	1.2800	1.529
7CP68A-9	9*	1.4400	1.689
7CP68A-10	10*	1.6000	1.850
7CP68A-11	11*	1.7600	2.009
7CP68A-12	12	1.9200	2.169
7CP68A-13	13	2.0800	2.330
7CP68A-14	14	2.2400	2.490
7CP68A-15	15	2.4000	2.650
7CP68A-16	16	2.5600	2.809
7CP68A-18	18	2.8800	3.129
7CP68A-20	20	3.2000	3.450
7CP68A-22	22	3.5000	3.769
7CP68A-24	24	3.8400	4.089
7CP68A-25	25	4.0000	4.250
7CP68A-28	28	4.4800	4.730
7CP68A-30	30	4.8000	5.050
7CP68A-32	32	5.1200	5.369
7CP68A-34	34	5.4400	5.689
7CP68A-36	36	5.7600	6.009
7CP68A-38	38	6.0800	6.330



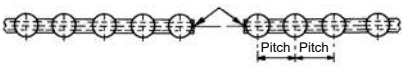
Teeth could be anodized.

* Sprockets with 1.760 P.D. and smaller are recommended for idler use only.
Other numbers of teeth available on request.

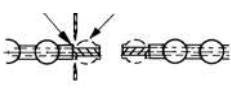
FIELD SPLICE KITS

Splicing Procedures:

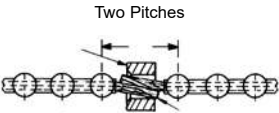
1. Cut "BERG" *Flex-Fitch*® sharp and square as shown, using cutter, to desired number of pitches, plus one pitch.



2. Cut plastic jacket (one pitch each side) lightly, with a sharp razor blade, as shown (all around). Caution: do not nick cable. Strip or twist off jacket carefully.

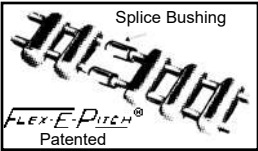
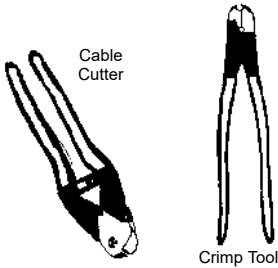
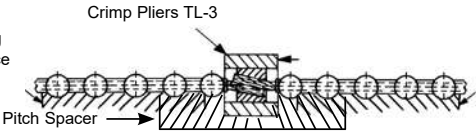


3. Slide stripped cable into oval splice bushing carefully. Caution: Do not fray cable. Feed cable into chamfered end of bushing last.



4. Center bushing and be certain chain is straight before crimping.

5. Position crimp tool over splice bushing and squeeze tightly for maximum splice strength.

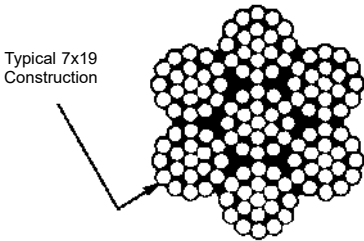


CHAIN SERIES	STOCK NO.	FIELD SPLICE KIT AND ACCESSORIES
14CCF 25CCF 35CCF 7CCF	14CCF-7 25CCF-7 35CCF-7 7CCF-7	Complete Kit Consists of: Crimp tool, Pitch Spacer, Sample Chain cutter, Bushings, Razor Blades & Instructions
	TL-3 TL-7	Crimp Tool For 14CCF, 25CCF, 35CCF Crimp Tool 7CCF
	BU-032-S BU-046-S BU-062-S	Extra Splice Bushings for: 14CCF & 25CCF (1/32" Cable) 35CCF (3/64" Cable) 7CCF (1/16" Cable)
	TL-1 TL-2	Cable Cutter for up to 3/64" Cable Cable Cutter for 7CCF (1/16" Cable)
	TL-9	7CCF Pitch Space Fixture

Field Splices offer only 50% of Catalog Rated Loads

AIRCRAFT CABLES

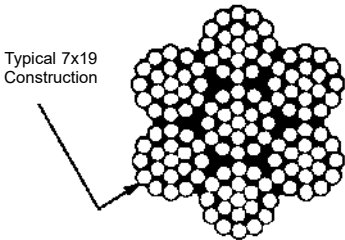
STYLE	MATERIALS	NOTE
PLAIN, UNJACKETED CABLE	302 STAINLESS STEEL	COMPLIES WITH MILITARY SPECIFICATION



STOCK NO.	CABLE CONST.	CABLE DIA.	CABLE LENGTH (FT.)	TENSILE STRENGTH (MIN. LBS.)
AB018-25FT	7X7	1/64	25	40
AB018-50FT	7X7	1/64	50	40
AB018-100FT	7X7	1/64	100	40
AB032-25FT	7X7	1/32	25	120
AB032-50FT	7X7	1/32	50	120
AB032-100FT	7X7	1/32	100	120
AB033-25FT	7X19	1/32	25	120
AB033-50FT	7X19	1/32	50	120
AB033-100FT	7X19	1/32	100	120
AB046-25FT	7X7	3/64	25	270
AB046-50FT	7X7	3/64	50	270
AB046-100FT	7X7	3/64	100	270
AB062-25FT	7X19	1/16	25	480
AB062-50FT	7X19	1/16	50	480
AB062-100FT	7X19	1/16	100	480
AB078-25FT	7X19	5/64	50	560
AB078-50FT	7X19	5/64	50	560
AB078-100FT	7X19	5/64	100	560
AB092-25FT	7X19	3/32	25	960
AB092-50FT	7X19	3/32	50	960
AB092-100FT	7X19	3/32	100	960
AB125-25FT	7X19	1/8	25	1760
AB125-50FT	7X19	1/8	50	1760
AB125-100FT	7X19	1/8	100	1760
AB156-25FT	7X19	5/32	25	2400
AB156-50FT	7X19	5/32	50	2400
AB156-100FT	7X19	5/32	100	2400

Stainless Steel Aircraft Cable is available in additional diameters and lengths.

STYLE	MATERIALS	NOTE
NYLON JACKET CABLE	302 STAINLESS STEEL	COMPLIES WITH MILITARY SPECIFICATION



STOCK NO.	CABLE CONST.	JACKET DIA.	CABLE DIA.	CABLE LENGTH (FT.)	TENSILE STRENGTH (MIN. LBS.)
AB046N-25FT	7X7	1/16	3/64	25	270
AB046N-50FT	7X7	1/16	3/64	50	270
AB046N-100FT	7X7	1/16	3/64	100	270
AB062N-25FT	7X7	1/8	1/16	25	480
AB062N-50FT	7X7	1/8	1/16	50	480
AB062N-100FT	7X7	1/8	1/16	100	480
AB092N-25FT	7X7	3/16	3/32	25	960
AB092N-50FT	7X7	3/16	3/32	50	960
AB092N-100FT	7X7	3/16	3/32	100	960
AB125N-25FT	7X19	3/16	1/8	25	1760
AB125N-50FT	7X19	3/16	1/8	50	1760
AB125N-100FT	7X19	3/16	1/8	100	1760

Stainless Steel Aircraft Cable is available in additional diameters and lengths.

FIBER CABLES

STYLE	MATERIALS	NOTE
1/64" TO 3/16" DIAMETER	ARAMID FILAMENT STRANDED	AVAILABLE IN ADDITIONAL DIAMETERS AND LENGTHS

BERG-FIBER CABLE is a continuous stranded Fiber Filament using a new Aramid Fiber. The combined multiple strands, which operate as one single working member, can now flex around much smaller pulley diameters than conventional steel cable, thus offering longer life spans as compared to steel cable. The impregnating of the flexible strands with a proprietary flexible coating serves to provide excellent resistance to self-abrasion by providing a barrier between adjacent fine fiber filaments. This coating keeps all the fine filament strands together so that when the cable is cut it does not open and unwind.

BERG-FIBER CABLE has strength to weight ratio approximately (4) times higher than steel in air, and (25) times higher in water in the same given diameter, it has a high modulus of elasticity and low elongation making this cable an ideal tensile member in electro-mechanical cables and cable assemblies. In addition, electrical properties and environmental resistance are excellent.

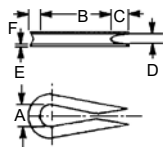
STOCK NO.	CABLE DIA.	CABLE LENGTH (FT.)	TENSILE STRENGTH (MIN. LBS.)	MINIMUM PULLEY DIA.
AA018-25FT	1/64	25	20	5/16
AA018-50FT	1/64	50	20	5/16
AA018-100FT	1/64	100	20	5/16
AA034-25FT	1/32	25	50	7/16
AA034-50FT	1/32	50	50	7/16
AA034-100FT	1/32	100	50	7/16
AA048-25FT	3/64	25	75	3/4
AA048-50FT	3/64	50	75	3/4
AA048-100FT	3/64	100	75	3/4
AA070-25FT	1/16	25	150	1-1/2
AA070-50FT	1/16	50	150	1-1/2
AA070-100FT	1/16	100	150	1-1/2
AA080-25FT	5/64	25	250	1-3/4
AA080-50FT	5/64	50	250	1-3/4
AA080-100FT	5/64	100	250	1-3/4
AA093-25FT	3/32	25	450	2"
AA093-50FT	3/32	50	450	2"
AA093-100FT	3/32	100	450	2"



Stainless Steel Aircraft Cable and Berg Fiber Cable are available in additional diameters and lengths.

CABLE THIMBLES

STYLE	MATERIALS
1/64" TO 3/16" CABLE DIAMETER	STAINLESS STEEL



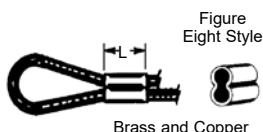
STOCK NO.	CABLE DIAMETERS	A	B	C	D	E	F
TH-032-S	.015-.046	.188	1/4	1/8	1/16	.015	3/64
TH-062-S	.046-.078	.350	43/64	3/16	3/32	.032	5/64
TH-092-S	.092-.125	.350	45/64	7/32	9/64	.032	5/64
TH-156-S	.156	.400	51/64	7/32	11/64	.032	7/64
TH-187-S	.187	.500	1"	5/16	13/64	.032	11/64



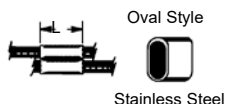
Some thimbles may have open and/or uneven ends.

CABLE CRIMP BUSHINGS

STYLE	MATERIALS
1/64" TO 3/16" CABLE DIAMETER	AVAILABLE IN COPPER, BRASS AND STAINLESS STEEL



Brass and Copper



Stainless Steel

COPPER (C) & BRASS (B) CRIMP BUSHINGS		
BUSHING STOCK NO.	L*	Use With Bushing Crimp Tool**
BU-018-B	1/4	TL-10
BU-032-C	9/32	TL-10
BU-046-C	7/16	TL-10
BU-062-C	1/4	TL-10
BU-093-C	1/2	TL-11
BU-125-C	3/4	TL-11
BU-156-C	7/8	TL-11
BU-187-C	1-1/4	TL-11

STAINLESS STEEL CRIMP BUSHINGS		
BUSHING STOCK NO.	L*	Use With Bushing Crimp Tool**
BU-018-S	1/32	TL-4
BU-032-S	3/64	TL-3
BU-046-S	1/8	TL-3
BU-062-S	3/16	TL-7

CABLE DIA.
1/64
1/32
3/64
1/16
3/32
1/8
5/32
3/16



Copper Bushings are zinc plated.
BU-093-C can be used for 5/64 Cable
* Dimensions apply after crimping.

CABLE CRIMP TOOLS

NOTE

See above for information on Cable Crimp Bushings mentioned below.



CRIMP TOOL STOCK NO.	Use With Bushing Stock Number(s)
TL-10	BU-018-B, BU-032-C, BU-046-C and BU 062-C
TL-11	BU-093-C, BU-125-C, BU-156-C and BU-187-C
TL-4	BU-018-S
TL-3	BU-032-S and BU-046-S
TL-7	BU-062-S

ROW-L-ER® CHAIN TECHNICAL DATA

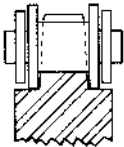
Operating Notes:

ROW-L-ER Chain offers no slippage due to the positive drive between chain and tooth. This series will also have negligible stretch, long life, and the ability to operate in many different hostile environments such as high temperature, high moisture, high dust or dirty areas, and corrosive atmospheres.

CIRCULAR PITCH	ROLLER DIAMETER	MATERIAL	SPROCKET
.1475	.090	Stainless Steel, Non-Magnetic, Prestretched Single Strand	Operates with 14EM and 14SP series.

.1475 Pitch Series

- Ultimate tensile 180 lbs. - Max. operating load 20 lbs.
- .035 lbs/ft - Must be lubricated



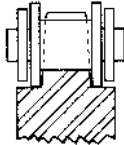
CIRCULAR PITCH	ROLLER DIAMETER	MATERIAL	SPROCKET
.250	.130	Stainless Steel or Mild Steel Single Strand, Delrin and Nylatron	Operates with 25EM and 25SP series.

.250 Pitch Series

American Standard No. 25

- Ultimate tensile 700 lbs., for Stainless Steel - Max. operating load 77 lbs.
875 lbs., for Mild Steel - Max. operating load 97 lbs.
63 lbs., for Delrin - Max. operating load 21 lbs.
65 lbs., for Nylatron - Max. operating load 22 lbs.

- .09 lbs/ft - Must be lubricated (Applies to steel chain only)



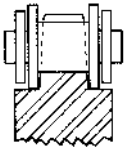
CIRCULAR PITCH	ROLLER DIAMETER	MATERIAL	SPROCKET
.375	.200	Stainless Steel or Mild Steel Single Strand, Delrin and Nylatron	Operates with 35EM and 35SP series.

.375 Pitch Series

American Standard No. 35

- Ultimate tensile 1400 lbs., for Stainless Steel - Max. operating load 155 lbs.
2100 lbs., for Mild Steel - Max. operating load 233 lbs.
136 lbs., for Delrin - Max. operating load 45 lbs.
136 lbs., for Nylatron - Max. operating load 45 lbs.

- .22 lbs/ft - Must be lubricated (Applies to steel chain only)



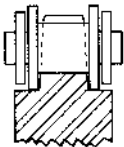
CIRCULAR PITCH	ROLLER DIAMETER	MATERIAL	SPROCKET
.500	.306 - Steel .313 - Plastic	Stainless Steel or Mild Steel Single Strand, Delrin and Nylatron	Operates with 41EM and 41SP series for steel. Operates with 40EM series for plastic.

.500 Pitch Series

American Standard No. 41 - Steel, No. 40 - Plastic

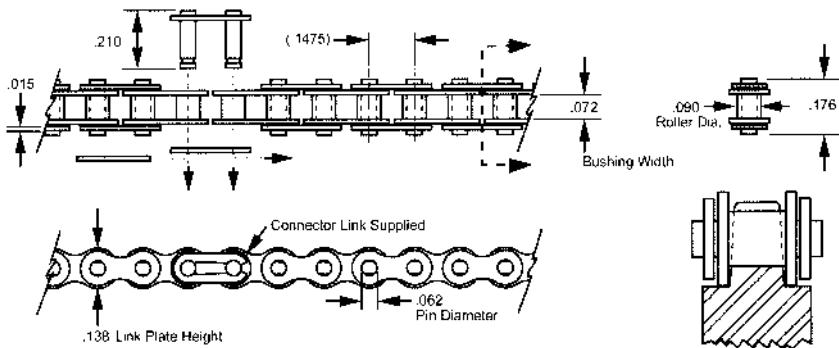
- Ultimate tensile 1700 lbs., for Stainless Steel - Max. operating load 188 lbs.
2400 lbs., for Mild Steel - Max. operating load 266 lbs.
175 lbs., for Delrin - Max. operating load 58 lbs.
173 lbs., for Nylatron - Max. operating load 57 lbs.

- .32 lbs/ft - Must be lubricated (Applies to steel chain only)



LINK CHAINS

CIRCULAR PITCH	ROLLER DIAMETER	BERG'S ® NAME	MATERIAL	SPROCKET
.1475	.090	ROW-L-ER®	Stainless Steel, Non-Magnetic, Prestretched Single Strand	Operates with 14EM and 14SP series.



STOCK NO.	NO. OF PITCHES	LENGTH INCHES
RC14SS-40	40	5.900
RC14SS-50	50	7.375
RC14SS-60	60	8.850
RC14SS-70	70	10.325
RC14SS-80	80	11.800
RC14SS-90	90	13.275
RC14SS-100	100	14.750
RC14SS-110	110	16.225
RC14SS-120	120	17.700
RC14SS-130	130	19.175
RC14SS-140	140	20.650
RC14SS-150	150	22.125
RC14SS-160	160	23.600
RC14SS-170	170	25.075
RC14SS-180	180	26.550
RC14SS-190	190	28.025
RC14SS-200	200	29.500
RC14SS-210	210	30.975
RC14SS-220	220	32.450
RC14SS-230	230	33.925
RC14SS-240	240	35.400
RC14SS-250	250	36.875
RC14SS-260	260	38.350
RC14SS-270	270	39.825
RC14SS-280	280	41.300
RC14SS-290	290	42.775
RC14SS-300	300	44.250
RC14SS-310	310	45.725
RC14SS-320	320	47.200
RC14SS-330	330	48.675
RC14SS-340	340	50.150
RC14SS-350	350	51.625
RC14SS-360	360	53.100
RC14SS-370	370	54.575
RC14SS-380	380	56.050
RC14SS-390	390	57.524

* Maximum recommended operating load is for a slip fit connecting link, which is standard. A press fit connecting link is a special available on request.

Special lengths available on request (only even numbers of links).

Maximum recommended Operating Load = 20 lbs.*

Ultimate Tensile Strength = 180 lbs.

.035 lbs/foot - Must be lubricated.

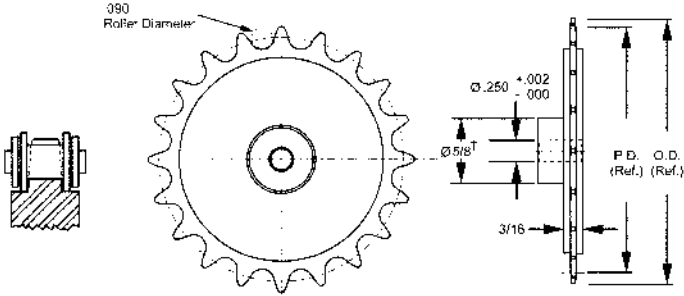
Use Connector Link Berg P/N RC14SS-CL.

STOCK NO.	LENGTH
RC14SS-5FT	5 FT
RC14SS-10FT	10 FT
RC14SS-25FT	25 FT
RC14SS-50FT	50 FT
RC14SS-100FT	100 FT



SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	1/4"	PIN HUB	Delrin®	ROW-L-ER®	Operates with RC14SS Series



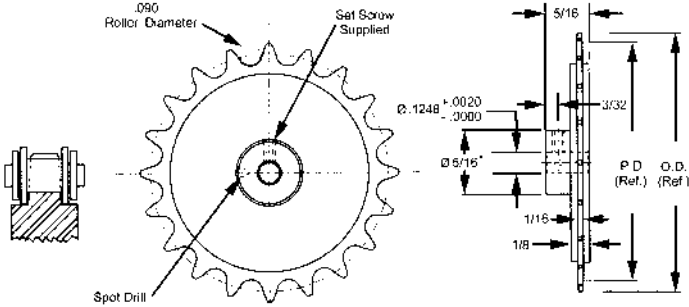
STOCK NO.	NO. OF TEETH	P.D.	O.D.
14EM4M-15	15†	.7094	.761
14EM4M-16	16†	.7561	.808
14EM4M-18	18†	.8494	.901
14EM4M-20	20	.9429	.994
14EM4M-22	22	1.0364	1.088
14EM4M-24	24	1.1300	1.182
14EM4M-26	26	1.2237	1.275
14EM4M-30	30	1.4111	1.463
14EM4M-32	32	1.5048	1.556
14EM4M-36	36	1.6924	1.744
14EM4M-40	40	1.8800	1.932
14EM4M-42	42	1.9738	2.025
14EM4M-44	44	2.0676	2.119
14EM4M-45	45	2.1145	2.166
14EM4M-50	50	2.3491	2.401
14EM4M-55	55	2.5837	2.635
14EM4M-60	60	2.8183	2.870



† Teeth runout on hub.
Other Bore sizes and other numbers of teeth are available on request.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
.1475	1/8"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	ROW-L-ER®	Operates with RC14SS Series



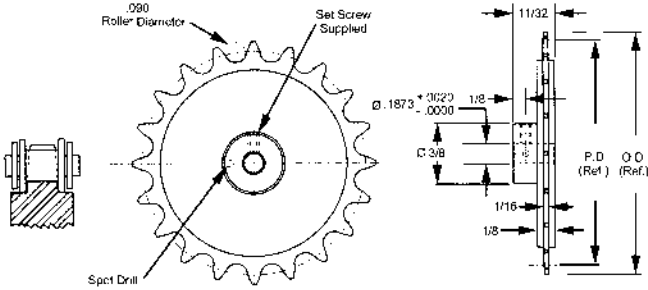
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14EM10S-9	14EM10A-9	9•	.431	.483
14EM10S-10	14EM10A-10	10•	.477	.529
14EM10S-11	14EM10A-11	11	.524	.575
14EM10S-12	14EM10A-12	12	.570	.621
14EM10S-13	14EM10A-13	13	.616	.668
14EM10S-14	14EM10A-14	14	.663	.714
14EM10S-15	14EM10A-15	15	.709	.761
14EM10S-16	14EM10A-16	16	.756	.808
14EM10S-17	14EM10A-17	17	.803	.854
14EM10S-18	14EM10A-18	18	.849	.901
14EM10S-19	14EM10A-19	19	.896	.948
14EM10S-20	14EM10A-20	20	.943	.994
14EM10S-21	14EM10A-21	21	.990	1.041
14EM10S-22	14EM10A-22	22	1.036	1.088
14EM10S-23	14EM10A-23	23	1.083	1.135
14EM10S-24	14EM10A-24	24	1.130	1.182
14EM10S-25	14EM10A-25	25	1.177	1.228
14EM10S-26	14EM10A-26	26	1.224	1.275
14EM10S-27	14EM10A-27	27	1.271	1.322
14EM10S-28	14EM10A-28	28	1.317	1.369
14EM10S-29	14EM10A-29	29	1.364	1.416
14EM10S-30	14EM10A-30	30	1.411	1.463
14EM10S-31	14EM10A-31	31	1.458	1.510
14EM10S-32	14EM10A-32	32	1.505	1.556
14EM10S-33	14EM10A-33	33	1.552	1.603
14EM10S-34	14EM10A-34	34	1.599	1.650
14EM10S-35	14EM10A-35	35	1.646	1.697
14EM10S-36	14EM10A-36	36	1.692	1.744



• For 9-10 teeth, hub diameter equals .23.
Other Bore sizes and other numbers of teeth are available on request.
Teeth could be anodized.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	3/16"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	ROW-L-ER®	Operates with RC14SS Series



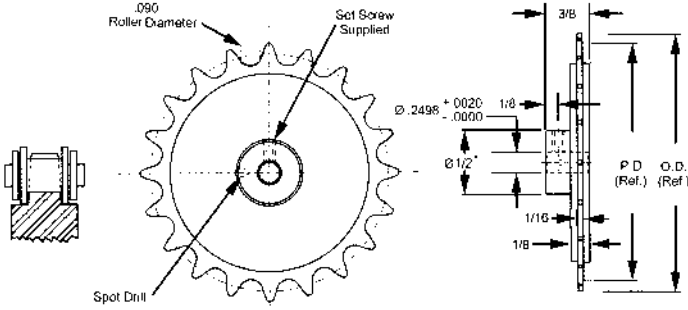
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14EM19S-12	14EM19A-12	12	.570	.621
14EM19S-13	14EM19A-13	13	.616	.668
14EM19S-14	14EM19A-14	14	.663	.714
14EM19S-15	14EM19A-15	15	.709	.761
14EM19S-16	14EM19A-16	16	.756	.808
14EM19S-17	14EM19A-17	17	.803	.854
14EM19S-18	14EM19A-18	18	.849	.901
14EM19S-19	14EM19A-19	19	.896	.948
14EM19S-20	14EM19A-20	20	.943	.994
14EM19S-21	14EM19A-21	21	.990	1.041
14EM19S-22	14EM19A-22	22	1.036	1.088
14EM19S-23	14EM19A-23	23	1.083	1.135
14EM19S-24	14EM19A-24	24	1.130	1.182
14EM19S-25	14EM19A-25	25	1.177	1.228
14EM19S-26	14EM19A-26	26	1.224	1.275
14EM19S-27	14EM19A-27	27	1.271	1.322
14EM19S-28	14EM19A-28	28	1.317	1.369
14EM19S-29	14EM19A-29	29	1.364	1.416
14EM19S-30	14EM19A-30	30	1.411	1.463
14EM19S-31	14EM19A-31	31	1.458	1.510
14EM19S-32	14EM19A-32	32	1.505	1.556
14EM19S-33	14EM19A-33	33	1.552	1.603
14EM19S-34	14EM19A-34	34	1.599	1.650
14EM19S-35	14EM19A-35	35	1.646	1.697
14EM19S-36	14EM19A-36	36	1.692	1.744
14EM19S-38	14EM19A-38	38	1.786	1.838



Other Bore sizes and other numbers of teeth are available on request.
Teeth could be anodized.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
.1475	1/4"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	ROW-L-ER®	Operates with RC14SS Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED				
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	
14EM26S-14	14EM26A-14	14*	.663	.714	
14EM26S-15	14EM26A-15	15	.709	.761	
14EM26S-16	14EM26A-16	16	.756	.808	
14EM26S-17	14EM26A-17	17	.803	.854	
14EM26S-18	14EM26A-18	18	.849	.901	
14EM26S-19	14EM26A-19	19	.896	.948	
14EM26S-20	14EM26A-20	20	.943	.994	
14EM26S-21	14EM26A-21	21	.990	1.041	
14EM26S-22	14EM26A-22	22	1.036	1.088	
14EM26S-23	14EM26A-23	23	1.083	1.135	
14EM26S-24	14EM26A-24	24	1.130	1.182	
14EM26S-25	14EM26A-25	25	1.177	1.228	
14EM26S-26	14EM26A-26	26	1.224	1.275	
14EM26S-27	14EM26A-27	27	1.271	1.322	
14EM26S-28	14EM26A-28	28	1.317	1.369	
14EM26S-29	14EM26A-29	29	1.364	1.416	
14EM26S-30	14EM26A-30	30	1.411	1.463	
14EM26S-31	14EM26A-31	31	1.458	1.510	
14EM26S-32	14EM26A-32	32	1.505	1.556	
14EM26S-33	14EM26A-33	33	1.552	1.603	
14EM26S-34	14EM26A-34	34	1.599	1.650	
14EM26S-35	14EM26A-35	35	1.646	1.679	
14EM26S-36	14EM26A-36	36	1.692	1.744	
14EM26S-38	14EM26A-38	38	1.786	1.838	
14EM26S-40	14EM26A-40	40	1.880	1.932	
14EM26S-42	14EM26A-42	42	1.974	2.025	
14EM26S-44	14EM26A-44	44	2.068	2.119	

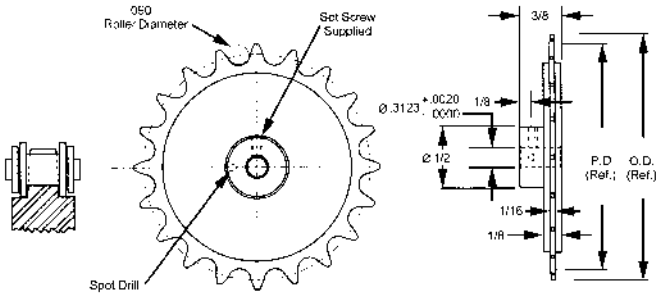


Other Bore sizes and other numbers of teeth are available on request.

*For 14 teeth and under, hub diameter equals shoulder diameter.
Teeth could be anodized.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	5/16"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	ROW-L-ER®	Operates with RC14SS Series



303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14EM31S-15	14EM31A-15	15	.709	.761
14EM31S-16	14EM31A-16	16	.756	.808
14EM31S-17	14EM31A-17	17	.803	.854
14EM31S-18	14EM31A-18	18	.849	.901
14EM31S-19	14EM31A-19	19	.896	.948
14EM31S-20	14EM31A-20	20	.943	.994
14EM31S-21	14EM31A-21	21	.990	1.041
14EM31S-22	14EM31A-22	22	1.036	1.088
14EM31S-23	14EM31A-23	23	1.083	1.135
14EM31S-24	14EM31A-24	24	1.130	1.182
14EM31S-25	14EM31A-25	25	1.177	1.228
14EM31S-26	14EM31A-26	26	1.224	1.275
14EM31S-27	14EM31A-27	27	1.271	1.322
14EM31S-28	14EM31A-28	28	1.317	1.369
14EM31S-29	14EM31A-29	29	1.364	1.416
14EM31S-30	14EM31A-30	30	1.411	1.463
14EM31S-31	14EM31A-31	31	1.458	1.510
14EM31S-32	14EM31A-32	32	1.505	1.556
14EM31S-33	14EM31A-33	33	1.552	1.603
14EM31S-34	14EM31A-34	34	1.599	1.650
14EM31S-35	14EM31A-35	35	1.646	1.679
14EM31S-36	14EM31A-36	36	1.692	1.744
14EM31S-38	14EM31A-38	38	1.786	1.838
14EM31S-40	14EM31A-40	40	1.880	1.932
14EM31S-42	14EM31A-42	42	1.974	2.025
14EM31S-44	14EM31A-44	44	2.068	2.119



Other Bore sizes and other numbers of teeth are available on request.
Teeth could be anodized.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	3/32"	PIN HUB	303 Stainless Steel	ROW-L-ER®	Operates with RC14SS Series

STOCK NO.	B BORE	H (Inch)	OVERALL LENGTH	SET SCREW	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14EM95S-7	.094	15/64	11/32	NONE	7*	.340	.391

* Hub is grooved 3/32" wide next to hub to provide clearance for chain link.
• Sprockets smaller than 10 teeth are recommended for idler use only.
Note: Undercut: 7 Teeth D = .142

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	1/8"	PIN HUB	303 Stainless Steel	ROW-L-ER®	Operates with RC14SS Series

STOCK NO.	B BORE	H (Inch)	OVERALL LENGTH	SET SCREW	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14EM95S-8	.125	9/32	11/32	#2-56	8*	.385	.437
14EM95S-9		21/64			9*	.431	.483
14EM95S-10		3/8			10*	.477	.529
14EM95S-11		3/8			11*	.524	.575
14EM95S-12		25/64		#4-40	12	.570	.621
14EM95S-13		25/64			13	.616	.668
14EM95S-14		25/64			14	.663	.714
14EM95S-14		25/64			14	.663	.714

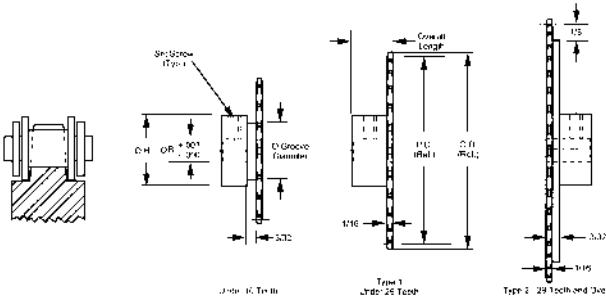
* Hub is grooved 3/32" wide next to hub to provide clearance for chain link.
• Sprockets smaller than 10 teeth are recommended for idler use only.
Note: Undercut: 8 Teeth D = .187
9 Teeth D = .233
10 Teeth D = .279
11 Teeth D = .326

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	3/16"	PIN HUB	303 Stainless Steel	ROW-L-ER®	Operates with RC14SS Series

STOCK NO.	B BORE	H (Inch)	OVERALL LENGTH	SET SCREW	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14EM95S-15	.188	17/32	11/32	#4-40	15	.709	.761
14EM95S-16		9/16			16	.756	.808
14EM95S-18		21/32			18	.849	.901
14EM95S-20		3/4	13/32	#6-32	20	.943	.994
14EM95S-20		3/4	13/32	#6-32	20	.943	.994

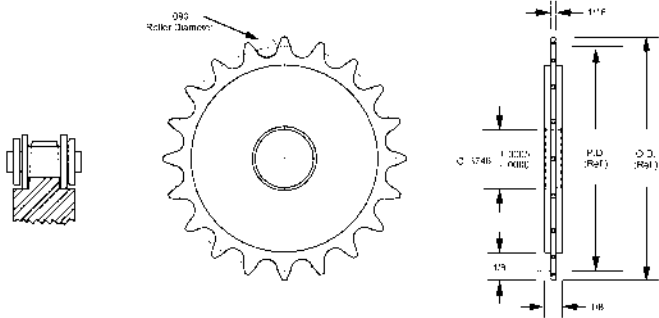
CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	1/4"	PIN HUB	303 Stainless Steel	ROW-L-ER®	Operates with RC14SS Series

STOCK NO.	B BORE	H (Inch)	OVERALL LENGTH	SET SCREW	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14EM95S-22	.250	3/4	13/32	#6-32	22	1.036	1.088
14EM95S-24					24	1.130	1.182
14EM95S-28					28	1.317	1.369
14EM95S-30					30	1.411	1.463
14EM95S-34					34	1.599	1.650
14EM95S-36					36	1.692	1.744
14EM95S-40					40	1.880	1.932
14EM95S-48					48	2.255	2.307
14EM95S-48					48	2.255	2.307
14EM95S-48					48	2.255	2.307



SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.1475	3/8"	HUBLESS	303 Stainless Steel or 2024-T4 Aluminum Anodized	ROW-L-ER®	Operates with RC14SS Series



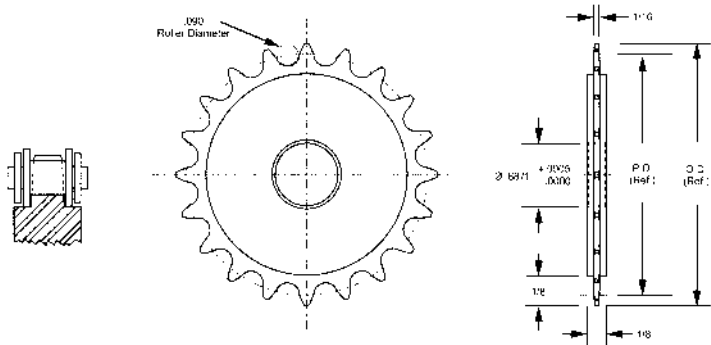
303 STAINLESS STEEL	2024-T4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14SP3S-14	14SP3A-14	14	.6629	.715
14SP3S-15	14SP3A-15	15	.7094	.761
14SP3S-16	14SP3A-16	16	.7561	.808
14SP3S-18	14SP3A-18	18	.8494	.901
14SP3S-20	14SP3A-20	20	.9429	.995
14SP3S-24	14SP3A-24	24	1.1300	1.182
14SP3S-25	14SP3A-25	25	1.1769	1.228
14SP3S-27	14SP3A-27	27	1.2705	1.322
14SP3S-28	14SP3A-28	28	1.3174	1.369
14SP3S-29	14SP3A-29	29	1.3642	1.416
14SP3S-30	14SP3A-30	30	1.4111	1.463
14SP3S-31	14SP3A-31	31	1.4580	1.510
14SP3S-32	14SP3A-32	32	1.5048	1.557
14SP3S-33	14SP3A-33	33	1.5517	1.604
14SP3S-34	14SP3A-34	34	1.5986	1.650
14SP3S-35	14SP3A-35	35	1.6455	1.697
14SP3S-36	14SP3A-36	36	1.6924	1.744
14SP3S-38	14SP3A-38	38	1.7862	1.838
14SP3S-40	14SP3A-40	40	1.8800	1.932
14SP3S-42	14SP3A-42	42	1.9738	2.026
14SP3S-44	14SP3A-44	44	2.0676	2.120
14SP3S-45	14SP3A-45	45	2.1145	2.166
14SP3S-48	14SP3A-48	48	2.2552	2.307
14SP3S-50	14SP3A-50	50	2.3491	2.401
14SP3S-52	14SP3A-52	52	2.4429	2.495
14SP3S-54	14SP3A-54	54	2.5368	2.589
14SP3S-55	14SP3A-55	55	2.5837	2.636
14SP3S-56	14SP3A-56	56	2.6306	2.683
14SP3S-60	14SP3A-60	60	2.8183	2.870
14SP3S-65	14SP3A-65	65	3.0530	3.105
14SP3S-70	14SP3A-70	70	3.2877	3.340
14SP3S-72	14SP3A-72	72	3.3815	3.434
14SP3S-75	14SP3A-75	75	3.5223	3.574
14SP3S-80	14SP3A-80	80	3.7570	3.809
14SP3S-85	14SP3A-85	85	3.9917	4.044



Available in Nylon upon request.
Other numbers of teeth available on request.
Teeth could be anodized.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S® NAME	CHAIN
.1475	11/16"	HUBLESS	303 Stainless Steel or 2024-T4 Aluminum Anodized	ROW-L-ER®	Operates with RC14SS Series



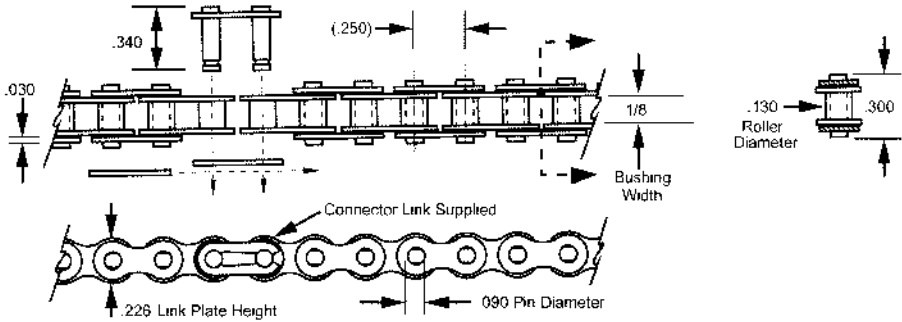
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
14SP17S-14	14SP17A-14	14	.6629	.715
14SP17S-15	14SP17A-15	15	.7094	.761
14SP17S-16	14SP17A-16	16	.7561	.808
14SP17S-18	14SP17A-18	18	.8494	.901
14SP17S-20	14SP17A-20	20	.9429	.995
14SP17S-24	14SP17A-24	24	1.1300	1.182
14SP17S-25	14SP17A-25	25	1.1769	1.228
14SP17S-27	14SP17A-27	27	1.2705	1.322
14SP17S-28	14SP17A-28	28	1.3174	1.369
14SP17S-29	14SP17A-29	29	1.3642	1.416
14SP17S-30	14SP17A-30	30	1.4111	1.463
14SP17S-31	14SP17A-31	31	1.4580	1.510
14SP17S-32	14SP17A-32	32	1.5048	1.557
14SP17S-33	14SP17A-33	33	1.5517	1.604
14SP17S-34	14SP17A-34	34	1.5986	1.650
14SP17S-35	14SP17A-35	35	1.6455	1.697
14SP17S-36	14SP17A-36	36	1.6924	1.744
14SP17S-38	14SP17A-38	38	1.7862	1.838
14SP17S-40	14SP17A-40	40	1.8800	1.932
14SP17S-42	14SP17A-42	42	1.9738	2.026
14SP17S-44	14SP17A-44	44	2.0676	2.120
14SP17S-45	14SP17A-45	45	2.1145	2.166
14SP17S-48	14SP17A-48	48	2.2552	2.307
14SP17S-50	14SP17A-50	50	2.3491	2.401
14SP17S-52	14SP17A-52	52	2.4429	2.495
14SP17S-54	14SP17A-54	54	2.5368	2.589
14SP17S-55	14SP17A-55	55	2.5837	2.636
14SP17S-56	14SP17A-56	56	2.6306	2.683
14SP17S-60	14SP17A-60	60	2.8183	2.870
14SP17S-65	14SP17A-65	65	3.0530	3.105
14SP17S-70	14SP17A-70	70	3.2877	3.340
14SP17S-72	14SP17A-72	72	3.3815	3.434
14SP17S-75	14SP17A-75	75	3.5223	3.574
14SP17S-80	14SP17A-80	80	3.7570	3.809
14SP17S-85	14SP17A-85	85	3.9917	4.044



Available in Nylon upon request.
Other numbers of teeth available on request.
Teeth could be anodized.

LINK CHAINS

CIRCULAR PITCH	ROLLER DIAMETER	BERG'S ® NAME	MATERIAL	SPROCKET
.250	.130	ROW-L-ER®	Stainless Steel or Mild Steel, Non-Magnetic, Prestretched Single Strand	Operates with 25EM and 25SP series.



STAINLESS STEEL	MILD STEEL		
STOCK NO.	STOCK NO.	NO. OF PITCHES	LENGTH (Inch)
RC25SS-40	RC25-40	40	10.000
RC25SS-50	RC25-50	50	12.500
RC25SS-60	RC25-60	60	15.000
RC25SS-70	RC25-70	70	17.500
RC25SS-80	RC25-80	80	20.000
RC25SS-90	RC25-90	90	22.500
RC25SS-100	RC25-100	100	25.000
RC25SS-120	RC25-120	120	30.000
RC25SS-130	RC25-130	130	32.500
RC25SS-140	RC25-140	140	35.000
RC25SS-150	RC25-150	150	37.500
RC25SS-160	RC25-160	160	40.000
RC25SS-170	RC25-170	170	42.500
RC25SS-180	RC25-180	180	45.000
RC25SS-190	RC25-190	190	47.500
RC25SS-200	RC25-200	200	50.000
RC25SS-210	RC25-210	210	52.500
RC25SS-220	RC25-220	220	55.000
RC25SS-230	RC25-230	230	57.500
RC25SS-240	RC25-240	240	60.000
RC25SS-250	RC25-250	250	62.500
RC25SS-260	RC25-260	260	65.000
RC25SS-270	RC25-270	270	67.500
RC25SS-280	RC25-280	280	70.000



STAINLESS STEEL STOCK NO.	MILD STEEL STOCK NO.	LENGTH
RC25SS-5FT	RC25-5FT	5 FT
RC25SS-10FT	RC25-10FT	10 FT
RC25SS-25FT	RC25-25FT	25 FT
RC25SS-50FT	RC25-50FT	50 FT
RC25SS-100FT	RC25-100FT	100 FT

American Standard No. 25

* Maximum recommended operating load is for a slip fit connecting link, which is standard. A press fit connecting link is a special available on request.

Special lengths available on request (only even numbers of links).

Operating load = 77 lbs. for Stainless Steel, 97 lbs. for Mild Steel.

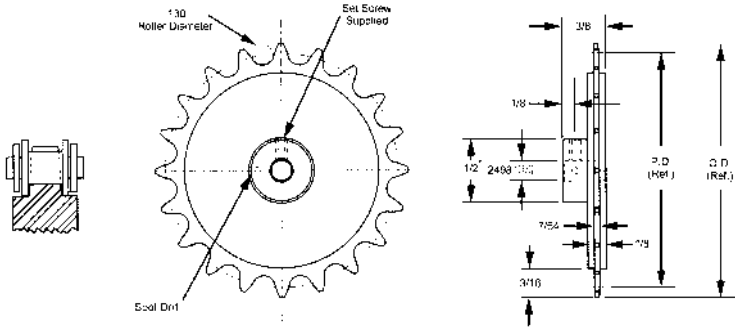
Ultimate tensile 700 lbs. for Stainless Steel, 875 lbs. for Mild Steel

.09 lbs/foot - Must be lubricated.

Use Connector Link Berg P/N RC25SS-CL for Stainless Steel chain, and P/N RC25-CL for Mild Steel.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/4"	PIN HUB	303 Stainless Steel or 2024-T4 Aluminum Anodized	ROW-L-ER®	Operates with RC25 and RC25SS series



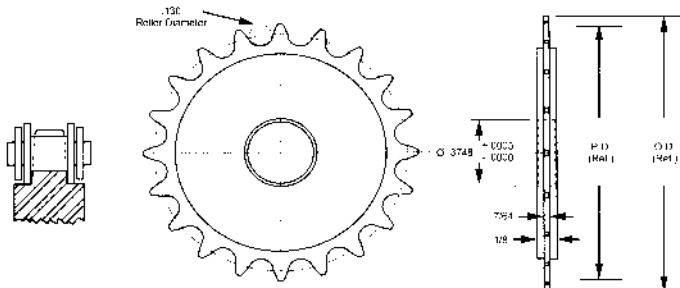
303 STAINLESS STEEL	2024T-4 ALUMINUM ANODIZED			
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25EM26S-9	25EM26A-9	9*	.7310	.836
25EM26S-10	25EM26A-10	10	.8090	.919
25EM26S-11	25EM26A-11	11	.8874	1.001
25EM26S-12	25EM26A-12	12	.9659	1.083
25EM26S-13	25EM26A-13	13	1.0446	1.164
25EM26S-14	25EM26A-14	14	1.1235	1.245
25EM26S-15	25EM26A-15	15	1.2024	1.326
25EM26S-16	25EM26A-16	16	1.2815	1.406
25EM26S-18	25EM26A-18	18	1.4397	1.567
25EM26S-20	25EM26A-20	20	1.5981	1.728
25EM26S-21	25EM26A-21	21	1.6774	1.808
25EM26S-22	25EM26A-22	22	1.7567	1.888
25EM26S-24	25EM26A-24	24	1.9153	2.048
25EM26S-25	25EM26A-25	25	1.9947	2.128
25EM26S-26	25EM26A-26	26	2.0741	2.208
25EM26S-28	25EM26A-28	28	2.2329	2.368
25EM26S-30	25EM26A-30	30	2.3917	2.528
25EM26S-32	25EM26A-32	32	2.5506	2.688
25EM26S-36	25EM26A-36	36	2.8684	3.007
25EM26S-40	25EM26A-40	40	3.1864	3.326
25EM26S-45	25EM26A-45	45	3.5839	3.725
25EM26S-48	25EM26A-48	48	3.8224	3.964
25EM26S-50	25EM26A-50	50	3.9815	4.123
25EM26S-54	25EM26A-54	54	4.2996	4.442



- For 9 teeth, hub diameter equals .46.
- Other numbers of teeth available on request.
- Teeth could be anodized.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	3/8"	HUBLESS	303 Stainless Steel	ROW-L-ER®	Operates with RC25 and RC25SS series



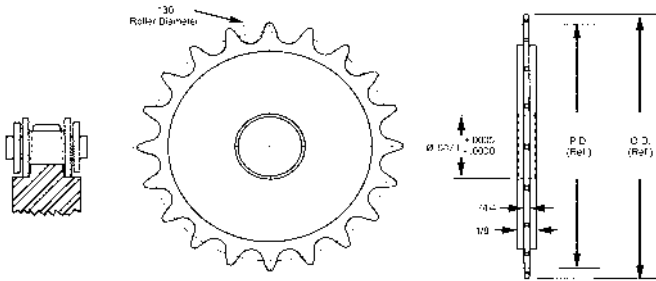
STOCK NO.	NO. OF TEETH	P.D.	O.D.
25SP3S-10	10	.8090	.919
25SP3S-11	11	.8874	1.001
25SP3S-12	12	.9659	1.083
25SP3S-13	13	1.0446	1.164
25SP3S-14	14	1.1235	1.245
25SP3S-15	15	1.2024	1.326
25SP3S-16	16	1.2815	1.406
25SP3S-17	17	1.3605	1.487
25SP3S-18	18	1.4397	1.567
25SP3S-19	19	1.5189	1.648
25SP3S-20	20	1.5981	1.728
25SP3S-21	21	1.6774	1.808
25SP3S-22	22	1.7567	1.888
25SP3S-24	24	1.9153	2.048
25SP3S-25	25	1.9947	2.128
25SP3S-26	26	2.0741	2.208
25SP3S-30	30	2.3917	2.528
25SP3S-32	32	2.5506	2.688
25SP3S-36	36	2.8684	3.007
25SP3S-40	40	3.1864	3.326
25SP3S-45	45	3.5839	3.725
25SP3S-48	48	3.8224	3.964
25SP3S-50	50	3.9815	4.123
25SP3S-54	54	4.2996	4.442
25SP3S-60	60	4.7768	4.920
25SP3S-70	70	5.5723	5.716
25SP3S-72	72	5.7314	5.875



Other Bore sizes and other numbers of teeth are available on request.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	11/16"	HUBLESS	303 Stainless Steel	ROW-L-ER®	Operates with RC25 and RC25SS series



STOCK NO.	NO. OF TEETH	P.D.	O.D.
25SP17S-15	15	1.2024	1.326
25SP17S-16	16	1.2815	1.406
25SP17S-17	17	1.3605	1.487
25SP17S-18	18	1.4397	1.567
25SP17S-19	19	1.5189	1.648
25SP17S-20	20	1.5981	1.728
25SP17S-21	21	1.6774	1.808
25SP17S-22	22	1.7567	1.888
25SP17S-24	24	1.9153	2.048
25SP17S-25	25	1.9947	2.128
25SP17S-26	26	2.0741	2.208
25SP17S-30	30	2.3917	2.528
25SP17S-32	32	2.5506	2.688
25SP17S-36	36	2.8684	3.007
25SP17S-40	40	3.1864	3.326
25SP17S-45	45	3.5839	3.725
25SP17S-48	48	3.8224	3.964
25SP17S-50	50	3.9815	4.123
25SP17S-54	54	4.2996	4.442
25SP17S-60	60	4.7768	4.920
25SP17S-70	70	5.5723	5.716
25SP17S-72	72	5.7314	5.875



Other Bore sizes and other numbers of teeth are available on request.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/4"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC25 and RC25SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25SP-A-18	.250	18	1.4397	1.567
25SP-A-20	.250	20	1.5980	1.728

Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	3/8"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC25 and RC25SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25SP-A-22	.375	22	1.7567	1.888
25SP-A-24	.375	24	1.9153	2.048
25SP-A-25	.375	25	1.9947	2.128
25SP-A-26	.375	26	2.0741	2.208
25SP-A-28	.375	28	2.2329	2.368
25SP-A-30	.375	30	2.3917	2.528
25SP-A-32	.375	32	2.5506	2.688
25SP-A-35	.375	35	2.7890	2.927
25SP-A-36	.375	36	2.8684	3.007

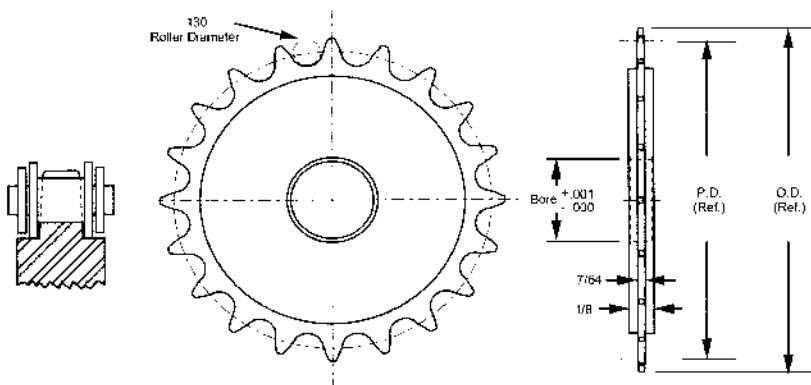
Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/2"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC25 and RC25SS series



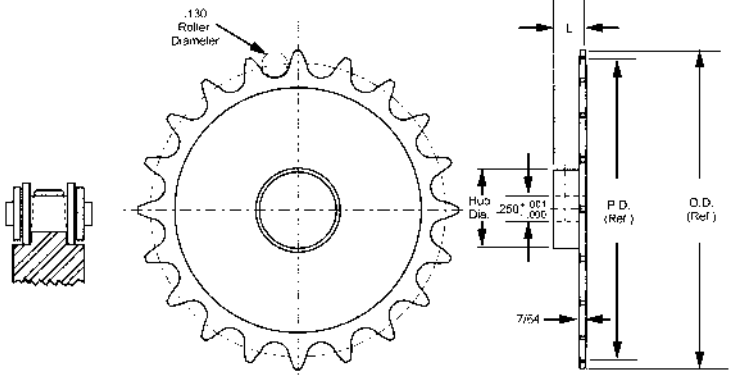
STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25SP-A-40	.500	40	3.1864	3.326
25SP-A-45	.500	45	3.5839	3.725
25SP-A-48	.500	48	3.8224	3.964
25SP-A-54	.500	54	4.2996	4.442
25SP-A-60	.500	60	4.7768	4.920
25SP-A-72	.500	72	5.7314	5.875

Other numbers of teeth, keyways, modified bores and set screws available on request.



SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/4"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC25 and RC25SS series



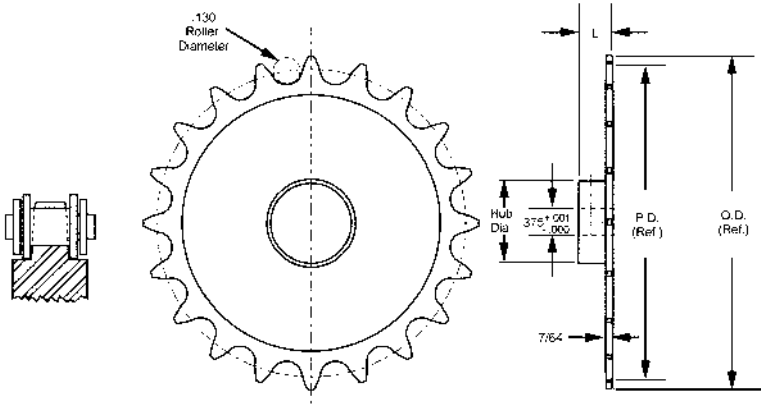
STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25EM-B-9	.250	.43	.50	9	.7310	.836
25EM-B-10	.250	.50	.50	10	.8090	.919
25EM-B-11	.250	.57	.50	11	.8874	1.001
25EM-B-12	.250	.62	.50	12	.9659	1.083
25EM-B-13	.250	.72	.50	13	1.0446	1.164
25EM-B-14	.250	.81	.50	14	1.1235	1.245
25EM-B-15	.250	.89	.50	15	1.2024	1.326
25EM-B-16	.250	.96	.50	16	1.2815	1.406
25EM-B-18	.250	1.12	.50	18	1.4397	1.567
25EM-B-20	.250	1.28	.62	20	1.5980	1.728
25EM-B-21	.250	1.37	.62	21	1.6774	1.808
25EM-B-22	.250	1.43	.62	22	1.7567	1.888



Other numbers of teeth, keyways, modified bores and set screws available on request.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	3/8"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC25 and RC25SS series



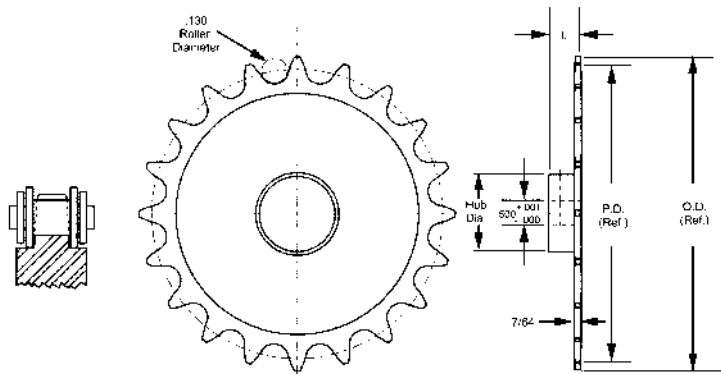
STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25EM-B-24	.375	1.50	.62	24	1.9153	2.048
25EM-B-25	.375	1.50	.62	25	1.9947	2.128
25EM-B-26	.375	1.50	.62	26	2.0741	2.208
25EM-B-28	.375	1.50	.62	28	2.2329	2.368
25EM-B-30	.375	1.50	.62	30	2.3917	2.528
25EM-B-32	.375	1.50	.62	32	2.5506	2.688
25EM-B-36	.375	1.50	.75	36	2.8684	3.007



Other numbers of teeth, keyways, modified bores and set screws available on request.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/2"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC25 and RC25SS series



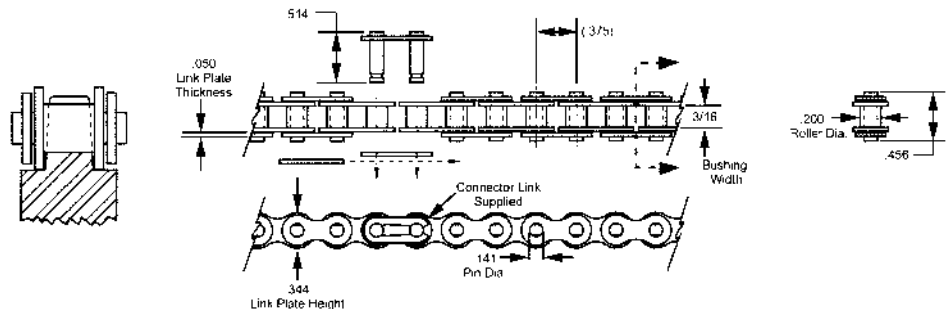
STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
25EM-B-40	.500	2.00	.75	40	3.1864	3.326
25EM-B-45	.500	2.00	.75	45	3.5839	3.725
25EM-B-48	.500	2.00	.75	48	3.8224	3.964
25EM-B-54	.500	2.00	.75	54	4.2996	4.442
25EM-B-60	.500	2.00	.75	60	4.7768	4.920
25EM-B-70	.500	2.00	.75	70	5.5723	5.716
25EM-B-72	.500	2.00	.75	72	5.7314	5.875



Other numbers of teeth, keyways, modified bores and set screws available on request.

LINK CHAINS

CIRCULAR PITCH	ROLLER DIAMETER	BERG'S ® NAME	MATERIAL	SPROCKET
.375	.200	ROW-L-ER®	Stainless or Mild Steel, Non-Magnetic, Prestretched Single Strand	Operates with 35EM and 35SP series.



STAINLESS STEEL	MILD STEEL		
STOCK NO.	STOCK NO.	NO. OF PITCHES	LENGTH (Inch)
RC35SS-40	RC35-40	40	15.00
RC35SS-50	RC35-50	50	18.75
RC35SS-60	RC35-60	60	22.50
RC35SS-70	RC35-70	70	26.25
RC35SS-80	RC35-80	80	30.00
RC35SS-90	RC35-90	90	33.75
RC35SS-100	RC35-100	100	37.50
RC35SS-120	RC35-120	120	45.00
RC35SS-130	RC35-130	130	48.75
RC35SS-140	RC35-140	140	52.50
RC35SS-150	RC35-150	150	56.25
RC35SS-160	RC35-160	160	60.00
RC35SS-170	RC35-170	170	63.75
RC35SS-180	RC35-180	180	67.50
RC35SS-190	RC35-190	190	71.25
RC35SS-200	RC35-200	200	75.00
RC35SS-210	RC35-210	210	78.75
RC35SS-220	RC35-220	220	82.50
RC35SS-230	RC35-230	230	86.25



STAINLESS STEEL STOCK NO.	MILD STEEL STOCK NO.	LENGTH
RC35SS-5FT	RC35-5FT	5 FT
RC35SS-10FT	RC35-10FT	10 FT
RC35SS-25FT	RC35-25FT	25 FT
RC35SS-50FT	RC35-50FT	50 FT
RC35SS-100FT	RC35-100FT	100 FT

American Standard No. 35

* Maximum recommended operating load is for a slip fit connecting link, which is standard. A press fit connecting link is a special available on request.

Special lengths available on request (only even numbers of links). For odd numbers of pitches contact our sales department.

Operating load = 155 lbs. for Stainless Steel, 233 lbs. for Mild Steel. Ultimate tensile 1400 lbs. for Stainless Steel, 2100 lbs. for Mild Steel

For odd numbers of pitches contact our sales department.

Special quotation option is available.

.22 lbs/foot - Must be lubricated.

Use Connector Link Berg P/N RC35SS-CL for Stainless Steel chain, and P/N RC35-CL for Mild Steel.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	1/2"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC35 and RC35SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35SP-A-15	.500	15	1.804	1.989
35SP-A-16	.500	16	1.922	2.110
35SP-A-17	.500	17	2.041	2.231
35SP-A-18	.500	18	2.160	2.351
35SP-A-20	.500	20	2.397	2.592
35SP-A-21	.500	21	2.516	2.712
35SP-A-22	.500	22	2.635	2.833
35SP-A-24	.500	24	2.873	3.073
35SP-A-25	.500	25	2.992	3.193
35SP-A-26A	.500	26	3.111	3.313
35SP-A-28A	.500	28	3.349	3.553
35SP-A-30A	.500	30	3.588	3.792

Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	5/8"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC35 and RC35SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35SP-A-32A	.625	32	3.826	4.032
35SP-A-35A	.625	35	4.183	4.391
35SP-A-36A	.625	36	4.303	4.511

Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	19/32"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC35 and RC35SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35SP-A-40A	.593	40	4.780	4.989
35SP-A-45A	.593	45	5.376	5.587
35SP-A-48A	.593	48	5.734	5.946

Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	23/32"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC35 and RC35SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35SP-A-60A	.718	60	7.165	7.380
35SP-A-70A	.718	70	8.358	8.575
35SP-A-72A	.718	72	8.597	8.813

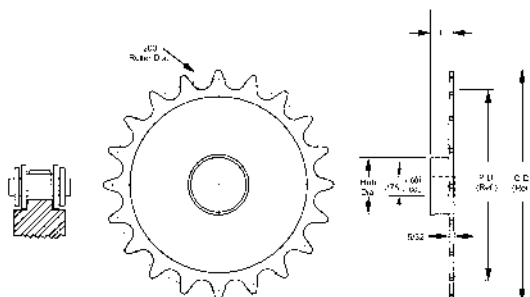
Other numbers of teeth, keyways, modified bores and set screws available on request.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	3/8"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC35 and RC35SS series



Other numbers of teeth, keyways, modified bores and set screws available on request.

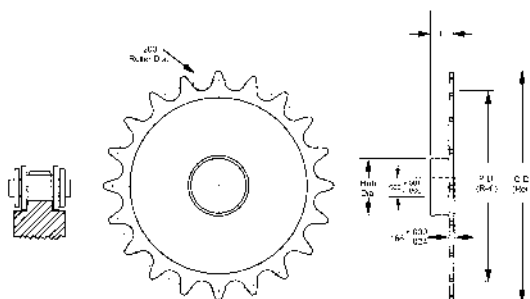


STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35EM-B-8	.375	.75	.75	8	.980	1.130
35EM-B-9	.375	.84	.75	9	1.096	1.255
35EM-B-10	.375	.97	.75	10	1.214	1.379
35EM-B-11	.375	1.06	.75	11	1.331	1.502

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	1/2"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC35 and RC35SS series



Other numbers of teeth, keyways, modified bores and set screws available on request.



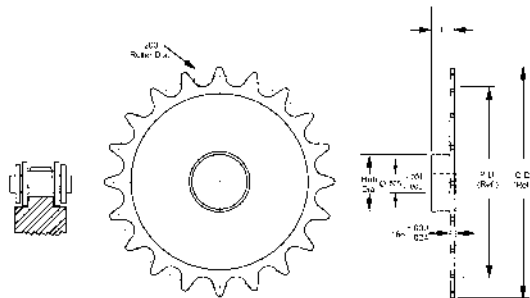
STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35EM-B-12	.500	1.21	.75	12	1.449	1.624
35EM-B-13	.500	1.25	.75	13	1.567	1.746
35EM-B-14	.500	1.25	.75	14	1.685	1.867
35EM-B-15	.500	1.34	.75	15	1.804	1.989
35EM-B-16	.500	1.47	.75	16	1.922	2.110
35EM-B-17	.500	1.59	.75	17	2.041	2.231
35EM-B-18	.500	1.72	.75	18	2.160	2.351
35EM-B-20	.500	1.93	.75	20	2.397	2.592
35EM-B-21	.500	2.00	.87	21	2.516	2.712
35EM-B-22	.500	2.00	.87	22	2.635	2.833
35EM-B-24	.500	2.00	.87	24	2.873	3.073
35EM-B-25	.500	2.00	.87	25	2.992	3.193
35EM-B-26	.500	2.00	.87	26	3.111	3.313
35EM-B-28	.500	2.00	.87	28	3.349	3.553
35EM-B-30	.500	2.00	.87	30	3.588	3.792
35EM-B-32	.500	2.25	.87	32	3.826	4.032

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	5/8"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC35 and RC35SS series



Other numbers of teeth, keyways, modified bores and set screws available on request.

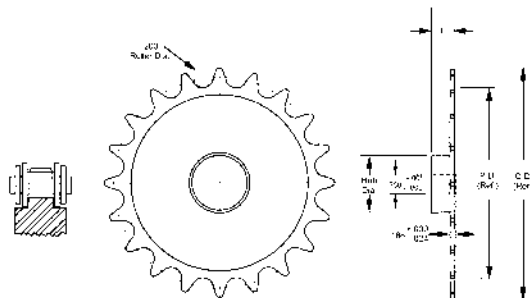


STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35EM-B-35	.625	2.25	.87	35	4.183	4.391
35EM-B-36A	.625	2.25	.87	36	4.303	4.511
35EM-B-40A	.625	2.25	1.00	40	4.780	4.989
35EM-B-45	.625	2.25	1.00	45	5.376	5.587
35EM-B-48	.625	2.25	1.00	48	5.734	5.946

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	3/4"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC35 and RC35SS series



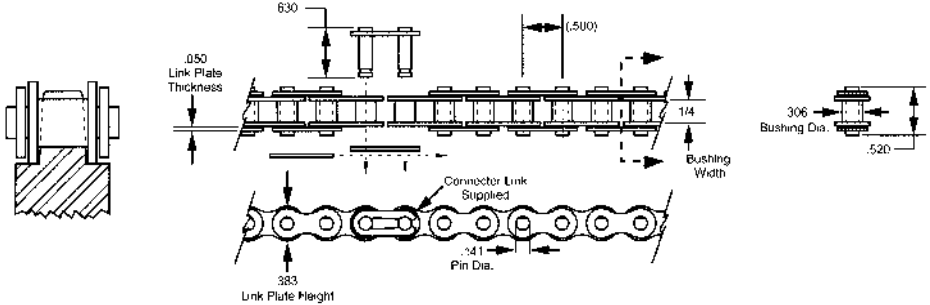
Other numbers of teeth, keyways, modified bores and set screws available on request.



STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
35EM-B-60A	.750	2.25	1.00	60	7.165	7.380
35EM-B-72A	.750	2.25	1.00	72	8.597	8.813

LINK CHAINS

CIRCULAR PITCH	ROLLER DIAMETER	BERG'S ® NAME	MATERIAL	SPROCKET
.500	.306	ROW-L-ER®	Stainless or Mild Steel, Non-Magnetic, Prestretched Single Strand	Operates with 41EM and 41SP series.



STAINLESS STEEL	MILD STEEL		
STOCK NO.	STOCK NO.	NO. OF PITCHES	LENGTH (Inch)
RC41SS-40	RC41-40	40	20.00
RC41SS-50	RC41-50	50	25.00
RC41SS-60	RC41-60	60	30.00
RC41SS-70	RC41-70	70	35.00
RC41SS-80	RC41-80	80	40.00
RC41SS-90	RC41-90	90	45.00
RC41SS-100	RC41-100	100	50.00
RC41SS-120	RC41-120	120	60.00
RC41SS-130	RC41-130	130	65.00
RC41SS-140	RC41-140	140	70.00
RC41SS-150	RC41-150	150	75.00
RC41SS-160	RC41-160	160	80.00
RC41SS-170	RC41-170	170	85.00
RC41SS-180	RC41-180	180	90.00
RC41SS-190	RC41-190	190	95.00
RC41SS-200	RC41-200	200	100.00



American Standard No. 41

* Maximum recommended operating load is for a slip fit connecting link, which is standard. A press fit connecting link is a special available on request.

Operating load = 188 lbs. for Stainless Steel, 266 lbs. for Mild Steel.
Ultimate tensile 1700 lbs. for Stainless Steel, 2400 lbs. for Mild Steel

Special lengths available on request (only even numbers of links). For odd numbers of pitches contact our sales department.

.32 lbs/foot - Must be lubricated.

Use Connector Link Berg P/N RC41SS-CL for Stainless Steel chain, and P/N RC41-CL for Mild Steel.

STAINLESS STEEL STOCK NO.	MILD STEEL STOCK NO.	LENGTH
RC41SS-5FT	RC41-5FT	5 FT
RC41SS-10FT	RC41-10FT	10 FT
RC41SS-25FT	RC41-25FT	25 FT
RC41SS-50FT	RC41-50FT	50 FT
RC41SS-100FT	RC41-100FT	100 FT

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	5/8"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC41 and RC41SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
41SP-A-15A	.625	15	2.4049	2.652
41SP-A-16A	.625	16	2.5629	2.813
41SP-A-18A	.625	18	2.8794	3.135
41SP-A-20A	.625	20	3.1962	3.456
41SP-A-22A	.625	22	3.5133	3.777
41SP-A-24A	.625	24	3.8306	4.097
41SP-A-25A	.625	25	3.9894	4.257
41SP-A-30A	.625	30	4.7834	5.057

Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	19/32"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC41 and RC41SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
41SP-A-32A	.593	32	5.1011	5.376
41SP-A-35A	.593	35	5.5779	5.855
41SP-A-36A	.593	36	5.7369	6.015

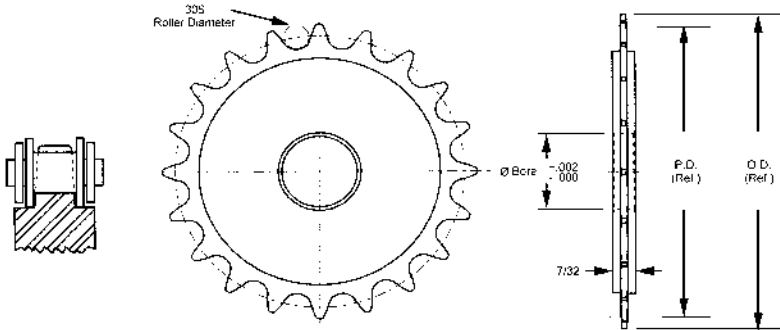
Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	23/32"	HUBLESS	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC41 and RC41SS series



STOCK NO.	BORE	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
41SP-A-40A	.718	40	6.3727	6.653
41SP-A-45A	.718	45	7.1678	7.450
41SP-A-48A	.718	48	7.6449	7.928
41SP-A-54A	.718	54	8.5992	8.884
41SP-A-60A	.718	60	9.5537	9.840
41SP-A-72A	.718	72	11.4628	11.751

Other numbers of teeth, keyways, modified bores and set screws available on request.



SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	1/2"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC41 and RC41SS series

STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
41EM-B-8	.500	.98	.87	8	1.3066	1.507
41EM-B-9	.500	1.12	.87	9	1.4619	1.673
41EM-B-10	.500	1.25	.87	10	1.6180	1.838
41EM-B-11	.500	1.43	.87	11	1.7747	2.002
41EM-B-12	.500	1.56	.87	12	1.9319	2.166
41EM-B-13	.500	1.56	.87	13	2.0893	2.328
41EM-B-14	.500	1.75	.87	14	2.2470	2.490
41EM-B-15	.500	1.91	.87	15	2.4049	2.652

Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	5/8"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC41 and RC41SS series

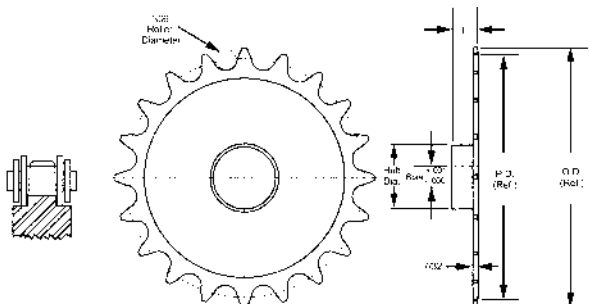
STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
41EM-B-16	.625	2.06	.87	16	2.5629	2.813
41EM-B-17	.625	2.23	1.00	17	2.7211	2.974
41EM-B-18	.625	2.37	1.00	18	2.8794	3.135
41EM-B-20	.625	2.75	1.00	20	3.1962	3.456
41EM-B-22	.625	3.00	1.00	22	3.5133	3.777
41EM-B-24	.625	3.25	1.00	24	3.8306	4.097
41EM-B-25	.625	3.25	1.00	25	3.9894	4.257
41EM-B-28	.625	3.25	1.00	28	4.4657	4.737
41EM-B-30	.625	3.25	1.00	30	4.7834	5.057
41EM-B-32	.625	3.25	1.00	32	5.1011	5.376
41EM-B-35A	.625	3.25	1.00	35	5.5779	5.855
41EM-B-36	.625	3.25	1.00	36	5.7369	6.015

Other numbers of teeth, keyways, modified bores and set screws available on request.

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	3/4"	PIN HUB	Mild Steel Parts are rust-protected	ROW-L-ER®	Operates with RC41 and RC41SS series

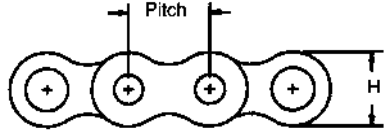
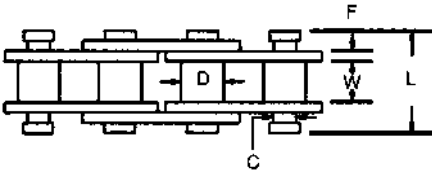
STOCK NO.	BORE	HUB DIA.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
41EM-B-40	.750	3.25	1.06	40	6.3727	6.653
41EM-B-45	.750	3.50	1.06	45	7.1678	7.450
41EM-B-48	.750	3.50	1.06	48	7.6449	7.928
41EM-B-54	.750	3.50	1.06	54	8.5992	8.884
41EM-B-60A	.750	3.50	1.06	60	9.5537	9.840
41EM-B-72	.750	4.00	1.18	72	11.4628	11.751

Other numbers of teeth, keyways, modified bores and set screws available on request.



LINK CHAINS

CIRCULAR PITCH	ROLLER DIAMETER	BERG'S ® NAME	MATERIAL	SPROCKET
.250	.130	ROW-L-ER®	Delrin and Nylatron	Operates with 25EM and 25SP series.



DELTRIN® STOCK NO.	NYLATRON® STOCK NO.	NO. OF PITCHES	LENGTH (Inch)	PITCH	W	C	F	L	H
RC25D-40	RC25N-40	40	10.00	1/4	1/8	.105	.040	.359	.25
RC25D-50	RC25N-50	50	12.50						
RC25D-60	RC25N-60	60	15.00						
RC25D-70	RC25N-70	70	17.50						
RC25D-80	RC25N-80	80	20.00						
RC25D-90	RC25N-90	90	22.50						
RC25D-100	RC25N-100	100	25.00						
RC25D-120	RC25N-120	120	30.00						
RC25D-130	RC25N-130	130	32.50						
RC25D-140	RC25N-140	140	35.00						
RC25D-150	RC25N-150	150	37.50						
RC25D-160	RC25N-160	160	40.00						
RC25D-170	RC25N-170	170	42.50						
RC25D-180	RC25N-180	180	45.00						
RC25D-190	RC25N-190	190	47.50						
RC25D-200	RC25N-200	200	50.00						
RC25D-210	RC25N-210	210	52.50						
RC25D-220	RC25N-220	220	55.00						
RC25D-230	RC25N-230	230	57.50						
RC25D-240	RC25N-240	240	60.00						
RC25D-250	RC25N-250	250	62.50						
RC25D-260	RC25N-260	260	65.00						
RC25D-270	RC25N-270	270	67.50						
RC25D-280	RC25N-280	280	70.00						

Chain Material Data:

Chain Tensile Strength @ Break (lbs.)
 Max. Operating Load (lbs.)
 Tensile (PSI)
 Compressive (PSI)
 Flexural (PSI)
 Water Absorption %
 Chain Elongation % (ultimate)
 @ 75% Ultimate

Delrin = 63
 Delrin = 21
 Delrin = 9,700
 Delrin = 15,600
 Delrin = 13,600
 Delrin = 0.25
 Delrin = 9
 Delrin = 5

Nylatron GS = 65
 Nylatron GS = 22
 Nylatron GS = 13,700
 Nylatron GS = 12,500
 Nylatron GS = 17,000
 Nylatron GS = 0.8
 Nylatron GS = 34
 Nylatron GS = 14

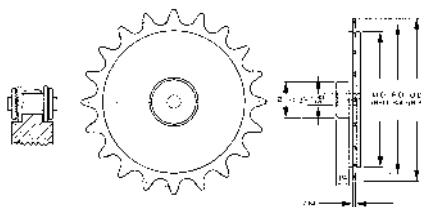
Other materials available upon request. Other lengths available upon request.

For material data on Polypropylene (RC25PP) and/or Kynar (RC25K) contact our technical support department.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/4"	PIN HUB	Delrin®	ROW-L-ER®	Operates with RC25D and RC25N series

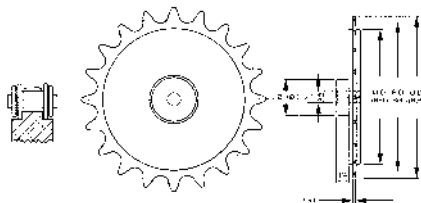
STOCK NO.	NO. OF TEETH	OUTSIDE DIA. (Inch)	PITCH DIA. (Inch)	MINOR DIA. (Inch)	HUB DIA. (Inch)
25EM4E-10	10	.9191	.809	.679	17/32
25EM4E-12	12	1.083	.996	.836	39/64
25EM4E-15	15	1.326	1.203	1.073	39/64
25EM4E-16	16	1.407	1.282	1.152	39/64
25EM4E-17	17	1.487	1.361	1.231	39/64
25EM4E-18	18	1.568	1.440	1.310	39/64
25EM4E-19	19	1.648	1.519	1.389	39/64
25EM4E-20	20	1.729	1.598	1.468	39/64
25EM4E-21	21	1.809	1.677	1.547	43/64



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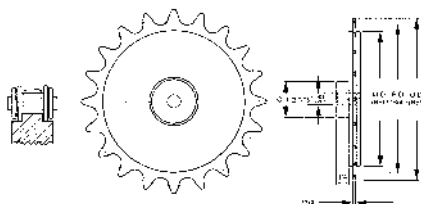
CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	5/16"	PIN HUB	Delrin®	ROW-L-ER®	Operates with RC25D and RC25N series

STOCK NO.	NO. OF TEETH	OUTSIDE DIA. (Inch)	PITCH DIA. (Inch)	MINOR DIA. (Inch)	HUB DIA. (Inch)
25EM5E-24	24	2.049	1.915	1.785	39/64
25EM5E-25	25	2.129	1.995	1.865	43/64
25EM5E-30	30	2.529	2.392	2.262	43/64



CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	3/8"	PIN HUB	Delrin®	ROW-L-ER®	Operates with RC25D and RC25N series

STOCK NO.	NO. OF TEETH	OUTSIDE DIA. (Inch)	PITCH DIA. (Inch)	MINOR DIA. (Inch)	HUB DIA. (Inch)
25EM6E-32	32	2.688	2.551	2.421	43/64
25EM6E-36	36	3.008	2.869	2.739	43/64
25EM6E-40	40	3.327	3.187	3.057	43/64



SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/4"	PIN HUB	NYLATRON®	ROW-L-ER®	Operates with RC25D and RC25N series

NYLATRON® STOCK NO.	NO. OF TEETH	OUTSIDE DIA. (Inch)	PITCH DIA. (Inch)	MINOR DIA. (Inch)	BORE 002/ -.000 (Inch)	HUB DIA. (Inch)	HUB PROJECTION (Inch)
25EM4GS-10	10	.919	.81	.679	.250	9/16	3/8
25EM4GS-11	11	1.002	.89	.757	.250	9/16	3/8

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	5/16"	PIN HUB	NYLATRON®	ROW-L-ER®	Operates with RC25D and RC25N series

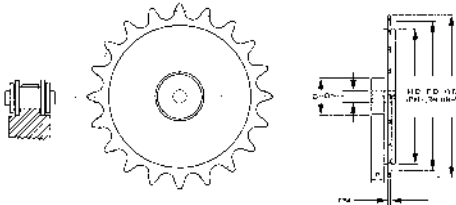
NYLATRON® STOCK NO.	NO. OF TEETH	OUTSIDE DIA. (Inch)	PITCH DIA. (Inch)	MINOR DIA. (Inch)	BORE 002/ -.000 (Inch)	HUB DIA. (Inch)	HUB PROJECTION (Inch)
25EM5GS-12	12	1.083	.97	.836	.313	11/16	3/8
25EM5GS-13	13	1.167	1.05	.915	.313	3/4	3/8
25EM5GS-14	14	1.246	1.13	.993	.313	3/4	3/8
25EM5GS-15	15	1.326	1.20	1.073	.313	3/4	3/8
25EM5GS-16	16	1.407	1.28	1.152	.313	13/16	3/8
25EM5GS-17	17	1.487	1.36	1.231	.313	29/32	3/8

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	3/8"	PIN HUB	NYLATRON®	ROW-L-ER®	Operates with RC25D and RC25N series

NYLATRON® STOCK NO.	NO. OF TEETH	OUTSIDE DIA. (Inch)	PITCH DIA. (Inch)	MINOR DIA. (Inch)	BORE 002/ -.000 (Inch)	HUB DIA. (Inch)	HUB PROJECTION (Inch)
25EM6GS-18	18	1.568	1.44	1.310	.375	1	3/8
25EM6GS-19	19	1.648	1.52	1.389	.375	1-1/16	3/8
25EM6GS-20	20	1.729	1.60	1.468	.375	1-5/32	3/8
25EM6GS-21	21	1.809	1.68	1.547	.375	1-5/32	3/8
25EM6GS-22	22	1.889	1.76	1.627	.375	1-5/32	3/8
25EM6GS-24	24	2.049	1.91	1.785	.375	1-7/32	3/8
25EM6GS-26	26	2.209	2.07	1.944	.375	1-7/32	3/8
25EM6GS-27	27	2.369	2.23	2.103	.375	1-7/32	3/8
25EM6GS-30	30	2.529	2.39	2.262	.375	1-9/32	3/8

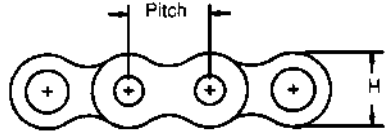
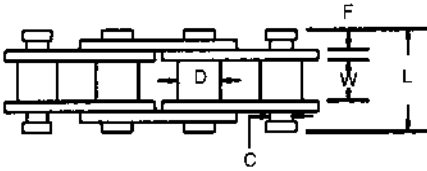
CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.250	1/2"	PIN HUB	NYLATRON®	ROW-L-ER®	Operates with RC25D and RC25N series

NYLATRON® STOCK NO.	NO. OF TEETH	OUTSIDE DIA. (Inch)	PITCH DIA. (Inch)	MINOR DIA. (Inch)	BORE 002/ -.000 (Inch)	HUB DIA. (Inch)	HUB PROJECTION (Inch)
25EM8GS-36	36	3.008	2.87	2.739	.500	1-3/8	1/2
25EM8GS-40	40	3.327	3.19	3.057	.500	1-3/8	1/2
25EM8GS-48	48	3.964	3.82	3.693	.500	1-3/8	1/2
25EM8GS-54	54	4.442	4.30	4.200	.500	1-3/8	1/2
25EM8GS-60	60	4.921	4.78	4.647	.500	1-3/8	1/2



LINK CHAINS

CIRCULAR PITCH	ROLLER DIAMETER	BERG'S ® NAME	MATERIAL	SPROCKET
.375	.200	ROW-L-ER®	Delrin and Nylatron	Operates with 35EM and 35SP series.



DELTRIN® STOCK NO.	NYLATRON® STOCK NO.	NO. OF PITCHES	LENGTH (Inch)	PITCH	W	C	F	L	H
RC35D-40	RC35N-40	40	15.00	3/8	3/16	.141	.075	.545	.35
RC35D-50	RC35N-50	50	18.75						
RC35D-60	RC35N-60	60	22.50						
RC35D-70	RC35N-70	70	26.25						
RC35D-80	RC35N-80	80	30.00						
RC35D-90	RC35N-90	90	33.75						
RC35D-100	RC35N-100	100	37.50						
RC35D-120	RC35N-120	120	45.00						
RC35D-130	RC35N-130	130	48.75						
RC35D-140	RC35N-140	140	52.50						
RC35D-150	RC35N-150	150	56.25						
RC35D-160	RC35N-160	160	60.00						
RC35D-170	RC35N-170	170	63.75						
RC35D-180	RC35N-180	180	67.50						
RC35D-190	RC35N-190	190	71.25						
RC35D-200	RC35N-200	200	75.00						
RC35D-210	RC35N-210	210	78.75						
RC35D-220	RC35N-220	220	82.50						
RC35D-230	RC35N-230	230	86.25						

Chain Material Data:

Chain Tensile Strength @ Break (lbs.)

Max. Operating Load (lbs.)

Tensile (PSI)

Compressive (PSI)

Flexural (PSI)

Water Absorption %

Chain Elongation % (ultimate)

@ 75% Ultimate

Delrin = 136

Delrin = 45

Delrin = 9,700

Delrin = 15,600

Delrin = 13,600

Delrin = 0.25

Delrin = 6

Delrin = 5

Nylatron GS = 136

Nylatron GS = 45

Nylatron GS = 13,700

Nylatron GS = 12,500

Nylatron GS = 17,000

Nylatron GS = 0.8

Nylatron GS = 11

Nylatron GS = 9

Other materials available upon request. Other lengths available upon request.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	3/8"	PIN HUB	Glass filled Nylatron® GS-51	ROW-L-ER®	Operates with RC35D and RC35N series

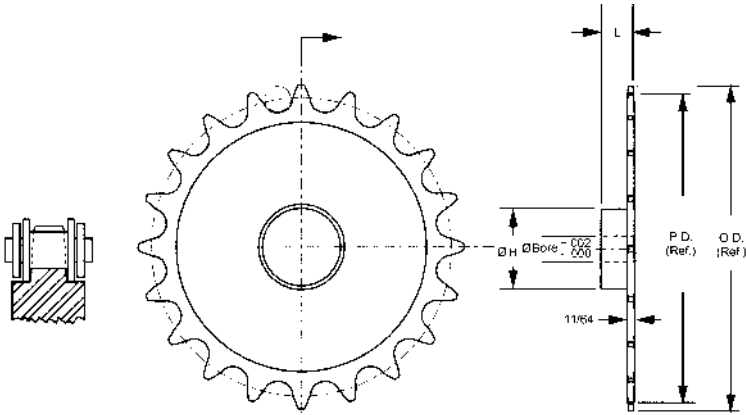
STOCK NO.	NO. OF TEETH	OUTSIDE DIA.	PITCH DIA.	HUB DIA. (Inch)	MINOR DIA. (Inch)	L (Inch)	MAX. BORE (Inch)	STOCK BORES (Inch)
35EM6GS-9	9	1.256	1.096	5/8	.896	3/4	.375	3/8
35EM6GS-10	10	1.380	1.214	13/16	1.014	3/4	.438	3/8
35EM6GS-11	11	1.502	1.331	7/8	1.131	3/4	.500	3/8

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	1/2"	PIN HUB	Glass filled Nylatron® GS-51	ROW-L-ER®	Operates with RC35D and RC35N series

STOCK NO.	NO. OF TEETH	OUTSIDE DIA.	PITCH DIA.	HUB DIA. (Inch)	MINOR DIA. (Inch)	L (Inch)	MAX. BORE (Inch)	STOCK BORES (Inch)
35EM8GS-12	12	1.625	1.449	1	1.249	3/4	.563	.500
35EM8GS-14	14	1.868	1.685	1-1/16	1.485	3/4	.750	.500
35EM8GS-15	15	1.990	1.804	1-3/8	1.604	3/4	.813	.500
35EM8GS-16	16	2.111	1.922	1-1/2	1.722	3/4	.938	.500
35EM8GS-18	18	2.352	2.159	1-1/4	1.959	3/4	1.063	.500
35EM8GS-20	20	2.593	2.397	1-1/2	2.197	7/8	1.188	.500
35EM8GS-24	24	3.074	2.873	2	2.673	7/8	1.188	.500
35EM8GS-26	26	3.314	3.111	2-1/16	2.911	7/8	1.438	.500
35EM8GS-30	30	3.793	3.588	2-1/4	3.388	7/8	1.438	.500
35EM8GS-35	35	4.392	4.138	2-1/4	3.983	7/8	1.438	.500

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.375	5/8"	PIN HUB	Glass filled Nylatron® GS-51	ROW-L-ER®	Operates with RC35D and RC35N series

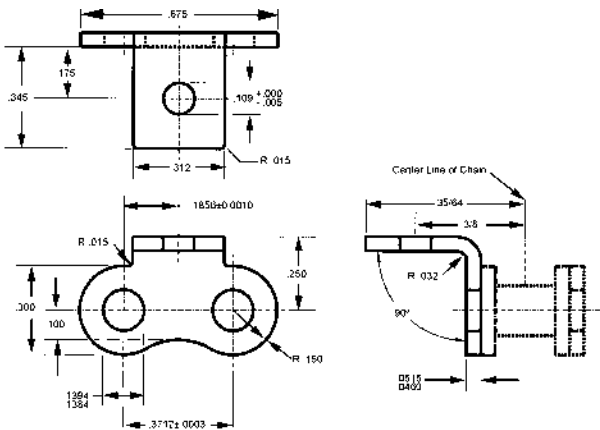
STOCK NO.	NO. OF TEETH	OUTSIDE DIA.	PITCH DIA.	HUB DIA. (Inch)	MINOR DIA. (Inch)	L (Inch)	MAX. BORE (Inch)	STOCK BORES (Inch)
35EM10GS-36	36	4.511	4.300	2-1/4	4.103	7/8	1.438	.625
35EM10GS-40	40	4.990	4.780	2-1/2	4.580	7/8	1.750	.625
35EM10GS-45	45	5.588	5.376	2-3/4	5.176	1	1.750	.625



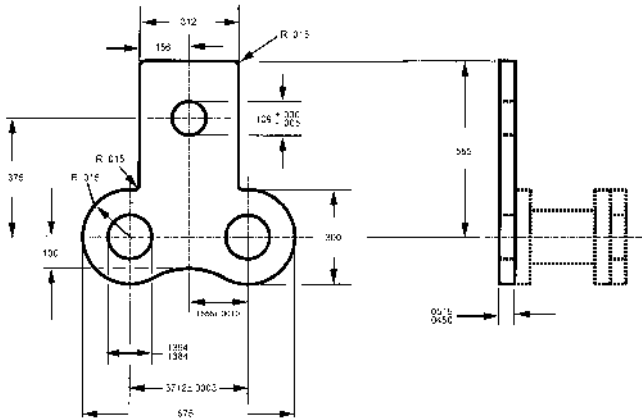
Other bore sizes available upon request.

LINK PLATE LUGS

STOCK NUMBER	DESCRIPTION
35NBBL	BENT LUG - NYLATRON®

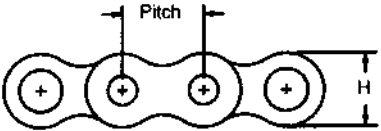
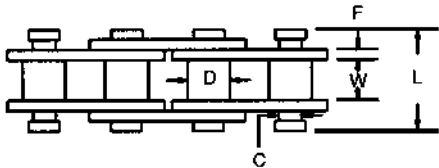


STOCK NUMBER	DESCRIPTION
35NBSL	STRAIGHT LUG - NYLATRON®



LINK CHAINS

CIRCULAR PITCH	ROLLER DIAMETER	BERG'S ® NAME	MATERIALS	SPROCKET
.500	.313	ROW-L-ER®	Delrin and Nylatron	Operates with 40EM series.



DELRI® STOCK NO.	NYLATRON® STOCK NO.	NO. OF PITCHES	LENGTH (Inch)	PITCH	W	C	F	L	H
RC40D-40	RC40N-40	40	20.00	1/2	5/16	.156	.088	.725	.46
RC40D-50	RC40N-50	50	25.00						
RC40D-60	RC40N-60	60	30.00						
RC40D-70	RC40N-70	70	35.00						
RC40D-80	RC40N-80	80	40.00						
RC40D-90	RC40N-90	90	45.00						
RC40D-100	RC40N-100	100	50.00						
RC40D-120	RC40N-120	120	60.00						
RC40D-130	RC40N-130	130	65.00						
RC40D-140	RC40N-140	140	70.00						
RC40D-150	RC40N-150	150	75.00						
RC40D-160	RC40N-160	160	80.00						
RC40D-170	RC40N-170	170	85.00						
RC40D-180	RC40N-180	180	90.00						
RC40D-190	RC40N-190	190	95.00						
RC40D-200	RC40N-200	200	100.00						

Chain Material Data:

Chain Tensile Strength @ Break (lbs.)
Max. Operating Load (lbs.)
Tensile (PSI)
Compressive (PSI)
Flexural (PSI)
Water Absorption %
Chain Elongation % (ultimate)
@ 75% Ultimate

Delrin = 175
Delrin = 58
Delrin = 9,700
Delrin = 15,600
Delrin = 13,600
Delrin = 0.250.8
Delrin = 4
Delrin = 3

Nylatron GS = 173
Nylatron GS = 57
Nylatron GS = 13,700
Nylatron GS = 12,500
Nylatron GS = 17,000
Nylatron GS = 0.8
Nylatron GS = 9
Nylatron GS = 7

Other materials available upon request. Other lengths available upon request.

SPROCKETS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	1/2"	PIN HUB	Glass filled Nylatron® GS-51	ROW-L-ER®	Operates with RC40D and RC40N series

STOCK NO.	NO. OF TEETH	OUTSIDE DIA.	PITCH DIA.	HUB DIA. (Inch)	MINOR DIA. (Inch)	L (Inch)	MAX. BORE (Inch)	STOCK BORES (Inch)
40EM8GS-9	9	1.674	1.462	7/8	1.150	7/8	.500	.500
40EM8GS-10	10	1.839	1.618	1-1/8	1.306	7/8	.281	.500
40EM8GS-12	12	2.166	1.932	1-3/8	1.620	7/8	.844	.500
40EM8GS-15	15	2.652	2.405	1-7/8	2.093	7/8	1.188	.500

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	5/8"	PIN HUB	Glass filled Nylatron® GS-51	ROW-L-ER®	Operates with RC40D and RC40N series

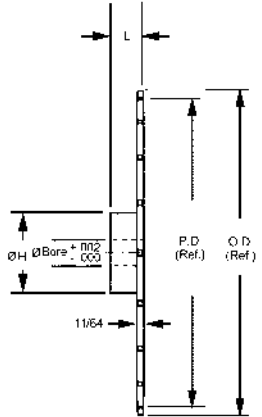
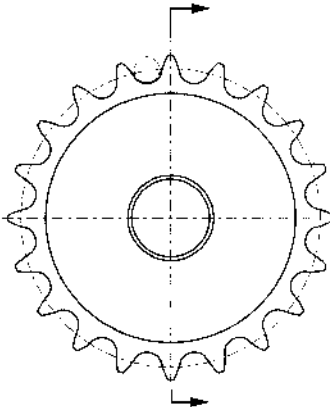
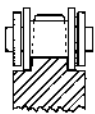
STOCK NO.	NO. OF TEETH	OUTSIDE DIA.	PITCH DIA.	HUB DIA. (H)	MINOR DIA. (Inch)	L (Inch)	MAX. BORE (Inch)	STOCK BORES (Inch)
40EM10GS-16	16	2.814	2.563	1-7/8	2.251	7/8	1.250	.625
40EM10GS-24	24	4.098	3.831	2-1/2	3.519	1	1.375	.625

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500	3/4"	PIN HUB	Glass filled Nylatron® GS-51	ROW-L-ER®	Operates with RC40D and RC40N series

STOCK NO.	NO. OF TEETH	OUTSIDE DIA.	PITCH DIA.	HUB DIA. (H)	MINOR DIA. (Inch)	L (Inch)	MAX. BORE (Inch)	STOCK BORES (Inch)
40EM12GS-32	32	5.377	5.101	2	4.789	1	1.375	.750

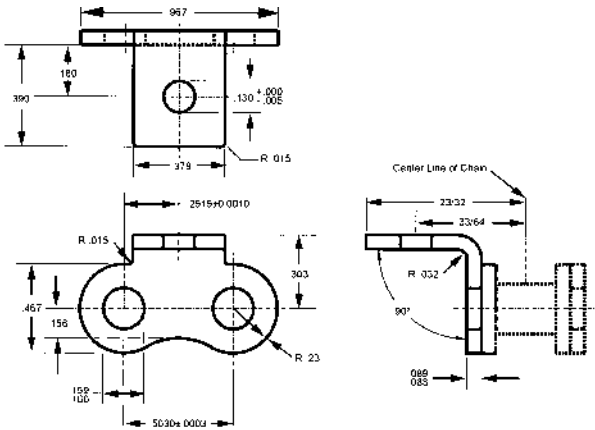


Other bore sizes available upon request.

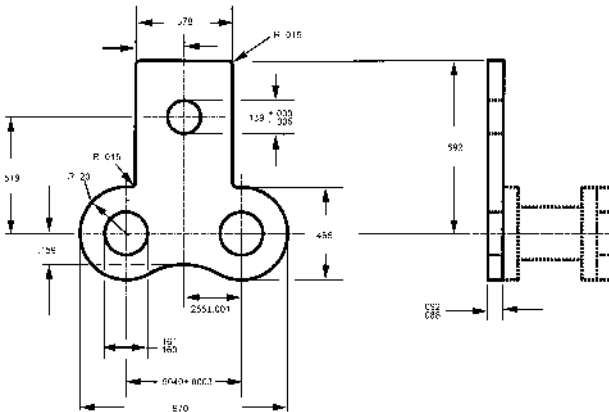


LINK PLATE LUGS

STOCK NUMBER	DESCRIPTION
40NBBL	BENT LUG - NYLATRON®



STOCK NUMBER	DESCRIPTION
40NBSL	STRAIGHT LUG - NYLATRON®



FLEX-E-GRIP® TIMING BELT TECHNICAL DATA

Features

- No Side Flanges Necessary
- Infinite Lengths
- Higher Load Capacities and Narrower Widths
- Positive Drives (Non-slip Engagement)
- No Lubrication
- Minimum Backlash
- High Mechanical Efficiency
- Extra Light Weight
- Silent Operation (No Side Flange Noise)
- Economical
- Wide Speed Range
- Broader Ratio Selection

Installation Notes

- (A) All Shafts Must Be Parallel
(B) Use Adjustable Centers Wherever Possible
(C) If Adjustable Centers are not Possible Use Idler Pulley Inside The Belt
(D) Never Force Belt Over Pulleys
(E) Avoid Reverse Bending (See Page X)

4 Compact Width Sizes

40 D. Pitch (XXL) Miniature 1/8" Wide

Equal to or stronger than conventional Timing Belts up to 5/8" wide

1/5" Pitch (XL) Extra Light 1/4" Wide

Equal to or stronger than conventional Timing Belts up to 1" wide

3/8" Pitch (L) Light 1/2" Wide

Equal to or stronger than conventional Timing Belts up to 2" wide

1/2" Pitch (H) Heavy 3/4" Wide

Equal to or stronger than conventional Timing Belts up to 2" wide

Construction

Belts - Molded in Polyurethane to meet Acid, Chemical and Environmental Conditions.

Cable - Steel Preformed Aircraft Standard Cable of both 7 x 7 and 7 x 19 Construction.

Pulleys - Aluminum 2024 (bar) MIL QQ-Q-225/6 Cond. T4 Anodized

Operating Parameters

Minimum Pulley Diameters

SIZE	MAX SPEED R.P.M.	MIN. NO OF GROOVES	PITCH DIAMETER
40 D.P. 8TB- SERIES	1750	24	.623
	1750	20	.520
	1160	18	.468
1/5" PITCH 20TB- SERIES	1750	14	.871
	1750	12	.743
	1160	11	.700
3/8" PITCH 37TB- SERIES	1750	16	1.910
	1750	14	1.671
	1160	12	1.432
1/2" PITCH 50TB- SERIES	1750	20	3.183
	1750	18	2.865
	1160	16	2.564

400% Stronger Than Conventional Timing Belts

Will Not Slip, Slide, Jump, Creep or Walk Off Timing Pulley

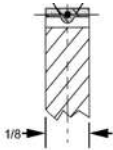
FLEX-E-GRIP® TIMING BELT TECHNICAL DATA

Technical Data & Comparison with Standard Timing Belts

Berg 8 TB Series 20 lb. Ultimate tensile

40 Pitch - Miniature (X,XL) .0816 C.P. 1/8" Timing Belts - equal to standard 5/8" wide XXL belts
Flex-E-Grip XXL Timing Belts 1/8" wide 20 lbs. Ultimate tensile strength.

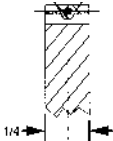
Conventional Belt	Tensile Strength
1/8" WIDE	4 lbs.
3/16" WIDE	6 lbs.
1/4" WIDE	8 lbs.
5/8" WIDE	20 lbs.



Berg 20TB Series 50 lb. Ultimate tensile

1/5" Pitch - Extra Light (XL) .200 C.P. 1/4" Timing Belts - equal to standard 1" wide XL belts
Flex-E-Grip XL Timing Belts 1/4" wide 50 lbs. Ultimate tensile strength

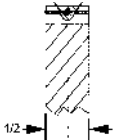
Conventional Belt	Tensile Strength
1/4" WIDE	10 lbs.
5/16" WIDE	12 lbs.
3/8" WIDE	15 lbs.
1/2" WIDE	21 lbs.
9/16" WIDE	23 lbs.
1" WIDE	41 lbs.



Berg 37TB Series 125 lb. Ultimate tensile

3/8" Pitch - Light (L) .375 C.P. 1/2" Timing Belts - equal to standard 2" wide L belts.
Flex-E-Grip L Timing Belts 1/2" wide 125 lbs. Ultimate tensile strength

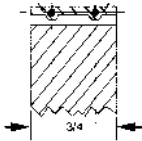
Conventional Belt	Tensile Strength
3/8" WIDE	16 lbs.
1/2" WIDE	24 lbs.
5/8" WIDE	31 lbs.
3/4" WIDE	39 lbs.
1" WIDE	55 lbs.
2-1/2" WIDE	150 lbs.



Berg 50TB Series 125 lb. Ultimate tensile

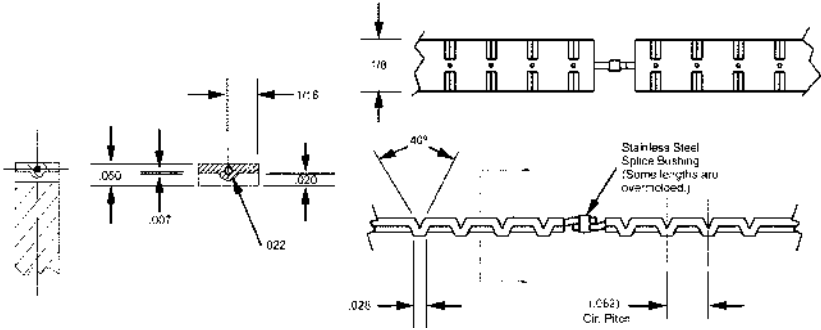
1/2" Pitch - Heavy (H) .500 C.P. 3/4" Timing Belts - equal to standard 2" wide H belts
Flex-E-Grip H Timing Belts 3/4" wide 300 lbs. Ultimate tensile strength

Conventional Belt	Tensile Strength
1/2" WIDE	59 lbs.
5/8" WIDE	80 lbs.
3/4" WIDE	99 lbs.
1" WIDE	140 lbs.
2" WIDE	300 lbs.



TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S® NAME	PULLEY
.0816 (XXL)	1/8"	Polyurethane (Black) 90A Duro .018 Stainless Steel Cable*	Flex-E-Grip®	Operates with 8TP series.



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
8TB-24*	24	1.958
8TB-44	44	3.590
8TB-45	45	3.672
8TB-48	48	3.916
8TB-51	51	4.161
8TB-52	52	4.243
8TB-53	53	4.324
8TB-60	60	4.896
8TB-64	64	5.222
8TB-66	66	5.385
8TB-67	67	5.467
8TB-72	72	5.875
8TB-77	77	6.283
8TB-88	88	7.180
8TB-96	96	7.833
8TB-98	98	7.996
8TB-102	102	8.323
8TB-109	109	8.894
8TB-110	110	8.976
8TB-114	114	9.302
8TB-120	120	9.792
8TB-123	123	10.036
8TB-126	126	10.281
8TB-132	132	10.771
8TB-139	139	11.342
8TB-140	140	11.424
8TB-150	150	12.240
8TB-162	162	13.219
8TB-175	175	14.280
8TB-184	184	15.014
8TB-193	193	15.748
8TB-214	214	17.462
8TB-228	228	18.604
8TB-245	245	19.992
8TB-249	249	20.318
8TB-251	251	20.481
8TB-264	264	21.542

- No Flanges Required
- Infinite Lengths
- Silent Drive
- No-Walk Feature
- No Lubrication
- Weight .05 oz./ft.
- Compact Design
- Positive Drive
- Light Weight
- Extra Strong
- Ultimate Tensile Strength 20 lbs.
- Temperature Range +180°F to -15°F
- Recommended Operating Load 4-5 lbs.
- Recommended Max. Operating Speed 376 ft./min
- For Field Splice Kit order 8TB-7.

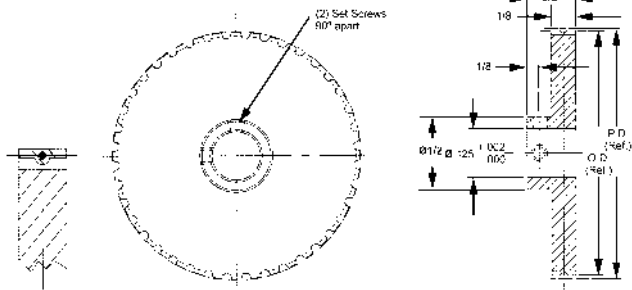
* Splices are factory overmolded

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
8TB-5FT	5 FT
8TB-10FT	10 FT
8TB-25FT	25 FT
8TB-50FT	50 FT
8TB-100FT	100 FT



TIMING PULLEYS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	1/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 8TB Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
8TP2-14	14**	.3636	.349
8TP2-15	15**	.3896	.375
8TP2-18	18**	.4675	.453
8TP2-20	20*	.5195	.505
8TP2-24	24	.6234	.609
8TP2-25	25	.6494	.635
8TP2-28	28	.7273	.713
8TP2-30	30	.7792	.765
8TP2-32	32	.8312	.817
8TP2-34	34	.8831	.869
8TP2-36	36	.9351	.921
8TP2-38	38	.9870	.972
8TP2-40	40	1.0390	1.024
8TP2-42	42	1.0909	1.076
8TP2-44	44	1.1429	1.128
8TP2-48	48	1.2468	1.232
8TP2-50	50	1.2987	1.284
8TP2-54	54	1.4026	1.388
8TP2-60	60	1.5584	1.544
8TP2-72	72	1.8701	1.856
8TP2-75	75	1.9481	1.934
8TP2-80	80	2.0779	2.063
8TP2-84	84	2.1818	2.167
8TP2-88	88	2.2857	2.271
8TP2-90	90	2.3377	2.323
8TP2-96	96	2.4935	2.479
8TP2-98	98	2.5455	2.531
8TP2-100	100	2.5974	2.583
8TP2-120	120	3.1169	3.102

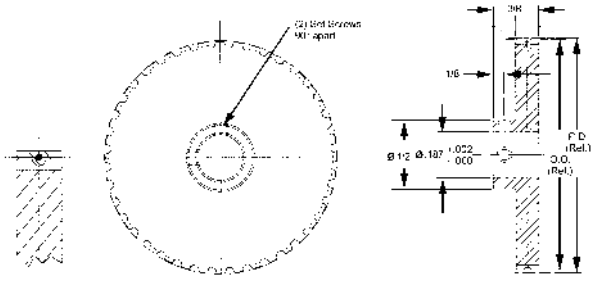


- For 14-20 teeth, hub diameter equals .32.
 - * Pulleys .468 P.D. and smaller for idler use only.
- Teeth could be anodized.

TIMING PULLEYS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	3/16"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 8TB Series

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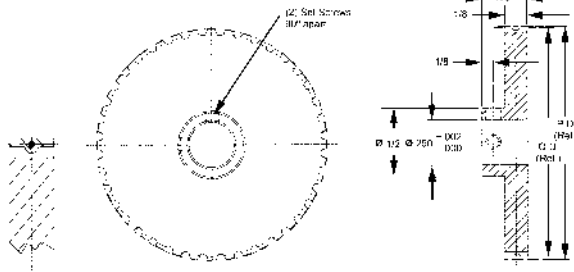
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
8TP3-18	18*	.4675	.453
8TP3-20	20*	.5195	.505
8TP3-24	24	.6234	.609
8TP3-25	25	.6494	.635
8TP3-28	28	.7273	.713
8TP3-30	30	.7792	.765
8TP3-32	32	.8312	.817
8TP3-34	34	.8831	.869
8TP3-36	36	.9351	.921
8TP3-38	38	.9870	.972
8TP3-40	40	1.0390	1.024
8TP3-42	42	1.0909	1.076
8TP3-44	44	1.1429	1.128
8TP3-48	48	1.2468	1.232
8TP3-50	50	1.2987	1.284
8TP3-54	54	1.4026	1.388
8TP3-60	60	1.5584	1.544
8TP3-72	72	1.8701	1.856
8TP3-75	75	1.9481	1.934
8TP3-80	80	2.0779	2.063
8TP3-84	84	2.1818	2.167
8TP3-88	88	2.2857	2.271
8TP3-90	90	2.3377	2.323
8TP3-96	96	2.4935	2.479
8TP3-98	98	2.5455	2.531
8TP3-100	100	2.5974	2.583
8TP3-120	120	3.1169	3.102



- For 18-20 teeth, hub diameter equals .42
 - * Pulleys .468 P.D. and smaller for idler use only.
- Teeth could be anodized.

TIMING PULLEYS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	1/4"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 8TB Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
8TP4-18	18*	.4675	.453
8TP4-20	20	.5195	.505
8TP4-24	24	.6234	.609
8TP4-25	25	.6494	.635
8TP4-28	28	.7273	.713
8TP4-30	30	.7792	.765
8TP4-32	32	.8312	.817
8TP4-34	34	.8831	.869
8TP4-36	36	.9351	.921
8TP4-38	38	.9870	.972
8TP4-40	40	1.0390	1.024
8TP4-42	42	1.0909	1.076
8TP4-44	44	1.1429	1.128
8TP4-48	48	1.2468	1.232
8TP4-50	50	1.2987	1.284
8TP4-54	54	1.4026	1.388
8TP4-60	60	1.5584	1.544
8TP4-72	72	1.8701	1.856
8TP4-75	75	1.9481	1.934
8TP4-80	80	2.0779	2.063
8TP4-84	84	2.1818	2.167
8TP4-88	88	2.2857	2.271
8TP4-90	90	2.3377	2.323
8TP4-96	96	2.4935	2.479
8TP4-98	98	2.5455	2.531
8TP4-100	100	2.5974	2.583
8TP4-120	120	3.1169	3.102

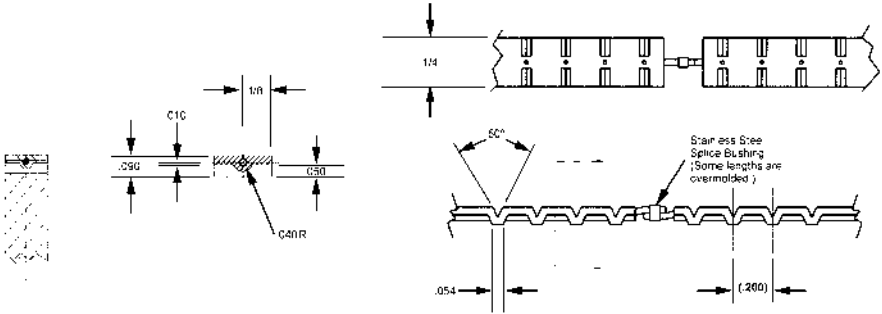


- For 18 teeth, hub diameter equals .42.
- * Pulleys .468 P.D. and smaller for idler use only.

Teeth could be anodized.

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.200 (XL)	1/4"	Polyurethane (Red) 90A Duro 1/32" Stainless Steel Cable*	Flex-E-Grip®	Operates with 20TP Series



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
20TB-10	10	2.00
20TB-15	15	3.00
20TB-20	20	4.00
20TB-25	25	5.00
20TB-30	30	6.00
20TB-35	35	7.00
20TB-40	40	8.00
20TB-45	45	9.00
20TB-50	50	10.00
20TB-55	55	11.00
20TB-60	60	12.00
20TB-65	65	13.00
20TB-70	70	14.00
20TB-80	80	16.00
20TB-85	85	17.00
20TB-90	90	18.00
20TB-95	95	19.00
20TB-100	100	20.00
20TB-105	105	21.00
20TB-110	110	22.00
20TB-110	115	23.00
20TB-120	120	24.00
20TB-125	125	25.00
20TB-130	130	26.00
20TB-135	135	27.00
20TB-140	140	28.00
20TB-145	145	29.00
20TB-150	150	30.00
20TB-155	155	31.00
20TB-160	160	32.00
20TB-175	175	35.00
20TB-180	180	36.00
20TB-185	185	37.00
20TB-190	190	38.00
20TB-200	200	40.00
20TB-210	210	42.00

* Aramid Core. Alternate construction available.

- No Flanges Required
- Infinite Lengths
- Silent Drive
- No-Walk Feature
- No Lubrication
- Weight .10 oz./ft.
- Compact Design
- Positive Drive
- Light Weight
- Extra Strong
- Ultimate Tensile Strength 50 lbs.
- Temperature Range +180°F to -15°F
- Recommended Operating Load 10-12 lbs.
- Recommended Max. Operating Speed 376 ft./min.
- For Field Splice Kit Order 20TB-7

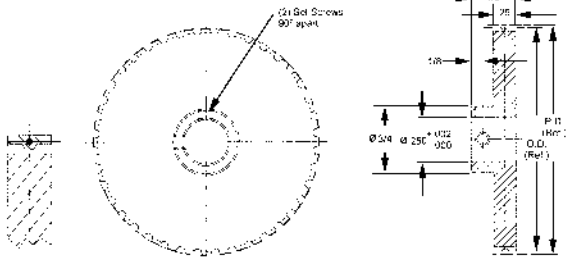
* Splices are factory overmolded

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
20TB-5FT	5 FT
20TB-10FT	10 FT
20TB-25FT	25 FT
20TB-50FT	50 FT
20TB-100FT	100 FT



TIMING PULLEYS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
.200 (XL)	1/4"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 20TB Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
20TP4-10	10*	.6366	.616
20TP4-11	11*	.7003	.680
20TP4-12	12*	.7639	.743
20TP4-14	14	.8913	.871
20TP4-15	15	.9549	.934
20TP4-16	16	1.0186	.998
20TP4-17	17	1.0823	1.062
20TP4-18	18	1.1459	1.125
20TP4-19	19	1.2096	1.189
20TP4-20	20	1.2732	1.253
20TP4-21	21	1.3369	1.316
20TP4-22	22	1.4006	1.380
20TP4-23	23	1.4642	1.444
20TP4-24	24	1.5279	1.507
20TP4-25	25	1.5916	1.571
20TP4-27	27	1.7189	1.698
20TP4-28	28	1.7825	1.762
20TP4-29	29	1.8462	1.826
20TP4-30	30	1.9099	1.889
20TP4-32	32	2.0372	2.017
20TP4-36	36	2.2918	2.271
20TP4-40	40	2.5465	2.526
20TP4-42	42	2.6738	2.653
20TP4-44	44	2.8011	2.781
20TP4-45	45	2.8648	2.844
20TP4-48	48	3.0558	3.035
20TP4-50	50	3.1831	3.163
20TP4-60	60	3.8197	3.799
20TP4-72	72	4.5837	4.563

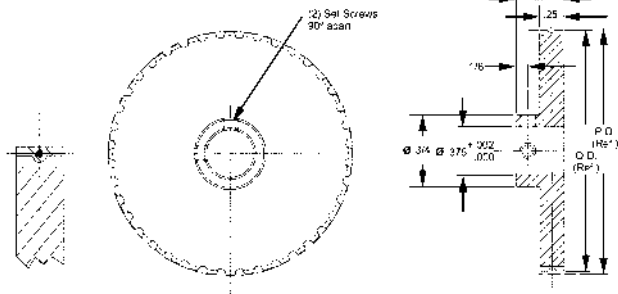


- For 10-12 teeth, hub diameter equals .56.
- * Pulleys .750 P.D. and smaller for idler use only.
- Other numbers of teeth available upon request.

Teeth could be anodized.

TIMING PULLEYS

CIRCULAR PITCH	BORE	STYLE	MATERIAL	BERG'S ® NAME	BELT
.200 (XL)	3/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 20TB Series



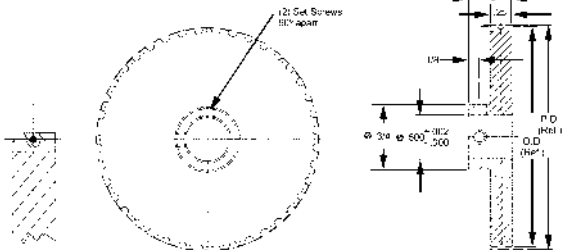
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
20TP6-11	11*	.7003	.680
20TP6-12	12*	.7639	.743
20TP6-14	14	.8913	.871
20TP6-15	15	.9549	.934
20TP6-16	16	1.0186	.998
20TP6-17	17	1.0823	1.062
20TP6-18	18	1.1459	1.125
20TP6-19	19	1.2096	1.189
20TP6-20	20	1.2732	1.253
20TP6-21	21	1.3369	1.316
20TP6-22	22	1.4006	1.380
20TP6-23	23	1.4642	1.444
20TP6-24	24	1.5279	1.507
20TP6-25	25	1.5916	1.571
20TP6-27	27	1.7189	1.698
20TP6-28	28	1.7825	1.762
20TP6-29	29	1.8462	1.826
20TP6-30	30	1.9099	1.889
20TP6-32	32	2.0372	2.017
20TP6-36	36	2.2918	2.271
20TP6-40	40	2.5465	2.526
20TP6-42	42	2.6738	2.653
20TP6-44	44	2.8011	2.781
20TP6-45	45	2.8648	2.844
20TP6-48	48	3.0558	3.035
20TP6-50	50	3.1831	3.163
20TP6-60	60	3.8197	3.799
20TP6-72	72	4.5837	4.563



- For 11-12 teeth, hub diameter equals .62.
 - * Pulleys .750 P.D. and smaller for idler use only.
- Other numbers of teeth available upon request.
- Teeth could be anodized.

TIMING PULLEYS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
.200 (XL)	1/2"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 20TB Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
20TP8-14	14	.8913	.871
20TP8-15	15	.9549	.934
20TP8-16	16	1.0186	.998
20TP8-17	17	1.0823	1.062
20TP8-18	18	1.1459	1.125
20TP8-19	19	1.2096	1.189
20TP8-20	20	1.2732	1.253
20TP8-21	21	1.3369	1.316
20TP8-22	22	1.4006	1.380
20TP8-23	23	1.4642	1.444
20TP8-24	24	1.5279	1.507
20TP8-25	25	1.5916	1.571
20TP8-27	27	1.7189	1.698
20TP8-28	28	1.7825	1.762
20TP8-29	29	1.8462	1.826
20TP8-30	30	1.9099	1.889
20TP8-32	32	2.0372	2.017
20TP8-36	36	2.2918	2.271
20TP8-40	40	2.5465	2.526
20TP8-42	42	2.6738	2.653
20TP8-44	44	2.8011	2.781
20TP8-45	45	2.8648	2.844
20TP8-48	48	3.0558	3.035
20TP8-50	50	3.1831	3.163
20TP8-60	60	3.8197	3.799
20TP8-72	72	4.5837	4.563

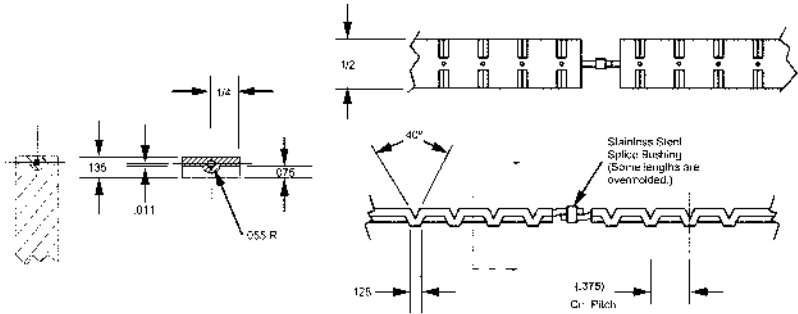


* Pulleys .750 P.D. and smaller for idler use only.
Other numbers of teeth available upon request.

Teeth could be anodized.

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.375 (L)	1/2"	Polyurethane (Blue) 90A Duro 3/64" Stainless Steel Cable*	Flex-E-Grip®	Operates with 37TP Series

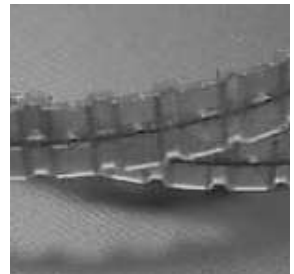


STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
37TB-20	20	7.500
37TB-22	22	8.250
37TB-24	24	9.000
37TB-26	26	9.750
37TB-28	28	10.500
37TB-30	30	11.250
37TB-33	33	12.375
37TB-36	36	13.500
37TB-40	40	15.000
37TB-45	45	16.875
37TB-50	50	18.750
37TB-56	56	21.000
37TB-60	60	22.500
37TB-64	64	24.000
37TB-68	68	25.500
37TB-72	72	27.000
37TB-80	80	30.000
37TB-86	86	32.250
37TB-92	92	34.500
37TB-98	98	36.750
37TB-100	100	37.500
37TB-104	104	39.000
37TB-108	108	40.500
37TB-112	112	42.000
37TB-116	116	43.500
37TB-120	120	45.000
37TB-124	124	46.500
37TB-128	128	48.000
37TB-132	132	49.500
37TB-136	136	51.000
37TB-140	140	52.500
37TB-144	144	54.000
37TB-148	148	55.500
37TB-152	152	57.000
37TB-156	156	58.500
37TB-160	160	60.000
37TB-176	176	66.000

Aramid Core. Alternate construction available.

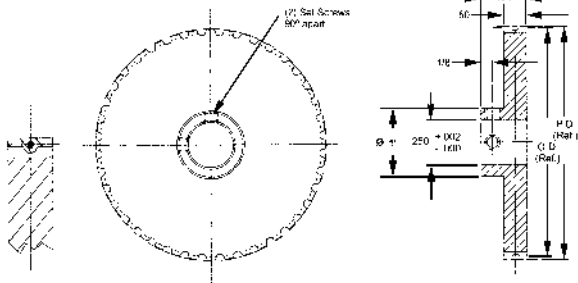
- No Flanges Required
- Infinite Lengths
- Silent Drive
- No-Walk Feature
- No Lubrication
- Weight .41 oz./ft.
- Compact Design
- Positive Drive
- Light Weight
- Extra Strong
- Ultimate Tensile Strength 50 lbs.
- Temperature Range +180°F to -15°F
- Recommended Operating Load 30 lbs.
- Recommended Max. Operating Speed 376 ft./min.
- For Field Splice Kit Order 37TB-7
- Splices are factory overmolded

BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
37TB-5FT	5 FT
37TB-10FT	10 FT
37TB-25FT	25 FT
37TB-50FT	50 FT
37TB-100FT	100 FT

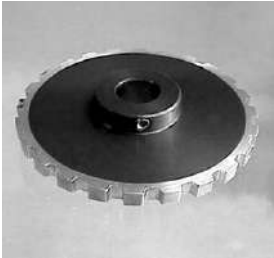


TIMING PULLEYS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
.375 (L)	1/4"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 37TB Series



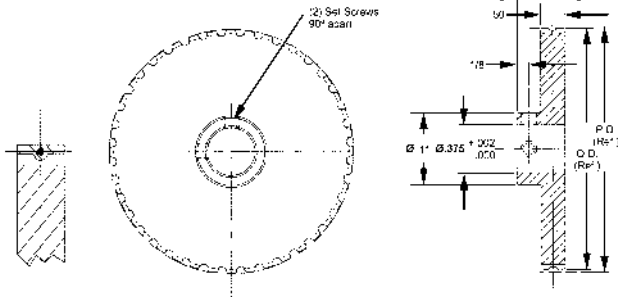
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
37TP4-10	10*	1.1937	1.164
37TP4-11	11*	1.3130	1.284
37TP4-12	12	1.4324	1.403
37TP4-13	13	1.5518	1.522
37TP4-14	14	1.6711	1.642
37TP4-15	15	1.7905	1.761
37TP4-16	16	1.9099	1.880
37TP4-17	17	2.0292	2.000
37TP4-18	18	2.1486	2.119
37TP4-19	19	2.2680	2.239
37TP4-20	20	2.3873	2.358
37TP4-21	21	2.5067	2.477
37TP4-22	22	2.6261	2.597
37TP4-24	24	2.8648	2.835
37TP4-26	26	3.1035	3.074
37TP4-28	28	3.3422	3.313
37TP4-30	30	3.5810	3.552
37TP4-32	32	3.8197	3.790
37TP4-36	36	4.2972	4.268



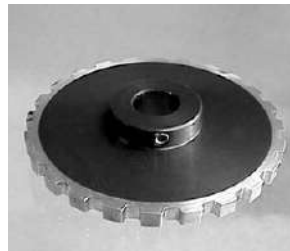
* Pulleys 1.375 P.D. and smaller for idler use only.
Other numbers of teeth available upon request.
Teeth could be anodized.

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CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
.375 (L)	3/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 37TB Series



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
37TP6-10	10*	1.1937	1.164
37TP6-11	11*	1.3130	1.284
37TP6-12	12	1.4324	1.403
37TP6-13	13	1.5518	1.522
37TP6-14	14	1.6711	1.642
37TP6-15	15	1.7905	1.761
37TP6-16	16	1.9099	1.880
37TP6-17	17	2.0292	2.000
37TP6-18	18	2.1486	2.119
37TP6-19	19	2.2680	2.239
37TP6-20	20	2.3873	2.358
37TP6-21	21	2.5067	2.477
37TP6-22	22	2.6261	2.597
37TP6-24	24	2.8648	2.835
37TP6-26	26	3.1035	3.074
37TP6-28	28	3.3422	3.313
37TP6-30	30	3.5810	3.552
37TP6-32	32	3.8197	3.790
37TP6-36	36	4.2972	4.268

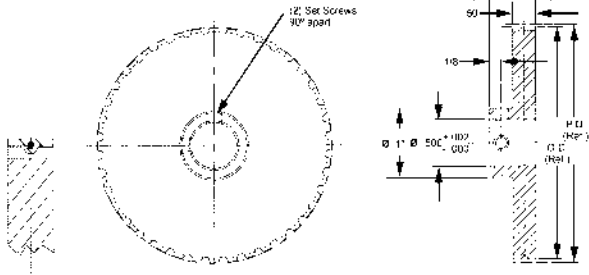


* Pulleys 1.375 P.D. and smaller for idler use only.
Other numbers of teeth available upon request.

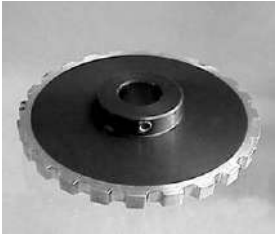
Teeth could be anodized.

TIMING PULLEYS

CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
.375 (L)	1/2"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 37TB Series



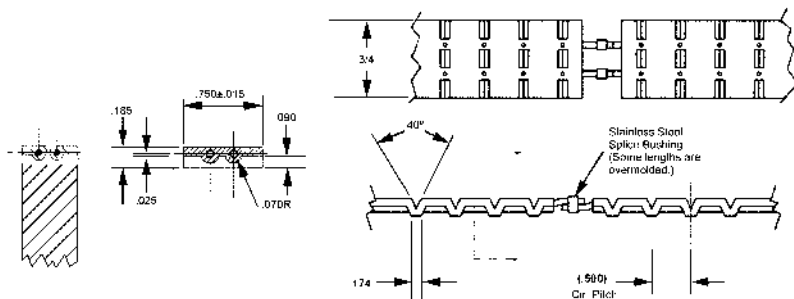
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
37TP8-10	10*	1.1937	1.164
37TP8-11	11*	1.3130	1.284
37TP8-12	12	1.4324	1.403
37TP8-13	13	1.5518	1.522
37TP8-14	14	1.6711	1.642
37TP8-15	15	1.7905	1.761
37TP8-16	16	1.9099	1.880
37TP8-17	17	2.0292	2.000
37TP8-18	18	2.1486	2.119
37TP8-19	19	2.2680	2.239
37TP8-20	20	2.3873	2.358
37TP8-21	21	2.5067	2.477
37TP8-22	22	2.6261	2.597
37TP8-24	24	2.8648	2.835
37TP8-26	26	3.1035	3.074
37TP8-28	28	3.3422	3.313
37TP8-30	30	3.5810	3.552
37TP8-32	32	3.8197	3.790
37TP8-36	36	4.2972	4.268



* Pulleys 1.375 P.D. and smaller for idler use only.
Other numbers of teeth available upon request.
Teeth could be anodized.

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.500 (H)	3/4"	Polyurethane (Green) 90A Duro 1/16" Stainless Steel Cable*	Flex-E-Grip®	Operates with 50TP Series



STOCK NO.	NO. OF PITCHES	LENGTH (Ref.)
50TB-32	32	16.00
50TB-36	36	18.00
50TB-40	40	20.00
50TB-44	44	22.00
50TB-48	48	24.00
50TB-50	50	25.00
50TB-54	54	27.00
50TB-56	56	28.00
50TB-60	60	30.00
50TB-64	64	32.00
50TB-66	66	33.00
50TB-70	70	35.00
50TB-72	72	36.00
50TB-75	75	37.50
50TB-78	78	39.00
50TB-80	80	40.00
50TB-84	84	42.00
50TB-88	88	44.00
50TB-90	90	45.00
50TB-96	96	48.00
50TB-102	102	51.00
50TB-108	108	54.00
50TB-114	114	57.000
50TB-120	120	60.000
50TB-126	126	63.000
50TB-132	132	66.000
50TB-140	140	70.000
50TB-150	150	75.000
50TB-160	160	80.000
50TB-170	170	85.000
50TB-180	180	90.000
50TB-190	190	95.000
50TB-200	200	100.000
50TB-225	225	112.500
50TB-250	250	125.000
50TB-275	275	137.500
50TB-400	400	200.000

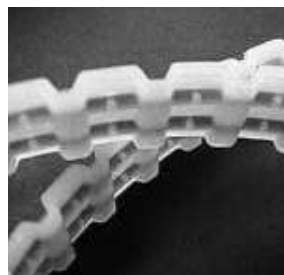
BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
50TB-5FT	5 FT
50TB-10FT	10 FT
50TB-25FT	25 FT
50TB-50FT	50 FT
50TB-100FT	100 FT

Aramid Core. Alternate construction available.

- No Flanges Required
- Infinite Lengths
- Silent Drive
- No-Walk Feature
- No Lubrication
- Weight .91 oz./ft.
- Compact Design
- Positive Drive
- Light Weight
- Extra Strong
- 90A Durometer
- Ultimate Tensile Strength 300 lbs.
- Temperature Range +180°F to -15°F
- Recommended Operating Load 75 lbs.
- Recommended Max. Operating Speed 376 ft./min.
- For Field Splice Kit Order 50TB-7

Special lengths available upon request.

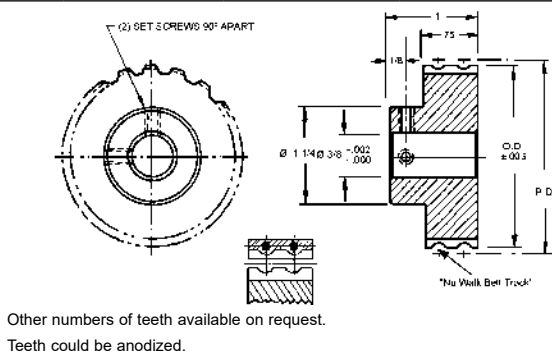
* Splices are factory overmolded



TIMING PULLEYS

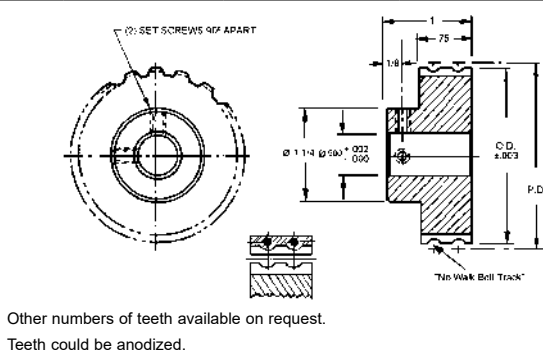
CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500 (H)	3/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 50TB Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
50TP6-10	10	1.5916	1.539
50TP6-11	11	1.7507	1.698
50TP6-12	12	1.9099	1.857
50TP6-13	13	2.0690	2.016
50TP6-14	14	2.2282	2.176
50TP6-15	15	2.3873	2.335
50TP6-16	16	2.5465	2.494
50TP6-17	17	2.7056	2.653
50TP6-18	18	2.8648	2.812
50TP6-19	19	3.0239	2.971
50TP6-20	20	3.1831	3.131
50TP6-21	21	3.3422	3.290
50TP6-22	22	3.5014	3.449
50TP6-24	24	3.8197	3.767
50TP6-26	26	4.1380	4.086
50TP6-28	28	4.4563	4.404
50TP6-30	30	4.7747	4.722
50TP6-32	32	5.0930	5.041



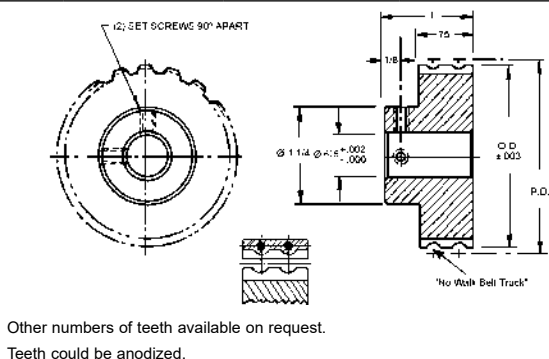
CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500 (H)	1/2"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 50TB Series

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
50TP8-10	10	1.5916	1.539
50TP8-11	11	1.7507	1.698
50TP8-12	12	1.9099	1.857
50TP8-13	13	2.0690	2.016
50TP8-14	14	2.2282	2.176
50TP8-15	15	2.3873	2.335
50TP8-16	16	2.5465	2.494
50TP8-17	17	2.7056	2.653
50TP8-18	18	2.8648	2.812
50TP8-19	19	3.0239	2.971
50TP8-20	20	3.1831	3.131
50TP8-21	21	3.3422	3.290
50TP8-22	22	3.5014	3.449
50TP8-24	24	3.8197	3.767
50TP8-26	26	4.1380	4.086
50TP8-28	28	4.4563	4.404
50TP8-30	30	4.7747	4.722
50TP8-32	32	5.0930	5.041



CIRCULAR PITCH	BORE	STYLE	MATERIALS	BERG'S ® NAME	CHAIN
.500 (H)	5/8"	PIN HUB	2024-T4 Aluminum Anodized	Flex-E-Grip®	Operates with Flex-E-Grip Belt 50TB Series

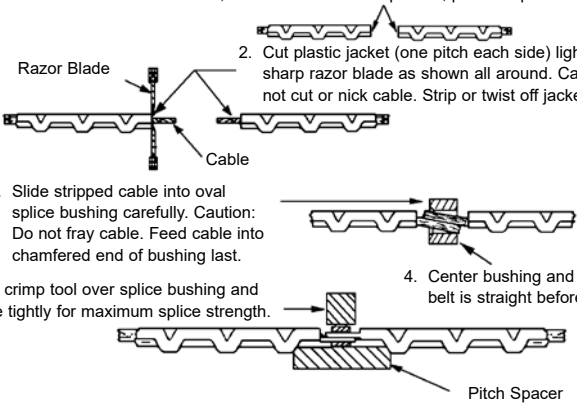
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
50TP10-10	10	1.5916	1.539
50TP10-11	11	1.7507	1.698
50TP10-12	12	1.9099	1.857
50TP10-13	13	2.0690	2.016
50TP10-14	14	2.2282	2.176
50TP10-15	15	2.3873	2.335
50TP10-16	16	2.5465	2.494
50TP10-17	17	2.7056	2.653
50TP10-18	18	2.8648	2.812
50TP10-19	19	3.0239	2.971
50TP10-20	20	3.1831	3.131
50TP10-21	21	3.3422	3.290
50TP10-22	22	3.5014	3.449
50TP10-24	24	3.8197	3.767
50TP10-26	26	4.1380	4.086
50TP10-28	28	4.4563	4.404
50TP10-30	30	4.7747	4.722
50TP10-32	32	5.0930	5.041



FIELD SPLICE KITS

Splicing Procedures:

1. Cut Berg "Flex-E-Grip" sharp and square as shown, using cutter, to desired number of pitches, plus one pitch.
2. Cut plastic jacket (one pitch each side) lightly with sharp razor blade as shown all around. Caution: Do not cut or nick cable. Strip or twist off jacket carefully.
3. Slide stripped cable into oval splice bushing carefully. Caution: Do not fray cable. Feed cable into chamfered end of bushing last.
4. Center bushing and be certain belt is straight before crimping.
5. Position crimp tool over splice bushing and squeeze tightly for maximum splice strength.



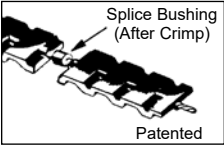
Crimp Tool



Cable Cutter



BELT SERIES	STOCK NUMBER	FIELD SPLICE KIT AND ACCESSORIES
8TB 20TB 37TB 50TB	8TB-7 20TB-7 37TB-7 50TB-7	Complete Kit Consists of: Crimp Tool, Pitch Spacer, Sample Belt Cable Cutter, Bushings, Razor Blades & Instructions
	TL-4 TL-3 TL-7	Crimp Tool for 8TB Crimp Tool for 20TB and 37TB Crimp Tool for 50TB
	BU-018-S BU-032-S BU-046-S BU-062-S	Extra Splice Bushings for: 8TB (1/64" Cable) 20TB (1/32" Cable) 37TB (3/64" Cable) 50TB (1/16" Cable)
	TL-1 TL-2	Cable Cutter for up to 3/64" Cable Cable Cutter for up to 5/64" Cable



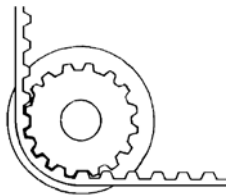
Field Splices offer only 50% of Catalog Rated Loads

W. M. Berg, Inc. will factory splice to order, any length belt at a nominal charge.

MAX-M-DRIVE® CABLE DRIVE CHAIN TECHNICAL DATA

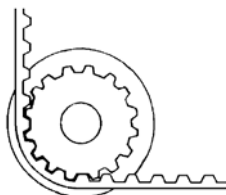
Operating Notes

Timing Belts, also known as Synchronous Belts, are basically flat belts with evenly spaced or pitched teeth. These teeth when matched with the grooves in the pulleys provide a positive no-slip engagement. These belts will not stretch and require no lubrication.



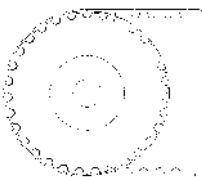
TB7 Series

- Trapezoidal Profile
- .080 Pitch
- Maximum Speed 20,000 RPM
- Maximum Pulley Diameter .25" (10 Teeth)



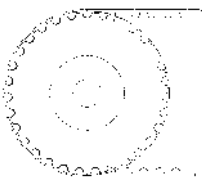
TB20 Series

- Trapezoidal Profile
- 1/5 Pitch (.200 Circular Pitch)
- Maximum Speed 10,000 RPM



TB2 Series

- GT2 Profile
- 2 mm Pitch GT2
- Maximum operating tension 25 lbs (111N) /In. of belt width
- Maximum operating speed 10,000 rpm
- Minimum pulley diameter .281 (12 teeth)

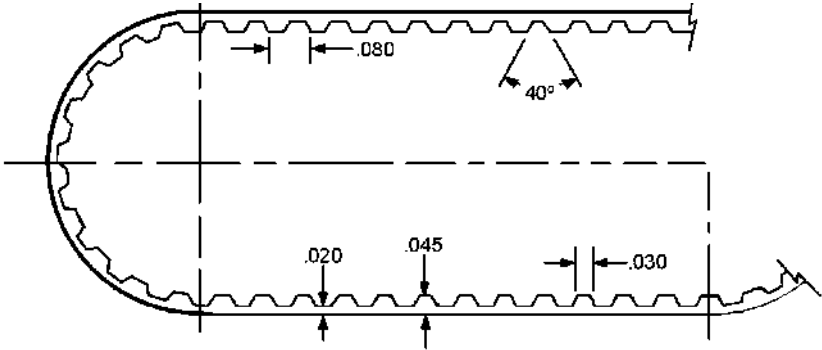


TB3 Series

- GT2 Profile
- 3 mm Pitch GT2
- Maximum operating tension 114 lbs (507N) /In. of belt width
- Maximum operating speed 20,000 rpm
- Minimum pulley diameter .572 (16 teeth)

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.080 (MXL)	1/8"	Neoprene (Black) Fiberglass reinforced	Max-M-Drive®	Operates with TP7 Series



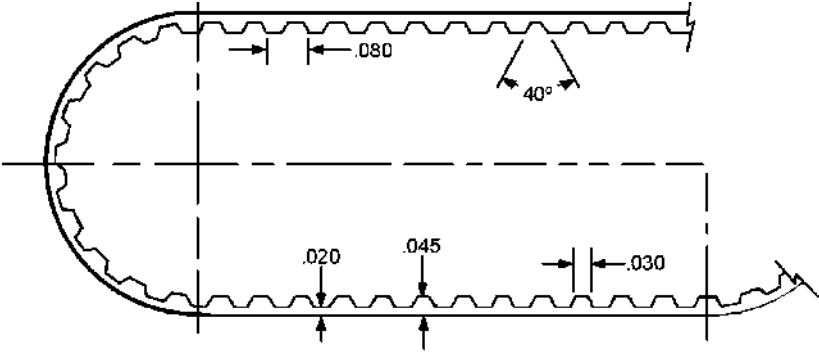
STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB7EF2-40	40	3.20
TB7EF2-42	42	3.36
TB7EF2-45	45	3.60
TB7EF2-50	50	4.00
TB7EF2-54	54	4.32
TB7EF2-55	55	4.40
TB7EF2-57	57	4.56
TB7EF2-60	60	4.80
TB7EF2-64	64	5.12
TB7EF2-67	67	5.36
TB7EF2-70	70	5.60
TB7EF2-73	73	5.84
TB7EF2-80	80	6.40
TB7EF2-90	90	7.20
TB7EF2-100	100	8.00
TB7EF2-105	105	8.40
TB7EF2-110	110	8.80
TB7EF2-120	120	9.60
TB7EF2-130	130	10.40
TB7EF2-150	150	12.00
TB7EF2-160	160	12.80
TB7EF2-170	170	13.60
TB7EF2-175	175	14.00
TB7EF2-190	190	15.20
TB7EF2-200	200	16.00
TB7EF2-225	225	18.00
TB7EF2-250	250	20.00
TB7EF2-300	300	24.00
TB7EF2-400	400	32.00

- High Ratios
- Allows use of small diameter pulleys
- High Speeds
- High Power Transmission
- Long Life
- Wear Resistant Nylon Facing
- Low Profile
- Quiet Operation
- Maximum speed up to 20,000 RPM
- Minimum pulley diameter .25 (10 grooves)
- Temperature Range +185°F to -30°F



TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.080 (MXL)	1/4"	Neoprene (Black) Fiberglass reinforced	Max-M-Drive®	Operates with TP7 Series



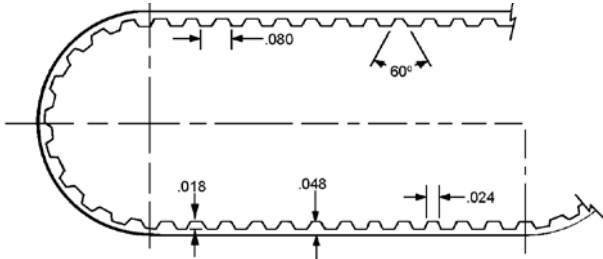
STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB7EF4-40	40	3.20
TB7EF4-42	42	3.36
TB7EF4-45	45	3.60
TB7EF4-50	50	4.00
TB7EF4-54	54	4.32
TB7EF4-55	55	4.40
TB7EF4-57	57	4.56
TB7EF4-60	60	4.80
TB7EF4-64	64	5.12
TB7EF4-67	67	5.36
TB7EF4-70	70	5.60
TB7EF4-73	73	5.84
TB7EF4-80	80	6.40
TB7EF4-90	90	7.20
TB7EF4-100	100	8.00
TB7EF4-105	105	8.40
TB7EF4-110	110	8.80
TB7EF4-120	120	9.60
TB7EF4-130	130	10.40
TB7EF4-150	150	12.00
TB7EF4-160	160	12.80
TB7EF4-170	170	13.60
TB7EF4-175	175	14.00
TB7EF4-190	190	15.20
TB7EF4-200	200	16.00
TB7EF4-225	225	18.00
TB7EF4-250	250	20.00
TB7EF4-300	300	24.00
TB7EF4-400	400	32.00

- High Ratios
- Allows use of small diameter pulleys
- High Speeds
- High Power Transmission
- Long Life
- Wear Resistant Nylon Facing
- Low Profile
- Quiet Operation
- Maximum speed up to 20,000 RPM
- Minimum pulley diameter .25 (10 grooves)
- Temperature Range +185°F to -30°F



TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.080 (MXL)	1/8"	Urethane Hardness Shore "A" 80-85 Polyester Cord Construction Urethane (Black or Orange)	Max-M-Drive®	Operates with TP7 Series



STOCK NO.	LENGTH (Ref.)	STOCK NO.	LENGTH (Ref.)
TB7UP2-30	2.400	TB7UP2-160	12.800
TB7UP2-35	2.280	TB7UP2-165	13.200
TB7UP2-40	3.200	TB7UP2-170	13.600
TB7UP2-45	3.600	TB7UP2-175	14.000
TB7UP2-48	3.840	TB7UP2-180	14.400
TB7UP2-50	4.000	TB7UP2-184	14.720
TB7UP2-55	4.400	TB7UP2-185	14.800
TB7UP2-60	4.800	TB7UP2-190	15.200
TB7UP2-65	5.200	TB7UP2-195	15.600
TB7UP2-70	5.600	TB7UP2-200	16.000
TB7UP2-71	5.680	TB7UP2-205	16.400
TB7UP2-75	6.000	TB7UP2-210	16.800
TB7UP2-78	6.240	TB7UP2-212	16.960
TB7UP2-80	6.400	TB7UP2-215	17.200
TB7UP2-81	6.480	TB7UP2-220	17.600
TB7UP2-85	6.800	TB7UP2-225	18.000
TB7UP2-87	6.960	TB7UP2-230	18.400
TB7UP2-88	7.040	TB7UP2-235	18.800
TB7UP2-90	7.200	TB7UP2-240	19.200
TB7UP2-95	7.600	TB7UP2-245	19.600
TB7UP2-97	7.760	TB7UP2-249	19.920
TB7UP2-100	8.000	TB7UP2-250	20.000
TB7UP2-102	8.160	TB7UP2-255	20.400
TB7UP2-103	8.240	TB7UP2-260	20.800
TB7UP2-105	8.400	TB7UP2-265	21.200
TB7UP2-106	8.480	TB7UP2-270	21.600
TB7UP2-110	8.800	TB7UP2-275	22.000
TB7UP2-112	8.960	TB7UP2-280	22.400
TB7UP2-114	9.120	TB7UP2-285	22.800
TB7UP2-115	9.200	TB7UP2-290	23.200
TB7UP2-118	9.440	TB7UP2-295	23.600
TB7UP2-120	9.600	TB7UP2-300	24.000
TB7UP2-122	9.760	TB7UP2-310	24.800
TB7UP2-123	9.840	TB7UP2-315	25.200
TB7UP2-125	10.000	TB7UP2-320	25.600
TB7UP2-126	10.080	TB7UP2-330	26.400
TB7UP2-130	10.400	TB7UP2-340	27.200
TB7UP2-132	10.560	TB7UP2-350	28.000
TB7UP2-135	10.800	TB7UP2-360	28.800
TB7UP2-140	11.200	TB7UP2-370	29.600
TB7UP2-144	11.520	TB7UP2-380	30.400
TB7UP2-145	11.600	TB7UP2-390	31.200
TB7UP2-150	12.000	TB7UP2-400	32.000
TB7UP2-155	12.400		

Tooth Shear Strength:

Approx. 15% Break Strength.

Break Strength:

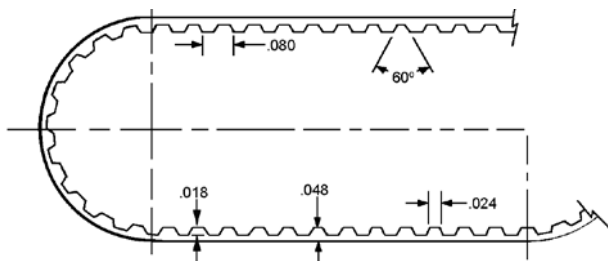
32 lbs. Per 1/16 belt width in endless form.

Temperature Range:

Continuous 0°F to 80°F
Intermittent 250°F

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.080 (MXL)	1/4"	Urethane Hardness Shore "A" 80-85 Polyester Cord Construction Urethane (Black or Orange)	Max-M-Drive®	Operates with TP7 Series



STOCK NO.	LENGTH (Ref.)	STOCK NO.	LENGTH (Ref.)
TB7UP4-30	2.400	TB7UP4-160	12.800
TB7UP4-35	2.280	TB7UP4-165	13.200
TB7UP4-40	3.200	TB7UP4-170	13.600
TB7UP4-45	3.600	TB7UP4-175	14.000
TB7UP4-48	3.840	TB7UP4-180	14.400
TB7UP4-50	4.000	TB7UP4-184	14.720
TB7UP4-55	4.400	TB7UP4-185	14.800
TB7UP4-60	4.800	TB7UP4-190	15.200
TB7UP4-65	5.200	TB7UP4-195	15.600
TB7UP4-70	5.600	TB7UP4-200	16.000
TB7UP4-71	5.680	TB7UP4-205	16.400
TB7UP4-75	6.000	TB7UP4-210	16.800
TB7UP4-78	6.240	TB7UP4-212	16.960
TB7UP4-80	6.400	TB7UP4-215	17.200
TB7UP4-81	6.480	TB7UP4-220	17.600
TB7UP4-85	6.800	TB7UP4-225	18.000
TB7UP4-87	6.960	TB7UP4-230	18.400
TB7UP4-88	7.040	TB7UP4-235	18.800
TB7UP4-90	7.200	TB7UP4-240	19.200
TB7UP4-95	7.600	TB7UP4-245	19.600
TB7UP4-97	7.760	TB7UP4-249	19.920
TB7UP4-100	8.000	TB7UP4-250	20.000
TB7UP4-102	8.160	TB7UP4-255	20.400
TB7UP4-103	8.240	TB7UP4-260	20.800
TB7UP4-105	8.400	TB7UP4-265	21.200
TB7UP4-106	8.480	TB7UP4-270	21.600
TB7UP4-110	8.800	TB7UP4-275	22.000
TB7UP4-112	8.960	TB7UP4-280	22.400
TB7UP4-114	9.120	TB7UP4-285	22.800
TB7UP4-115	9.200	TB7UP4-290	23.200
TB7UP4-118	9.440	TB7UP4-295	23.600
TB7UP4-120	9.600	TB7UP4-300	24.000
TB7UP4-122	9.760	TB7UP4-310	24.800
TB7UP4-123	9.840	TB7UP4-315	25.200
TB7UP4-125	10.000	TB7UP4-320	25.600
TB7UP4-126	10.080	TB7UP4-330	26.400
TB7UP4-130	10.400	TB7UP4-340	27.200
TB7UP4-132	10.560	TB7UP4-350	28.000
TB7UP4-135	10.800	TB7UP4-360	28.800
TB7UP4-140	11.200	TB7UP4-370	29.600
TB7UP4-144	11.520	TB7UP4-380	30.400
TB7UP4-145	11.600	TB7UP4-390	31.200
TB7UP4-150	12.000	TB7UP4-400	32.000
TB7UP4-155	12.400	-	-

Tooth Shear Strength:
Approx. 15% Break Strength.

Break Strength:
32 lbs. Per 1/16 belt width in endless form.

Temperature Range:
Continuous 0°F to 80°F
Intermittent 250°F

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	1/8"	10% Glass Filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB7 series

STOCK NO.	BORE + .001 - .000	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	FLANGE DIA.	HUB DIA.	SET SCREW ± .03
TP7E2U4-10	.125	10	.255	.235	.42	.44	#4-40
TP7E2U4-12		12	.306	.286	.47		
TP7E2U4-14		14	.357	.337	.53		

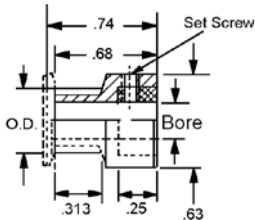
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	3/16"	10% Glass Filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB7 series

STOCK NO.	BORE + .001 - .000	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	FLANGE DIA.	HUB DIA.	SET SCREW ± .03
TP7E3U4-15	.187	15	.362	.362	.55	.44	#6-32
TP7P3U4-20	.187	20	.509	.489	.68	.50	#6-32
TP7P3U4-21		21	.535	.515	.70		
TP7P3U4-22		22	.560	.540	.73		
TP7P3U4-24		24	.611	.591	.78		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	1/4"	10% Glass Filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB7 series

STOCK NO.	BORE + .001 - .000	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	FLANGE DIA.	HUB DIA.	SET SCREW ± .03
TP7E4U4-16	.250	16	.407	.387	.58	.44	#8-32
TP7E4U4-18	.250	18	.458	.438	.58	.50	#8-32
TP7P4U4-26	.250	26	.662	.642	.83	.69	#8-32
TP7P4U4-28		28	.713	.693	.88		
TP7P4U4-30		30	.764	.744	.93		
TP7P4U4-32		32	.815	.795	.98		
TP7P4U4-34		34	.866	.846	1.04		
TP7P4U4-36		36	.917	.897	1.09		
TP7P4U4-38		38	.968	.948	1.14		
TP7P4U4-40		40	1.019	.999	1.19		
TP7P4U4-42		42	1.070	1.050	1.24		
TP7P4U4-44		44	1.120	1.100	1.29		
TP7P4U4-46		46	1.171	1.151	1.34		
TP7P4U4-48		48	1.222	1.202	1.39		
TP7P4U4-50		50	1.273	1.253	1.44		
TP7P4U4-51		51	1.299	1.279	1.48		
TP7P4U4-60		60	1.528	1.508	1.70		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	5/16"	10% Glass Filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB7 series



STOCK NO.	BORE + .001 - .000	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	FLANGE DIA.	HUB DIA.	SET SCREW ± .03
TP7P5U4-70	.313	70	1.783	1.763	1.95	.69	#10-32
TP7P5U4-72		72	1.833	1.813	2.00		
TP7P5U4-80		80	2.037	2.017	2.21		
TP7P5U4-90		90	2.292	2.272	2.46		
TP7P5U4-100		100	2.546	2.526	2.71		
TP7P5U4-110		110	2.801	2.781	2.97		
TP7P5U4-120		120	3.056	3.036	3.22		

10 - 18 Grooves - O.D. Tolerance +.003/- .001 71 - 120 Grooves - O.D. Tolerance +.005/- .001
25 - 70 Grooves - O.D. Tolerance +.004/- .001

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	1/8"	10% Glass Filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB7 series

STOCK NO.	BORE + .001 - .000	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	FLANGE DIA.	HUB DIA.	SET SCREW ± .03
TP7E2W4-10	.125	10	.255	.235	.42	.44	#4-40
TP7E2W4-12		12	.306	.286	.47		
TP7E2W4-14		14	.357	.337	.53		

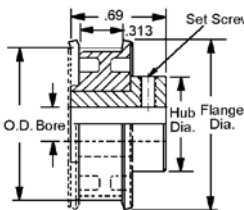
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	3/16"	10% Glass Filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB7 series

STOCK NO.	BORE + .001 - .000	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	FLANGE DIA.	HUB DIA.	SET SCREW ± .03
TP7E3W4-15	.187	15	.382	.362	.55	.44	#6-32
TP7P3W4-20	.187	20	.509	.489	.68	.50	#6-32
TP7P3W4-21		21	.535	.515	.70		
TP7P3W4-22		22	.560	.540	.73		
TP7P3W4-24		24	.611	.591	.78		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	1/4"	10% Glass Filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB7 series

STOCK NO.	BORE + .001 - .000	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	FLANGE DIA.	HUB DIA.	SET SCREW ± .03
TP7E4W4-16	.250	16	.407	.387	.58	.44	#8-32
TP7E4W4-18	.250	18	.458	.438	.58	.50	#8-32
TP7P4W4-26	.250	26	.662	.642	.83	.69	#8-32
TP7P4W4-28		28	.713	.693	.88		
TP7P4W4-30		30	.764	.744	.93		
TP7P4W4-32		32	.815	.795	.98		
TP7P4W4-34		34	.866	.846	1.04		
TP7P4W4-36		36	.917	.897	1.09		
TP7P4W4-38		38	.968	.948	1.14		
TP7P4W4-40		40	1.019	.999	1.19		
TP7P4W4-42		42	1.070	1.050	1.24		
TP7P4W4-44		44	1.120	1.100	1.29		
TP7P4W4-46		46	1.171	1.151	1.34		
TP7P4W4-48		48	1.222	1.202	1.39		
TP7P4W4-50		50	1.273	1.253	1.44		
TP7P4W4-51		51	1.299	1.279	1.48		
TP7P4W4-60		60	1.528	1.508	1.70		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	5/16"	10% Glass Filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB7 series



STOCK NO.	BORE + .001 - .000	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	FLANGE DIA.	HUB DIA.	SET SCREW ± .03
TP7P5W4-70	.313	70	1.783	1.763	1.95	.69	#10-32
TP7P5W4-72		72	1.833	1.813	2.00		
TP7P5W4-80		80	2.037	2.017	2.21		
TP7P5W4-90		90	2.292	2.272	2.46		
TP7P5W4-100		100	2.546	2.526	2.71		
TP7P5W4-110		110	2.801	2.781	2.97		
TP7P5W4-120		120	3.056	3.036	3.22		

10 - 18 Grooves - O.D. Tolerance +.003/- .001 71 - 120 Grooves - O.D. Tolerance +.005/- .001
25 - 70 Grooves - O.D. Tolerance +.004/- .001

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	3/32"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

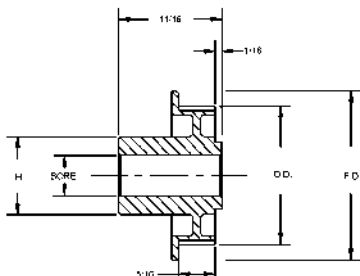
STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L2DU4-10	10	.235	.255	.42		
TP7L2DU4-11	11	.260	.280	.45	.094	7/16
TP7L2DU4-12	12	.286	.306	.47		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	1/8"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L2U4-14	14	.337	.357	.53		
TP7L2U4-15	15	.362	.382	.55	.125	7/16
TP7L2U4-16	16	.387	.407	.58		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	3/16"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L3U4-18	18	.438	.458	.63		
TP7L3U4-20	20	.489	.590	.68		
TP7L3U4-21	21	.515	.535	.70	.187	1/2
TP7L3U4-22	22	.540	.560	.73		
TP7L3U4-24	24	.591	.611	.78		



All flanges 1/16" thick.

One or two set screws are optional.

Lexan® Material Specs:

Tensile Strength (PSI) 16,000
Compressive Strength (PSI) 16,000
Flexural Strength (PSI) 19,000
Impact (ft.-lbs./in. notch) 2.0
Water Absorption (24 hrs.)
Equilibrium 73% 0.29%

Examples of specials:

- Bores: D shaped, key slots, square or spline.
- Face widths other than standard.
- Hubless or hub diameters other than standard.
- Aluminum, brass or stainless steel inserts thru bore with pulley overmolded.
- Non-standard bores including metric bores are available upon request.

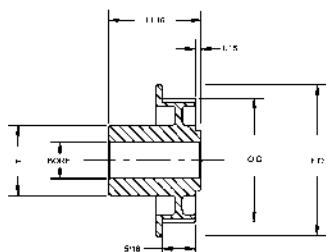
TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	1/4"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L4U4-26	26	.642	.662	.83	.250	11/16
TP7L4U4-28	28	.693	.713	.88		
TP7L4U4-30	30	.744	.764	.93		
TP7L4U4-32	32	.795	.815	.98		
TP7L4U4-36	36	.897	.917	1.09		
TP7L4U4-40	40	.999	1.019	1.19		
TP7L4U4-42	42	1.050	1.070	1.24		
TP7L4U4-44	44	1.100	1.120	1.29		
TP7L4U4-48	48	1.202	1.222	1.39		
TP7L4U4-50	50	1.253	1.273	1.44		
TP7L4U4-60	60	1.508	1.528	1.70		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Single Flange Pin Hub	1/8" to 1/4"	5/16"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L5U4-65	65	1.635	1.655	1.82	.313	11/16
TP7L5U4-72	72	1.813	1.833	2.00		
TP7L5U4-80	80	2.017	2.037	2.21		
TP7L5U4-90	90	2.272	2.292	2.46		
TP7L5U4-100	100	2.526	2.546	2.71		
TP7L5U4-110	110	2.781	2.801	2.97		
TP7L5U4-120	120	3.036	3.056	3.22		
TP7L5U4-130	130	3.290	3.310	3.48		



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	3/32"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

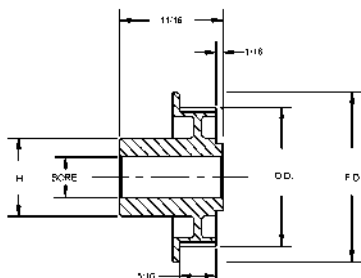
STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7LDW4-10	10	.235	.255	.42		
TP7LDW4-11	11	.260	.280	.45	.094	7/16
TP7LDW4-12	12	.286	.306	.47		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	1/8"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L2W4-14	14	.337	.357	.53		
TP7L2W4-15	15	.362	.382	.55	.125	7/16
TP7L2W4-16	16	.387	.407	.58		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	3/16"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L3W4-18	18	.438	.458	.63		
TP7L3W4-20	20	.489	.590	.68		
TP7L3W4-21	21	.515	.535	.70	.188	1/2
TP7L3W4-22	22	.540	.560	.73		
TP7L3W4-24	24	.591	.611	.78		



All flanges 1/16" thick.

One or two set screws are optional.

Lexan® Material Specs:

Tensile Strength (PSI) 16,000
Compressive Strength (PSI) 16,000
Flexural Strength (PSI) 19,000
Impact (ft.-lbs./in. notch) 2.0
Water Absorption (24 hrs.)
Equilibrium 73% 0.29%

Examples of specials:

- Bores: D shaped, key slots, square or spline.
- Face widths other than standard.
- Hubless or hub diameters other than standard.
- Aluminum, brass or stainless steel inserts thru bore with pulley overmolded.
- Non-standard bores including metric bores are available upon request.

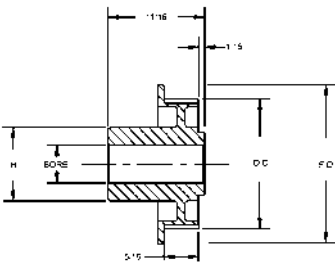
TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	1/4"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L4W4-26	26	.642	.662	.83	.250	11/16
TP7L4W4-28	28	.693	.713	.88		
TP7L4W4-30	30	.744	.764	.93		
TP7L4W4-32	32	.795	.815	.98		
TP7L4W4-36	36	.897	.917	1.09		
TP7L4W4-40	40	.999	1.019	1.19		
TP7L4W4-42	42	1.050	1.070	1.24		
TP7L4W4-44	44	1.100	1.120	1.29		
TP7L4W4-48	48	1.202	1.222	1.39		
TP7L4W4-50	50	1.253	1.273	1.44		
TP7L4W4-60	60	1.508	1.528	1.70		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8" to 1/4"	5/16"	Polycarbonate Lexan® with Fiberglass Reinforcement 94 V-O UL Rated	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	OUTSIDE DIA.	PITCH DIA.	FLANGE DIA.	BORE +.001 -.000	HUB DIA.
TP7L5W4-65	65	1.635	1.655	1.82	.313	11/16
TP7L5W4-72	72	1.813	1.833	2.00		
TP7L5W4-80	80	2.017	2.037	2.21		
TP7L5W4-90	90	2.272	2.292	2.46		
TP7L5W4-100	100	2.526	2.546	2.71		
TP7L5W4-110	110	2.781	2.801	2.97		
TP7L5W4-120	120	3.036	3.056	3.22		
TP7L5W4-130	130	3.290	3.310	3.48		



All flanges 1/16" thick.

One or two set screws are optional.

Lexan® Material Specs:

Tensile Strength (PSI) 16,000
Compressive Strength (PSI) 16,000
Flexural Strength (PSI) 19,000
Impact (ft.-lbs./in. notch) 2.0
Water Absorption (24 hrs.)
Equilibrium 73% 0.29%

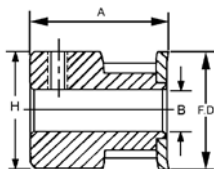
Examples of specials:

- Bores: D shaped, key slots, square or spline.
- Face widths other than standard.
- Hubless or hub diameters other than standard.
- Aluminum, brass or stainless steel inserts thru bore with pulley overmolded.
- Non-standard bores including metric bores are available upon request.

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8"	1/8"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	F.D ±.016	A ±.016	H ±.010	B +.001/- .000
TP7A2W2-10	10	.255	.235	.425		.425	
TP7A2W2-11	11	.280	.260	.450		.450	
TP7A2W2-12	12	.306	.286	.480	.436	.480	.125
TP7A2W2-14	14	.357	.337	.530		.530	

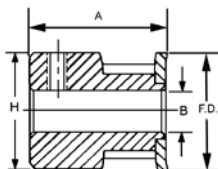


Other numbers of grooves, bores or hub styles available on request.



CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8"	3/16"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	F.D ±.016	A ±.016	H ±.010	B +.001/- .000
TP7A3W2-15	15	.382	.362	.555		.555	
TP7A3W2-16	16	.407	.387	.580	.436	.580	.188



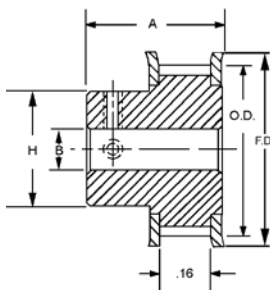
Other numbers of grooves, bores or hub styles available on request.



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8"	3/16"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

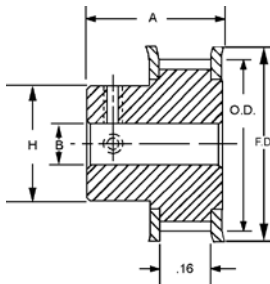
STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	F.D ±.016	A ±.016	H ±.010	B +.001/- .000
TP7A3W2-18	18	.458	.438	.635	.484	.312	.188
TP7A3W2-20	20	.509	.489	.685		.364	
TP7A3W2-21	21	.535	.515	.710		.390	
TP7A3W2-22	22	.560	.540	.740		.390	



Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/8"	1/4"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	F.D ±.016	A ±.016	H ±.010	B +.001/- .000
TP7A4W2-24	24	.611	.591	.790	.515	.442	.250
TP7A4W2-28	28	.713	.693	.895		.494	
TP7A4W2-30	30	.764	.744	.945		.546	
TP7A4W2-32	32	.815	.795	1.000		.598	
TP7A4W2-36	36	.917	.897	1.105	.531	.676	
TP7A4W2-40	40	1.019	.999	1.210		.754	
TP7A4W2-42	42	1.070	1.050	1.260		.806	
TP7A4W2-44	44	1.120	1.100	1.315		.858	
TP7A4W2-48	48	1.122	1.202	1.420		.936	
TP7A4W2-60	60	1.528	1.508	1.730		1.222	

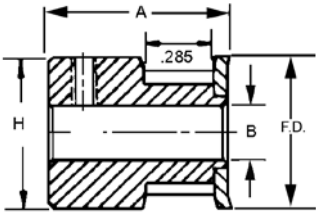


Other numbers of grooves, bores or hub styles available on request.

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/4"	1/8"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

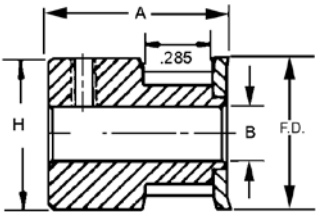
STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	F.D ±.016	A ±.016	H ±.010	B +.001/- .000
TP7A2W4-10	10	.255	.235	.425		.425	
TP7A2W4-11	11	.280	.260	.450		.450	
TP7A2W4-12	12	.306	.286	.480	.565	.480	.125
TP7A2W4-14	14	.357	.337	.530		.530	



Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/4"	3/16"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	F.D ±.016	A ±.016	H ±.010	B +.001/- .000
TP7A3W4-15	15	.382	.362	.555		.555	
TP7A3W4-16	16	.407	.387	.580	.565	.580	.188

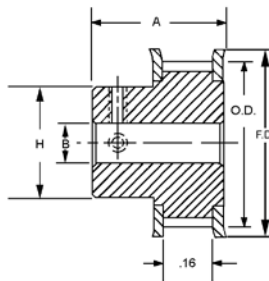


Other numbers of grooves, bores or hub styles available on request.

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/4"	3/16"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

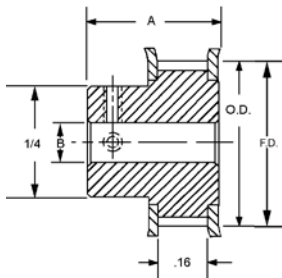
STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	F.D ±.016	A ±.016	H ±.010	B +.001/- .000
TP7A3W4-18	18	.458	.438	.635	.625	.312	.188
TP7A3W4-20	20	.509	.489	.685		.364	
TP7A3W4-21	21	.535	.515	.710		.390	
TP7A3W4-22	22	.560	.540	.740		.390	



Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.080 (MXL)	Double Flange Pin Hub	1/4"	1/4"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	F.D ±.016	A ±.016	H ±.010	B +.001/- .000
TP7A4W4-24	24	.611	.591	.790	.687	.442	.250
TP7A4W4-28	28	.713	.693	.895		.494	
TP7A4W4-30	30	.764	.744	.945		.546	
TP7A4W4-32	32	.815	.795	1.000		.598	
TP7A4W4-36	36	.917	.897	1.105	.718	.676	
TP7A4W4-40	40	1.019	.999	1.210		.754	
TP7A4W4-42	42	1.070	1.050	1.260		.806	
TP7A4W4-44	44	1.120	1.100	1.315		.858	
TP7A4W4-48	48	1.222	1.202	1.420		.936	
TP7A4W4-50	50	1.273	1.253	1.470		.968	

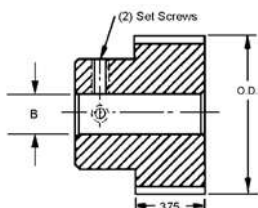


Other numbers of grooves, bores or hub styles available on request.

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	No Flange Pin Hub	1/4"	1/4"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

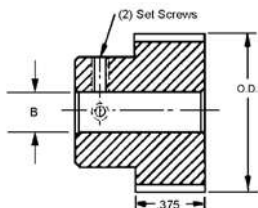
STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	A ±.016	H ±.010	B +.001/- .000
TP7A4H4-60	60	1.528	1.508	.750	1.148	.250
TP7A4H4-72	72	1.833	1.813		1.195	



Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	No Flange Pin Hub	1/4"	5/16"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

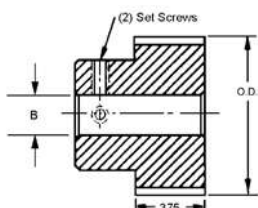
STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	A ±.016	H ±.010	B +.001/- .000
TP7A5H4-80	80	2.037	2.017	.750	1.500	.313
TP7A5H4-90	90	2.292	2.272			
TP7A5H4-100	100	2.546	2.526			



Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.080 (MXL)	No Flange Pin Hub	1/4"	3/8"	Aluminum Alloy Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB7 series.

STOCK NO.	NO. OF GROOVES	PITCH DIA.	OUTSIDE DIA.	A ±.016	H ±.010	B +.001/- .000
TP7A6H4-120	120	3.056	3.036	.750	1.500	.375



Other numbers of grooves, bores or hub styles available on request.

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	Single Flange Pin Hub	1/4"	3/32"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8EDU4-10	10	.246	.260	.43		
TP8EDU4-11	11	.272	.286	.46	.094	7/16
TP8EDU4-12	12	.298	.312	.49		

No set screws. One or two set screws are optional at an additional charge.

Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	Single Flange Pin Hub	1/4"	1/8"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8E2U4-14	14	.350	.364	.54	.125	7/16
TP8E2U4-15	15	.376	.390	.57		7/16

No set screws. One or two set screws are optional at an additional charge.

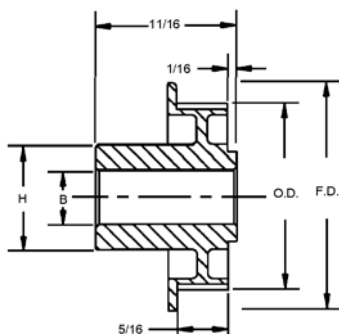
Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	Single Flange Pin Hub	1/4"	3/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8E3U4-18	18	.454	.468	.65		
TP8E3U4-19	19	.480	.494	.68		
TP8E3U4-20	20	.506	.520	.70	.188	1/2
TP8E3U4-21	21	.531	.546	.74		
TP8E3U4-24	24	.610	.624	.80		

No set screws. One or two set screws are optional at an additional charge.

Other numbers of grooves, bores or hub styles available on request.



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	Single Flange Pin Hub	1/4"	1/4"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8E4U4-25	25	.636	.650	.84	.250	1/2
TP8E4U4-28	28	.714	.728	.91		
TP8E4U4-30	30	.766	.780	.96		
TP8E4U4-32	32	.818	.832	1.01		
TP8E4U4-34	34	.870	.884	1.06		
TP8E4U4-36	36	.922	.936	1.11	.250	11/16
TP8E4U4-38	38	.974	.988	1.16		
TP8E4U4-40	40	1.026	1.040	1.22		
TP8E4U4-42	42	1.078	1.092	1.27		
TP8E4U4-44	44	1.130	1.144	1.32		
TP8E4U4-46	46	1.182	1.196	1.37		
TP8E4U4-48	48	1.234	1.248	1.43		
TP8E4U4-50	50	1.286	1.300	1.48		
TP8E4U4-51	51	1.312	1.326	1.50		
TP8E4U4-54	54	1.390	1.404	1.58		
TP8E4U4-60	60	1.546	1.560	1.73		
TP8E4U4-70	70	1.806	1.820	2.00		

No set screws. One or two set screws are optional at an additional charge.

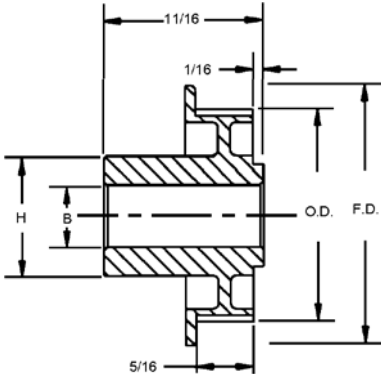
Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	Single Flange Pin Hub	1/4"	5/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8E5U4-72	72	1.858	1.872	2.04	.313	11/16
TP8E5U4-75	75	1.936	1.950	2.13		
TP8E5U4-80	80	1.066	2.080	2.26		
TP8E5U4-84	84	2.170	2.184	2.36		
TP8E5U4-90	90	2.326	2.340	2.52		
TP8E5U4-96	96	2.482	2.496	2.67		
TP8E5U4-97	97	2.508	2.522	2.71		
TP8E5U4-98	98	2.534	2.548	2.72		
TP8E5U4-99	99	2.560	2.574	2.77		
TP8E5U4-100	100	2.586	2.600	2.78		
TP8E5U4-102	102	2.638	2.652	2.83		
TP8E5U4-110	110	2.846	2.846	3.04		
TP8E5U4-120	120	3.106	3.106	3.37		

No set screws. One or two set screws are optional at an additional charge.

Other numbers of grooves, bores or hub styles available on request.



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	Double Flange Pin Hub	1/4"	3/32"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8EDW4-10	10	.246	.260	.43		
TP8EDW4-11	11	.272	.286	.46	.094	7/16
TP8EDW4-12	12	.298	.312	.49		

No set screws. One or two set screws are optional at an additional charge.

Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	Double Flange Pin Hub	1/4"	1/8"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8E2W4-14	14	.350	.364	.54	.125	7/16
TP8E2W4-15	15	.376	.390	.57		

No set screws. One or two set screws are optional at an additional charge.

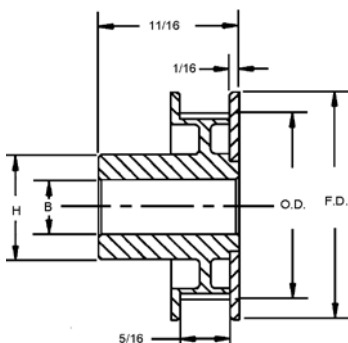
Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL)	Double Flange Pin Hub	1/4"	3/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8E3W4-18	18	.454	.468	.65		
TP8E3W4-19	19	.480	.494	.68		
TP8E3W4-20	20	.506	.520	.70	.188	1/2
TP8E3W4-21	21	.531	.546	.74		
TP8E3W4-24	24	.610	.624	.80		

No set screws. One or two set screws are optional at an additional charge.

Other numbers of grooves, bores or hub styles available on request.



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.0816 (XXL)	Double Flange Pin Hub	1/4"	1/4"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8E4W4-25	25	.636	.650	.84	.250	1/2
TP8E4W4-28	28	.714	.728	.91		
TP8E4W4-30	30	.766	.780	.96		
TP8E4W4-32	32	.818	.832	1.01		
TP8E4W4-34	34	.870	.884	1.06		
TP8E4W4-36	36	.922	.936	1.11		
TP8E4W4-38	38	.974	.988	1.16		11/16
TP8E4W4-40	40	1.026	1.040	1.22		
TP8E4W4-42	42	1.078	1.092	1.27		
TP8E4W4-44	44	1.130	1.144	1.32		
TP8E4W4-46	46	1.182	1.196	1.37		
TP8E4W4-48	48	1.234	1.248	1.43		
TP8E4W4-50	50	1.286	1.300	1.48		
TP8E4W4-51	51	1.312	1.326	1.50		
TP8E4W4-54	54	1.390	1.404	1.58		
TP8E4W4-60	60	1.546	1.560	1.73		
TP8E4W4-70	70	1.806	1.820	2.00		

No set screws. One or two set screws are optional at an additional charge.

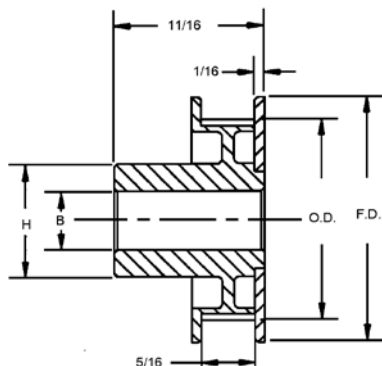
Other numbers of grooves, bores or hub styles available on request.

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.0816 (XXL)	Double Flange Pin Hub	1/4"	5/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB40 series.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001/- .002	H
TP8E5W4-72	72	1.858	1.872	2.04	.313	11/16
TP8E5W4-75	75	1.936	1.950	2.13		
TP8E5W4-80	80	1.066	2.080	2.26		
TP8E5W4-84	84	2.170	2.184	2.36		
TP8E5W4-90	90	2.326	2.340	2.52		
TP8E5W4-96	96	2.482	2.496	2.67		
TP8E5W4-97	97	2.508	2.522	2.71		
TP8E5W4-98	98	2.534	2.548	2.72		
TP8E5W4-99	99	2.560	2.574	2.77		
TP8E5W4-100	100	2.586	2.600	2.78		
TP8E5W4-102	102	2.638	2.652	2.83		
TP8E5W4-110	110	2.846	2.846	3.04		
TP8E5W4-120	120	3.106	3.106	3.37		

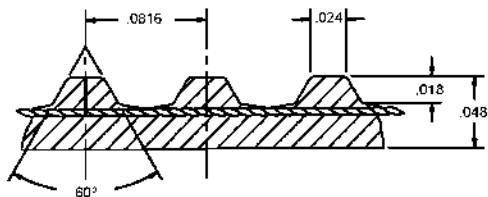
No set screws. One or two set screws are optional at an additional charge.

Other numbers of grooves, bores or hub styles available on request.



TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.0816 (XXL)	1/8"	Polyurethane Elastomer with a Polyester Cord Construction Urethane (Black or Orange)	Max-M-Drive®	Operates with TP8 Series



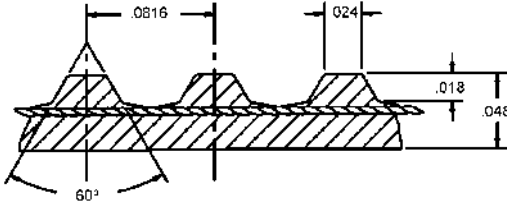
STOCK NO.	LENGTH (Ref.)	STOCK NO.	LENGTH (Ref.)	STOCK NO.	LENGTH (Ref.)
TB40UP2-24	1.958	TB40UP2-116	9.466	TB40UP2-214	17.462
TB40UP2-30	2.448	TB40UP2-118	9.629	TB40UP2-215	17.544
TB40UP2-33	2.693	TB40UP2-119	9.710	TB40UP2-220	17.952
TB40UP2-35	2.856	TB40UP2-120	9.792	TB40UP2-225	18.360
TB40UP2-40	3.264	TB40UP2-122	9.955	TB40UP2-230	18.768
TB40UP2-44	3.590	TB40UP2-123	10.037	TB40UP2-235	19.176
TB40UP2-45	3.672	TB40UP2-125	10.200	TB40UP2-240	19.584
TB40UP2-48	3.917	TB40UP2-130	10.608	TB40UP2-245	19.992
TB40UP2-50	4.080	TB40UP2-131	10.690	TB40UP2-250	20.400
TB40UP2-51	4.162	TB40UP2-132	10.771	TB40UP2-252	20.563
TB40UP2-52	4.243	TB40UP2-135	11.016	TB40UP2-255	20.808
TB40UP2-53	4.325	TB40UP2-139	11.342	TB40UP2-257	20.971
TB40UP2-55	4.488	TB40UP2-140	11.424	TB40UP2-258	21.053
TB40UP2-56	4.570	TB40UP2-143	11.669	TB40UP2-260	21.216
TB40UP2-57	4.651	TB40UP2-144	11.750	TB40UP2-264	21.542
TB40UP2-58	4.733	TB40UP2-145	11.832	TB40UP2-265	21.624
TB40UP2-60	4.896	TB40UP2-149	12.158	TB40UP2-270	22.032
TB40UP2-61	4.976	TB40UP2-150	12.240	TB40UP2-275	22.440
TB40UP2-64	5.222	TB40UP2-151	12.322	TB40UP2-280	22.848
TB40UP2-65	5.304	TB40UP2-152	12.403	TB40UP2-281	22.929
TB40UP2-69	5.630	TB40UP2-153	12.485	TB40UP2-285	23.256
TB40UP2-70	5.712	TB40UP2-154	12.666	TB40UP2-290	23.664
TB40UP2-72	5.875	TB40UP2-155	12.689	TB40UP2-295	24.072
TB40UP2-73	5.957	TB40UP2-159	12.974	TB40UP2-300	24.480
TB40UP2-75	6.120	TB40UP2-160	13.056	TB40UP2-310	25.296
TB40UP2-76	6.202	TB40UP2-162	13.219	TB40UP2-320	26.112
TB40UP2-80	6.528	TB40UP2-163	13.301	TB40UP2-324	26.438
TB40UP2-81	6.610	TB40UP2-165	13.464	TB40UP2-330	26.928
TB40UP2-85	6.936	TB40UP2-170	13.872	TB40UP2-340	27.744
TB40UP2-89	7.262	TB40UP2-175	14.280	TB40UP2-350	28.560
TB40UP2-90	7.344	TB40UP2-178	14.524	TB40UP2-360	29.376
TB40UP2-94	7.670	TB40UP2-180	14.688	TB40UP2-369	30.110
TB40UP2-95	7.752	TB40UP2-185	15.096	TB40UP2-370	30.192
TB40UP2-96	7.834	TB40UP2-190	15.504	TB40UP2-380	31.008
TB40UP2-97	7.915	TB40UP2-192	15.667	TB40UP2-390	31.824
TB40UP2-98	7.997	TB40UP2-193	15.749	TB40UP2-392	31.987
TB40UP2-100	8.160	TB40UP2-195	15.912	TB40UP2-400	32.640
TB40UP2-102	8.323	TB40UP2-200	16.320	TB40UP2-423	34.517
TB40UP2-105	8.566	TB40UP2-205	16.769	TB40UP2-436	35.578
TB40UP2-110	8.976	TB40UP2-208	16.973	TB40UP2-472	38.515
TB40UP2-115	9.384	TB40UP2-210	17.136		

Breaking Strength:
50 lbs. in endless form.

Temperature Range:
-40°F to +150°F

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.0816 (XXL)	1/4"	Polyurethane Elastomer with a Polyester Cord Construction Urethane (Black or Orange)	Max-M-Drive®	Operates with TP8 Series



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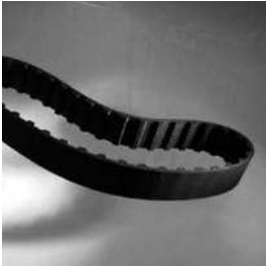
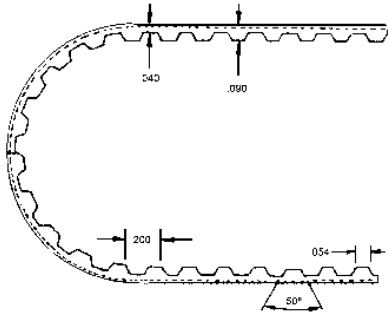
STOCK NO.	LENGTH (Ref.)	STOCK NO.	LENGTH (Ref.)	STOCK NO.	LENGTH (Ref.)
TB40UP4-24	1.958	TB40UP4-116	9.466	TB40UP4-214	17.462
TB40UP4-30	2.448	TB40UP4-118	9.629	TB40UP4-215	17.544
TB40UP4-33	2.693	TB40UP4-119	9.710	TB40UP4-220	17.952
TB40UP4-35	2.856	TB40UP4-120	9.792	TB40UP4-225	18.360
TB40UP4-40	3.264	TB40UP4-122	9.955	TB40UP4-230	18.768
TB40UP4-44	3.590	TB40UP4-123	10.037	TB40UP4-235	19.176
TB40UP4-45	3.672	TB40UP4-125	10.200	TB40UP4-240	19.584
TB40UP4-48	3.917	TB40UP4-130	10.608	TB40UP4-245	19.992
TB40UP4-50	4.080	TB40UP4-131	10.690	TB40UP4-250	20.400
TB40UP4-51	4.162	TB40UP4-132	10.771	TB40UP4-252	20.563
TB40UP4-52	4.243	TB40UP4-135	11.016	TB40UP4-255	20.808
TB40UP4-53	4.325	TB40UP4-139	11.342	TB40UP4-257	20.971
TB40UP4-55	4.488	TB40UP4-140	11.424	TB40UP4-258	21.053
TB40UP4-56	4.570	TB40UP4-143	11.669	TB40UP4-260	21.216
TB40UP4-57	4.651	TB40UP4-144	11.750	TB40UP4-264	21.542
TB40UP4-58	4.733	TB40UP4-145	11.832	TB40UP4-265	21.624
TB40UP4-60	4.896	TB40UP4-149	12.158	TB40UP4-270	22.032
TB40UP4-61	4.976	TB40UP4-150	12.240	TB40UP4-275	22.440
TB40UP4-64	5.222	TB40UP4-151	12.322	TB40UP4-280	22.848
TB40UP4-65	5.304	TB40UP4-152	12.403	TB40UP4-281	22.929
TB40UP4-69	5.630	TB40UP4-153	12.485	TB40UP4-285	23.256
TB40UP4-70	5.712	TB40UP4-154	12.666	TB40UP4-290	23.664
TB40UP4-72	5.875	TB40UP4-155	12.689	TB40UP4-295	24.072
TB40UP4-73	5.957	TB40UP4-159	12.974	TB40UP4-300	24.480
TB40UP4-75	6.120	TB40UP4-160	13.056	TB40UP4-310	25.296
TB40UP4-76	6.202	TB40UP4-162	13.219	TB40UP4-320	26.112
TB40UP4-80	6.528	TB40UP4-163	13.301	TB40UP4-324	26.438
TB40UP4-81	6.610	TB40UP4-165	13.464	TB40UP4-330	26.928
TB40UP4-85	6.936	TB40UP4-170	13.872	TB40UP4-340	27.744
TB40UP4-89	7.262	TB40UP4-175	14.280	TB40UP4-350	28.560
TB40UP4-90	7.344	TB40UP4-178	14.524	TB40UP4-360	29.376
TB40UP4-94	7.670	TB40UP4-180	14.688	TB40UP4-369	30.110
TB40UP4-95	7.752	TB40UP4-185	15.096	TB40UP4-370	30.192
TB40UP4-96	7.834	TB40UP4-190	15.504	TB40UP4-380	31.008
TB40UP4-97	7.915	TB40UP4-192	15.667	TB40UP4-390	31.824
TB40UP4-98	7.997	TB40UP4-193	15.749	TB40UP4-392	31.987
TB40UP4-100	8.160	TB40UP4-195	15.912	TB40UP4-400	32.640
TB40UP4-102	8.323	TB40UP4-200	16.320	TB40UP4-423	34.517
TB40UP4-105	8.566	TB40UP4-205	16.769	TB40UP4-436	35.578
TB40UP4-110	8.976	TB40UP4-208	16.973	TB40UP4-472	38.515
TB40UP4-115	9.384	TB40UP4-210	17.136		

Breaking Strength:
100 lbs. in endless form.

Temperature Range:
-40°F to +150°F

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.200 (XL)	1/4"	Neoprene (Black) Fiberglass Reinforced or Urethane (Black or Orange)	Max-M-Drive®	Operates with TP20 Series

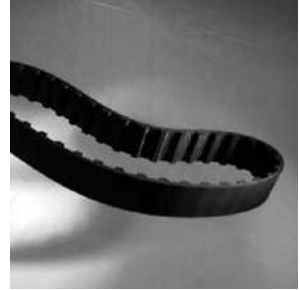
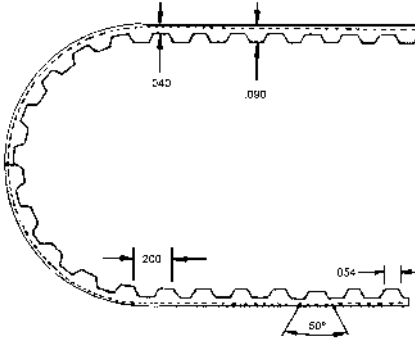


NEOPRENE	URETHANE		
STOCK NO.	STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB20EF4-25	TB20UP4-25	25	5.00
TB20EF4-30	TB20UP4-30	30	6.00
TB20EF4-35	TB20UP4-35	35	7.00
TB20EF4-40	TB20UP4-40	40	8.00
TB20EF4-45	TB20UP4-45	45	9.00
—	TB20UP4-47	47	9.40
—	TB20UP4-48	48	9.60
TB20EF4-50	TB20UP4-50	50	10.00
TB20EF4-55	TB20UP4-55	55	11.00
TB20EF4-60	TB20UP4-60	60	12.00
TB20EF4-65	TB20UP4-65	65	13.00
TB20EF4-70	TB20UP4-70	70	14.00
TB20EF4-75	TB20UP4-75	75	15.00
TB20EF4-80	TB20UP4-80	80	16.00
—	TB20UP4-83	83	16.60
TB20EF4-85	TB20UP4-85	85	17.00
TB20EF4-90	TB20UP4-90	90	18.00
TB20EF4-95	TB20UP4-95	95	19.00
TB20EF4-100	TB20UP4-100	100	20.00
—	TB20UP4-105	105	21.00
TB20EF4-110	TB20UP4-110	110	22.00
TB20EF4-115	TB20UP4-115	115	23.00
TB20EF4-120	TB20UP4-120	120	24.00
TB20EF4-125	TB20UP4-125	125	25.00
TB20EF4-130	TB20UP4-130	130	26.00
TB20EF4-135	TB20UP4-135	135	27.00
TB20EF4-140	TB20UP4-140	140	28.00
TB20EF4-145	TB20UP4-145	145	29.00
TB20EF4-150	TB20UP4-150	150	30.00
TB20EF4-155	—	155	31.00
TB20EF4-165	TB20UP4-165	165	33.00
—	TB20UP4-172	172	34.40
—	TB20UP4-175	175	35.00
—	TB20UP4-180	180	36.00
—	TB20UP4-230	230	46.00

- Large Ratios
- Allows use of small diameter pulleys
- High Speeds
- High Power Transmission
- Quiet Operation
- Wear resistant nylon facing
- Maximum Speed 10,000 RPM
- Minimum Pulley Diameter .64 (10 teeth)
- Temperature Range +185°F to -30°F

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.200 (XL)	3/8"	Neoprene (Black) Fiberglass Reinforced or Urethane (Black or Orange)	Max-M-Drive®	Operates with TP20 Series



NEOPRENE	URETHANE		
STOCK NO.	STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB20EF6-25	TB20UP6-25	25	5.00
TB20EF6-30	TB20UP6-30	30	6.00
TB20EF6-35	TB20UP6-35	35	7.00
TB20EF6-40	TB20UP6-40	40	8.00
TB20EF6-45	TB20UP6-45	45	9.00
TB20EF6-47	TB20UP6-47	47	9.40
TB20EF6-48	TB20UP6-48	48	9.60
TB20EF6-50	TB20UP6-50	50	10.00
TB20EF6-55	TB20UP6-55	55	11.00
TB20EF6-60	TB20UP6-60	60	12.00
TB20EF6-65	TB20UP6-65	65	13.00
TB20EF6-70	TB20UP6-70	70	14.00
TB20EF6-75	TB20UP6-75	75	15.00
TB20EF6-80	TB20UP6-80	80	16.00
TB20EF6-83	TB20UP6-83	83	16.60
TB20EF6-85	TB20UP6-85	85	17.00
TB20EF6-90	TB20UP6-90	90	18.00
TB20EF6-95	TB20UP6-95	95	19.00
TB20EF6-100	TB20UP6-100	100	20.00
TB20EF6-105	TB20UP6-105	105	21.00
TB20EF6-110	TB20UP6-110	110	22.00
TB20EF6-115	TB20UP6-115	115	23.00
TB20EF6-120	TB20UP6-120	120	24.00
TB20EF6-125	TB20UP6-125	125	25.00
TB20EF6-130	TB20UP6-130	130	26.00
TB20EF6-135	TB20UP6-135	135	27.00
TB20EF6-140	TB20UP6-140	140	28.00
TB20EF6-145	TB20UP6-145	145	29.00
TB20EF6-150	TB20UP6-150	150	30.00
TB20EF6-165	TB20UP6-165	165	33.00
TB20EF6-172	TB20UP6-172	172	34.40
TB20EF6-175	TB20UP6-175	175	35.00
TB20EF6-180	TB20UP6-180	180	36.00
TB20EF6-230	TB20UP6-230	230	46.00

- Large Ratios
- Allows use of small diameter pulleys
- High Speeds
- High Power Transmission
- Quiet Operation
- Wear resistant nylon facing
- Maximum Speed 10,000 RPM
- Minimum Pulley Diameter .64 (10 teeth)
- Temperature Range +185°F to -30°F

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.200 (XL)	Single Flange Pin Hub	1/4"	3/16"	10% Glass filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

O.D. Tolerance: 10 - 28 Grooves: +.003/- .001

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	HUB DIA.	F.D.	B +.001 -.000	SET SCREW
TP20P3U6-10	10	.637	.617	.69	.87	.1875	#6-32
TP20P3U6-11	11	.700	.680		.93		
TP20P3U6-12	12	.764	.744		.99		
TP20P3U6-13	13	.828	.808	.75	1.06		

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.200 (XL)	Single Flange Pin Hub	1/4"	1/4"	10% Glass filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

O.D. Tolerance:

10 - 28 Grooves: +.003/- .001
29 - 58 Grooves: +.004/- .001

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	HUB DIA.	F.D.	B +.001 -.000	SET SCREW
TP20P4U6-14	14	.891	.871	.75	1.12	.2500	#8-32
TP20P4U6-15	15	.955	.935		1.19		
TP20P4U6-16	16	1.019	.999		1.24		
TP20P4U6-17	17	1.082	1.062		1.31		
TP20P4U6-18	18	1.146	1.126		1.39		
TP20P4U6-19	19	1.210	1.190	.88	1.44		
TP20P4U6-20	20	1.273	1.253		1.51		
TP20P4U6-21	21	1.337	1.317		1.57		
TP20P4U6-22	22	1.401	1.381		1.63		
TP20P4U6-23	23	1.464	1.444		1.69		
TP20P4U6-24	24	1.528	1.508		1.76		
TP20P4U6-25	25	1.592	1.572		1.82		
TP20P4U6-26	26	1.655	1.635		1.89		
TP20P4U6-27	27	1.719	1.699		1.95		
TP20P4U6-28	28	1.783	1.763		2.02		
TP20P4U6-29	29	1.846	1.826		2.08		

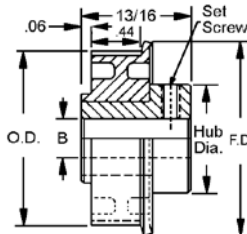
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.200 (XL)	Single Flange Pin Hub	1/4"	5/16"	10% Glass filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

O.D. Tolerance:

29 - 58 Grooves: +.004/- .001
60 - 72 Grooves: +.005/- .001

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	HUB DIA.	F.D.	B +.001 -.000	SET SCREW
TP20P5U6-30	30	1.910	1.890	.88	2.14	.3125	#10-32
TP20P5U6-31	31	1.974	1.954		2.20		
TP20P5U6-32	32	2.037	2.017		2.27		
TP20P5U6-34	34	2.165	2.145		2.40		
TP20P5U6-35	35	2.228	2.208		2.46		
TP20P5U6-36	36	2.292	2.272	.88	2.53	.3125	#10-32
TP20P5U6-37	37	2.355	2.335		2.59		
TP20P5U6-39	39	2.482	2.462		2.71		
TP20P5U6-40	40	2.546	2.526		2.78		
TP20P5U6-42	42	2.674	2.654		2.92		
TP20P5U6-44	44	2.801	2.781		3.04		
TP20P5U6-48	48	3.056	3.036		3.29		



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/4" - 3/8"	3/16"	10% Glass filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

O.D. Tolerance: 10 - 28 Grooves: +.003/- .001
+.003/- .001

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	HUB DIA.	F.D.	B +.0010 -.0000	SET SCREW	LD
TP20P3W6-10	10	.637	.617		.87			
TP20P3W6-11	11	.700	.680	.69	.93	.1875	#6-32	13/16
TP20P3W6-12	12	.764	.744		.99			
TP20P3W6-13	13	.828	.808	.75	1.06			

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/4" - 3/8"	1/4"	10% Glass filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

O.D. Tolerance:
10 - 28 Grooves: +.003/- .001
29 - 58 Grooves: +.004/- .001

Other numbers of grooves, bores or hub styles available on request.

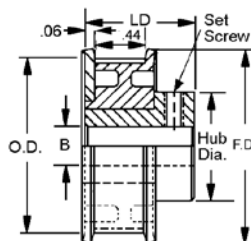
STOCK NO.	NO. OF GROOVES	P.D.	O.D.	HUB DIA.	F.D.	B +.0010 -.0000	SET SCREW	LD
TP20P4W6-14	14	.891	.871		1.12			
TP20P4W6-15	15	.955	.935		1.19			
TP20P4W6-16	16	1.019	.999		1.24			
TP20P4W6-17	17	1.082	1.062	.75	1.31			
TP20P4W6-18	18	1.146	1.126		1.39			
TP20P4W6-19	19	1.210	1.190		1.44			
TP20P4W6-20	20	1.273	1.253		1.51			
TP20P4W6-21	21	1.337	1.317		1.57			
TP20P4W6-22	22	1.401	1.381		1.63			
TP20P4W6-23	23	1.464	1.444		1.69			
TP20P4W6-24	24	1.528	1.508		1.76			
TP20P4W6-25	25	1.592	1.572	.88	1.82	.2500	#8-32	13/16
TP20P4W6-26	26	1.655	1.635		1.89			
TP20P4W6-27	27	1.719	1.699		1.95			
TP20P4W6-28	28	1.783	1.763		2.02			
TP20P4W6-29	29	1.846	1.826		2.08			

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/4" - 3/8"	5/16"	10% Glass filled Polycarbonate (Black) Hub = Aluminum	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

O.D. Tolerance:
29 - 58 Grooves: +.004/- .001
60 - 72 Grooves: +.005/- .001

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	HUB DIA.	F.D.	B +.0010 -.0000	SET SCREW	LD
TP20P5W6-30	30	1.910	1.890	.88	2.14	.3125	#10-32	13/16
TP20P5W6-31	31	1.974	1.954		2.20			
TP20P5W6-32	32	2.037	2.017		2.27			
TP20P5W6-34	34	2.165	2.145		2.40			
TP20P5W6-35	35	2.228	2.208		2.46			
TP20P5W6-36	36	2.292	2.272		2.53			
TP20P5W6-37	37	2.355	2.335	.88	2.59	.3125	#10-32	7/8
TP20P5W6-39	39	2.482	2.462		2.71			
TP20P5W6-40	40	2.546	2.526		2.78			
TP20P5W6-42	42	2.674	2.654		2.92			
TP20P5W6-44	44	2.801	2.781		3.04			
TP20P5W6-48	48	3.056	3.036		3.29			



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Single Flange Pin Hub	1/2"	3/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	H	L	W
TP20E3U6-10	10	.617	.637	.87				
TP20E3U6-11	11	.680	.700	.93	.188	1/2	1	1/2
TP20E3U6-12	12	.744	.764	.99				

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Single Flange Pin Hub	1/2"	1/4"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

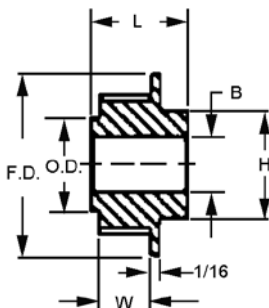
Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	H	L	W
TP20E4U6-14	14	.871	.891	1.12				
TP20E4U6-15	15	.935	.955	1.19		1/2		
TP20E4U6-16	16	.999	1.019	1.25				
TP20E4U6-17	18	1.126	1.146	1.38				
TP20E4U6-18	20	1.253	1.273	1.51	.250		1	1/2
TP20E4U6-20	21	1.317	1.337	1.57		5/8		
TP20E4U6-21	22	1.381	1.401	1.63				
TP20E4U6-22	24	1.508	1.528	1.76				
TP20E4U6-24	28	1.763	1.783	2.02				

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Single Flange Pin Hub	1/2"	5/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	H	L	W
TP20E5U6-30	30	1.890	1.910	2.14				
TP20E5U6-32	32	2.017	2.037	2.27				
TP20E5U6-36	36	2.272	2.292	2.53				
TP20E5U6-40	40	2.526	2.546	2.78	.313	11/16	1	1/2
TP20E5U6-42	42	2.654	2.674	2.91				
TP20E5U6-44	44	2.781	2.801	3.04				
TP20E5U6-48	48	3.036	3.056	3.29				



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/2"	3/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	H	L	W
TP20E3W6-10	10	.617	.637	.87	.188	1/2	1	1/2
TP20E3W6-11	11	.680	.700	.93				
TP20E3W6-12	12	.744	.764	.99				

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/2"	1/4"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

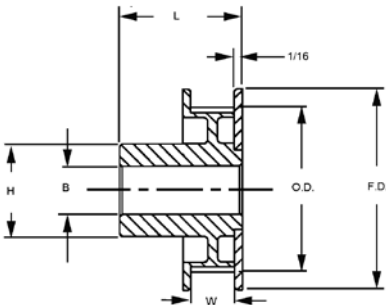
Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	H	L	W
TP20E4W6-14	14	.871	.891	1.12	.250	1/2	1	1/2
TP20E4W6-15	15	.935	.955	1.19				
TP20E4W6-16	16	.999	1.019	1.25				
TP20E4W6-17	18	1.126	1.146	1.38		5/8		
TP20E4W6-18	20	1.253	1.273	1.51				
TP20E4W6-20	21	1.317	1.337	1.57				
TP20E4W6-21	22	1.381	1.401	1.63				
TP20E4W6-22	24	1.508	1.528	1.76				
TP20E4W6-24	28	1.763	1.783	2.02				

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/2"	5/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	H	L	W
TP20E5W6-30	30	1.890	1.910	2.14	.313	11/16	1	1/2
TP20E5W6-32	32	2.017	2.037	2.27				
TP20E5W6-36	36	2.272	2.292	2.53				
TP20E5W6-40	40	2.526	2.546	2.78				
TP20E5W6-42	42	2.654	2.674	2.91				
TP20E5W6-44	44	2.781	2.801	3.04				
TP20E5W6-48	48	3.036	3.056	3.29				



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Single Flange Pin Hub	7/16"	3/16"	Lexan®	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

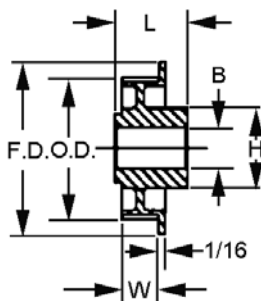
Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	W	L	H
TP20L3U6-10	10	.617	.637	.87				
TP20L3U6-11	11	.680	.700	.93				
TP20L3U6-12	12	.744	.764	.99	.188	7/16	3/16	11/16
TP20L3U6-13	13	.808	.828	1.06				

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Single Flange Pin Hub	7/16"	1/4"	Lexan®	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	W	L	H
TP20E4U6-14	14	.871	.891	1.12				
TP20E4U6-15	15	.935	.955	1.19				
TP20E4U6-16	16	.999	1.019	1.24				
TP20E4U6-17	17	1.062	1.082	1.31				
TP20E4U6-18	18	1.126	1.146	1.38				
TP20E4U6-19	19	1.190	1.210	1.44				
TP20E4U6-20	20	1.253	1.273	1.51				
TP20E4U6-21	21	1.317	1.337	1.57				
TP20E4U6-22	22	1.381	1.401	1.63				
TP20E4U6-23	23	1.444	1.464	2.69				
TP20E4U6-24	24	1.508	1.528	1.76				
TP20E4U6-25	25	1.572	1.592	1.82				
TP20E4U6-26	26	1.635	1.655	1.89				
TP20E4U6-27	27	1.699	1.719	1.95				
TP20E4U6-28	28	1.763	1.783	2.02				
TP20E4U6-29	29	1.827	1.846	2.08				



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Single Flange Pin Hub	7/16"	5/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

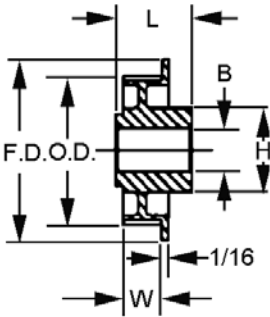
Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	W	L	H
TP20E5U6-30	30	1.890	1.910	2.14	.313	11/16	13/16	7/8
TP20E5U6-31	31	1.954	1.973	2.20				
TP20E5U6-32	32	2.017	2.037	2.27				
TP20E5U6-34	34	2.145	2.165	2.40				
TP20E5U6-35	35	2.209	2.228	2.46				
TP20E5U6-36	36	2.272	2.292	2.53				
TP20E5U6-37	37	2.336	2.355	2.59				
TP20E5U6-39	39	2.462	2.482	2.71				
TP20E5U6-40	40	2.526	2.546	2.78				
TP20E5U6-42	42	2.654	2.374	2.92				
TP20E5U6-44	44	2.781	2.801	3.04				
TP20E5U6-48	48	3.036	3.056	3.29				

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Single Flange Pin Hub	7/16"-1/2"	3/8"	Lexan®	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	W	L	H
TP20L6U6-54	54	3.418	3.438	None	.375	1/2	7/8	1"
TP20L6U6-58	58	3.672	3.692	3.92		7/16	3/16	
TP20L6U6-60	60	3.800	3.820	None		1/2	7/8	
TP20L6U6-72	72	4.564	4.584	None		1/2	7/8	
TP20L6U6-78	78	4.946	4.966	5.19		1/2	31/32	



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	7/16"	3/16"	Lexan®	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	W	L	H
TP20L3W6-10	10	.617	.637	.87				
TP20L3W6-11	11	.680	.700	.93				
TP20L3W6-12	12	.744	.764	.99	.188	7/16	3/16	11/16
TP20L3W6-13	13	.808	.828	1.06				

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	7/16"	1/4"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

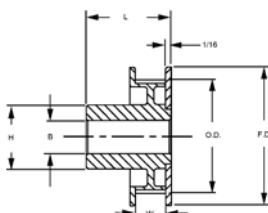
Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	W	L	H
TP20E4W6-14	14	.871	.891	1.12				
TP20E4W6-15	15	.935	.955	1.19				
TP20E4W6-16	16	.999	1.019	1.24				
TP20E4W6-17	17	1.062	1.082	1.31				
TP20E4W6-18	18	1.126	1.146	1.38				
TP20E4W6-19	19	1.190	1.210	1.44				
TP20E4W6-20	20	1.253	1.273	1.51				
TP20E4W6-21	21	1.317	1.337	1.57				
TP20E4W6-22	22	1.381	1.401	1.63				
TP20E4W6-23	23	1.444	1.464	2.69				
TP20E4W6-24	24	1.508	1.528	1.76				
TP20E4W6-25	25	1.572	1.592	1.82				
TP20E4W6-26	26	1.635	1.655	1.89				
TP20E4W6-27	27	1.699	1.719	1.95				
TP20E4W6-28	28	1.763	1.783	2.02				
TP20E4W6-29	29	1.827	1.846	2.08				

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	7/16"	5/16"	Acetal	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

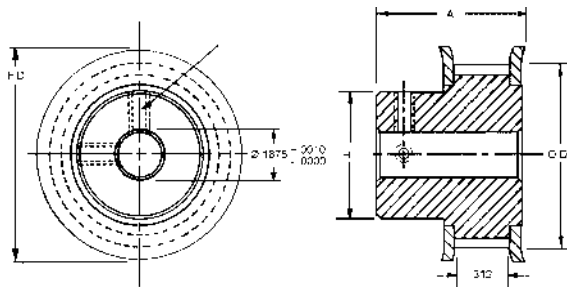
Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	O.D.	P.D.	F.D.	B +.001 -.000	W	L	H
TP20E5W6-30	30	1.890	1.910	2.14				
TP20E5W6-31	31	1.954	1.973	2.20				
TP20E5W6-32	32	2.017	2.037	2.27				
TP20E5W6-34	34	2.145	2.165	2.40				
TP20E5W6-35	35	2.209	2.228	2.46				
TP20E5W6-36	36	2.272	2.292	2.53				
TP20E5W6-37	37	2.336	2.355	2.59				
TP20E5W6-39	39	2.462	2.482	2.71				
TP20E5W6-40	40	2.526	2.546	2.78				
TP20E5W6-42	42	2.654	2.374	2.92				
TP20E5W6-44	44	2.781	2.801	3.04				
TP20E5W6-48	48	3.036	3.056	3.29				



TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/4"	3/16"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

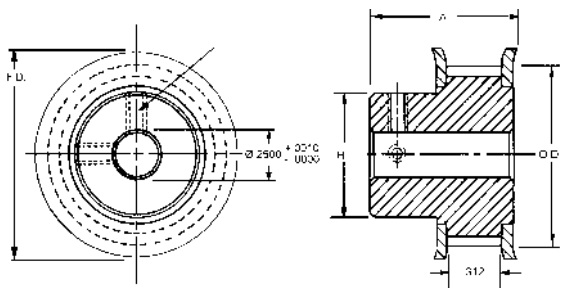


* These pulleys may contain one or two set screws.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A3W4-10	10*	.637	.617	.88	11/16	3/8
TP20A3W4-11	11*	.700	.680	.94		7/16
TP20A3W4-12	12	.764	.744	1.00		1/2

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/4"	1/4"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.



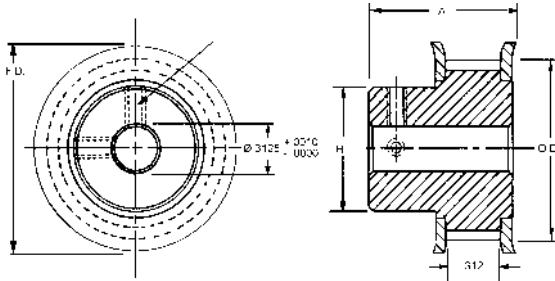
* These pulleys may contain one or two set screws.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A4W4-11	11*	.700	.680	.94	11/16	7/16
TP20A4W4-12	12	.764	.744	1.00		1/2
TP20A4W4-13	13	.828	.808	1.06		9/16
TP20A4W4-14	14	.891	.871	1.09		9/16
TP20A4W4-15	15	.955	.935	1.19		5/8
TP20A4W4-16	16	1.019	.999	1.25	3/4	11/16
TP20A4W4-18	18	1.146	1.126	1.38		13/16
TP20A4W4-20	20	1.273	1.253	1.50		15/16
TP20A4W4-21	21	1.337	1.317	1.56		1
TP20A4W4-22	22	1.401	1.381	1.63		1
TP20A4W4-24	24	1.528	1.508	1.75	25/32	1-1/16
TP20A4W4-26	26	1.655	1.635	1.88		1-3/16
TP20A4W4-28	28	1.783	1.763	2.00		1-3/16
TP20A4W4-30	30	1.910	1.890	2.13		1-5/16

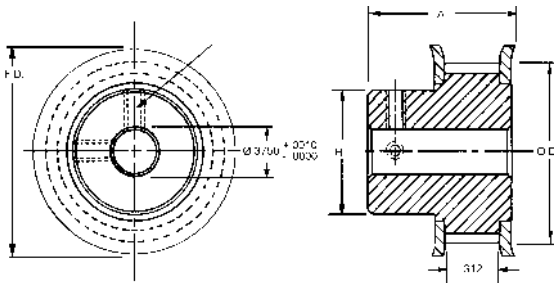
TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/4"	5/16"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.



STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A5W4-14	14	.891	.871	1.09	11/16	9/16
TP20A5W4-15	15	.955	.935	1.19		5/8
TP20A5W4-16	16	1.019	.999	1.25		11/16
TP20A5W4-18	18	1.146	1.126	1.38		13/16
TP20A5W4-20	20	1.273	1.253	1.50	3/4	15/16
TP20A5W4-21	21	1.337	1.317	1.56		1
TP20A5W4-24	24	1.528	1.508	1.75		1-1/16

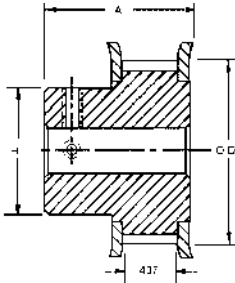
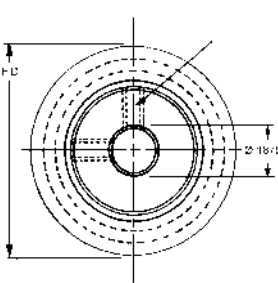
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	1/4"	3/8"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.



STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A6W4-22	22	1.401	1.381	1.63	25/32	1
TP20A6W4-24	24	1.528	1.508	1.75		1-1/16
TP20A6W4-26	26	1.655	1.635	1.88		1-3/16
TP20A6W4-28	28	1.783	1.763	2.00		1-3/16
TP20A6W4-30	30	1.910	1.890	2.13		1-5/16

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	3/8"	3/16"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.

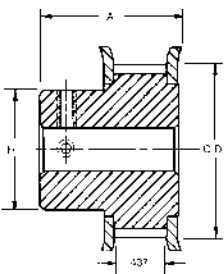
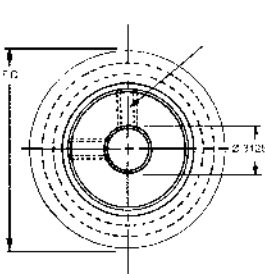


* These pulleys may contain one or two set screws.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A3W6-10	10*	.637	.617	.88	13/16	7/16
TP20A3W6-11	11*	.700	.680	.94		1/2
TP20A3W6-12	12	.764	.744	1.00		1/2

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	3/8"	1/4"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.



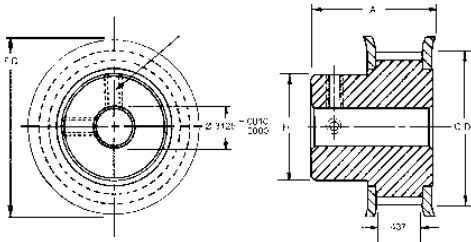
* These pulleys may contain one or two set screws.

Other numbers of grooves, bores or hub styles available on request.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A4W6-10*	10	.637	.617	.88	13/16	7/16
TP20A4W6-11*	11	.700	.680	.91		1/2
TP20A4W6-12	12	.764	.744	1.00		1/2
TP20A4W6-13	13	.828	.808	1.06		9/16
TP20A4W6-14	14	.891	.871	1.09		9/16
TP20A4W6-15	15	.955	.935	1.19		5/8
TP20A4W6-16	16	1.019	.999	1.25		11/16
TP20A4W6-17	17	1.082	1.062	1.31		3/4
TP20A4W6-18	18	1.146	1.126	1.38		13/16
TP20A4W6-19	19	1.210	1.190	1.44		13/16
TP20A4W6-20	20	1.273	1.253	1.50	7/8	15/16
TP20A4W6-21	21	1.337	1.317	1.56		1
TP20A4W6-22	22	1.401	1.381	1.63		1
TP20A4W6-23	23	1.464	1.444	1.69		1-1/16
TP20A4W6-24	24	1.528	1.508	1.75		1-1/16
TP20A4W6-25	25	1.592	1.572	1.81		1-3/32
TP20A4W6-26	26	1.655	1.635	1.88		1-3/16
TP20A4W6-28	28	1.783	1.763	2.00		1-3/16
TP20A4W6-30	30	1.910	1.890	2.13		1-5/16
					29/32	

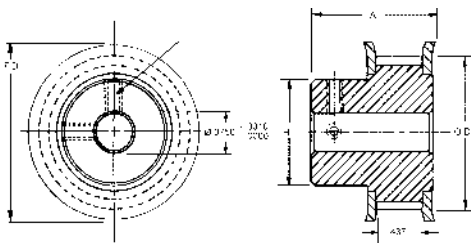
TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.200 (XL)	Double Flange Pin Hub	3/8"	5/16"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.



STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A5W6-12	12	.764	.744	1.00	13/16	1/2
TP20A5W6-14	14	.891	.871	1.09		9/16
TP20A5W6-15	15	.955	.935	1.19		5/8
TP20A5W6-16	16	1.019	.999	1.25		11/16
TP20A5W6-18	18	1.146	1.126	1.38		13/16
TP20A5W6-20	20	1.273	1.253	1.50	7/8	15/16
TP20A5W6-21	21	1.337	1.317	1.56		1
TP20A5W6-22	22	1.401	1.381	1.63	29/32	1
TP20A5W6-24	24	1.528	1.508	1.75		1-1/16
TP20A5W6-25	25	1.592	1.572	1.81		1-3/32
TP20A5W6-26	26	1.655	1.635	1.88		1-3/16
TP20A5W6-28	28	1.783	1.763	2.00		1-3/16
TP20A5W6-30	30	1.910	1.890	2.13		1-5/16
TP20A5W6-32	32	2.037	2.017	2.25		1-7/16

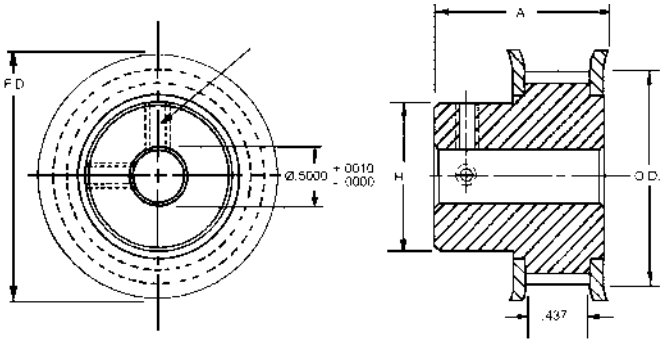
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S ® NAME	BELT
.200 (XL)	Double Flange Pin Hub	3/8"	3/8"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.



STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A6W6-16	16	1.019	.999	1.25	13/16	11/16
TP20A6W6-18	18	1.146	1.126	1.38		13/16
TP20A6W6-20	20	1.273	1.253	1.50		15/16
TP20A6W6-21	21	1.337	1.317	1.56	7/8	1
TP20A6W6-22	22	1.401	1.381	1.63		1
TP20A6W6-24	24	1.528	1.508	1.75	29/32	1-1/16
TP20A6W6-25	25	1.592	1.572	1.81		1-3/32
TP20A6W6-26	26	1.655	1.635	1.88		1-3/16
TP20A6W6-28	28	1.783	1.763	2.00		1-3/16
TP20A6W6-30	30	1.910	1.890	2.13		1-5/16
TP20A6W6-32	32	2.037	2.017	2.25		1-7/16

TIMING PULLEYS

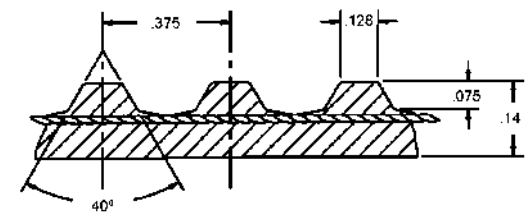
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.200 (XL)	Double Flange Pin Hub	3/8"	1/2"	Aluminum Clear Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB20 series.



STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	A	H
TP20A8W6-18	18	1.146	1.126	1.38	13/16	13/16
TP20A8W6-20	20	1.273	1.253	1.50	7/8	15/16
TP20A8W6-24	24	1.528	1.508	1.75	29/32	1-1/16
TP20A8W6-30	30	1.910	1.890	2.13		1-5/16

TIMING BELTS

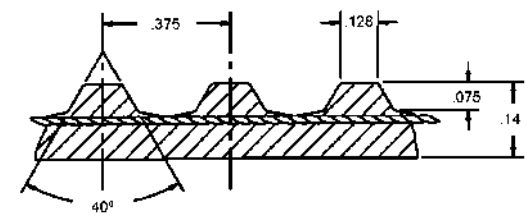
CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.375 (L)	1/2"	Nylon covered fiber reinforced neoprene	Max-M-Drive®	Operates with TP37 Series



• Temp Range 30°F To 185°F

STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB37EF8-33	33	12.375
TB37EF8-40	40	15.000
TB37EF8-50	50	18.750
TB37EF8-56	56	21.000
TB37EF8-60	60	22.500
TB37EF8-64	64	24.000
TB37EF8-68	68	25.500
TB37EF8-72	72	27.000
TB37EF8-76	76	28.500
TB37EF8-80	80	30.000
TB37EF8-86	86	32.250
TB37EF8-92	92	34.500
TB37EF8-98	98	36.750
TB37EF8-104	104	39.000
TB37EF8-112	112	42.000
TB37EF8-120	120	45.000
TB37EF8-128	128	48.000
TB37EF8-136	136	51.000
TB37EF8-144	144	54.000
TB37EF8-160	160	60.000

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.375 (L)	3/4"	Nylon covered fiber reinforced neoprene	Max-M-Drive®	Operates with TP37 Series

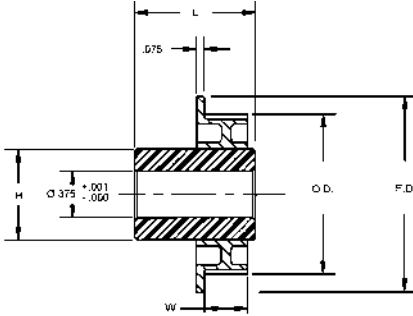


• Temp Range 30°F To 185°F

STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB37EF12-33	33	12.375
TB37EF12-40	40	15.000
TB37EF12-50	50	18.750
TB37EF12-56	56	21.000
TB37EF12-60	60	22.500
TB37EF12-64	64	24.000
TB37EF12-68	68	25.500
TB37EF12-72	72	27.000
TB37EF12-76	76	28.500
TB37EF12-80	80	30.000
TB37EF12-86	86	32.250
TB37EF12-92	92	34.500
TB37EF12-98	98	36.750
TB37EF12-104	104	39.000
TB37EF12-112	112	42.000
TB37EF12-120	120	45.000
TB37EF12-128	128	48.000
TB37EF12-136	136	51.000
TB37EF12-144	144	54.000
TB37EF12-160	160	60.000

TIMING PULLEYS

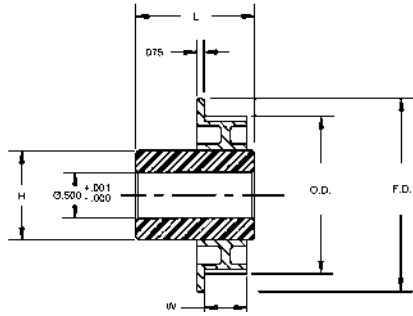
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.375 (L)	Single Flange Pin Hub	1/2" & 3/4"	3/8"	Polycarbonate Lexan® with a fiberglass reinforced Aluminum Hub	Max-M-Drive®	Operates with Max-M-Drive® TB37 series.



All core pulleys have 1/16" thick ribs, reinforcement.

STOCK NO.	NO. OF GROOVES	BELT WIDTH	O.D.	P.D.	F.D.	BORE	W	L	H
TP37L6U8-10	10	1/2	1.164	1.194	1.44	3/8	9/16	1.21	7/8
TP37L6U12-10	10	3/4	1.164	1.194	1.44		13/16	1.46	
TP37L6U8-12	12	1/2	1.402	1.432	1.69		9/16	1.21	
TP37L6U12-12	12	3/4	1.402	1.432	1.69		13/16	1.46	

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.375 (L)	Single Flange Pin Hub	1/2" & 3/4"	1/2"	Polycarbonate Lexan® with a fiberglass reinforced Aluminum Hub	Max-M-Drive®	Operates with Max-M-Drive® TB37 series.

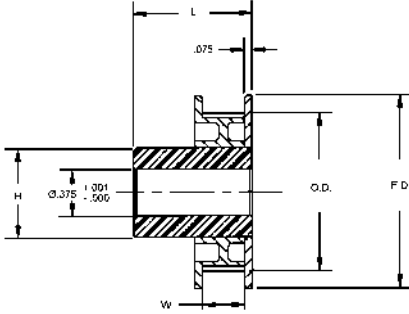


All core pulleys have 1/16" thick ribs, reinforcement.

STOCK NO.	NO. OF GROOVES	BELT WIDTH	O.D.	P.D.	F.D.	BORE	W	L	H
TP37L8U8-16	16	1/2	1.880	1.910	2.12	1/2	9/16	1.21	1-1/8
TP37L8U12-16	16	3/4	1.880	1.910	2.12		13/16	1.46	
TP37L8U8-18	18	1/2	2.119	2.149	2.37		9/16	1.21	
TP37L8U12-18	18	3/4	2.119	2.149	2.37		13/16	1.46	
TP37L8U8-20	20	1/2	2.357	2.387	2.62		9/16	1.21	
TP37L8U12-20	20	3/4	2.357	2.387	2.62		13/16	1.46	
TP37L8U8-24	24	1/2	2.835	2.865	3.12		9/16	1.21	
TP37L8U12-24	24	3/4	2.835	2.865	3.12		13/16	1.46	
TP37L8U8-36	36	1/2	4.267	4.297	4.53		9/16	1.21	
TP37L8U12-36	36	3/4	4.267	4.297	4.53		13/16	1.46	
TP37L8U8-40	40	1/2	4.745	4.775	5.00		9/16	1.21	
TP37L8U12-40	40	3/4	4.745	4.775	5.09		13/16	1.46	

TIMING PULLEYS

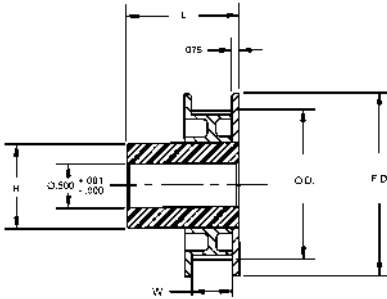
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.375 (L)	Double Flange Pin Hub	1/2" & 3/4"	3/8"	Polycarbonate Lexan® with a fiberglass reinforced Aluminum Hub	Max-M-Drive®	Operates with Max-M-Drive® TB37 series.



All core pulleys have 1/16" thick ribs, reinforcement.

STOCK NO.	NO. OF GROOVES	BELT WIDTH	O.D.	P.D.	F.D.	BORE	W	L	H
TP37L6W8-10	10	1/2	1.164	1.194	1.44	3/8	9/16	1.21	7/8
TP37L6W12-10	10	3/4	1.164	1.194	1.44		13/16	1.46	
TP37L6W8-12	12	1/2	1.402	1.432	1.69		9/16	1.21	
TP37L6W12-12	12	3/4	1.402	1.432	1.69		13/16	1.46	

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.375 (L)	Double Flange Pin Hub	1/2" & 3/4"	1/2"	Polycarbonate Lexan® with a fiberglass reinforced Aluminum Hub	Max-M-Drive®	Operates with Max-M-Drive® TB37 series.

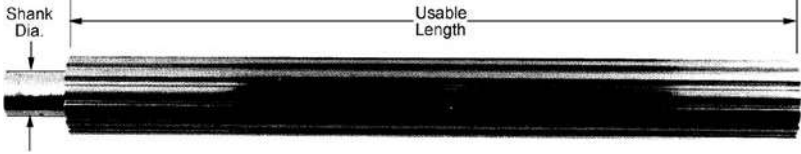


All core pulleys have 1/16" thick ribs, reinforcement.

STOCK NO.	NO. OF GROOVES	BELT WIDTH	O.D.	P.D.	F.D.	BORE	W	L	H
TP37L8W8-16	16	1/2	1.880	1.910	2.12	1/2	9/16	1.21	1-1/8
TP37L8W12-16	16	3/4	1.880	1.910	2.12		13/16	1.46	
TP37L8W8-18	18	1/2	2.119	2.149	2.37		9/16	1.21	
TP37L8W12-18	18	3/4	2.119	2.149	2.37		13/16	1.46	
TP37L8W8-20	20	1/2	2.357	2.387	2.62		9/16	1.21	
TP37L8W12-20	20	3/4	2.357	2.387	2.62		13/16	1.46	
TP37L8W8-24	24	1/2	2.835	2.865	3.12		9/16	1.21	
TP37L8W12-24	24	3/4	2.835	2.865	3.12		13/16	1.46	
TP37L8W8-36	36	1/2	4.267	4.297	4.53		9/16	1.21	
TP37L8W12-36	36	3/4	4.267	4.297	4.53		13/16	1.46	
TP37L8W8-40	40	1/2	4.745	4.775	5.00		9/16	1.21	
TP37L8W12-40	40	3/4	4.745	4.775	5.00		13/16	1.46	

TIMING PULLEY BAR STOCKS

CIRCULAR PITCH	STYLE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL) .200 (XL) .375 (L) and .500 (H)	BAR STOCK	ALUMINUM	MAX-M-DRIVE®	TB40; TB20; TB37



Material: Aluminum

Other numbers of grooves and materials available upon request.
For P.D. and O.D. dimensions see Max-M-Drive pulley pages.

.0816 (XXL) PITCH

STOCK NO.	NO. OF GROOVES
8TA-14-3A	14
8TA-15-3A	15
8TA-18-3A	18
8TA-20-4A	20
8TA-24-5A	24
8TA-25-5A	25
8TA-28-5A	28
8TA-30-6A	30
8TA-32-6A	32
8TA-34-6A	34
8TA-36-6A	36
8TA-38-6A	38
8TA-40-7A	40
8TA-42-7A	42
8TA-44-7A	44
8TA-48-7A	48
8TA-50-7A	50
8TA-54-7A	54
8TA-60-8A	60
8TA-72-8A	72
8TA-75-8A	75
8TA-80-8A	80
8TA-84-8A	84
8TA-88-8A	88
8TA-90-8A	90
8TA-96-8A	96
8TA-98-8A	98
8TA-100-8A	100
8TA-120-8A	120

Bar Stock Lengths:

Number of grooves - 14 to 18
useable length = 3" shank diameter = 7/16" to 1/2"

Number of grooves - 20
useable length = 4" shank diameter = 3/8"

Number of grooves - 24 to 28
useable length = 5" shank diameter = 1/2"

Number of grooves - 30 to 38
useable length = 6" shank diameter = 1/2"

Number of grooves - 40 to 54
useable length = 7" shank diameter = 1/2"

Number of grooves - 60 to 120
useable length = 8" shank diameter = 1/2" to 3/4"

.200 (XL) Pitch

STOCK NO.	NO. OF GROOVES
20TA-10-6A	10
20TA-11-6A	11
20TA-12-8A	12
20TA-14-8A	14
20TA-15-8A	15
20TA-16-8A	16
20TA-17-8A	17
20TA-18-8A	18
20TA-19-8A	19
20TA-20-8A	20
20TA-21-8A	21
20TA-22-8A	22
20TA-23-8A	23
20TA-24-8A	24
20TA-25-8A	25
20TA-27-8A	27
20TA-28-8A	28
20TA-29-8A	29
20TA-30-8A	30
20TA-32-8A	32
20TA-36-8A	36
20TA-40-8A	40
20TA-42-8A	42
20TA-44-8A	44
20TA-45-8A	45
20TA-48-8A	48
20TA-50-8A	50
20TA-60-8A	60
20TA-72-8A	72

Bar Stock Lengths:

Number of grooves - 10 to 11
useable length = 6" shank diameter = 1/2"

Number of grooves - 12 to 72
useable length = 8" shank diameter = 1/2" to 1"

.375 (L) PITCH

STOCK NO.	NO. OF GROOVES
37TA-10-8A	10
37TA-11-8A	11
37TA-12-8A	12
37TA-13-8A	13
37TA-14-8A	14
37TA-15-8A	15
37TA-16-8A	16
37TA-17-8A	17
37TA-18-8A	18
37TA-19-8A	19
37TA-20-8A	20
37TA-21-8A	21
37TA-22-8A	22
37TA-24-8A	24
37TA-26-8A	26
37TA-28-8A	28
37TA-30-8A	30
37TA-32-8A	32

Bar Stock Lengths:

Number of grooves - 10 to 36
useable length = 8" shank diameter = 3/4" to 1"

.500 (H) PITCH

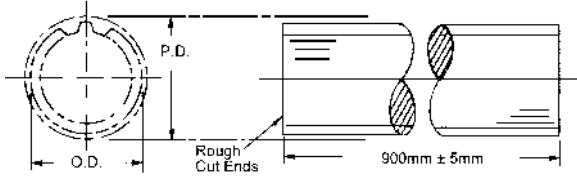
STOCK NO.	NO. OF GROOVES
50TA-10-10A	10
50TA-11-10A	11
50TA-12-10A	12
50TA-13-10A	13
50TA-14-10A	14
50TA-15-10A	15
50TA-16-10A	16
50TA-17-10A	17
50TA-18-10A	18
50TA-19-10A	19
50TA-20-10A	20
50TA-21-10A	21
50TA-22-10A	22
50TA-24-10A	24
50TA-26-10A	26
50TA-28-10A	28
50TA-30-10A	30
50TA-32-10A	32
50TA-36-10A	36

Bar Stock Lengths:

Number of grooves - 10 to 32
useable length = 10" shank diameter = 3/4" to 1"

TIMING PULLEY BAR STOCKS

CIRCULAR PITCH	STYLE	MATERIALS	BERG'S ® NAME	BELT
.0816 (XXL) .200 (XL) .080 (MXL)	BAR STOCK	6063-T6 ALUMINUM	MAX-M-DRIVE®	TB20; TB40; TB7



Material: 6063-T6 Aluminum

Fabricate your own pulleys.

W.M. Berg will fabricate custom orders, send us your print.

Available in custom lengths.

.200 CIRCULAR PITCH (XL)

STOCK NO.	NO. OF GROOVES	P.D.	O.D.
PW20TA-10	10	.637	.6170
PW20TA-11	11	.700	.6800
PW20TA-12	12	.764	.7440
PW20TA-14	14	.891	.8710
PW20TA-15	15	.955	.9350
PW20TA-16	16	1.019	.9990
PW20TA-17	17	1.082	1.0620
PW20TA-18	18	1.146	1.1260
PW20TA-20	20	1.273	1.2530
PW20TA-22	22	1.401	1.3810
PW20TA-23	23	1.464	1.4440
PW20TA-24	24	1.528	1.5080

.0816 CIRCULAR PITCH (XXL)

STOCK NO.	NO. OF GROOVES	P.D.	O.D.
PW8TA-10	10	.260	.2460
PW8TA-12	12	.312	.2980
PW8TA-14	14	.364	.3500
PW8TA-15	15	.390	.3760
PW8TA-18	18	.468	.4540
PW8TA-20	20	.520	.5060
PW8TA-24	24	.624	.6100
PW8TA-25	25	.650	.6360
PW8TA-28	28	.728	.7140
PW8TA-30	30	.780	.7660
PW8TA-32	32	.832	.8180
PW8TA-34	34	.884	.8700
PW8TA-36	36	.936	.9220
PW8TA-38	38	.988	.9740
PW8TA-40	40	1.040	1.0260
PW8TA-42	42	1.092	1.0780
PW8TA-44	44	1.144	1.1300
PW8TA-45	45	1.170	1.1560
PW8TA-48	48	1.248	1.2340
PW8TA-50	50	1.300	1.2860
PW8TA-54	54	1.404	1.3900
PW8TA-60	60	1.560	1.5460

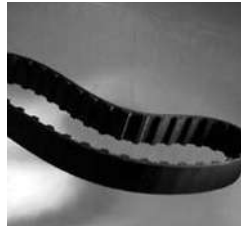
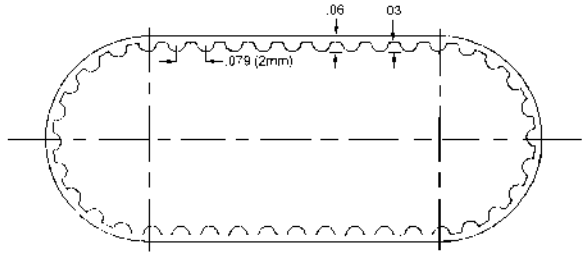
.080 CIRCULAR PITCH (MXL)

STOCK NO.	NO. OF GROOVES	P.D.	O.D.
PW7TA-10	10	.255	.235
PW7TA-12	12	.306	.286
PW7TA-14	14	.357	.337
PW7TA-18	18	.458	.438
PW7TA-20	20	.509	.489
PW7TA-25	25	.637	.617
PW7TA-28	28	.713	.693
PW7TA-30	30	.764	.744
PW7TA-32	32	.815	.795
PW7TA-34	34	.866	.846
PW7TA-36	36	.917	.897
PW7TA-38	38	.968	.948
PW7TA-40	40	1.019	.999
PW7TA-42	42	1.070	1.050
PW7TA-44	44	1.120	1.100
PW7TA-45	45	1.146	1.126
PW7TA-48	48	1.222	1.202
PW7TA-50	50	1.273	1.253
PW7TA-54	54	1.375	1.355
PW7TA-60	60	1.528	1.508

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.079 (GT) 2 mm	.236" 6 mm	Nylon covered Neoprene (Black) Fiberglass Reinforced	Max-M-Drive®	Operates with TP2 Series

STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB2EF6-50	50	3.94
TB2EF6-56	56	4.41
TB2EF6-62	62	4.88
TB2EF6-63	63	4.96
TB2EF6-67	67	5.28
TB2EF6-68	68	5.35
TB2EF6-70	70	5.51
TB2EF6-74	74	5.83
TB2EF6-76	76	5.98
TB2EF6-79	79	6.22
TB2EF6-80	80	6.30
TB2EF6-82	82	6.46
TB2EF6-83	83	6.54
TB2EF6-86	86	6.77
TB2EF6-90	90	7.09
TB2EF6-93	93	7.32
TB2EF6-96	96	7.56
TB2EF6-100	100	7.87
TB2EF6-101	101	7.95
TB2EF6-105	105	8.27
TB2EF6-106	106	8.35
TB2EF6-108	108	8.50
TB2EF6-110	110	8.66
TB2EF6-116	116	9.13
TB2EF6-118	118	9.29
TB2EF6-120	120	9.45
TB2EF6-125	125	9.84
TB2EF6-126	126	9.92
TB2EF6-129	129	10.16
TB2EF6-139	139	10.94
TB2EF6-140	140	11.02
TB2EF6-150	150	11.81
TB2EF6-160	160	12.60
TB2EF6-161	161	12.68
TB2EF6-166	166	13.07
TB2EF6-173	173	13.62
TB2EF6-175	175	13.78
TB2EF6-182	182	14.33
TB2EF6-185	185	14.57
TB2EF6-190	190	14.96
TB2EF6-193	193	15.20
TB2EF6-200	200	15.75
TB2EF6-203	203	15.98
TB2EF6-210	210	16.54
TB2EF6-228	228	17.95
TB2EF6-235	235	18.50
TB2EF6-237	237	18.66
TB2EF6-244	244	19.21
TB2EF6-252	252	19.84
TB2EF6-264	264	20.79
TB2EF6-276	276	21.73
TB2EF6-288	288	22.68
TB2EF6-300	300	23.62
TB2EF6-320	320	25.20
TB2EF6-348	348	27.40
TB2EF6-372	372	29.29
TB2EF6-424	424	33.39
TB2EF6-582	582	45.83

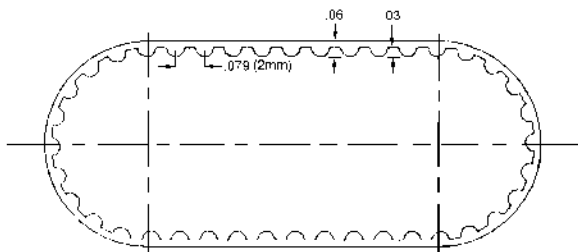


- Compact
- Light weight
- Durability
- Quiet Peration
- No lubrication
- Improved registration
- Corrosion resistant
- Clean operation
- Minimal elongation
- Recommended working strength 25 lbs. (111N) per 1" (25.4 mm) belt width
- Recommended temperature range: -34°C to +85°C (-30°F to +185°F)

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.079 (GT) 2 mm	.354" 9 mm	Nylon covered Neoprene (Black) Fiberglass Reinforced	Max-M-Drive®	Operates with TP2 Series

STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB2EF9-50	50	3.94
TB2EF9-56	56	4.41
TB2EF9-62	62	4.88
TB2EF9-63	63	4.96
TB2EF9-67	67	5.28
TB2EF9-68	68	5.35
TB2EF9-70	70	5.51
TB2EF9-76	76	5.98
TB2EF9-79	79	6.22
TB2EF9-80	80	6.30
TB2EF9-82	82	6.46
TB2EF9-83	83	6.54
TB2EF9-84	84	6.61
TB2EF9-86	86	6.77
TB2EF9-90	90	7.09
TB2EF9-93	93	7.32
TB2EF9-96	96	7.56
TB2EF9-100	100	7.87
TB2EF9-101	101	7.95
TB2EF9-105	105	8.27
TB2EF9-106	106	8.35
TB2EF9-108	108	8.50
TB2EF9-110	110	8.66
TB2EF9-116	116	9.13
TB2EF9-118	118	9.29
TB2EF9-120	120	9.45
TB2EF9-125	125	9.84
TB2EF9-126	126	9.92
TB2EF9-129	129	10.16
TB2EF9-139	139	10.94
TB2EF9-140	140	11.02
TB2EF9-150	150	11.81
TB2EF9-160	160	12.60
TB2EF9-161	161	12.68
TB2EF9-166	166	13.07
TB2EF9-173	173	13.62
TB2EF9-175	175	13.78
TB2EF9-182	182	14.33
TB2EF9-185	185	14.57
TB2EF9-190	190	14.96
TB2EF9-193	193	15.20
TB2EF9-200	200	15.75
TB2EF9-203	203	15.98
TB2EF9-210	210	16.54
TB2EF9-228	228	17.95
TB2EF9-235	235	18.50
TB2EF9-237	237	18.66
TB2EF9-244	244	19.21
TB2EF9-252	252	19.84
TB2EF9-264	264	20.79
TB2EF9-276	276	21.73
TB2EF9-288	288	22.68
TB2EF9-300	300	23.62
TB2EF9-320	320	25.20
TB2EF9-348	348	27.40
TB2EF9-372	372	29.29
TB2EF9-424	424	33.39
TB2EF9-582	582	45.83

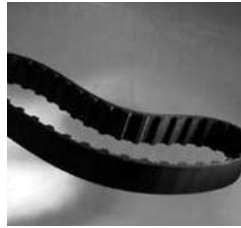
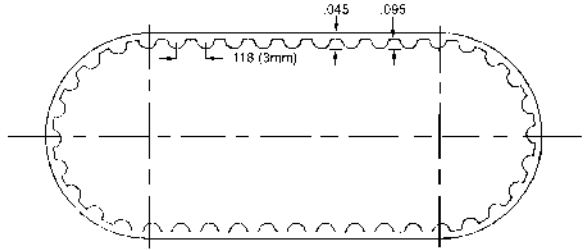


- Compact
- Light weight
- Durability
- Less width required vs. HTD
- Tooth jump resistance: Better than MXL-HTD
- Noise: Far less than HTD
- Positioning: Half (or more) the positioning error of MXL and HTD
- No lubrication
- Improved registration
- Corrosion resistant
- Clean operation
- Minimal elongation
- Recommended working strength 25 lbs. (111N) per 1" (25.4mm) belt width
- Recommended temperature range: -34°C to +85°C (-30°F to +185°F)

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.118 (GT) 3 mm	.354" 9 mm	Nylon covered Neoprene (Black) Fiberglass Reinforced	Max-M-Drive®	Operates with TP3 Series

STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB3EF9-33	33	3.894
TB3EF9-37	37	4.366
TB3EF9-41	41	4.838
TB3EF9-43	43	5.074
TB3EF9-53	53	6.254
TB3EF9-55	55	6.490
TB3EF9-60	60	7.080
TB3EF9-61	61	7.198
TB3EF9-63	63	7.434
TB3EF9-67	67	7.906
TB3EF9-73	73	8.614
TB3EF9-75	75	8.850
TB3EF9-80	80	9.440
TB3EF9-81	81	9.558
TB3EF9-85	85	10.030
TB3EF9-89	89	10.502
TB3EF9-94	94	11.092
TB3EF9-97	97	11.446
TB3EF9-100	100	11.800
TB3EF9-113	113	13.334
TB3EF9-116	116	13.688
TB3EF9-119	119	14.042
TB3EF9-120	120	14.160
TB3EF9-125	125	14.750
TB3EF9-131	131	15.458
TB3EF9-138	138	16.284
TB3EF9-140	140	16.520
TB3EF9-149	149	17.582
TB3EF9-150	150	17.700
TB3EF9-158	158	18.644
TB3EF9-160	160	18.880
TB3EF9-161	161	18.998
TB3EF9-163	163	19.234
TB3EF9-168	168	19.824
TB3EF9-179	179	21.122
TB3EF9-184	184	21.712
TB3EF9-188	188	22.184
TB3EF9-200	200	23.600
TB3EF9-203	203	23.954
TB3EF9-210	210	24.780
TB3EF9-228	228	26.904
TB3EF9-245	245	28.910
TB3EF9-250	250	29.500
TB3EF9-262	262	30.916
TB3EF9-280	280	33.040
TB3EF9-315	315	37.170
TB3EF9-350	350	41.300
TB3EF9-360	360	42.480
TB3EF9-512	512	60.416
TB3EF9-529	529	62.422
TB3EF9-687	687	81.066

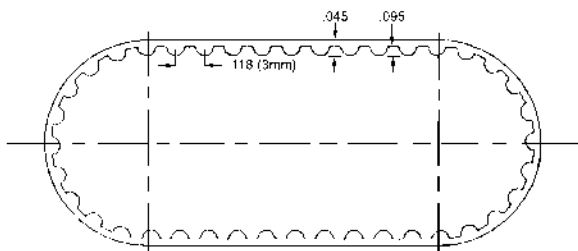


- Compact
- Light weight
- Durability
- Less width required vs. HTD
- Tooth jump resistance: Better than MXL-HTD
- Noise: Far less than HTD
- Positioning: Half (or more) the positioning error of MXL and HTD
- No lubrication
- Improved registration
- Corrosion resistant
- Clean operation
- Minimal elongation
- Recommended working strength 114 lbs. (507N) per 1" (25.4 mm) belt width
- Recommended temperature range: -34°C to +85°C (-30°F to +185°F)

TIMING BELTS

CIRCULAR PITCH	BELT WIDTH	MATERIALS	BERG'S ® NAME	PULLEY
.118 (GT) 3 mm	.590" 15 mm	Nylon covered Neoprene (Black) Fiberglass Reinforced	Max-M-Drive®	Operates with TP3 Series

STOCK NO.	NO. OF GROOVES	LENGTH (Ref.)
TB3EF15-33	33	3.894
TB3EF15-37	37	4.366
TB3EF15-41	41	4.838
TB3EF15-43	43	5.074
TB3EF15-53	53	6.254
TB3EF15-55	55	6.490
TB3EF15-60	60	7.080
TB3EF15-61	61	7.198
TB3EF15-63	63	7.434
TB3EF15-67	67	7.906
TB3EF15-73	73	8.614
TB3EF15-75	75	8.850
TB3EF15-80	80	9.440
TB3EF15-81	81	9.558
TB3EF15-85	85	10.030
TB3EF15-89	89	10.502
TB3EF15-94	94	11.092
TB3EF15-97	97	11.446
TB3EF15-100	100	11.800
TB3EF15-113	113	13.334
TB3EF15-116	116	13.688
TB3EF15-119	119	14.042
TB3EF15-125	125	14.750
TB3EF15-131	131	15.458
TB3EF15-138	138	16.284
TB3EF15-140	140	16.520
TB3EF15-149	149	17.582
TB3EF15-150	150	17.700
TB3EF15-158	158	18.644
TB3EF15-160	160	18.880
TB3EF15-161	161	18.998
TB3EF15-163	163	19.234
TB3EF15-168	168	19.824
TB3EF15-179	179	21.122
TB3EF15-184	184	21.712
TB3EF15-188	188	22.184
TB3EF15-200	200	23.600
TB3EF15-203	203	23.954
TB3EF15-210	210	24.780
TB3EF15-228	228	26.904
TB3EF15-245	245	28.910
TB3EF15-250	250	29.500
TB3EF15-262	262	30.916
TB3EF15-280	280	33.040
TB3EF15-315	315	37.170
TB3EF15-350	350	41.300
TB3EF15-360	360	42.480
TB3EF15-512	512	60.416
TB3EF15-529	529	62.422
TB3EF15-687	687	81.066



- Compact
- Light weight
- Durability
- Less width required vs. HTD
- Tooth jump resistance: Better than MXL-HTD
- Noise: Far less than HTD
- Positioning: Half (or more) the positioning error of MXL and HTD
- No lubrication
- Improved registration
- Corrosion resistant
- Clean operation
- Minimal elongation
- Recommended working strength 114 lbs. (507N) per 1" (25.4 mm) belt width
- Recommended temperature range: -34°C to +85°C (-30°F to +185°F)

TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.079 (GT) 2 mm	Single Flange Pin Hub	.354" 9 mm	1/8" - 1/4"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	B*	F.W.	A	Ø H
TP2A1W9-12	12	0.301	0.281	0.480	1/8	0.446	0.687	0.480
TP2A1W9-13	13	0.326	0.306	0.505	1/8	0.446	0.687	0.505
TP2A1W9-14	14	0.351	0.331	0.530	1/8	0.446	0.687	0.530
TP2A1W9-15	15	0.376	0.356	0.555	3/16	0.446	0.687	0.555
TP2A2W9-16	16	0.401	0.381	0.580	3/16	0.446	0.687	0.580
TP2A2W9-17	17	0.426	0.406	0.635	1/4	0.446	0.687	0.635
TP2A2W9-18	18	0.451	0.431	0.635	1/4	0.446	0.687	0.635
TP2A2W9-19	19	0.476	0.456	0.635	1/4	0.446	0.687	0.635
TP2A2W9-20	20	0.501	0.481	0.685	1/4	0.446	0.687	0.685
TP2A2W9-21	21	0.526	0.506	0.710	1/4	0.446	0.687	0.710
TP2A2W9-22	22	0.551	0.531	0.740	1/4	0.446	0.687	0.740

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.079 (GT) 2 mm	Single Flange Pin Hub	.236" 6 mm	1/8" - 1/4"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

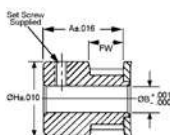
STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	B*	F.W.	A	Ø H
TP2A1W6-12	12	0.301	0.281	0.480	1/8	0.327	0.562	0.480
TP2A1W6-13	13	0.326	0.306	0.505	1/8	0.327	0.562	0.505
TP2A1W6-14	14	0.351	0.331	0.530	1/8	0.327	0.562	0.530
TP2A2W6-15	15	0.376	0.356	0.555	3/16	0.327	0.562	0.555
TP2A2W6-16	16	0.401	0.381	0.580	3/16	0.327	0.562	0.580
TP2A2W6-17	17	0.426	0.406	0.635	1/4	0.327	0.562	0.635
TP2A2W6-18	18	0.451	0.431	0.635	1/4	0.327	0.562	0.635
TP2A2W6-19	19	0.476	0.456	0.635	1/4	0.327	0.562	0.635
TP2A2W6-20	20	0.501	0.481	0.685	1/4	0.327	0.562	0.685
TP2A2W6-21	21	0.526	0.506	0.710	1/4	0.327	0.562	0.710
TP2A2W6-22	22	0.551	0.531	0.740	1/4	0.327	0.562	0.740

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.118 (GT) 3 mm	Single Flange Pin Hub	.354" 9 mm	3/16"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB3 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	B*	F.W.	A	Ø H
TP3A2W9-16	16	0.602	0.572	0.710	3/16	0.453	0.691	0.710
TP3A2W9-17	17	0.639	0.609	0.740	3/16	0.453	0.691	0.740

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.118 (GT) 3 mm	Single Flange Pin Hub	.590" 15 mm	3/16"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB3 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	B*	F.W.	A	Ø H
TP3A2W15-16	16	0.602	0.572	0.710	3/16	0.689	0.927	0.710
TP3A2W15-17	17	0.639	0.609	0.740	3/16	0.689	0.927	0.710



* Metric bore available on request.

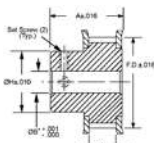
TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.079 (GT) 2 mm	Double Flange Pin Hub	.354" 9 mm	3/16" to 1/4"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	B*	F.W.	A	Ø H
TP2A3W9-17	17	0.426	0.406	0.635	3/16	0.514	0.750	0.312
TP2A3W9-18	18	0.451	0.431	0.635	3/16	0.514	0.750	0.312
TP2A3W9-19	19	0.476	0.456	0.635	3/16	0.514	0.750	0.338
TP2A3W9-20	20	0.501	0.481	0.685	3/16	0.514	0.750	0.364
TP2A3W9-21	21	0.526	0.506	0.710	3/16	0.514	0.750	0.390
TP2A3W9-22	22	0.551	0.531	0.740	3/16	0.514	0.750	0.390
TP2A3W9-24	24	0.602	0.582	0.790	1/4	0.514	0.812	0.442
TP2A3W9-25	25	0.627	0.607	0.815	1/4	0.514	0.812	0.468
TP2A3W9-26	26	0.652	0.632	0.840	1/4	0.514	0.812	0.490
TP2A3W9-28	28	0.702	0.682	0.895	1/4	0.514	0.812	0.494
TP2A3W9-30	30	0.752	0.732	0.945	1/4	0.514	0.812	0.546
TP2A3W9-32	32	0.802	0.782	1.000	1/4	0.514	0.812	0.598
TP2A3W9-36	36	0.902	0.882	1.105	1/4	0.514	0.812	0.676
TP2A3W9-40	40	1.003	0.983	1.210	1/4	0.530	0.843	0.754
TP2A3W9-42	42	1.053	1.033	1.260	1/4	0.530	0.843	0.806
TP2A3W9-44	44	1.103	1.083	1.315	1/4	0.530	0.843	0.858
TP2A3W9-45	45	1.128	1.108	1.340	1/4	0.530	0.843	0.900
TP2A3W9-48	48	1.203	1.183	1.420	1/4	0.530	0.843	0.936
TP2A3W9-50	50	1.253	1.233	1.470	1/4	0.530	0.843	0.936
TP2A3W9-56	56	1.404	1.384	1.575	1/4	0.530	0.843	1.030
TP2A3W9-60	60	1.504	1.484	1.730	1/4	0.530	0.843	1.222

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.079 (GT) 2 mm	Double Flange Pin Hub	.236" 6 mm	3/16" to 1/4"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	B*	F.W.	A	Ø H
TP2A2W6-17	17	0.426	0.406	0.635	3/16	0.389	0.625	0.312
TP2A2W6-18	18	0.451	0.431	0.635	3/16	0.389	0.625	0.312
TP2A2W6-19	19	0.476	0.456	0.635	3/16	0.389	0.625	0.338
TP2A2W6-20	20	0.501	0.481	0.685	3/16	0.389	0.625	0.364
TP2A2W6-21	21	0.526	0.506	0.710	3/16	0.389	0.625	0.390
TP2A2W6-22	22	0.551	0.531	0.740	3/16	0.389	0.625	0.390
TP2A3W6-24	24	0.602	0.582	0.790	1/4	0.389	0.687	0.442
TP2A3W6-25	25	0.627	0.607	0.815	1/4	0.389	0.687	0.468
TP2A3W6-26	26	0.652	0.632	0.840	1/4	0.389	0.687	0.490
TP2A3W6-28	28	0.702	0.682	0.895	1/4	0.389	0.687	0.494
TP2A3W6-30	30	0.752	0.732	0.945	1/4	0.389	0.687	0.546
TP2A3W6-32	32	0.802	0.782	1.000	1/4	0.389	0.687	0.598
TP2A3W6-36	36	0.902	0.882	1.105	1/4	0.389	0.687	0.676
TP2A3W6-40	40	1.003	0.983	1.210	1/4	0.389	0.719	0.754
TP2A3W6-42	42	1.053	1.033	1.260	1/4	0.389	0.719	0.806
TP2A3W6-44	44	1.103	1.083	1.315	1/4	0.405	0.719	0.858
TP2A3W6-45	45	1.128	1.108	1.340	1/4	0.405	0.719	0.900
TP2A3W6-48	48	1.203	1.183	1.420	1/4	0.405	0.719	0.936
TP2A3W6-50	50	1.253	1.233	1.470	1/4	0.405	0.719	0.936
TP2A3W6-56	56	1.404	1.384	1.575	1/4	0.405	0.719	1.030
TP2A3W6-60	60	1.504	1.484	1.730	1/4	0.405	0.719	1.222



* Metric bore available on request.

TIMING PULLEYS

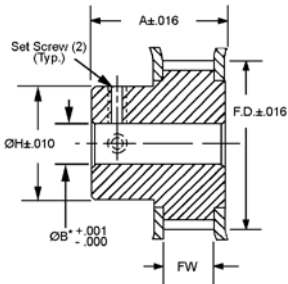
CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.118 (GT) 3 mm	Double Flange Pin Hub	.354" 9 mm	3/16" to 1/4"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

A

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	B*	F.W.	A	Ø H
TP3A3W9-18	18	0.677	0.684	0.790	3/16	0.506	0.812	0.442
TP3A3W9-19	19	0.714	0.722	0.815	3/16	0.506	0.812	0.468
TP3A3W9-20	20	0.752	0.760	0.895	3/16	0.506	0.812	0.500
TP3A3W9-21	21	0.790	0.797	0.895	3/16	0.506	0.812	0.500
TP3A3W9-22	22	0.827	0.872	0.945	3/16	0.506	0.812	0.562
TP3A3W9-24	24	0.902	0.910	1.025	1/4	0.506	0.812	0.625
TP3A3W9-25	25	0.940	0.947	1.060	1/4	0.506	0.812	0.625
TP3A3W9-26	26	0.977	1.023	1.105	1/4	0.506	0.812	0.625
TP3A3W9-28	28	1.053	1.098	1.173	1/4	0.506	0.812	0.701
TP3A3W9-30	30	1.128	1.173	1.250	1/4	0.506	0.812	0.776
TP3A3W9-32	32	1.203	1.248	1.323	1/4	0.506	0.812	0.851
TP3A3W9-34	34	1.248	1.323	1.398	1/4	0.527	0.833	0.921
TP3A3W9-36	36	1.353	1.399	1.473	1/4	0.527	0.833	1.000
TP3A3W9-38	38	1.429	1.399	1.549	1/4	0.527	0.833	1.075
TP3A3W9-40	40	1.504	1.474	1.625	1/4	0.527	0.833	1.150
TP3A3W9-44	44	1.654	1.624	1.775	1/4	0.527	0.833	1.300
TP3A3W9-45	45	1.692	1.662	1.775	1/4	0.527	0.833	1.250

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.118 (GT) 3 mm	Double Flange Pin Hub	.590" 15 mm	.3/16" to 1/4"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	F.D.	B*	F.W.	A	Ø H
TP3A3W15-18	18	0.677	0.647	0.790	3/16	0.742	1.057	0.442
TP3A3W15-19	19	0.714	0.684	0.815	3/16	0.742	1.057	0.468
TP3A3W15-20	20	0.752	0.722	0.895	3/16	0.742	1.057	0.500
TP3A3W15-21	21	0.790	0.760	0.895	3/16	0.742	1.057	0.500
TP3A3W15-22	22	0.827	0.797	0.945	3/16	0.742	1.057	0.562
TP3A3W15-24	24	0.902	0.872	1.025	1/4	0.742	1.057	0.625
TP3A3W15-25	25	0.940	0.910	1.060	1/4	0.742	1.057	0.625
TP3A3W15-26	26	0.977	0.947	1.105	1/4	0.742	1.057	0.625
TP3A3W15-28	28	1.053	1.023	1.173	1/4	0.742	1.057	0.701
TP3A3W15-30	30	1.128	1.098	1.250	1/4	0.742	1.057	0.776
TP3A3W15-32	32	1.203	1.173	1.323	1/4	0.742	1.057	0.851
TP3A3W15-34	34	1.248	1.248	1.398	1/4	0.763	1.069	0.921
TP3A3W15-36	36	1.353	1.323	1.473	1/4	0.763	1.069	1.000
TP3A3W15-38	38	1.429	1.399	1.549	1/4	0.763	1.069	1.075
TP3A3W15-40	40	1.504	1.474	1.625	1/4	0.763	1.069	1.150
TP3A3W15-44	44	1.654	1.624	1.775	1/4	0.763	1.069	1.300



* Metric bore available on request.



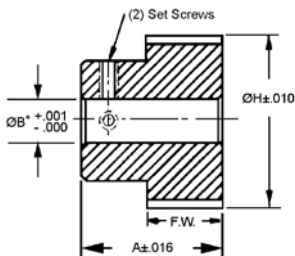
TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.079 (GT) 2 mm	Flangeless Pin Hub	.354" 9 mm	1/4" to 3/8"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	B*	F.W.	A	Ø H
TP2A3H9-60	60	1.504	1.484	1/4	0.500	0.875	1.148
TP2A3H9-62	62	1.554	1.534	1/4	0.500	0.875	1.148
TP2A3H9-68	68	1.704	1.684	1/4	0.500	0.875	1.185
TP2A3H9-72	72	1.805	1.785	1/4	0.500	0.875	1.195
TP2A3H9-74	74	1.855	1.835	1/4	0.500	0.875	1.215
TP2A3H9-80	80	2.005	1.985	5/16	0.500	0.875	1.500
TP2A3H9-90	90	2.256	2.236	5/16	0.500	0.875	1.500
TP2A3H9-100	100	2.506	2.486	5/16	0.500	0.875	1.500
TP2A3H9-120	120	3.008	2.988	3/8	0.500	0.875	1.500

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.079 (GT) 2 mm	Flangeless Pin Hub	.236" 6 mm	1/4" to 3/8"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	B*	F.W.	A	Ø H
TP2A3H6-60	60	1.504	1.484	1/4	0.375	0.750	1.148
TP2A3H6-62	62	1.554	1.534	1/4	0.375	0.750	1.148
TP2A3H6-68	68	1.704	1.684	1/4	0.375	0.750	1.185
TP2A3H6-72	72	1.805	1.785	1/4	0.375	0.750	1.195
TP2A3H6-74	74	1.855	1.835	1/4	0.375	0.750	1.215
TP2A3H6-80	80	2.005	1.985	5/16	0.375	0.750	1.500
TP2A3H6-90	90	2.256	2.236	5/16	0.375	0.750	1.500
TP2A3H6-100	100	2.506	2.486	5/16	0.375	0.750	1.500
TP2A3H6-120	120	3.008	2.988	3/8	0.375	0.750	1.500



* Metric bore available on request.

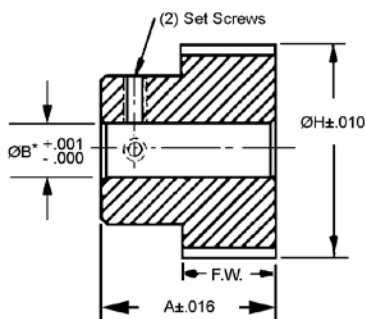
TIMING PULLEYS

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.118 (GT) 3 mm	Flangeless Pin Hub	.354" 9 mm	5/16"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	B*	F.W.	A	Ø H
TP3A3H9-45	45	1.692	1.662	5/16	0.527	0.875	1.250
TP3A3H9-48	48	1.805	1.775	5/16	0.500	0.875	1.250
TP3A3H9-50	50	1.880	1.850	5/16	0.500	0.875	1.250
TP3A3H9-56	56	2.105	2.075	5/16	0.500	0.875	1.250
TP3A3H9-60	60	2.256	2.226	5/16	0.500	0.875	1.250
TP3A3H9-62	62	2.331	2.301	5/16	0.500	0.875	1.250
TP3A3H9-68	68	2.557	2.527	5/16	0.500	0.875	1.250
TP3A3H9-72	72	2.707	2.677	5/16	0.500	0.875	1.250
TP3A3H9-74	74	2.782	2.752	5/16	0.500	0.875	1.250
TP3A3H9-80	80	3.008	2.978	5/16	0.500	0.875	1.250

CIRCULAR PITCH	STYLE	BELT WIDTH	BORE	MATERIALS	BERG'S® NAME	BELT
.118 (GT) 3 mm	Flangeless Pin Hub	.590" 15 mm	1/4" to 5/16"	Aluminum Anodized	Max-M-Drive®	Operates with Max-M-Drive® TB2 series.

STOCK NO.	NO. OF GROOVES	P.D.	O.D.	B*	F.W.	A	Ø H
TP3A3H15-45	45	1.692	1.662	1/4	0.763	1.069	1.250
TP3A3H15-48	48	1.805	1.775	5/16	0.736	1.111	1.250
TP3A3H15-50	50	1.880	1.850	5/16	0.736	1.111	1.250
TP3A3H15-56	56	2.105	2.075	5/16	0.736	1.111	1.250
TP3A3H15-60	60	2.256	2.226	5/16	0.736	1.111	1.250
TP3A3H15-62	62	2.331	2.301	5/16	0.736	1.111	1.250
TP3A3H15-68	68	2.557	2.527	5/16	0.736	1.111	1.250
TP3A3H15-72	72	2.707	2.677	5/16	0.736	1.111	1.250
TP3A3H15-74	74	2.782	2.752	5/16	0.736	1.111	1.250
TP3A3H15-80	80	3.008	2.978	5/16	0.736	1.111	1.250



* Metric bore available on request.



POW-R-VEE® BELTS

A New Concept in V-Belt Drives

Advantages

Cable Design



- Completely Non-Corrosive
- Stainless Steel-Cable Core Allows Maximum Strength.
- Lighter Weight
- Single Strand Cable Core Permits Complete Flexibility
- Power is Transferred Along The Pitch Line For Minimum Transmission Loss
- Can Be Spliced On Machine For Minimum Down Time
- Damaged Sections Can Be Replaced
- Infinite Lengths Are Available

Flexible Sidewall



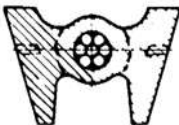
- Can Be Used With Pulleys Of Any Angle
- Inherent Locking Action Offers A More Positive, Non-Slip Drive & Allows For Tension On The Belt & Pulleys

Flexible Design



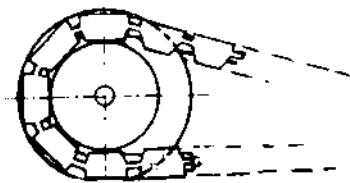
- Permits Odd Angle & Three Dimensional Drives
- Compensates For Misalignment
- Prevents "Turn Over" & "Lift Off"

Materials



- The Combination Of Engineered Plastics & Stainless Steel Cable Offers High Heat Resistance, Smoother Operation, Light Weight, Less Inertia & Vibration.
- Pow-R-Vee Can Be Molded In Any Color For Sales Appeal

Cog Design



- No Stretch Or Compression Of Belt- Results In Less Fatigue, Longer Life, More Flexibility
- Segmented, Cog Design Permits Smaller Pulley Diameters, Larger Ratios, More Compact Design and Most Importantly
- Provides Positive Gripping at All Times.

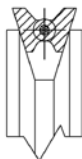
POW-R-VEE® BELT TECHNICAL DATA

Operating Notes:

Due to the unique design of polyurethane molded over a stainless steel cable, this series offers high heat resistance, smooth operation, light weight, and less inertia. Because the design is cogged it allows for smaller pulley diameters and compensates for misalignment of pulleys by permitting an angle (7° maximum misalignment). The design also allows for the belt to be spliced to any length (either in the field or at Berg), thus allowing belts to be replaced quickly.

2V Series

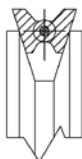
- Weight .21 oz./ft
- 1/32" Diameter
Stainless Steel Cable



- 90A Durometer Polyurethane (Brown)
- Ultimate Tensile Strength 50 lbs.
- Recommended Operating Load 12 lbs.
- Recommended Maximum Operating Speed 1800 rpm
- Temperature Range +180°F to -15°F

3V Series

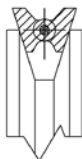
- Weight .60 oz/ft
- 3/64" Diameter
Stainless Steel Cable



- 90A Durometer Polyurethane (Red)
- Ultimate Tensile Strength 125 lbs.
- Recommended Operating Load 30 lbs.
- Recommended Maximum Operating Speed 1800 rpm
- Temperature Range +180°F to -15°F

4V Series

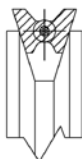
- Weight 1.1 oz/ft
- 1/16" Diameter
Stainless Steel Cable



- 90A Durometer Polyurethane (Blue)
- Ultimate Tensile Strength 200 lbs.
- Recommended Operating Load 50 lbs.
- Recommended Maximum Operating Speed 1800 rpm
- Temperature Range + 180°F to -15°F

5V Series

- Weight 1.4 oz/ft
- 5/64" Diameter
Stainless Steel Cable

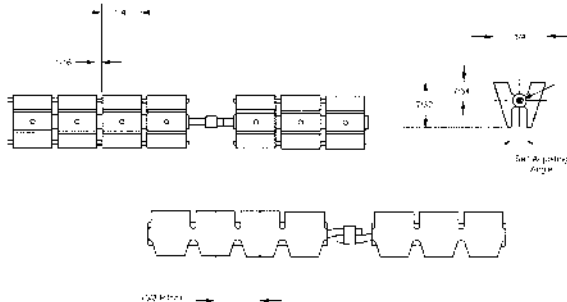


- 90A Durometer Polyurethane (Yellow)
- Ultimate Tensile Strength 350 lbs.
- Recommended Operating Load 85 lbs.
- Recommended Maximum Operating Speed 1800 rpm
- Temperature Range +180°F to -15°F



V-BELTS

SERIES	WIDTH	HEIGHT	MATERIALS	BERG'S ® NAME	PULLEY
2V	1/4"	7/32"	Polyurethane (Brown) with 1/32" Dia. Stainless Steel Cable	POW-R-VEE®	Operates with Pow-R-Vee 2V Series



- More sidewall contact
- Less slippage
- Greater power transmission
- Infinite length variations
- Extra strong
- Light weight
- 90A Durometer
- Weight .21 oz./ft.
- Ultimate Tensile Strength 50 lbs.
- Temperature Range +180°F to -15°F
- Silent drive
- Recommended Operating Load 12 lbs.
- Recommended Max. Operating Speed 376 ft./min.
- For Field Splice Kit order 2V-7.

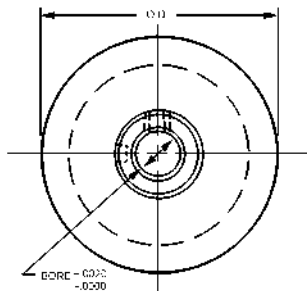
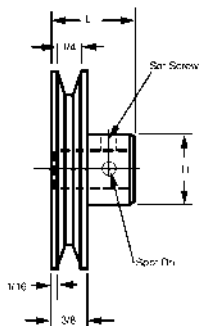


BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
2V-5FT	5 FT
2V-10FT	10 FT
2V-25FT	25 FT
2V-50FT	50 FT
2V-100FT	100 FT

STOCK NO.	LENGTH (Ref.)
2V-16	6.00
2V-18	6.75
2V-20	7.50
2V-22	8.25
2V-24	9.00
2V-26	9.75
2V-28	10.50
2V-30	11.25
2V-32	12.00
2V-34	12.75
2V-36	13.50
2V-38	14.25
2V-40	15.00
2V-42	15.75
2V-44	16.50
2V-46	17.25
2V-48	18.00
2V-50	18.75
2V-52	19.50
2V-54	20.25
2V-56	21.00
2V-58	21.75
2V-60	22.50
2V-62	23.25
2V-64	24.00
2V-66	24.75
2V-68	25.50
2V-70	26.25
2V-72	27.00
2V-74	27.75
2V-76	28.50
2V-78	29.25
2V-80	30.00
2V-82	30.75
2V-84	31.50
2V-86	32.25
2V-88	33.00
2V-90	33.75
2V-92	34.50
2V-94	35.25
2V-96	36.00
2V-98	36.75
2V-100	37.50
2V-102	38.25
2V-104	39.00
2V-106	39.75
2V-108	40.50
2V-110	41.25
2V-112	42.00
2V-114	42.75
2V-116	43.50
2V-118	44.25
2V-120	45.00
2V-122	45.75
2V-124	46.50
2V-126	47.25
2V-128	48.00
2V-130	48.75
2V-132	49.50
2V-134	50.25
2V-136	51.00
2V-140	52.50

V-BELT PULLEYS

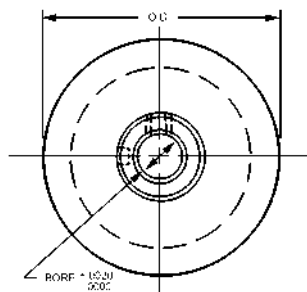
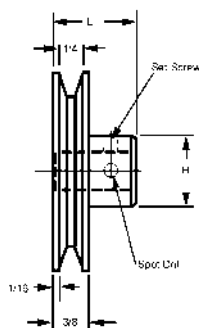
SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
2V	3/8"	303 Stainless Steel	Pow-R-Vee®	Operates with Pow-R-Vee 2V Series (1/4"W X 7/32"D)



STOCK NO.	BORE	O.D.	H	L
V2M35S-1	(3/8) .3748	1.67	3/4	7/8
V2M35S-2		1.77		
V2M35S-3		1.87		
V2M35S-4		1.97		
V2M35S-5		2.08		
V2M35S-6		2.20		
V2M35S-7		2.34		
V2M35S-8		2.48		
V2M35S-9		2.64		
V2M35S-10		2.80		
V2M35S-11		2.95		
V2M35S-12		3.15		
V2M35S-13		3.35		
V2M35S-14		3.64		
V2M35S-15		3.94		

Other sizes available upon request.

SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
2V	1/2"	303 Stainless Steel	Pow-R-Vee®	Operates with Pow-R-Vee 2V Series (1/4"W X 7/32"D)

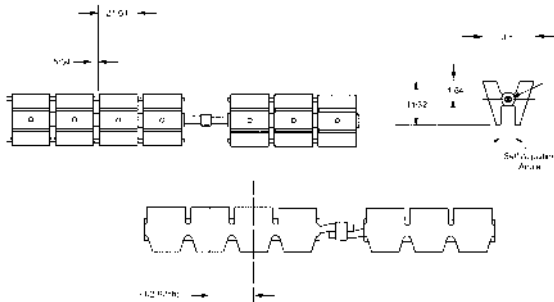


STOCK NO.	BORE	O.D.	H	L
V2M37S-1	(1/2) .4998	1.67	1"	7/8
V2M37S-2		1.77		
V2M37S-3		1.87		
V2M37S-4		1.97		
V2M37S-5		2.08		
V2M37S-6		2.20		
V2M37S-7		2.34		
V2M37S-8		2.48		
V2M37S-9		2.64		
V2M37S-10		2.80		
V2M37S-11		2.95		
V2M37S-12		3.15		
V2M37S-13		3.35		
V2M37S-14		3.64		
V2M37S-15		3.94		

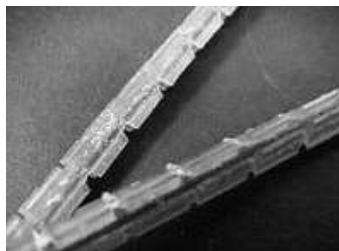
Other sizes available upon request.

V-BELTS

SERIES	WIDTH	HEIGHT	MATERIALS	BERG'S ® NAME	PULLEY
3V	1/4"	11/32"	Polyurethane (Red) with 1/32" Dia. Stainless Steel Cable	POW-R-VEE®	Operates with Pow-R-Vee 3V Series



- More sidewall contact
- Less slippage
- Greater power transmission
- Infinite length variations
- Extra strong
- Silent drive
- 90A Durometer
- Weight .60 oz./ft.
- Ultimate Tensile Strength 125 lbs.
- Temperature Range +180°F to -15°F
- Recommended Operating Load 30 lbs.
- Recommended Max. Operating Speed 376 ft./min.
- For Field Splice Kit Order 3V-7.

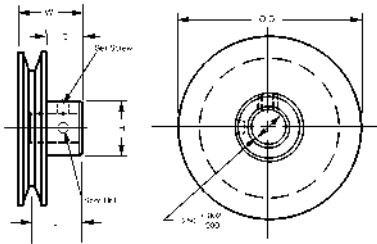


BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
3V-5FT	5 FT
3V-10FT	10 FT
3V-25FT	25 FT
3V-50FT	50 FT
3V-100FT	100 FT

STOCK NO.	LENGTH (Ref.)
3V-12	6.00
3V-13	6.50
3V-14	7.00
3V-15	7.50
3V-16	8.00
3V-17	8.50
3V-18	9.00
3V-19	9.50
3V-20	10.00
3V-21	10.50
3V-22	11.00
3V-23	11.50
3V-24	12.00
3V-25	12.50
3V-26	13.00
3V-27	13.50
3V-28	14.00
3V-29	14.50
3V-30	15.00
3V-31	15.50
3V-32	16.00
3V-33	16.50
3V-34	17.00
3V-35	17.50
3V-36	18.00
3V-37	18.50
3V-38	19.00
3V-39	19.50
3V-40	20.00
3V-41	20.50
3V-42	21.00
3V-43	21.50
3V-44	22.00
3V-45	22.50
3V-46	23.00
3V-47	23.50
3V-48	24.00
3V-49	24.50
3V-50	25.00
3V-51	25.50
3V-52	26.00
3V-53	26.50
3V-54	27.00
3V-55	27.50
3V-56	28.00
3V-57	28.50
3V-58	29.00
3V-59	29.50
3V-60	30.00
3V-61	30.50
3V-62	31.00
3V-63	31.50
3V-64	32.00
3V-65	32.50
3V-66	33.00
3V-67	33.50
3V-68	34.00
3V-69	34.50
3V-70	35.00
3V-71	35.50
3V-72	36.00
3V-74	37.00

V-BELT PULLEYS

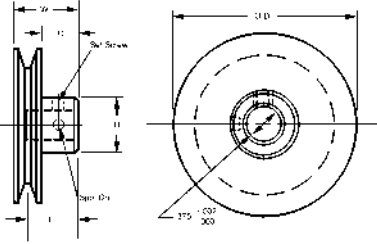
SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
3V	1/4"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 3V Series (3/8"W X 11/32"D)



STOCK NO.	O.D. ± 5/64	W	C	L	H
V3-150-2	1-1/2	1	1/2	7/8	15/16
V3-200-2	2				1

All pulleys have set screws supplied.
Other bore sizes and keyways are available upon request.

SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
3V	3/8"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 3V Series (3/8"W X 11/32"D)



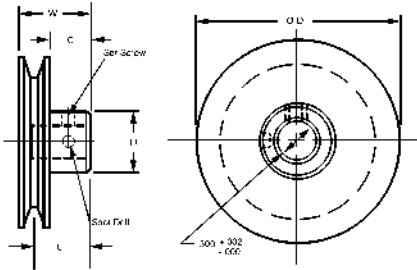
STOCK NO.	O.D. ± 5/64	W	C	L	H
V3-150-3	1-1/2				15/16
V3-200-3	2				1
V3-250-3	2-1/2	1	1/2	7/8	1-1/8
V3-300-3	3				1-1/8
V3-350-3	3-1/2				1-1/8
V3-400-3	4				1-1/8

All pulleys have set screws supplied.
Other bore sizes and keyways are available upon request.



V-BELT PULLEYS

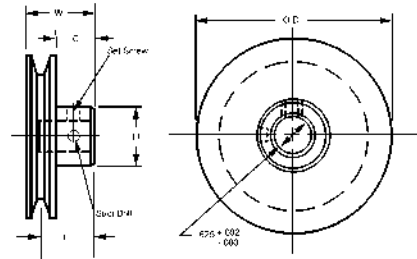
SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
3V	1/2"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 3V Series (3/8"W X 11/32"D)



STOCK NO.	O.D. $\pm 5/64$	W	C	L	H
V3-150-4	1-1/2	1	1/2	7/8	15/16
V3-200-4	2				1
V3-250-4	2-1/2				1-1/8
V3-300-4	3				1-1/8
V3-350-4	3-1/2				1-1/8
V3-400-4	4				1-1/8

All pulleys have set screws supplied.
Other bore sizes and keyways are available upon request.

SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
3V	5/8"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 3V Series (3/8"W X 11/32"D)



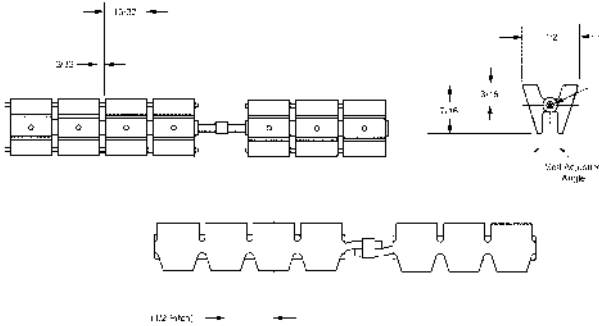
STOCK NO.	O.D. $\pm 5/64$	W	C	L	H
V3-200-5	2	1	1/2	7/8	1
V3-250-5	2-1/2				1-1/8
V3-300-5	3				1-1/8
V3-350-5	3-1/2				1-1/8
V3-400-5	4				1-1/8

All pulleys have set screws supplied.
Other bore sizes and keyways are available upon request.



V-BELTS

SERIES	WIDTH	HEIGHT	MATERIALS	BERG'S ® NAME	PULLEY
4V	1/2"	7/16"	Polyurethane (Blue) with 1/16" Dia. Stainless Steel Cable	POW-R-VEE®	Operates with Pow-R-Vee 4V Series



- More sidewall contact
- Less slippage
- Greater power transmission
- Infinite length variations
- Extra strong
- Silent drive
- 90A Durometer
- Weight 1.1 oz./ft.
- Ultimate Tensile Strength 200 lbs.
- Temperature Range +180°F to -15°F
- Recommended Operating Load 50 lbs.
- Recommended Max. Operating Speed 376 ft./min.
- For Field Splice Kit Order 4V-7.

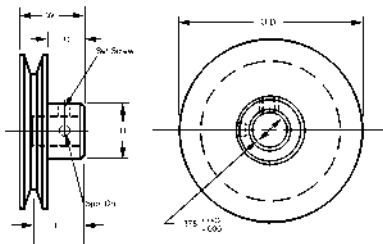


BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
4V-5FT	5 FT
4V-10FT	10 FT
4V-25FT	25 FT
4V-50FT	50 FT
4V-100FT	100 FT

STOCK NO.	LENGTH (Ref.)
4V-15	7.50
4V-16	8.00
4V-17	8.50
4V-18	9.00
4V-19	9.50
4V-20	10.00
4V-21	10.50
4V-22	11.00
4V-23	11.50
4V-24	12.00
4V-25	12.50
4V-26	13.00
4V-27	13.50
4V-28	14.00
4V-29	14.50
4V-30	15.00
4V-31	15.50
4V-32	16.00
4V-33	16.50
4V-34	17.00
4V-35	17.50
4V-36	18.00
4V-37	18.50
4V-38	19.00
4V-39	19.50
4V-40	20.00
4V-41	20.50
4V-42	21.00
4V-43	21.50
4V-44	22.00
4V-45	22.50
4V-46	23.00
4V-47	23.50
4V-48	24.00
4V-49	24.50
4V-50	25.00
4V-51	25.50
4V-52	26.00
4V-53	26.50
4V-54	27.00
4V-55	27.50
4V-56	28.00
4V-57	28.50
4V-58	29.00
4V-59	29.50
4V-60	30.00
4V-61	30.50
4V-62	31.00
4V-63	31.50
4V-64	32.00
4V-65	32.50
4V-66	33.00
4V-67	33.50
4V-68	34.00
4V-69	34.50
4V-70	35.00
4V-72	36.00
4V-74	37.00
4V-76	38.00
4V-78	39.00
4V-80	40.00
4V-82	41.00
4V-84	42.00
4V-86	43.00
4V-88	44.00
4V-90	45.00
4V-92	46.00
4V-96	48.00

V-BELT PULLEYS

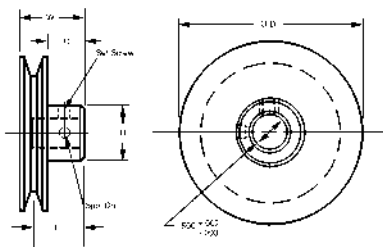
SERIES	BORE	MATERIALS	BERG'S® NAME	BELT
4V	3/8"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 4V Series (1/2"W X 13/32"D)



STOCK NO.	O.D. ± 5/64	W	C	L	H
V4-150-3	1-1/2	1-1/8	1/2	1	7/8
V4-175-3	1-3/4	1-1/8	1/2	1	1-1/16
V4-200-3	2	1-1/8	1/2	1	1-1/8
V4-225-3	2-1/4	1-1/8	1/2	1	1-1/8
V4-250-3	2-1/2	1-1/8	1/2	1	1-1/8

All pulleys have set screws supplied.
Other bore sizes and keyways are available upon request.

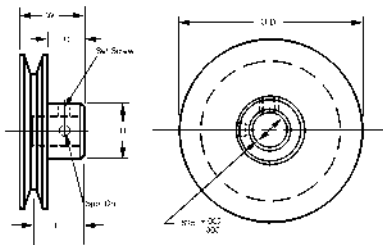
SERIES	BORE	MATERIALS	BERG'S® NAME	BELT
4V	1/2"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 4V Series (1/2"W X 13/32"D)



STOCK NO.	O.D. ± 5/64	W	C	L	H
V4-150-4	1-1/2	1-1/8	1/2	1	7/8
V4-175-4	1-3/4	1-1/8	1/2	1	1-1/16
V4-200-4	2	1-1/8	1/2	1	1-1/8
V4-225-4	2-1/4	1-1/8	1/2	1	1-1/8
V4-250-4	2-1/2	1-1/8	1/2	1	1-1/8
V4-300-4	3	1-1/8	1/2	1-1/8	1-1/4
V4-325-4	3-1/4	1-3/16	1/2	1-1/8	1-1/4
V4-350-4	3-1/2	1-1/4	5/8	1-1/8	1-1/4
V4-400-4	4	1-1/4	5/8	1-1/8	1-1/4
V4-500-4	5	1-3/8	7/8	1-3/16	1-9/16
V4-600-4	6	1-1/2	7/8	1-5/16	1-9/16
V4-700-4	7	1-1/2	7/8	1-5/16	1-9/16
V4-800-4	8	1-1/2	7/8	1-11/32	1-3/8
V4-900-4	9	1-1/2	13/16	1-11/32	2-1/16
V4-1000-4	10	1-1/2	13/16	1-11/32	2-1/16

All pulleys have set screws supplied.
Other bore sizes and keyways are available upon request.

SERIES	BORE	MATERIALS	BERG'S® NAME	BELT
4V	5/8"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 4V Series (1/2"W X 13/32"D)

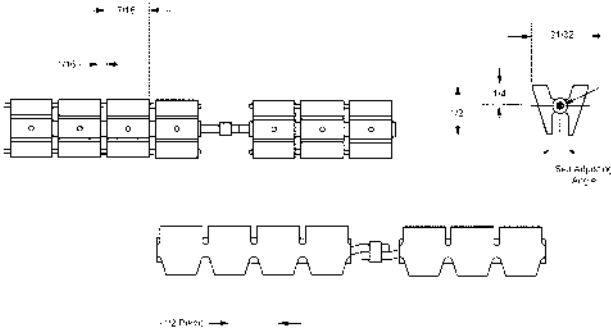


STOCK NO.	O.D. ± 5/64	W	C	L	H
V4-175-5	1-3/4	1-1/8	1/2	1	1-1/16
V4-200-5	2	1-1/8	1/2	1	1-1/8
V4-225-5	2-1/4	1-1/8	1/2	1	1-1/8
V4-250-5	2-1/2	1-1/8	1/2	1	1-1/8
V4-300-5	3	1-1/8	1/2	1-1/8	1-1/4
V4-325-5	3-1/4	1-3/16	1/2	1-1/8	1-1/4
V4-350-5	3-1/2	1-1/4	5/8	1-1/8	1-1/4
V4-400-5	4	1-1/4	5/8	1-1/8	1-1/4
V4-500-5	5	1-3/8	7/8	1-3/16	1-9/16
V4-600-5	6	1-1/2	7/8	1-5/16	1-9/16
V4-700-5	7	1-1/2	7/8	1-5/16	1-9/16
V4-800-5	8	1-1/2	7/8	1-11/32	1-3/8
V4-900-5	9	1-1/2	13/16	1-11/32	2-1/16
V4-1000-5	10	1-1/2	13/16	1-11/32	2-1/16

• Keyway Supplied 3/16" - 3/32"
All pulleys have set screws supplied.
Other bore sizes and keyways are available upon request.

V-BELTS

SERIES	WIDTH	HEIGHT	MATERIALS	BERG'S ® NAME	PULLEY
5V	21/32"	1/2"	Polyurethane (Yellow) with 5/64" Dia. Stainless Steel Cable	POW-R-VEE®	Operates with Pow-R-Vee 5V Series



- More sidewall contact
- Less slippage
- Greater power transmission
- Infinite length variations
- Extra strong
- Silent drive
- 90A Durometer
- Weight 1.1 oz./ft.
- Ultimate Tensile Strength 350 lbs.
- Temperature Range +180°F to -15°F
- Recommended Operating Load 85 lbs.
- Recommended Max. Operating Speed 376 ft./min.
- For Field Splice Kit Order 5V-7.

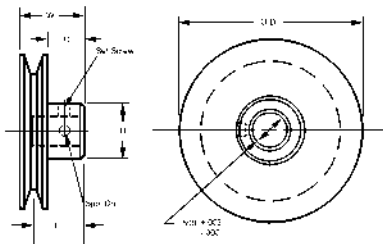


BULK FOOTAGE - NOT SPLICED	
STOCK NO.	LENGTH
5V-5FT	5 FT
5V-10FT	10 FT
5V-25FT	25 FT
5V-50FT	50 FT
5V-100FT	100 FT

STOCK NO.	LENGTH (Ref.)
5V-15	7.50
5V-16	8.00
5V-17	8.50
5V-18	9.00
5V-19	9.50
5V-20	10.00
5V-21	10.50
5V-22	11.00
5V-23	11.50
5V-24	12.00
5V-25	12.50
5V-26	13.00
5V-27	13.50
5V-28	14.00
5V-29	14.50
5V-30	15.00
5V-31	15.50
5V-32	16.00
5V-33	16.50
5V-34	17.00
5V-35	17.50
5V-36	18.00
5V-37	18.50
5V-38	19.00
5V-39	19.50
5V-40	20.00
5V-41	20.50
5V-42	21.00
5V-43	21.50
5V-44	22.00
5V-45	22.50
5V-46	23.00
5V-47	23.50
5V-48	24.00
5V-49	24.50
5V-50	25.00
5V-51	25.50
5V-52	26.00
5V-53	26.50
5V-54	27.00
5V-55	27.50
5V-56	28.00
5V-57	28.50
5V-58	29.00
5V-59	29.50
5V-60	30.00
5V-61	30.50
5V-62	31.00
5V-63	31.50
5V-64	32.00
5V-65	32.50
5V-66	33.00
5V-67	33.50
5V-68	34.00
5V-69	34.50
5V-70	35.00
5V-72	36.00
5V-74	37.00
5V-76	38.00
5V-78	39.00
5V-80	40.00
5V-82	41.00
5V-84	42.00
5V-86	43.00
5V-88	44.00
5V-90	45.00
5V-92	46.00
5V-96	48.00

V-BELT PULLEYS

SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
5V	1/2"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 5V Series (21/32"W X 1/2"D)

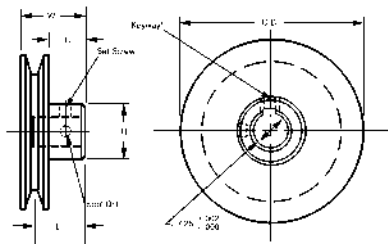


STOCK NO.	O.D. ± 5/64	W	C	L	H
V5-200-4	2	1-1/4	1/2	1-1/8	1-1/8
V5-225-4	2-1/4	1-1/4	3/8	1	1-1/8
V5-250-4	2-1/2	1-1/4	3/8	1	1-1/4
V5-275-4	2-3/4	1-1/4	1/2	1	1-1/4
V5-300-4	3	1-7/16	5/8	1-1/8	1-1/4
V5-325-4	3-1/4	1-1/4	1/2	1-1/8	1-1/4
V5-350-4	3-1/2	1-3/8	5/8	1-1/8	1-1/4
V5-400-4	4	1-3/8	5/8	1-1/8	1-5/16
V5-450-4	4-1/2	1-3/8	5/8	1-1/8	1-5/16
V5-500-4	5	1-9/16	3/4	1-5/16	1-3/8
V5-600-4	6	1-5/8	3/4	1-3/8	2-1/16

All pulleys have set screws supplied.

Other bore sizes and keyways are available upon request.

SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
5V	5/8"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 5V Series (21/32"W X 1/2"D)



STOCK NO.	O.D. ± 5/64	W	C	L	H
V5-200-5	2	1-1/4	1/2	1-1/8	1-1/8
V5-225-5	2-1/4	1-1/4	3/8	1	1-1/8
V5-250-5	2-1/2	1-1/4	3/8	1	1-1/4
V5-275-5	2-3/4	1-1/4	1/2	1	1-1/4
V5-300-5	3	1-7/16	5/8	1-1/8	1-1/4
V5-325-5	3-1/4	1-1/4	1/2	1-1/8	1-1/4
V5-350-5	3-1/2	1-3/8	5/8	1-1/8	1-1/4
V5-500-5	4	1-3/8	5/8	1-1/8	1-5/16
V5-550-5	4-1/2	1-3/8	5/8	1-1/8	1-5/16
V5-500-5	5	1-9/16	3/4	1-5/16	1-3/8
V5-600-5	6	1-5/8	3/4	1-3/8	2-1/16

*5/8" Bore Pulleys have a 3/16 x 3/32 keyway.

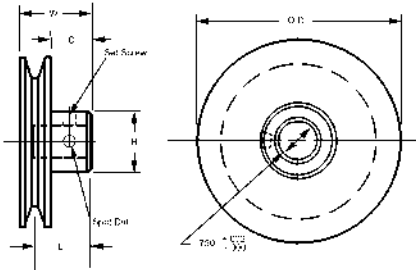
All pulleys have set screws supplied.

Other bore sizes and keyways are available upon request.



V-BELT PULLEYS

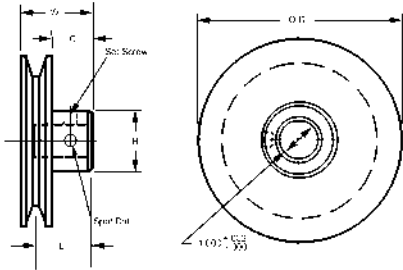
SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
5V	3/4"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 5V Series (21/32"W X 1/2"D)



STOCK NO.	O.D. ± 5/64	W	C	L	H
V5-225-6	2-1/4	1-1/4	3/8	1	1-1/8
V5-250-6	2-1/2	1-1/4	3/8	1	1-1/4
V5-275-6	2-3/4	1-1/4	1/2	1	1-1/4
V5-300-6	3	1-7/16	5/8	1-1/8	1-1/4
V5-325-6	3-1/4	1-1/4	1/2	1-1/8	1-1/4
V5-350-6	3-1/2	1-3/8	5/8	1-1/8	1-1/4
V5-400-6	4	1-3/8	5/8	1-1/8	1-5/16
V5-650-6	4-1/2	1-3/8	5/8	1-1/8	1-5/16
V5-500-6	5	1-9/16	3/4	1-5/16	1-3/8
V5-600-6	6	1-5/8	3/4	1-3/8	2-1/16

* 3/4" Bore Pulleys have a 3/16 x 3/32 keyway.
 All pulleys have set screws supplied.
 Other bore sizes and keyways are available upon request.

SERIES	BORE	MATERIALS	BERG'S ® NAME	BELT
5V	1"	Die Cast Zinc Alloy	Pow-R-Vee®	Operates with Pow-R-Vee 5V Series (21/32"W X 1/2"D)



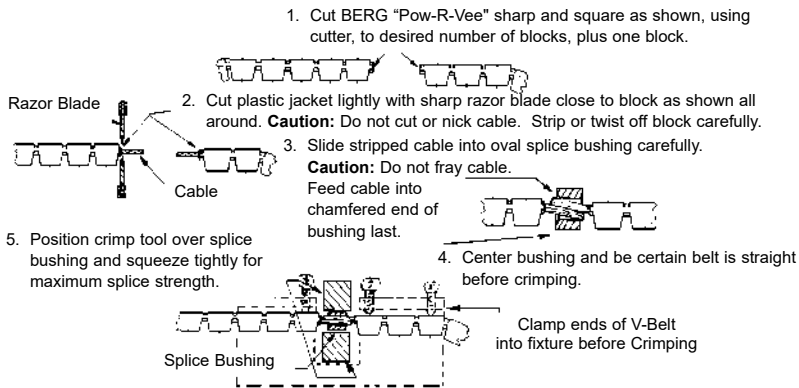
STOCK NO.	O.D. ± 5/64	W	C	L	H
V5-500-8	5	1-9/16	3/4	1-5/16	1-3/8
V5-600-8	6	1-5/8	3/4	1-3/8	2-1/16

*1" Bore Pulleys have a 1/4 X 1/8 keyway.
 All pulleys have set screws supplied.
 Other bore sizes and keyways are available upon request.



FIELD SPLICE KITS

Splicing Procedures:

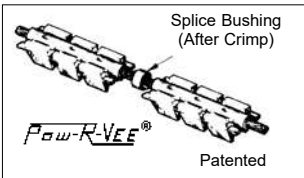


Cable Cutter

BELT SERIES	STOCK NUMBER	FIELD SPLICE KIT AND ACCESSORIES
2V 3V 4V 5V	2V-7 3V-7 4V-7 5V-7	Complete Kit Consists of: Crimp Tool, Crimp Fixture, Sample Belt Cable Cutter, Bushings, Razor Blades & Instructions
	TL-3 TL-3 TL-6	Crimp Tool for 2V Crimp Tool for 3V Crimp Tool for 4V AND 5V
	BU-032-S BU-046-S BU-062-C BU-078-S	Extra Splice Bushings for: 2V (1/32" Dia. Cable) 3V (3/64" Dia. Cable) 4V (1/16" Dia. Cable) 5V (5/64" Dia. Cable)
	TL-1 TL-2	Cable Cutter for up to 3/64" Cable Cable Cutter for up to 5/64" Cable



Crimp Tool



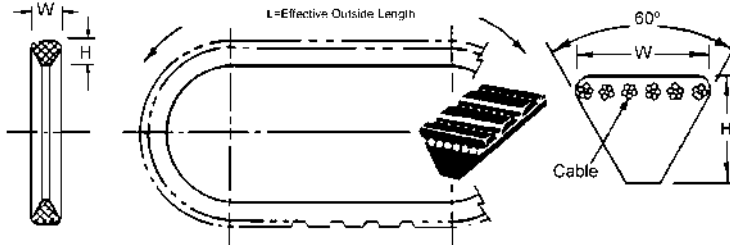
Field Splices offer only 50% of Catalog Rated Loads

W. M. Berg, Inc. will factory splice to order any length belt at a nominal charge.



60° V-BELTS

SERIES	WIDTH	HEIGHT	MATERIALS	BERG'S® NAME	PULLEY
V3M	1/8"	3/32"	Polyurethane (Black)	V-Flex	Operates with V3M Series



STOCK NO.	L (CIR.)
V3M180	7.09
V3M185	7.28
V3M190	7.48
V3M195	7.68
V3M200	7.87
V3M206	8.11
V3M212	8.35
V3M218	8.58
V3M224	8.82
V3M230	9.06
V3M243	9.57
V3M250	9.84
V3M265	10.43
V3M280	11.02
V3M300	11.81
V3M315	12.40
V3M325	12.80
V3M345	13.58
V3M365	14.37
V3M400	15.75
V3M425	16.73
V3M450	17.72
V3M475	18.70
V3M500	19.69
V3M530	20.87
V3M560	22.05
V3M600	23.62
V3M650	23.59
V3M710	27.95
V3M750	29.53

RPM Of Faster Shaft	Horsepower Ratings for 5000-10,000 Hours Service Life Range											
	V3M Small Sheave Diameter											
	.67	.71	.75	.79	.83	.88	.93	.98	1.04	1.10	1.17	1.24
200	.016	.019	.022	.024	.027	.031	.035	.039	.043	.048	.056	.059
400	.028	.033	.038	.044	.049	.056	.063	.070	.079	.088	.098	.11
600	.039	.046	.053	.061	.068	.078	.088	.099	.11	.12	.14	.15
800	.048	.057	.067	.076	.086	.099	.11	.13	.14	.16	.18	.20
1000	.057	.068	.079	.091	.10	.12	.13	.15	.17	.19	.21	.23
2000	-	.11	.13	.15	.17	.20	.23	.26	.29	.33	.37	.41
3000	-	-	.17	.20	.23	.27	.31	.35	.39	.44	.50	.55
4000	-	-	-	.23	.27	.32	.37	.42	.48	.54	.61	.68
5000	-	-	-	-	.31	.37	.42	.48	.55	.62	.70	.79

SERVICE FACTORS

Typical Units	Service Factor
Office Machines	1.2
Machine Tools	1.4
Woodworking Machines	1.5
Washing Machine Tumblers & Agitators	1.3
Dry Cleaning Tumblers	1.3
Clothes Dryer Tumblers	1.3
Ironers	1.0
Fans	1.0
Pumps:	
Centrifugal	1.1
Gear	1.3
Reciprocating	1.5
Compressors:	
Reciprocating	1.5
Rotary	1.3
Generators:	
Smooth Load	1.3
Welders	1.5
Lawn Mowers	1.5
Snow Blowers	1.5

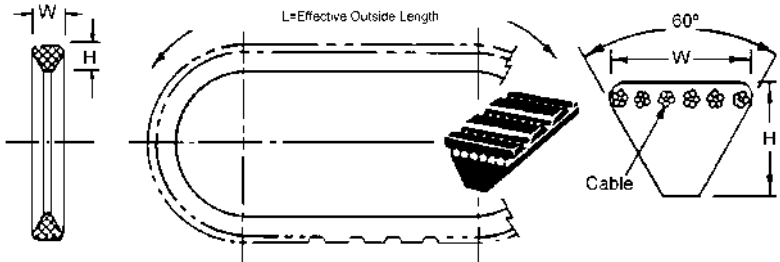
- Superior Horsepower Life on smaller Diameter Sheaves
- More Compact Drives
- Smoother Running
- Last three digits in the Stock No. represent length in Millimeter



Design Horsepower = (Service Factor) x (Horsepower Requirement)

60° V-BELTS

SERIES	WIDTH	HEIGHT	MATERIALS	BERG'S ® NAME	PULLEY
V5M	3/16"	1/8"	Polyurethane (Black)	V-Flex	Operates with V5M Series



STOCK NO.	L (CIR.)
V5M280	11.02
V5M290	11.42
V5M300	11.81
V5M307	12.09
V5M315	12.40
V5M325	12.80
V5M335	13.19
V5M345	13.58
V5M375	14.76
V5M400	15.75
V5M425	16.73
V5M450	17.72
V5M475	18.70
V5M500	19.69
V5M530	20.87
V5M560	22.05
V5M580	22.83
V5M600	23.62
V5M650	23.59
V5M690	27.17
V5M750	29.53
V5M800	31.50
V5M850	33.46
V5M900	35.43
V5M950	37.40
V5M1000	39.37
V5M1060	41.73
V5M1250	49.21
V5M1400	55.12
V5M1500	59.06

RPM Of Faster Shaft	Horsepower Ratings for 5000-10,000 Hours Service Life Range											
	V5M Small Sheave Diameter											
	.04	1.10	1.17	1.24	1.32	1.40	1.48	1.57	1.67	1.77	1.87	1.97
200	.053	.061	.071	.081	.092	.10	.12	.13	.15	.16	.18	.20
400	.007	.11	.13	.14	.17	.19	.22	.24	.27	.30	.33	.36
600	.15	.16	.18	.21	.24	.27	.31	.34	.39	.43	.47	.52
800	.17	.20	.23	.27	.31	.35	.39	.44	.50	.55	.61	.66
1000	.20	.24	.28	.32	.37	.42	.47	.53	.60	.67	.74	.80
2000	.35	.41	.48	.56	.65	.74	.83	.94	1.06	1.18	1.30	1.42
3000	.46	.55	.65	.76	.88	1.01	1.14	1.28	1.45	1.61	1.78	1.95
4000	-	.66	.80	.93	1.08	1.24	1.40	1.59	1.79	2.00	2.22	2.43
5000	-	-	.92	1.08	1.26	1.45	1.64	1.86	2.11	2.36	2.61	2.87

SERVICE FACTORS

Typical Units	Service Factor
Office Machines	1.2
Machine Tools	1.4
Woodworking Machines	1.5
Washing Machine Tumblers & Agitators	1.3
Dry Cleaning Tumblers	1.3
Clothes Dryer Tumblers	1.3
Ironers	1.0
Fans	1.0
Pumps:	
Centrifugal	1.1
Gear	1.3
Reciprocating	1.5
Compressors:	
Reciprocating	1.5
Rotary	1.3
Generators:	
Smooth Load	1.3
Welders	1.5
Lawn Mowers	1.5
Snow Blowers	1.5

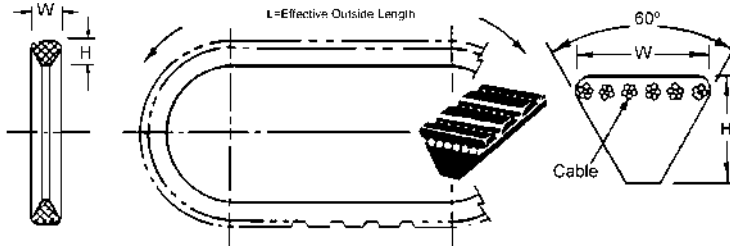
- Superior Horsepower Life on smaller Diameter Sheaves
- More Compact Drives
- Smoother Running
- Last three digits in the Stock No. represent length in Millimeter



Design Horsepower = (Service Factor) x (Horsepower Requirement)

60° V-BELTS

SERIES	WIDTH	HEIGHT	MATERIALS	BERG'S® NAME	PULLEY
V7M	5/16"	7/32"	Polyurethane (Black)	V-Flex	Operates with V7M Series



STOCK NO.	L (CIR.)
V7M500	19.69
V7M515	20.28
V7M530	20.87
V7M545	21.46
V7M560	22.05
V7M580	22.83
V7M600	23.62
V7M615	24.21
V7M650	23.59
V7M690	27.17
V7M710	27.95
V7M750	29.53
V7M800	31.50
V7M850	33.46
V7M900	35.43
V7M950	37.40
V7M1000	39.37
V7M1060	41.73
V7M1120	44.09
V7M1180	46.46
V7M1250	49.21
V7M1320	51.97
V7M1400	55.12
V7M1500	59.06
V7M1600	62.99
V7M1700	66.93
V7M1800	70.87
V7M1900	74.80
V7M2000	78.74
V7M2120	83.46
V7M2300	90.55

RPM Of Faster Shaft	Horsepower Ratings for 5000-10,000 Hours Service Life Range											
	V7M Small Sheave Diameter											
	1.67	1.77	1.87	1.97	2.08	2.20	2.34	2.48	2.64	2.80	2.95	3.15
200	.16	.19	.21	.24	.27	.30	.34	.38	.42	.47	.51	.57
400	.30	.34	.39	.44	.49	.55	.63	.70	.78	.87	.95	1.05
600	.42	.49	.56	.62	.70	.79	.89	1.00	1.12	1.24	1.35	1.50
800	.54	.62	.71	.80	.90	1.01	1.14	1.27	1.43	1.59	1.73	1.93
1000	.64	.75	.85	.96	1.08	1.22	1.38	1.54	1.73	1.91	2.09	2.33
2000	1.10	1.29	1.48	1.68	1.89	22.13	2.42	2.71	3.04	3.37	3.69	4.11
3000	1.47	1.73	2.00	2.27	2.57	2.91	3.30	3.71	4.17	4.64	5.08	5.67
4000	1.78	2.11	2.44	2.79	3.17	3.59	4.10	4.61	5.20	5.79	6.36	7.11
5000	2.03	2.43	2.83	3.24	3.70	4.21	4.82	5.43	6.14	6.86	7.53	8.43

SERVICE FACTORS

Typical Units	Service Factor
Office Machines	1.2
Machine Tools	1.4
Woodworking Machines	1.5
Washing Machine Tumblers & Agitators	1.3
Dry Cleaning Tumblers	1.3
Clothes Dryer Tumblers	1.3
Ironers	1.0
Fans	1.0
Pumps:	
Centrifugal	1.1
Gear	1.3
Reciprocating	1.5
Compressors:	
Reciprocating	1.5
Rotary	1.3
Generators:	
Smooth Load	1.3
Welders	1.5
Lawn Mowers	1.5
Snow Blowers	1.5

- Superior Horsepower Life on smaller Diameter Sheaves
- More Compact Drives
- Smoother Running
- Last three digits in the Stock No. represent length in Millimeter



Design Horsepower = (Service Factor) x (Horsepower Requirement)

60° V-BELT PULLEYS

BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
1/8"	PIN HUB SINGLE GROOVE	303 Stainless Steel	V-Flex	Operates with V3M Series

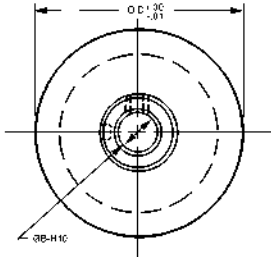
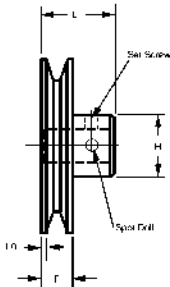
STOCK NO.	B	O.D.	F	H	L
V3M14S-1	(1/8) .1248	.67	3/16	5/16	3/8
V3M14S-2		.75			
V3M14S-3		.83			
V3M14S-4		.93			
V3M14S-5		1.04			
V3M14S-6		1.17			
V3M14S-7		1.24			

BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
3/16"	PIN HUB SINGLE GROOVE	303 Stainless Steel	V-Flex	Operates with V3M Series

STOCK NO.	B	O.D.	F	H	L
V3M21S-1	(3/16) .1873	.67	3/16	3/8	13/32
V3M21S-2		.75			
V3M21S-3		.83			
V3M21S-4		.93			
V3M21S-5		1.04			
V3M21S-6		1.17			
V3M21S-7		1.24			

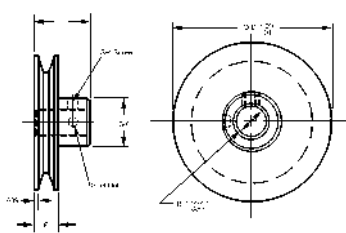
BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
1/4"	PIN HUB SINGLE GROOVE	303 Stainless Steel	V-Flex	Operates with V3M Series

STOCK NO.	B	O.D.	F	H	L
V3M28S-1	(1/4) .2498	.67	3/16	1/2	7/16
V3M28S-2		.75			
V3M28S-3		.79			
V3M28S-4		.88			
V3M28S-5		.93			
V3M28S-6		.98			
V3M28S-7		1.04			
V3M28S-8		1.10			
V3M28S-9		1.17			
V3M28S-10		1.24			
V3M28S-11		1.57			
V3M28S-12		1.97			
V3M28S-13		2.48			
V3M28S-14		3.15			
V3M28S-15		3.94			



60° V-BELT PULLEYS

BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
5/16"	PIN HUB SINGLE GROOVE	303 Stainless Steel	V-Flex	Operates with V5M Series

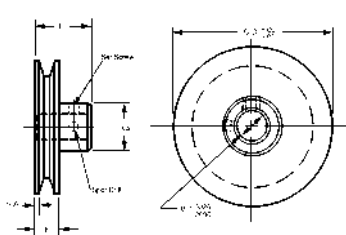


STOCK NO.	B	H	O.D.	F	L
V5M33S-1	.3123 (5/16)	3/4	1.04	1/4	5/8
V5M33S-2			1.10		
V5M33S-3			1.17		
V5M33S-4			1.24		
V5M33S-5			1.32		
V5M33S-6			1.40		
V5M33S-7			1.48		
V5M33S-8			1.57		
V5M33S-9			1.67		
V5M33S-10			1.77		
V5M33S-11			1.87		
V5M33S-12			1.97		
V5M33S-13			2.48		
V5M33S-14			3.15		
V5M33S-15			3.94		



Special sizes are available upon request.

BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
3/8"	PIN HUB SINGLE GROOVE	303 Stainless Steel	V-Flex	Operates with V5M Series



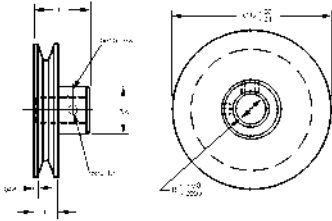
STOCK NO.	B	H	O.D.	F	L
V5M47S-1	.3748 (3/8)	3/4	1.04	1/4	5/8
V5M47S-2			1.10		
V5M47S-3			1.17		
V5M47S-4			1.24		
V5M47S-5			1.32		
V5M47S-6			1.40		
V5M47S-7			1.48		
V5M47S-8			1.57		
V5M47S-9			1.67		
V5M47S-10			1.77		
V5M47S-11			1.87		
V5M47S-12			1.97		
V5M47S-13			2.48		
V5M47S-14			3.15		
V5M47S-15			3.94		



Special sizes are available upon request.

60° V-BELT PULLEYS

BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
3/8"	PIN HUB SINGLE GROOVE	303 Stainless Steel	V-Flex	Operates with V7M Series

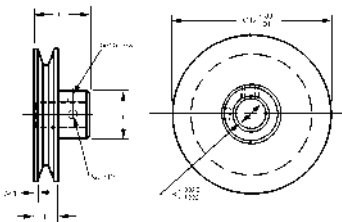


STOCK NO.	B	H	O.D.	F	L
V7M35S-1	.3748 (3/8)	3/4	1.67	3/8	7/8
V7M35S-2			1.77		
V7M35S-3			1.87		
V7M35S-4			1.97		
V7M35S-5			2.08		
V7M35S-6			2.20		
V7M35S-7			2.34		
V7M35S-8			2.48		
V7M35S-9			2.64		
V7M35S-10			2.80		
V7M35S-11			2.95		
V7M35S-12			3.15		
V7M35S-13			3.35		
V7M35S-14			3.64		
V7M35S-15			3.94		



Special sizes are available upon request.

BORE	STYLE	MATERIALS	BERG'S ® NAME	BELT
1/2"	PIN HUB SINGLE GROOVE	303 Stainless Steel	V-Flex	Operates with V7M Series



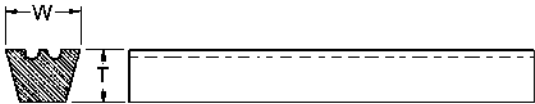
STOCK NO.	B	H	O.D.	F	L
V7M37S-1	.4998 (1/2)	1	1.67	3/8	7/8
V7M37S-2			1.77		
V7M37S-3			1.87		
V7M37S-4			1.97		
V7M37S-5			2.08		
V7M37S-6			2.20		
V7M37S-7			2.34		
V7M37S-8			2.48		
V7M37S-9			2.64		
V7M37S-10			2.80		
V7M37S-11			2.95		
V7M37S-12			3.15		
V7M37S-13			3.35		
V7M37S-14			3.64		
V7M37S-15			3.94		



Special sizes are available upon request.

60° V-BELT CORDS

TYPE	MATERIALS	TEMPERATURE RANGE
Heat Spliceable	Extruded Polyurethane 83A	-40° to +180°

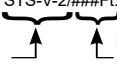


STOCK NO.	STANDARD BELT SIZE	W	T	USE WITH PULLEY SERIES
STS-V-1/FT	3L	3/8	7/32	V3-
STS-V-2/FT	A	1/2	5/16	V4-
STS-V-3/FT	B	21/32	13/32	V5-
STS-V-4/FT	C	7/8	17/32	-

• Coreless
• Ideal for odd sizes
Splice to suit. Order Berg heat splice tool Berg P/N STS-U-5.
For a nominal charge, we will splice belting to your specific requirements.
Sold in 5, 10, 25 and 50 foot reels.

NOTE: To order specific number and footage see below.

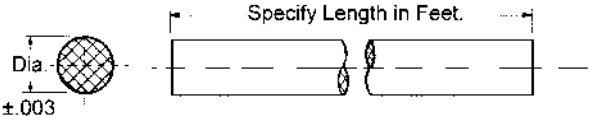
Example: STS-V-2/###Ft.

Stock No. 

Be certain to indicate footage after / (slash) when ordering.

O-RING CORDS

TYPE	MATERIALS	TEMPERATURE RANGE
Heat Spliceable	Extruded Polyurethane 83A	-40° to +180°



STOCK NO.	DIAMETER (ACTUAL)	FRACTIONAL SIZE
STS-C-1/FT	.062	1/16
STS-C-2/FT	.070	1/16
STS-C-3/FT	.103	3/32
STS-C-4/FT	.125	1/8
STS-C-6/FT	.187	3/16
STS-C-7/FT	.210	3/16
STS-C-9/FT	.250	1/4
STS-C-11/FT	.312	5/16
STS-C-12/FT	.375	3/8

Heat seal within temperatures from 525°F to 575°F.
 Splices into endless belts with Berg's heat splice tool Berg P/N STS-U-5
 Special O-Rings spliced at a nominal charge.

NOTE: To order specific number and footage see below.

Example: STS-C-2/###Ft.

Stock No.

↑

↑

Be certain to indicate footage after / (slash) when ordering.

O-RING BELTS

70A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE
3/64" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°

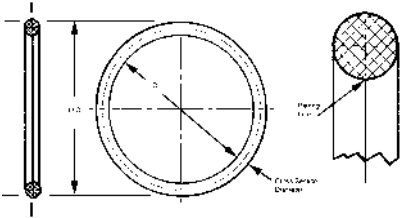
- Low break-away friction
- No extrusion
- Higher temperature resistance
- No back up rings required
- Low permanent set
- No cold flow
- No special tool required
- STS-70 series stretch is 15% of belt length for proper tension.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-70-101	3/64	1/32	7/64	.040	.029	±.004
STS-70-102		3/64	9/64	.050 ±.003	.042	

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
1/16" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG1 Series.

- Low break-away friction
- No extrusion
- Higher temperature resistance
- No back up rings required
- Low permanent set
- No cold flow
- No special tool required
- STS-70 series stretch is 15% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-70-203	1/16	1/16	11/64	.060 ±.003	.056	±.004
STS-70-204	1/16	5/64	7/32	.070 ±.003	.070	±.005
STS-70-205		3/32	15/64		.101	
STS-70-207		5/32	9/32		.145	
STS-70-208		3/16	5/16		.176	
STS-70-209		7/32	11/32		.208	
STS-70-210		1/4	3/8		.239	
STS-70-211		5/16	7/16		.301	
STS-70-212		3/8	1/2		.364	
STS-70-213		7/16	9/16		.426	
STS-70-214		1/2	5/8		.489	
STS-70-215		9/16	11/16		.551	
STS-70-216		5/8	3/4		.614	
STS-70-217		11/16	13/16		.676	
STS-70-218		3/4	7/8		.739	
STS-70-219	1/16	13/16	15/16	.070 ±.003	.801	±.006
STS-70-220		7/8	1		.864	
STS-70-221		15/16	1-1/16		.962	
STS-90-222		1	1-1/8		.989	
STS-70-224		1-1/8	1-1/4		1.114	
STS-70-225		1-3/16	1-5/16		1.176	
STS-70-226		1-1/4	1-3/8		1.239	
STS-70-228		1-3/8	1-1/2		1.364	
STS-70-229	1/16	1-1/2	1-5/8	.070 ±.003	1.489	±.010
STS-70-230		1-5/8	1-3/4		1.614	
STS-70-231		1-3/4	1-7/8		1.739	
STS-70-233		2	2-1/8		1.989	
STS-70-234		2-1/8	2-1/4		2.114	
STS-70-235		2-1/4	2-3/8		2.239	
STS-70-236		2-3/8	2-1/2		2.364	
STS-70-237		2-1/2	2-5/8		2.489	
STS-70-238		2-5/8	2-3/4		2.614	
STS-70-239		2-3/4	2-7/8		2.739	
STS-70-240		2-7/8	3		2.864	
STS-70-241		3	3-1/8		2.989	
STS-70-242	1/16	3-1/4	3-3/8	.070 ±.003	3.239	±.015
STS-70-243		3-1/2	3-5/8		3.489	
STS-70-244		3-3/4	3-7/8		3.739	
STS-70-245		4	4-1/8		3.989	



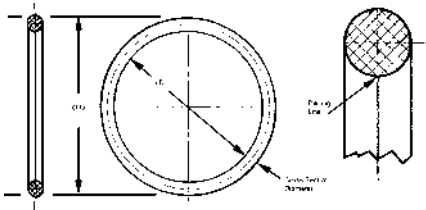
O-RING BELTS

70A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
3/32" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG2 Series.

- Low break-away friction
 - No extrusion
 - Higher temperature resistance
 - No back up rings required
 - Low permanent set
 - No cold flow
 - No special tool required
 - STS-70 series stretch is 15% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-70-310	3/32	3/8	9/16	.103 ±.003	.362	±.005
STS-70-311		7/16	5/8		.424	
STS-70-312		1/2	11/16		.487	
STS-70-313	3/32	9/16	3/4	.103 ±.003	.549	±.006
STS-70-315		11/16	7/8		.674	
STS-70-317		13/16	1		.799	
STS-70-318		7/8	1-1/16		.862	
STS-70-319		15/16	1-1/8		.924	
STS-70-321		1-1/16	1-1/4		1.049	
STS-70-322		1-1/8	1-5/16		1.112	
STS-70-323		1-3/16	1-3/8		1.174	
STS-70-324		1-1/4	1-7/16		1.237	
STS-70-325		1-5/16	1-1/2		1.299	
STS-70-326		1-3/8	1-9/16		1.362	
STS-70-328		1-1/2	1-11/16		1.487	
STS-70-329	3/32	1-9/16	1-3/4	.103 ±.003	1.549	±.010
STS-70-330		1-5/8	1-13/16		1.612	
STS-70-332		1-3/4	1-15/16		1.737	
STS-70-334		1-7/8	2-1/16		1.862	
STS-70-340		2-1/4	2-7/16		2.237	
STS-70-341		2-5/16	2-1/2		2.300	
STS-70-344		2-1/2	2-11/16		2.487	
STS-70-346		2-5/8	2-13/16		2.612	
STS-70-347		2-11/16	2-7/8		2.675	
STS-70-348	3/32	2-3/4	2-15/16	.103 ±.003	2.737	±.015
STS-70-349		2-13/16	3		2.800	
STS-70-350		2-7/8	3-1/16		2.862	
STS-70-351		3	3-3/16		2.987	
STS-70-352		3-1/4	3-7/16		3.237	
STS-70-353		3-1/2	3-11/16		3.487	
STS-70-354		3-3/4	3-15/16		3.737	
STS-70-355		4	4-3/16		3.987	
STS-70-356		4-1/4	4-7/16		4.237	
STS-70-357		4-1/2	4-11/16		4.487	
STS-70-358		4-3/4	4-15/16		4.737	
STS-70-359		5	5-3/16		4.987	
STS-70-360		5-1/4	5-7/16		5.237	
STS-70-361		5-1/2	5-11/16		5.487	
STS-70-362	3/32	5-3/4	5-15/16		5.737	±.023
STS-70-363		6	6-3/16		5.987	



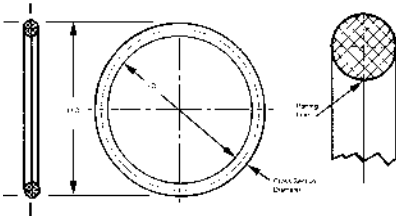
O-RING BELTS

70A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
1/8" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG3 Series.

- Low break-away friction
 - No extrusion
 - Higher temperature resistance
 - No back up rings required
 - Low permanent set
 - No cold flow
 - No special tool required
 - STS-70 series stretch is 15% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-70-410	1/8	3/4	1	.139 ±.004	.734	±.006
STS-70-411		13/16	1-1/16		.796	
STS-70-412		7/8	1-1/8		.859	
STS-70-414		1	1-1/4		.984	
STS-70-415		1-1/16	1-5/16		1.046	
STS-70-417		1-3/16	1-7/16		1.171	
STS-70-418		1-1/4	1-1/2		1.234	
STS-70-419		1-5/16	1-9/16		1.296	
STS-70-420	1/8	1-3/8	1-5/8	.139 ±.004	1.359	±.010
STS-70-421		1-7/16	1-11/16		1.421	
STS-70-422		1-1/2	1-3/4		1.484	
STS-70-423		1-5/8	1-7/8		1.609	
STS-70-424		1-3/4	2		1.737	
STS-70-425		1-7/8	2-1/8		1.859	
STS-70-426		2	2-1/4		1.984	
STS-70-427		2-1/8	2-3/8		2.109	
STS-70-428		2-1/4	2-1/2		2.234	
STS-70-429		2-3/8	2-5/8		2.359	
STS-70-430		2-1/2	2-3/4		2.484	
STS-70-431		2-5/8	2-7/8		2.609	
STS-70-432		2-3/4	3		2.734	
STS-70-433	1/8	2-7/8	3-1/8	.139 ±.004	2.859	±.015
STS-70-434		3	3-1/4		2.984	
STS-70-435		3-1/8	3-3/8		3.109	
STS-70-436		3-1/4	3-1/2		3.234	
STS-70-437		3-3/8	3-5/8		3.359	
STS-70-438		3-1/2	3-3/4		3.484	
STS-70-439		3-5/8	3-7/8		3.609	
STS-70-440		3-3/4	4		3.734	
STS-70-441		3-7/8	4-1/8		3.859	
STS-70-442	1/8	4	4-1/4	.139 ±.004	3.984	±.023
STS-70-444		4-1/4	4-1/2		4.234	
STS-70-445		4-3/8	4-5/8		4.359	
STS-70-446		4-1/2	4-3/4		4.484	
STS-70-448		4-3/4	5		4.734	
STS-70-449		4-7/8	5-1/8		4.859	
STS-70-450		5	5-1/4		4.984	
STS-70-452		5-1/4	5-1/2		5.234	
STS-70-454		5-1/2	5-3/4		5.484	
STS-70-456		5-3/4	6		5.734	
STS-70-458		6	6-1/4		5.984	
STS-70-459		6-1/4	6-1/2		6.234	
STS-70-460		6-1/2	6-3/4		6.484	
STS-70-462		7	7-1/4		6.984	
STS-70-464	1/8	7-1/2	7-3/4	.139 ±.004	7.484	±.030
STS-70-465		7-3/4	8		7.734	
STS-70-466		8	8-1/4		7.984	
STS-70-468		8-1/2	8-3/4		8.484	
STS-70-470		9	9-1/4		8.984	
STS-70-471		9-1/4	9-1/2		9.234	
STS-70-472		9-1/2	9-3/4		9.484	
STS-70-474		10	10-1/4		9.984	
STS-70-475		10-1/2	10-3/4		10.484	
STS-70-476		11	11-1/4		10.984	
STS-70-477		11-1/2	11-3/4		11.484	
STS-70-478		12	12-1/4		11.984	
STS-70-479		13	13-1/4		12.984	
STS-70-480		14	14-1/4		13.984	
STS-70-481		15	15-1/4		14.984	



O-RING BELTS

70A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
3/16" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG4 Series.

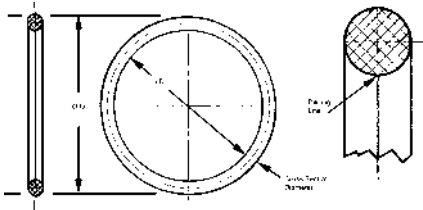
- Low break-away friction
 - No extrusion
 - Higher temperature resistance
 - No back up rings required
 - Low permanent set
 - No cold flow
 - No special tool required
 - STS-70 series stretch is 15% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-70-525	3/16	1-1/2	1-7/8	.210 ±.005	1.475	±.010
STS-70-526		1-5/8	2		1.600	
STS-70-527		1-3/4	2-1/8		1.725	
STS-70-529		2	2-3/8		1.975	
STS-70-530		2-1/8	2-1/2		2.100	
STS-70-531		2-1/4	2-5/8		2.225	
STS-70-532		2-3/8	2-3/4		2.350	
STS-70-533		2-1/2	2-7/8		2.475	
STS-70-534	3/16	2-5/8	3	.210 ±.005	2.600	±.015
STS-70-535		2-3/4	3-1/8		2.750	
STS-70-537		3	3-3/8		2.975	
STS-70-539		3-1/4	3-5/8		3.225	
STS-70-541		3-1/2	3-7/8		3.475	
STS-70-542		3-5/8	4		3.600	
STS-70-543		3-3/4	4-1/8		3.725	
STS-70-545		4	4-3/8		3.975	
STS-70-547		4-1/4	4-5/8		4.225	
STS-70-549		4-1/2	4-7/8		4.475	

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
1/4" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG5 Series.

- Low break-away friction
 - No extrusion
 - Higher temperature resistance
 - No back up rings required
 - Low permanent set
 - No cold flow
 - No special tool required
 - STS-70 series stretch is 15% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-70-627	1/4	4-3/4	5-1/4	.275±.006	4.725	±.015
STS-70-631	1/4	5-1/4	5-3/4	.275 ±.006	5.225	±.023
STS-70-635		5-3/4	6-1/4		5.725	
STS-70-637		6	6-1/2		5.975	
STS-70-639		6-1/2	7		6.475	
STS-70-641	1/4	7	7-1/2	.275 ±.006	6.975	±.030
STS-70-645		8	8-1/2		7.975	
STS-70-646		8-1/2	9		8.475	
STS-70-647		9	9-1/2		8.975	
STS-70-648		9-1/2	10		9.475	
STS-70-649		10	10-1/2		9.975	
STS-70-650		10-1/2	11		10.475	
STS-70-653		12	12-1/2		11.975	
STS-70-655		13	13-1/2		12.975	
STS-70-657		14	14-1/2		13.975	
STS-70-659		15	15-1/2		14.975	



O-RING BELTS

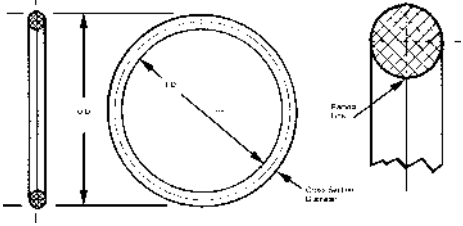
70A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
1/8" (Cross Section)	NEOPRENE RUBBER 70A DUROMETER STRETCH BELTS	-40° to +250°	Operates with Grooved Pulley PG3 Series.

- Low break-away friction
- No extrusion
- Higher temperature resistance
- No back up rings required
- Low permanent set
- No cold flow
- No special tool required
- STS-70 series stretch is 15% of belt length for proper tension.

NOTE:
Ultimate Tensile Strength 2100 PSI
Minimum Pulley Dia. should be 4 x Belt Dia.

STOCK NO.	INSIDE CIRCUMFERENCE
PP6-1	15.70
PP6-11	17.27
PP6-2	18.84
PP6-12	20.42
PP6-3	21.99
PP6-13	23.56
PP6-4	25.15
PP6-14	26.70
PP6-5	28.27
PP6-15	29.84
PP6-6	31.41
PP6-16	32.98
PP6-17	34.55
PP6-18	37.69
PP6-19	40.84



O-RING BELTS

90A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
3/64" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG1 Series.

- Low break-away friction
- No extrusion
- Higher temperature resistance
- No back up rings required
- Low permanent set
- No cold flow
- No special tool required
- STS-90 series stretch is 7% of belt length for proper tension.

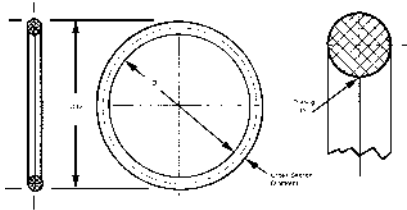
STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-90-101 STS-90-102	3/64	1/32 3/64	7/64 9/64	.040 .050 ±.003	.029 .042	±.004

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
1/16" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG1 Series.

- Low break-away friction
- No extrusion
- Higher temperature resistance
- No back up rings required
- Low permanent set
- No cold flow
- No special tool required
- STS-90 series stretch is 7% of belt length for proper tension.

* Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-90-203	1/16	1/16	11/64	.060 ±.003	.056	±.004
STS-90-204	1/16	5/64	7/32	.070 ±.003	.070	±.005
STS-90-205		3/32	15/64		.101	
STS-90-207		5/32	9/32		.145	
STS-90-208		3/16	5/16		.176	
STS-90-209		7/32	11/32		.208	
STS-90-210		1/4	3/8		.239	
STS-90-211		5/16	7/16		.301	
STS-90-212		3/8	1/2		.364	
STS-90-213		7/16	9/16		.426	
STS-90-214		1/2	5/8		.489	
STS-90-215	1/16	9/16	11/16	.070 ±.003	.551	±.006
STS-90-216		5/8	3/4		.614	
STS-90-217		11/16	13/16		.676	
STS-90-218		3/4	7/8		.739	
STS-90-219		13/16	15/16		.801	
STS-90-220		7/8	1		.864	
STS-90-221		15/16	1-1/16		.962	
STS-90-222	1/16	1	1-1/8	.070 ±.003	.989	±.010
STS-90-224		1-1/8	1-1/4		1.114	
STS-90-225		1-3/16	1-5/16		1.176	
STS-90-226		1-1/4	1-3/8		1.239	
STS-90-228		1-3/8	1-1/2		1.364	
STS-90-229		1-1/2	1-5/8		1.489	
STS-90-230		1-5/8	1-3/4		1.614	
STS-90-231	1/16	1-3/4	1-7/8	.070 ±.003	1.739	±.015
STS-90-233		2	2-1/8		1.989	
STS-90-234		2-1/8	2-1/4		2.114	
STS-90-235		2-1/4	2-3/8		2.239	
STS-90-236		2-3/8	2-1/2		2.364	
STS-90-237		2-1/2	2-5/8		2.489	
STS-90-238		2-5/8	2-3/4		2.614	
STS-90-239		2-3/4	2-7/8		2.739	
STS-90-240		2-7/8	3		2.864	
STS-90-241		3	3-1/8		2.989	
STS-90-242	1/16	3-1/4	3-3/8	.070 ±.003	3.239	±.015
STS-90-243		3-1/2	3-5/8		3.489	
STS-90-244		3-3/4	3-7/8		3.739	
STS-90-245		4	4-1/8		3.989	



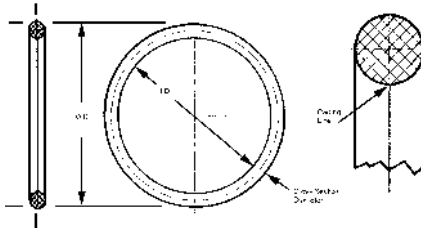
O-RING BELTS

90A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
1/8" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG2 Series.

- Low break-away friction
 - No extrusion
 - Higher temperature resistance
 - No back up rings required
 - Low permanent set
 - No cold flow
 - No special tool required
- STS-90 series stretch is 7% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-90-310	3/32	3/8	9/16	.103 ±.003	.362	±.005
STS-90-311		7/16	5/8		.424	
STS-90-312		1/2	11/16		.487	
STS-90-313	3/32	9/16	3/4	.103 ±.003	.549	±.006
STS-90-315		11/16	7/8		.674	
STS-90-317		13/16	1		.799	
STS-90-318		7/8	1-1/16		.862	
STS-90-319		15/16	1-1/8		.924	
STS-90-321		1-1/16	1-1/4		1.049	
STS-90-322		1-1/8	1-5/16		1.112	
STS-90-323		1-3/16	1-3/8		1.174	
STS-90-324		1-1/4	1-7/16		1.237	
STS-90-325		1-5/16	1-1/2		1.299	
STS-90-326		1-3/8	1-9/16		1.362	
STS-90-328		1-1/2	1-11/16		1.487	
STS-90-329	3/32	1-9/16	1-3/4	.103 ±.003	1.549	±.010
STS-90-330		1-5/8	1-13/16		1.612	
STS-90-332		1-3/4	1-15/16		1.737	
STS-90-334		1-7/8	2-1/16		1.862	
STS-90-340		2-1/4	2-7/16		2.237	
STS-90-341		2-5/16	2-1/2		2.300	
STS-90-344		2-1/2	2-11/16		2.487	
STS-90-346		2-5/8	2-13/16		2.612	
STS-90-347		2-11/16	2-7/8		2.675	
STS-90-348	3/32	2-3/4	2-15/16	.103 ±.003	2.737	±.015
STS-90-349		2-13/16	3		2.800	
STS-90-350		2-7/8	3-1/16		2.862	
STS-90-351		3	3-3/16		2.987	
STS-90-352		3-1/4	3-7/16		3.237	
STS-90-353		3-1/2	3-11/16		3.487	
STS-90-354		3-3/4	3-15/16		3.737	
STS-90-355		4	4-3/16		3.987	
STS-90-356		4-1/4	4-7/16		4.237	
STS-90-357		4-1/2	4-11/16		4.487	
STS-90-358		4-3/4	4-15/16		4.737	
STS-90-359		5	5-3/16		4.987	
STS-90-360		5-1/4	5-7/16		5.237	
STS-90-361		5-1/2	5-11/16		5.487	
STS-90-362	3/32	5-3/4	5-15/16		5.737	±.023
STS-90-363		6	6-3/16		5.987	



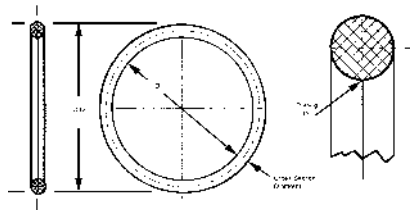
O-RING BELTS

90A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
1/8" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG3 Series.

- Low break-away friction
- No extrusion
- Higher temperature resistance
- No back up rings required
- Low permanent set
- No cold flow
- No special tool required
- STS-90 series stretch is 7% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-90-410	1/8	3/4	1	.139 ±.004	.734	±.006
STS-90-411		13/16	1-1/16		.796	
STS-90-412		7/8	1-1/8		.859	
STS-90-414		1	1-1/4		.984	
STS-90-415		1-1/16	1-5/16		1.046	
STS-90-417		1-3/16	1-7/16		1.171	
STS-90-418		1-1/4	1-1/2		1.234	
STS-90-419		1-5/16	1-9/16		1.296	
STS-90-420	1/8	1-3/8	1-5/8	.139 ±.004	1.359	±.010
STS-90-421		1-7/16	1-11/16		1.421	
STS-90-422		1-1/2	1-3/4		1.484	
STS-90-423		1-5/8	1-7/8		1.609	
STS-90-424		1-3/4	2		1.737	
STS-90-425		1-7/8	2-1/8		1.859	
STS-90-426		2	2-1/4		1.984	
STS-90-427		2-1/8	2-3/8		2.109	
STS-90-428		2-1/4	2-1/2		2.234	
STS-90-429		2-3/8	2-5/8		2.359	
STS-90-430		2-1/2	2-3/4		2.484	
STS-90-431		2-5/8	2-7/8		2.609	
STS-90-432		2-3/4	3		2.734	
STS-90-433	1/8	2-7/8	3-1/8	.139 ±.004	2.859	±.015
STS-90-434		3	3-1/4		2.984	
STS-90-435		3-1/8	3-3/8		3.109	
STS-90-436		3-1/4	3-1/2		3.234	
STS-90-437		3-3/8	3-5/8		3.359	
STS-90-438		3-1/2	3-3/4		3.484	
STS-90-439		3-5/8	3-7/8		3.609	
STS-90-440		3-3/4	4		3.734	
STS-90-441		3-7/8	4-1/8		3.859	
STS-90-442	1/8	4	4-1/4	.139 ±.004	3.984	±.023
STS-90-444		4-1/4	4-1/2		4.234	
STS-90-445		4-3/8	4-5/8		4.359	
STS-90-446		4-1/2	4-3/4		4.484	
STS-90-448		4-3/4	5		4.734	
STS-90-449		4-7/8	5-1/8		4.859	
STS-90-450		5	5-1/4		4.984	
STS-90-452		5-1/4	5-1/2		5.234	
STS-90-454		5-1/2	5-3/4		5.484	
STS-90-456		5-3/4	6		5.734	
STS-90-458		6	6-1/4		5.984	
STS-90-459		6-1/4	6-1/2		6.234	
STS-90-460		6-1/2	6-3/4		6.484	
STS-90-462		7	7-1/4		6.984	
STS-90-464	1/8	7-1/2	7-3/4	.139 ±.004	7.484	±.030
STS-90-465		7-3/4	8		7.734	
STS-90-466		8	8-1/4		7.984	
STS-90-468		8-1/2	8-3/4		8.484	
STS-90-470		9	9-1/4		8.984	
STS-90-471		9-1/4	9-1/2		9.234	
STS-90-472		9-1/2	9-3/4		9.484	
STS-90-474		10	10-1/4		9.984	
STS-90-475		10-1/2	10-3/4		10.484	
STS-90-476		11	11-1/4		10.984	
STS-90-477		11-1/2	11-3/4		11.484	
STS-90-478		12	12-1/4		11.984	
STS-90-479		13	13-1/4		12.984	
STS-90-480		14	14-1/4		13.984	
STS-90-481		15	15-1/4		14.984	



O-RING BELTS

90A DUROMETER

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
3/16" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG4 Series.

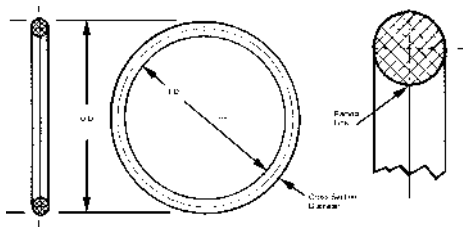
- Low break-away friction
- No extrusion
- Higher temperature resistance
- No back up rings required
- Low permanent set
- No cold flow
- No special tool required
- STS-90 series stretch is 7% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-90-525	3/16	1-1/2	1-7/8	.210 ±.005	1.475	±.010
STS-90-526		1-5/8	2		1.600	
STS-90-527		1-3/4	2-1/8		1.725	
STS-90-529		2	2-3/8		1.975	
STS-90-530		2-1/8	2-1/2		2.100	
STS-90-531		2-1/4	2-5/8		2.225	
STS-90-532		2-3/8	2-3/4		2.350	
STS-90-533		2-1/2	2-7/8		2.475	
STS-90-534	3/16	2-5/8	3	.210 ±.005	2.600	±.015
STS-90-535		2-3/4	3-1/8		2.750	
STS-90-537		3	3-3/8		2.975	
STS-90-539		3-1/4	3-5/8		3.225	
STS-90-541		3-1/2	3-7/8		3.475	
STS-90-542		3-5/8	4		3.600	
STS-90-543		3-3/4	4-1/8		3.725	
STS-90-545		4	4-3/8		3.975	
STS-90-547		4-1/4	4-5/8		4.225	
STS-90-549		4-1/2	4 7/8		4.475	

DIAMETER	MATERIALS	TEMPERATURE RANGE	PULLEY
1/4" (Cross Section)	ELASTOMER COMPOUND BUNA-N	-40° to +180°	Operates with Grooved Pulley PG5 Series.

- Low break-away friction
- No extrusion
- Higher temperature resistance
- No back up rings required
- Low permanent set
- No cold flow
- No special tool required
- STS-90 series stretch is 7% of belt length for proper tension.
- * Use in systems with variable center distance.

STOCK NO.	NOMINAL SIZES			ACTUAL SIZES		
	D	I.D.	O.D.	D	I.D.	I.D. TOL.
STS-90-627	1/4	4-3/4	5-1/4	.275 ±.006	4.725	±.015
STS-90-631	1/4	5-1/4	5-3/4	.275 ±.006	5.225	±.023
STS-90-635		5-3/4	6-1/4		5.725	
STS-90-637		6	6-1/2		5.975	
STS-90-639		6-1/2	7		6.475	
STS-90-641	1/4	7	7-1/2	.275 ±.006	6.975	±.030
STS-90-645		8	8-1/2		7.975	
STS-90-646		8-1/2	9		8.475	
STS-90-647		9	9-1/2		8.975	
STS-90-648		9-1/2	10		9.475	
STS-90-649		10	10-1/2		9.975	
STS-90-650		10-1/2	11		10.475	
STS-90-653		12	12-1/2		11.975	
STS-90-655		13	13-1/2		12.975	
STS-90-657		14	14-1/2		13.975	



FIELD SPLICE KITS

Rounds

1/8"-3/16"-1/4"-5/16"-3/8"-1/2"-9/16" Dia's.



V-Belts

#3L-A-B-C



Urethane Belting is ideal for a wide range of fractional horsepower applications. It is suitable for light metalworking, small appliances, textile, printing and particularly adaptable to conveying systems. Send us your specifications.



1. To splice or weld Urethane Belting, the free ends are first locked in either side.

2. The heating blade is then inserted to soften the urethane.



3. The two softened ends are then pressed together with pressure.

4. The weld or splice is then cooled and trimmed to the original size.

STOCK NUMBER	TOOL DESCRIPTION
STS-U-5	COMPLETE - HEAT SPLICE KIT CONSISTING OF STS-U-2, STS-U-3, STS-U-9, STS-U-11 & TOOL BOX
STS-U-2	CUTTING TOOL
STS-U-6	CUTTER BLADE FOR STS-U-2 CUTTING TOOL
STS-U-3	HEAT-SPLICER FIXTURE
STS-U-11	HEATING TOOL-DOUBLE SURFACE
STS-U-12	HANDLE FOR STS-U-11 HEATING TOOL
STS-U-13	HOT BLADE FOR STS-U-11
STS-U-9	TRIMMING TOOL FOR ROUND BELTING

W. M. Berg, Inc. will factory splice to order any length cord or belt at a nominal charge.

GROOVED PULLEYS

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/16"	1/8"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

STOCK NO.	B	D	H	L	A
PG1-1	.1248 (1/8)	.500	5/16	5/16	3/32
PG1-2		.750			
PG1-3		1.000			
PG1-4		1.500			
PG1-5		2.000			

* Outside Diameter = Pitch Diameter

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/16"	3/16"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

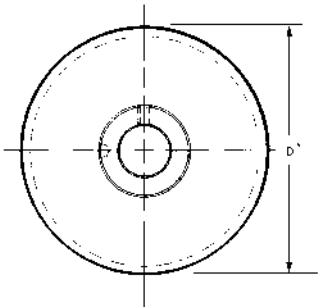
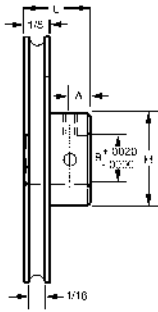
STOCK NO.	B	D	H	L	A
PG1-6	.1873 (3/16)	.500	3/8	11/32	7/64
PG1-7		.750			
PG1-8		1.000			
PG1-9		1.500			
PG1-10		2.000			

* Outside Diameter = Pitch Diameter
Special diameters available upon request.

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/16"	1/4"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

STOCK NO.	B	D	H	L	A
PG1-11	.2498 (1/4)	1.000	1/2	3/8	1/8
PG1-12		1.500			
PG1-13		2.000			
PG1-14		2.500			
PG1-15		3.000			

* Outside Diameter = Pitch Diameter
Special diameters available upon request.



GROOVED PULLEYS

BELT DIA.	BORE	STYLE	MATERIALS	BELT
3/32"	1/8"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

STOCK NO.	B	D	H	L	A
PG2-1	.1248 (1/8)	.500	5/16	5/16	3/32
PG2-2		.750			
PG2-3		1.000			
PG2-4		1.500			
PG2-5		2.000			

* Outside Diameter = Pitch Diameter
Special diameters available upon request.

BELT DIA.	BORE	STYLE	MATERIALS	BELT
3/32"	3/16"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

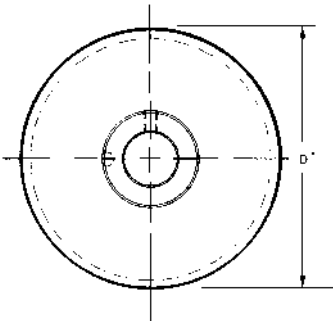
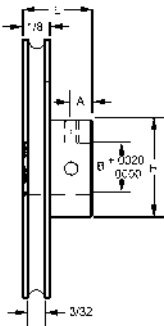
STOCK NO.	B	D	H	L	A
PG2-6	.1873 (3/16)	.500	3/8	11/32	7/64
PG2-7		.750			
PG2-8		1.000			
PG2-9		1.500			
PG2-10		2.000			

* Outside Diameter = Pitch Diameter
Special diameters available upon request.

BELT DIA.	BORE	STYLE	MATERIALS	BELT
3/32"	1/4"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

STOCK NO.	B	D	H	L	A
PG2-11	.2498 (1/4)	1.000	1/2	3/8	1/8
PG2-12		1.500			
PG2-13		2.000			
PG2-14		2.500			
PG2-15		3.000			

* Outside Diameter = Pitch Diameter
Special diameters available upon request.



GROOVED PULLEYS

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/8"	1/8"	PIN HUB	303 Stainless Steel	Operates with the O Ring STS Series or the O-Ring Belt PP Series

* Outside Diameter = Pitch Diameter
Special diameters available upon request.
Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H	L	A
PG3-1	.1248 (1/8)	.500	5/16	3/8	.09
PG3-2		.750			
PG3-3		1.000			
PG3-4		1.500			
PG3-5		2.000			

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/8"	3/16"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

* Outside Diameter = Pitch Diameter
Special diameters available upon request.
Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H	L	A
PG3-6	.1873 (3/16)	.500	3/8	13/32	.11
PG3-7		.750			
PG3-8		1.000			
PG3-9		1.500			
PG3-10		2.000			

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/8"	1/4"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

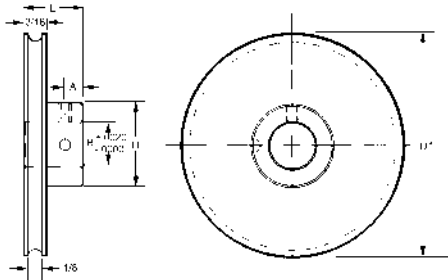
* Outside Diameter = Pitch Diameter
Special diameters available upon request.
Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H	L	A
PG3-11	.2498 (1/4)	.500	1/2	7/16	.12
PG3-12		.750			
PG3-13		1.000			
PG3-20		1.500			
PG3-14		2.000			
PG3-21		2.500			
PG3-15		3.000			

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/8"	5/16"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

* Outside Diameter = Pitch Diameter
Special diameters available upon request.
Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H	L	A
PG3-16	.3123 (5/16)	1.000	1/2	7/16	.12
PG3-17		2.000			
PG3-18		3.000			
PG3-19		4.000			



GROOVED PULLEYS

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/8"	1/8"	CLAMP HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

* Outside Diameter = Pitch Diameter
 Special diameters available upon request.
 Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H +.000/- .003	C	CLAMP NO.
PG3-1-C PG3-2-C PG3-3-C PG3-4-C PG3-5-C	.1248 (1/8)	.50 .75 1.00 1.50 2.00	.188	1/4	CG1-5

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/8"	3/16"	CLAMP HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

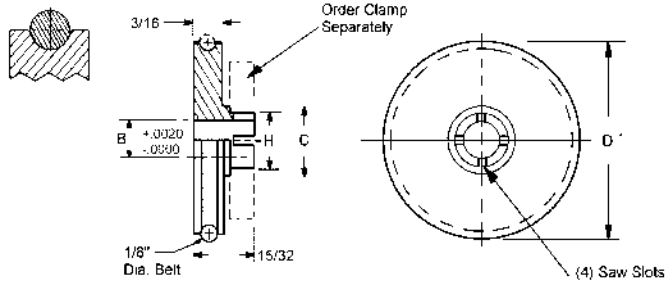
* Outside Diameter = Pitch Diameter
 Special diameters available upon request.
 Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H +.000/- .003	C	CLAMP NO.
PG3-6-C PG3-7-C PG3-8-C PG3-9-C PG3-10-C	.1873 (3/16)	.50 .75 1.00 1.50 2.00	.250	5/16	CG1-9

BELT DIA.	BORE	STYLE	MATERIAL	BELT
1/8"	1/4"	CLAMP HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

* Outside Diameter = Pitch Diameter
 Special diameters available upon request.
 Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H +.000/- .003	C	CLAMP NO.
PG3-11-C PG3-12-C PG3-13-C PG3-20-C PG3-14-C PG3-21-C PG3-15-C	.2498 (1/4)	.50 .75 1.00 1.50 2.00 2.50 3.00	.312	3/8	CG1-12



GROOVED PULLEYS

BELT DIA.	BORE	STYLE	MATERIALS	BELT
3/16"	5/16"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

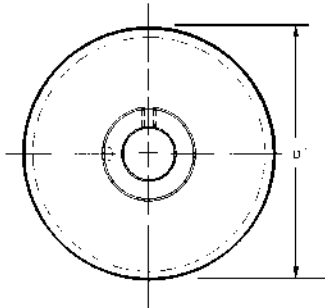
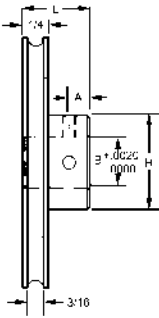
* Outside Diameter = Pitch Diameter
Special diameters available upon request.
Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H	L	A
PG4-1	.3123 (5/16)	1.00	3/4	5/8	3/16
PG4-2		1.50			
PG4-3		2.00			
PG4-4		3.00			

BELT DIA.	BORE	STYLE	MATERIALS	BELT
3/16"	3/8"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

* Outside Diameter = Pitch Diameter
Special diameters available upon request.
Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H	L	A
PG4-5	.3748 (3/8)	1.00	3/4	3/4	1/4
PG4-6		1.50			
PG4-7		2.00			
PG4-8		3.00			



GROOVED PULLEYS

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/4"	3/8"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

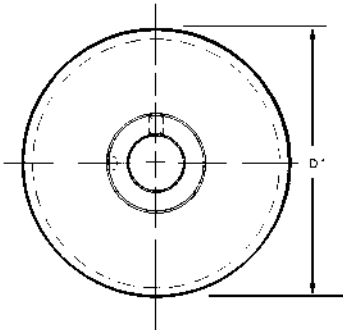
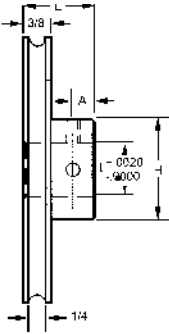
* Outside Diameter = Pitch Diameter
Special diameters available upon request.
Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H	L	A
PG5-1	.3748 (3/8)	1.000	3/4	7/8	1/4
PG5-2		1.500			
PG5-3		2.000			
PG5-4		3.000			
PG5-5		4.000			

BELT DIA.	BORE	STYLE	MATERIALS	BELT
1/4"	1/2"	PIN HUB	303 Stainless Steel	Operates with the O-Ring STS Series or the O-Ring Belt PP Series

* Outside Diameter = Pitch Diameter
Special diameters available upon request.
Use in systems with variable or unknown center distances.

STOCK NO.	B	D	H	L	A
PG5-6	.4998 (1/2)	1.000	1	7/8	1/4
PG5-7		1.500			
PG5-8		2.000			
PG5-9		3.000			
PG5-10		4.000			



FRICTION DRIVE ROLLERS

BORE	STYLE	MATERIALS	TEMPERATURE RANGE
1/8"	PIN HUB	Wheel - 303 Stainless Steel Tire - Buna-N Elastomer Compound	Temperature Range -40°F to +180°F

- Other materials and diameters available on request.
- Ideal as a paper, tape or card drive.

STOCK NO.	B	D	H	L	A	F	E
G1-1 G1-2 G1-3 G1-4 G1-5	.1248 (1/8)	5/8 7/8 1-1/8 1-5/8 2-1/8	5/16	.375	.09	3/16	3/32
							1/8

BORE	STYLE	MATERIALS	TEMPERATURE RANGE
3/16"	PIN HUB	Wheel - 303 Stainless Steel Tire - Buna-N Elastomer Compound	Temperature Range -40°F to +180°F

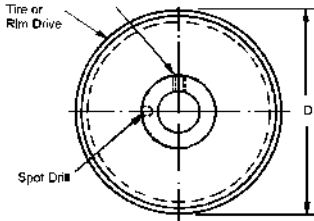
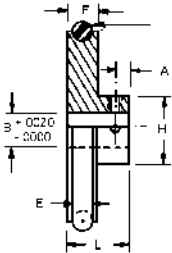
- Other materials and diameters available on request.
- Ideal as a paper, tape or card drive.

STOCK NO.	B	D	H	L	A	F	E
G1-6 G1-7 G1-8 G1-9 G1-10	.1873 (3/16)	5/8 7/8 1-1/8 1-5/8 2-1/8	3/8	.406	.11	3/16	3/32
							1/8

BORE	STYLE	MATERIALS	TEMPERATURE RANGE
1/4"	PIN HUB	Wheel - 303 Stainless Steel Tire - Buna-N Elastomer Compound	Temperature Range -40°F to +180°F

- Other materials and diameters available on request.
- Ideal as a paper, tape or card drive.

STOCK NO.	B	D	H	L	A	F	E
G1-11 G1-12 G1-13 G1-14 G1-15 G1-16 G1-17	.2498 (1/4)	5/8 7/8 1-1/8 1-5/8 2-1/8 2-5/8 3-1/8	1/2	.437	.12	3/16	3/32
							1/8



FRICION DRIVE ROLLERS

BORE	STYLE	MATERIALS	TEMPERATURE RANGE
5/16"	PIN HUB	Wheel - 303 Stainless Steel Tire - Buna-N Elastomer Compound	-40°F to +180°F

- Other materials and diameters available on request.
- Ideal as a paper, tape or card drive.

STOCK NO.	B	D	H	L	A	F	E
G1-18 G1-19 G1-20 G1-21	.3123 (5/16)	1-1/8 2-1/8 3-1/8 4-1/8	1/2	.437	.12	3/16	1/8

BORE	STYLE	MATERIALS	TEMPERATURE RANGE
3/8"	PIN HUB	Wheel - 303 Stainless Steel Tire - Buna-N Elastomer Compound	-40°F to +180°F

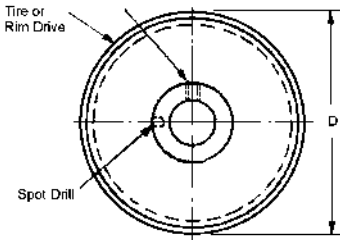
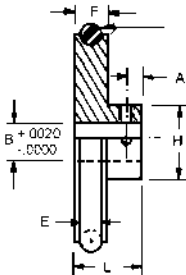
- Other materials and diameters available on request.
- Ideal as a paper, tape or card drive.

STOCK NO.	B	D	H	L	A	F	E
G1-22 G1-23 G1-24 G1-25	.3748 (3/8)	1-1/8 2-1/8 3-1/8 4-1/8	3/4	.750	.25	1/4	1/8

BORE	STYLE	MATERIALS	TEMPERATURE RANGE
1/2"	PIN HUB	Wheel - 303 Stainless Steel Tire - Buna-N Elastomer Compound	-40°F to +180°F

- Other materials and diameters available on request.
- Ideal as a paper, tape or card drive.

STOCK NO.	B	D	H	L	A	F	E
G1-26 G1-27 G1-28 G1-29	.4998 (1/2)	1-1/8 2-1/8 3-1/8 4-1/8	1	.875	.25	3/8	1/8



BELT TENSIONER GUIDE

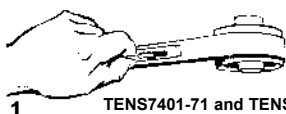
Handy Tools for Checking V-Belt & Synchronous Belt Drive Tension

Push slowly on the pad to get an accurate reading. When you feel and hear the **CLICK** - stop immediately and remove the Krikrit carefully so the indicator arm isn't moved. (A)

The illustrations below shows how to accurately read the Krikrit to get the correct tension.



Position the Krikrit on the belt - midway between the pulleys - with flange on the bottom of gauge against the edge of belt.



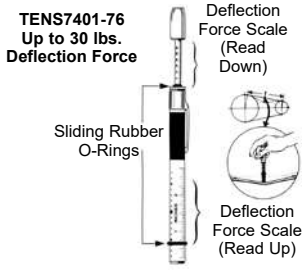
TENS7401-71 and TENS7401-72
Up to 30 lbs. Deflection Force

Detailed instructions are included with gauge.

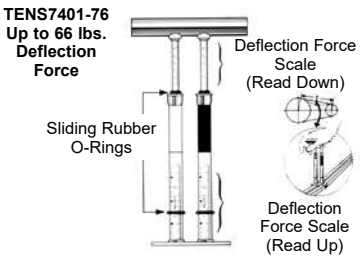
How to Use the Krikrit V-Belt Gauge:

1. Position the Krikrit on the belt - midway between the pulleys - with flange on bottom gauge against the edge of belts.
2. Push slowly on the black pad to get an accurate reading. When you feel and hear the **CLICK** - stop immediately and remove the Krikrit carefully so black indicator arm isn't moved.
3. Read the gauge to get the correct tension.

STOCK NO.	DESCRIPTION
TENS7401-71	Krikrit IV belt tension gauge. Calibrated to measure tension from 30-150 lbs. (15-65 kg.)
TENS7401-72	Krikrit II V belt tension gauge. Calibrated to measure tension from 100-320 lbs. (50-150 kg.)
TENS7401-75	Tension Tester Calibrated to measure tension up to 66 lbs. deflection force
TENS7401-76	Tension Tester Calibrated to measure tension up to 30 lbs. deflection force



Read the scales at the bottom edge of the O-Ring. Leave the upper O-Ring in maximum "up" position.



Read scales at the bottom edge of the O-Rings. Leave the upper O-Rings in maximum "down" position.

Compare the deflection force with the range of forces recommended. If **less** than **minimum** recommended force, belts should be tightened. If **more** than the **maximum** recommended deflection force, drive is tighter than necessary.

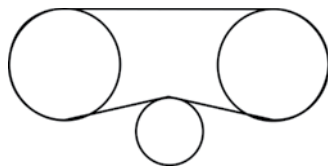
NOTE: There normally will be a rapid drop in tension during the "run-in period" for V-Belt drives. Check tension frequently during the first day of operation.

BELT & CHAIN TECHNICAL DATA

ALTERNATE BELT CONSTRUCTION

Fiber Cable Construction

Some Berg belts are available with a fiber cable spine. This flexible aramid cable allows greater flexibility and longer life in applications requiring reverse bending of the belt. It should be noted that the tensile strength of the belt must be derated to 50% of the value given for the stainless steel construction. There would be no change to the load per pin ratings. To specify a fiber cable spine belt, add "K" to the part number. Example: 32GCF-49-EK



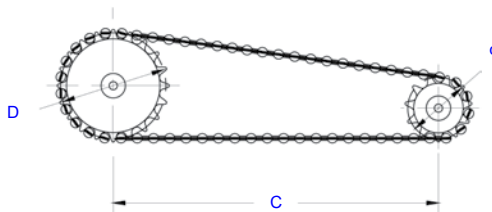
Reverse bending

Anti-Static Construction

Some Berg belts are available in anti-static material. This allows the belts to be used in environments where electrostatic discharge could be hazardous. It should be noted that this type of polyurethane is only available in black, but is approximately the same hardness as our standard material (90A Duro). To specify an anti-static belt, add "AS" to the part number. Example: 37TB-100AS

Contact our engineering department for more information on anti-static belts or availability of other belts in this material.

BELT & CHAIN FORMULAS



Length Calculation

$$L = 2C + 1.57(D + d) + \frac{(D-d)^2}{4C}$$

Where:

L = Length of belt at pitch line (in inches)

C = Center distance (in inches)

D = Pitch diameter (in inches) of large sprocket (for V- or O-ring belts, use the pulley O.D.)

d = Pitch diameter (in inches) of small sprocket (for V- or O-ring belts, use the pulley O.D.)

Pitch Calculation

$$N = \frac{L}{C.P.}$$

Where:

N = Number of pitches

L = Length of belt (calculated above)

C.P. = Circular pitch

Horsepower Calculation

$$H.P. = \frac{TN}{63024}$$

Where:

T = Torque (in. lbs.)

N = RPM

Torque Calculation

$$T = FR$$

Where:

F = Force (load) on belts (lbs.)

R = Pitch radius of pulley/sprocket (in.)

T = Torque (in lbs.)

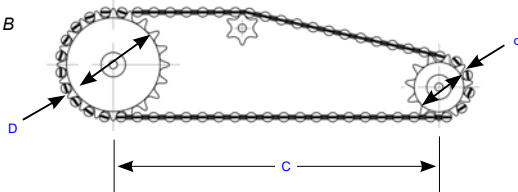
PLASTIC BELT & CHAIN TENSION

For proper tensioning of Berg's steel reinforced polyurethane belts, the tensioner should be designed inside the system as shown in Figure B). Design of an external tensioner, shown in Figure A), should be avoided when using steel reinforced belts. This will cause reverse bending of the belt which leads to shortened belt life. If an external tensioner is required, Berg recommends the use of a Kevlar® reinforced belt. For Kevlar® reinforced belts, see above *Alternate Belt Construction* section.

Figure A



Figure B



O-Ring Belt Length Calculation

$$LF = \frac{L}{1 + (E/200)}$$

Where:

LF = Free length (before stretch)

L = Installed length

E = Elongation (percent)

Belt Tension Calculation

$$X = (1/64)C$$

Where:

C = Center distance (in inches)

F = Force (5% of ultimate load for belt)

X = Deflection should be 1/64" per inch of center distance

BELT & CHAIN TECHNICAL DATA

Due to the variety of applications in which our belts are used, it is impossible to offer life curves that will apply to every situation. We therefore offer this list of how operating parameters might affect the life of our belts. Contact our engineering department for assistance in designing your system to receive optimal belt life.

Torque: Torque will directly effect the life of the belt. The torque at the pulley times .5 the PD of that pulley will give you the belt load. This value should not exceed 20% to 25% of the ultimate load listed in the catalog.

Start-Up Torque: For optimal life, it is important to ensure that your power source is not inducing a start-up torque larger than your operating torque. This is a common problem in belting systems.

Belt Speed: Belt speed should always be below 376 ft/min. Our tests have shown that higher end speeds shorten the life, while lower end speeds increase the life.

Reverse Bending: Steel reinforced belts should not be used in a reverse bending application as this degrades the life significantly. For these applications we manufacture Kevlar® reinforced belts. For information on Kevlar® reinforced belts see *Alternate Belt Construction* section.

Pulley Ratio: A ratio other than 1:1 will cause less than a full 180° wrap around the smaller pulley. This could shorten the life by causing each belt pin to carry too much of the load. It should be ensured that 5 or 6 teeth minimum be in contact with all load carrying pulleys in the system for optimal life.

Belt Tension: Proper tension is essential for optimal life. Too much tension will cause excessive pin abrasion resulting in premature wear of the belt. Too little tension will result in a whipping motion that will cause cable fatigue and mistracking of belt entrance into pulley. Tension should be set by pressing on the belt half way between the pulleys with 5% of the ultimate load. The belt should deflect 1/64" per inch of center distance.

Direction Reversing: Changing the rotational direction of the pulleys will shorten the life of the belt by causing abrasive wear on the pins. It can also cause major damage if the transition is abrupt and the torque effectively doubles through inertia of the system. This effect can be limited by ensuring that the transition in direction is controlled by not permitting such an increase in torque.

Pulley Alignment: Some of our belts are designed to handle pulley misalignment. As a general guideline, our belts that contain a single load carrying member down the center can handle up to 7° of pulley misalignment (this does not apply to our TB line of timing belts). Our ladder style belts-belts containing 2 load carrying members-are not designed to handle any pulley misalignment. Pulley alignments should be held within 1/2° or life can be adversely affected. Excessive misalignment will cause abrasive wear on the belt, resulting in shortened life.

Alternate Construction: The belt's composition also directly affects lifespan. Certain materials are better suited for specific applications due to higher loads or harsh operating conditions.

NOTES

This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

GEARS

Table of Contents

GEAR BLANKS

HUBLESS	B 2
PIN HUB	B 3 - B 4
CLAMP HUB	B 5

SPUR GEARS

HUBLESS - 12 PITCH	B 6
HUBLESS - 16 PITCH	B 8 - B 9
HUBLESS - 20 PITCH	B 14
HUBLESS - 24 PITCH	B 20 - B 21
HUBLESS - 32 PITCH	B 46 - B 49
HUBLESS - 48 PITCH	B 72 - B 74
HUBLESS - 64 PITCH	B 115 - B 116
HUBLESS - 72 PITCH	B 151
HUBLESS - 80 PITCH	B 175
HUBLESS - 96 PITCH	B 180
HUBLESS - 120 PITCH	B 203
PIN HUB - 1/20 PITCH	B 111 - B 112
PIN HUB - 1/10 PITCH	B 40 - B 41
PIN HUB - 12 PITCH	B 7
PIN HUB - 16 PITCH	B 10 - B 11
PIN HUB - 20 PITCH	B 15 - B 17
PIN HUB - 24 PITCH	B 23 - B 32
PIN HUB - 32 PITCH	B 51 - B 60
PIN HUB - 48 PITCH	B 77 - B 89
PIN HUB - 64 PITCH	B 119 - B 128
PIN HUB - 72 PITCH	B 154 - B 157
PIN HUB - 80 PITCH	B 176 - B 177
PIN HUB - 96 PITCH	B 182 - B 186
PIN HUB - 120 PITCH	B 206 - B 208
CLAMP HUB - 16 PITCH	B 12
CLAMP HUB - 20 PITCH	B 18
CLAMP HUB - 32 PITCH	B 61 - B 62
CLAMP HUB - 48 PITCH	B 90 - B 93
CLAMP HUB - 64 PITCH	B 129 - B 131
CLAMP HUB - 72 PITCH	B 158 - B 159
CLAMP HUB - 96 PITCH	B 187

GEAR RACKS

1/20 PITCH	B 113
1/10 PITCH	B 42 - B 43
16 PITCH	B 13
20 PITCH	B 19
24 PITCH	B 33 - B 34
32 PITCH	B 63 - B 64
48 PITCH	B 94 - B 95
64 PITCH	B 132 - B 133
72 PITCH	B 160 - B 161
80 PITCH	B 178
96 PITCH	B 188 - B 189
120 PITCH	B 209

CLUSTER GEARS & HUBS

24 PITCH	B 22
32 PITCH	B 50
48 PITCH	B 75 - B 76
64 PITCH	B 117 - B 118
72 PITCH	B 152 - B 153
96 PITCH	B 181
120 PITCH	B 204 - B 205

ANTI-BACKLASH GEARS

PIN HUB - 24 PITCH	B 35 - B 36
PIN HUB - 32 PITCH	B 65 - B 67
PIN HUB - 48 PITCH	B 96 - B 101
PIN HUB - 64 PITCH	B 134 - B 140
PIN HUB - 72 PITCH	B 162 - B 163, B 165 - B 167
PIN HUB - 96 PITCH	B 191 - B 193, B 195

ANTI-BACKLASH GEARS CONT.

CLAMP HUB - 1/10 PITCH	B 44
CLAMP HUB - 24 PITCH	B 36 - B 37
CLAMP HUB - 32 PITCH	B 68 - B 69
CLAMP HUB - 48 PITCH	B 102 - B 107
CLAMP HUB - 64 PITCH	B 141 - B 147
CLAMP HUB - 72 PITCH	B 169 - B 173
CLAMP HUB - 96 PITCH	B 196 - B 201

PINION SHAFTS

1/20 PITCH	B 114
1/10 PITCH	B 45
24 PITCH	B 38
32 PITCH	B 70
48 PITCH	B 108 - B 109
64 PITCH	B 148 - B 149
72 PITCH	B 174
80 PITCH	B 179
96 PITCH	B 202
120 PITCH	B 210

SPUR GEAR STOCKS

24 PITCH	B 39
32 PITCH	B 71
48 PITCH	B 110
64 PITCH	B 150

ANTI-BACKLASH PINIONS

PIN HUB - 72 PITCH	B 164
PIN HUB - 96 PITCH	B 190, B 194
CLAMP HUB - 72 PITCH	B 168

HELICAL GEARS

16 PITCH	B 211
20 PITCH	B 211
24 PITCH	B 212
32 PITCH	B 212
48 PITCH	B 213 - B 214
64 PITCH	B 215 - B 216

PRECISION WORMS

16 PITCH	B 217
24 PITCH	B 219
32 PITCH	B 221
48 PITCH	B 224
64 PITCH	B 235

PRECISION WORM GEARS

16 PITCH	B 218
24 PITCH	B 220
32 PITCH	B 222 - B 223
48 PITCH	B 226 - B 228
64 PITCH	B 236 - B 238

PRECISION WORM SHAFTS

48 PITCH	B 225

ANTI-BACKLASH WORM GEARS

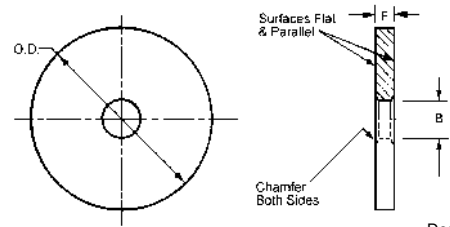
48 PITCH	B 229 - B 234
64 PITCH	B 239 - B 244

INTERNAL GEARS

24 PITCH	B 245
32 PITCH	B 245
48 PITCH	B 246
64 PITCH	B 246
72 PITCH	B 247
96 PITCH	B 247
120 PITCH	B 248

GEAR BLANKS

STYLE	BORE	FACE	MATERIAL
HUBLESS	3/8"	1/8" TO 1/2"	2024-T4 ALUMINUM ANODIZED

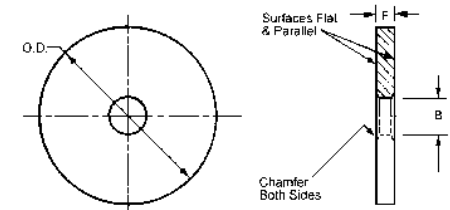


STOCK NO.	B BORE	F FACE	ANODIZED COLOR	MAX O.D.
FB79A-*	.375	3/4	GREEN	5.166
FB78A-*		1/2	BLUE	5.375
FB74A-*		3/8	BROWN	6.000
FB77A-*		1/4	RED	6.083
FB76A-*		3/16	GOLD	4.063
FB75A-*		1/8	BLACK	3.106

To order specify Blank Designator - Material Code - O.D. in inches.
Example: FB79 A - 2.750

Designator Number Material Code O.D.

STYLE	BORE	FACE	MATERIAL
HUBLESS	3/8" TO 1-3/8"	1/16" TO 1/2"	SEE MATERIAL CODES BELOW



- Ideal for:
- Gears
 - Pulleys
 - Cams
 - Sprockets
 - Handles
 - Wheels
 - Ratchets

Material Codes:

- A** - 2024-T4 Aluminum - Anodized
- B** - Tobin Bronze Alloy 464
- D** - Delrin®
- S** - 303 Stainless Steel
- U** - AF Delrin®

To order specify Blank Designator - Material Code - O.D. in inches.
Example: FB3 A - 2.750

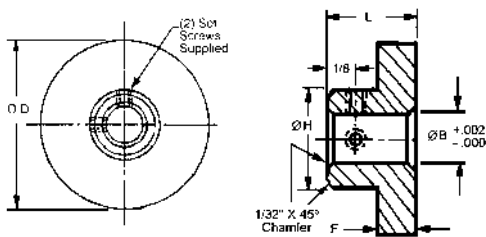
Designator Number Material Code O.D.

BLANK DESIGNATOR	B BORE	F FACE	MAX. AVAILABLE MATERIAL	ANODIZE STOCK O.D.	COLOR (ALUM.ONLY)
FB1	+.0005 .3748	1/16	A, S	3.125	GRAY
FB2		3/32	A, S	4.250	GRAY
FB3		1/8	A, S, U	4.250	GRAY
FB5		3/16	A, D**, S	4.250	GRAY
FB6		1/4	A, S, U	7.500	GRAY
FB75	+.002 .375	1/8	A	3.106	BLACK
FB76		3/16	A	4.063	GOLD
FB77		1/4	A	6.083	RED
FB74		3/8	A	6.000	BROWN
FB78		1/2	A	5.375	BLUE
FB79		3/4	A	5.166	GREEN
FB17	+.0005 .6871	1/8	A, S, U	4.250	GRAY
FB19		3/16	A, D, S	4.250	GRAY
FB18		1/4	A, S, U	7.500	GRAY
FB20		3/8	A, B, S, U	5.750	GRAY
FB25	+.002 1.374	1/8	S	4.250	-
FB26		3/16	S	4.250	-
FB27		1/4	S	7.500	-
FB50		3/8	S	5.250	-
FB60		1/2	S	12.000	-

** FB5D Bore is .3750.

GEAR BLANKS

STYLE	BORE	FACE	MATERIAL
PIN HUB	1/8" TO 5/8"	1/8" TO 3/4"	2024-T4 ALUMINUM ANODIZED



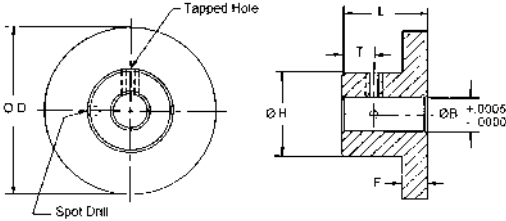
*To order specify Blank Designator - O.D. in inches.
Example: PBA74A - 2.750
Designator Number O.D.

STOCK NO.	B BORE	F FACE	H HUB DIA.	L	SET SCREWS	ANODIZED COLOR	MAX. OUTSIDE DIA.
PB72A-*	.375						3.125
PB73A-*	.500	3/4	1-1/4	1	#8-32	GREEN	5.250
PB74A-*	.625						5.250
PB69A-*	.250						2.125
PB70A-*	.375	1/2	1	3/4	#8-32	BLUE	5.500
PB71A-*	.500						5.500
PB57A-*	.250						
PB58A-*	.375	3/8	3/4	5/8	#8-32	BROWN	6.000
PB59A-*	.500						
PB66A-*	.250						
PB67A-*	.375	1/4	3/4	1/2	#8-32	RED	6.500
PB68A-*	.500						
PB65A-*	.125						
PB64A-*	.187	3/16	5/8	7/16	#4-40	GOLD	4.063
PB63A-*	.250						
PB62A-*	.125						
PB61A-*	.187	1/8	1/2	3/8	#4-40	BLACK	3.106
PB60A-*	.250						

- Ideal for:
- Gears
 - Pulleys
 - Cams
 - Sprockets
 - Handles
 - Wheels

GEAR BLANKS

STYLE	BORE	FACE	MATERIAL
PIN HUB	.1200 to .4998	1/16" TO 1/2"	SEE MATERIAL CODES BELOW



To order specify Blank Designator - Material Code - O.D. in inches.

Example: PB28 A - 2.250

Designator Number Material Code O.D.

STOCK NO.	B BORE	F FACE WIDTH	H	L	T	TAPPED HOLE	SPOT DRILL	MATERIALS AVAILABLE	MAX. STOCK O.D.		
PB3	.1200	1/16	5/16	1/4	.09	#2-56	#69	A, S	2.000		
PB2		3/32		9/32				A, S	2.000		
PB1		1/8		5/16				A, S	1.500		
PB5	.1248	1/16	5/16	1/4	.09	#2-56	#69	A, S	2.000		
PB7		3/32		9/32				A, S	2.000		
PB10		1/8		5/16	.11			A, N, S	2.625		
PB13		3/16		13/32				B	2.625		
PB14		3/16		3/8	.09			A, S	1.750		
PB15	.1562	1/8	5/16	5/16	.09	#2-66	#69	A, S	1.750		
PB16	.1873	1/16	5/16	1/4	.09	#4-40	#60	A, S	1.375		
PB17		3/32	3/8	5/16	.11			A, S	2.500		
PB19		1/8	3/8	11/32				A, S	3.250		
PB21		3/16	3/8	13/32				A, B, N, S	4.500		
PB24	.2405	3/16	3/8	13/32	.11	#4-40	#60	A, S	3.250		
PB25	.2498	3/32	7/16	5/16	.12	#6-32	#50	A, S	2.000		
PB26		1/8	1/2	3/8				A, S	4.250		
PB28		3/16	1/2	7/16				A, N, S	4.500		
PB29		3/16	1/2	13/32				B	5.750		
PB30	.3123	3/16	1/2	13/32	.12	#6-32	#50	B	3.250		
PB32		3/16	1/2	7/16	.12	#6-32	#50	A, S	4.437		
PB33		1/4	3/4	5/8	.18	#8-32	#42	S	4.250		
PB35	.3748	3/8	3/4	7/8	.25	#10-24	#31	A, B, S	4.250		
PB36		1/2		1				S	4.250		
PB34	.3750	3/8	3/4	3/4	.19	#10-32	-	B, S	2.000		
PB37	.4998	3/8	1	7/8	.25	#10-24	#31	B, S	6.415		
PB38		1/2		1				A, S	4.500		

Ideal for:

- Gears
- Pulleys
- Cams
- Sprockets
- Handles
- Wheels
- Ratchets

Material Codes:

A - 2024-T4 Aluminum - Gray Chromic Anodized

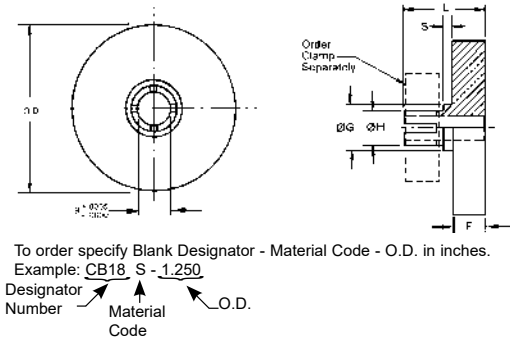
B - Tobin Bronze Alloy 464

N - Nylon - with Stainless Steel Bushing in Bore

S - 303 Stainless Steel

GEAR BLANKS

STYLE	BORE	FACE	MATERIAL
CLAMP HUB	.1200 to .4998	1/8" TO 3/8"	SEE MATERIAL CODES BELOW



BLANK STOCK NO.	B BORE	F FACE WIDTH	H +.000 - .003	L	G FLANGE	S DIA.	CLAMP STOCK NO.	MATERIALS AVAILABLE	MAX. STOCK O.D.
CB36	.1200	1/8	.188	13/32	1/4	1/32	CG3-1	A,S	1.625
CB4	.1248	1/16	.188	19/64	1/4	1/32	CG1-5	A,S	1.125
CB5		3/32		21/64			CG1-5	A,S	1.625
CB7		1/8		13/32			CG3-1	A,S	2.375
CB8		3/16		15/32			CG3-1	B	2.000
CB10	.1873	3/32	.250	21/64	5/16	1/32	CG1-8	A,S	1.500
CB14		1/8		13/32	5/16	1/32	CG1-9	A,S	2.500
CB16		3/16		1/2	11/32	3/64	CG1-9	B,S	2.000
CB18	.2498	1/8	.312	13/32	3/8	1/32	CG1-12	A,S	4.250
CB20		3/16		1/2	13/32	3/64	CG1-12	A,B,S	5.750
CB22	.3123	1/4	.375	9/16	11/16	1/16	CG1-14	S	4.250
CB25	.3748	1/4	.437	5/8	11/16	1/16	CG1-17	S	4.250
CB29	.4998	3/8	.562	3/4	13/16	1/16	CG1-19	S	4.250

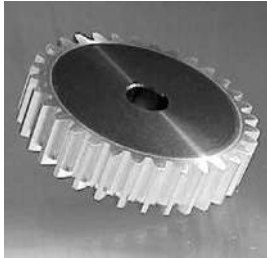
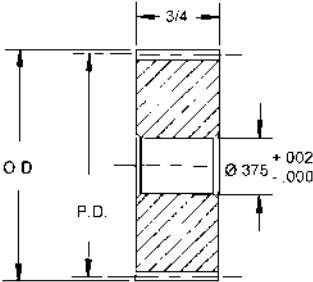
- Ideal for:

 - Gears
 - Pulleys
 - Cams
 - Sprockets
 - Handles
 - Wheels
 - Ratchets
- Material Codes:

 - A** - 2024-T4 Aluminum - Gray Chromic Anodized
 - B** - Tobin Bronze Alloy 464
 - S** - 303 Stainless Steel

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
12	HUBLESS	3/8"	3/4"	Aluminum Anodized (Green)	8	20°



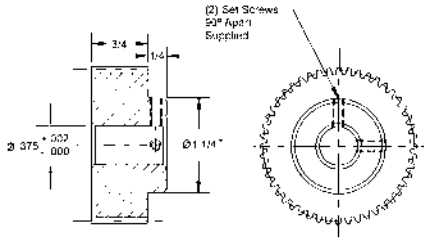
STOCK NO.	NO. OF TEETH	P.D.	O.D.
F12A79-12	12	1.0000	1.166
F12A79-13	13	1.0833	1.250
F12A79-14	14	1.1666	1.333
F12A79-15	15	1.2500	1.416
F12A79-16	16	1.3333	1.500
F12A79-18	18	1.5000	1.666
F12A79-20	20	1.6666	1.833
F12A79-21	21	1.7500	1.916
F12A79-22	22	1.8333	2.000
F12A79-24	24	2.0000	2.166
F12A79-30	30	2.5000	2.666
F12A79-32	32	2.6666	2.833
F12A79-36	36	3.0000	3.166

Available on request: other numbers of teeth; 14 - 1/2° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
12	PIN HUB	3/8"	3/4"	Aluminum Anodized (Green)	8	20°



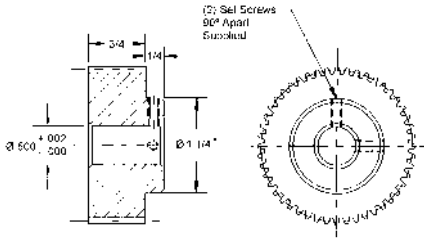
• For 10 - 17 teeth hub diameter equals .62.
Available on request: other numbers of teeth; 14 - 1/2° pressure angle.

STOCK NO.	NO. OF TEETH	P.D.	O.D.
P12A72-12	12•	1.0000	1.166
P12A72-13	13•	1.0833	1.250
P12A72-14	14•	1.1666	1.333
P12A72-15	15•	1.2500	1.416
P12A72-16	16•	1.3333	1.500
P12A72-18	18	1.5000	1.666
P12A72-20	20	1.6666	1.833
P12A72-21	21	1.7500	1.916
P12A72-22	22	1.8333	2.000
P12A72-24	24	2.0000	2.166
P12A72-30	30	2.5000	2.666
P12A72-32	32	2.6666	2.833
P12A72-36	36	3.0000	3.166



B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
12	PIN HUB	1/2"	3/4"	Aluminum Anodized (Green)	8	20°

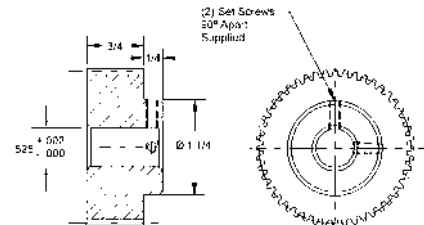


• For 11 - 17 teeth hub diameter equals .71.
Available on request: other numbers of teeth; 14 - 1/2° pressure angle.

STOCK NO.	NO. OF TEETH	P.D.	O.D.
P12A73-12	12•	1.0000	1.166
P12A73-13	13•	1.0833	1.250
P12A73-14	14•	1.1666	1.333
P12A73-15	15•	1.2500	1.416
P12A73-16	16•	1.3333	1.500
P12A73-18	18	1.5000	1.666
P12A73-20	20	1.6666	1.833
P12A73-21	21	1.7500	1.916
P12A73-22	22	1.8333	2.000
P12A73-24	24	2.0000	2.166
P12A73-30	30	2.5000	2.666
P12A73-32	32	2.6666	2.833
P12A73-36	36	3.0000	3.166
P12A73-40	40	3.3333	3.500
P12A73-42	42	3.5000	3.666
P12A73-48	48	4.0000	4.166
P12A73-54	54	4.5000	4.666
P12A73-60	60	5.0000	5.166



PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
12	PIN HUB	5/8"	3/4"	Aluminum Anodized (Green)	8	20°



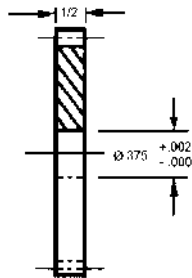
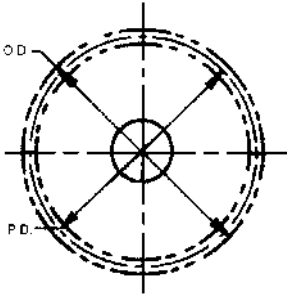
Available on request: other numbers of teeth; 14 - 1/2° pressure angle.

STOCK NO.	NO. OF TEETH	P.D.	O.D.
P12A74-18	18	1.5000	1.666
P12A74-20	20	1.6666	1.833
P12A74-21	21	1.7500	1.916
P12A74-22	22	1.8333	2.000
P12A74-24	24	2.0000	2.166
P12A74-30	30	2.5000	2.666
P12A74-32	32	2.6666	2.833
P12A74-36	36	3.0000	3.166
P12A74-40	40	3.3333	3.500
P12A74-42	42	3.5000	3.666
P12A74-48	48	4.0000	4.166
P12A74-54	54	4.5000	4.666
P12A74-60	60	5.0000	5.166



SPUR GEARS

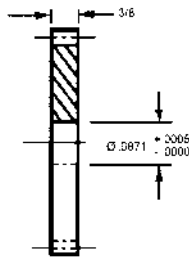
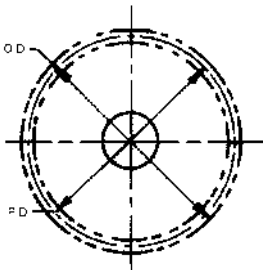
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	HUBLESS	3/8"	1/2"	Aluminum Anodized (BLUE)	8	20°



STOCK NO.	NO. OF TEETH	P.D.	O.D.
F16A78-12	12	.7500	.875
F16A78-13	13	.8125	.937
F16A78-14	14	.8750	1.000
F16A78-15	15	.9375	1.062
F16A78-16	16	1.0000	1.125
F16A78-18	18	1.1250	1.250
F16A78-20	20	1.2500	1.375
F16A78-22	22	1.3750	1.500
F16A78-24	24	1.5000	1.625
F16A78-26	26	1.6250	1.750
F16A78-28	28	1.7500	1.875
F16A78-30	30	1.8750	2.000
F16A78-32	32	2.0000	2.120
F16A78-36	36	2.2500	2.375
F16A78-40	40	2.5000	2.625
F16A78-48	48	3.0000	3.125
F16A78-54	54	3.3750	3.500
F16A78-56	56	3.5000	3.625
F16A78-60	60	3.7500	3.875
F16A78-64	64	4.0000	4.125
F16A78-72	72	4.5000	4.625
F16A78-80	80	5.0000	5.125
F16A78-84	84	5.2500	5.375

Available on request:
Other numbers of teeth; 14 - 1/2° pressure angle.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	HUBLESS	11/16"	3/8"	303 STAINLESS STEEL	9	20°



STOCK NO.	NO. OF TEETH	P.D.	O.D.
F16S20-18	18	1.1250	1.250
F16S20-20	20	1.2500	1.375
F16S20-24	24	1.5000	1.625
F16S20-28	28	1.7500	1.875
F16S20-30	30	1.8750	2.000
F16S20-32	32	2.0000	2.125
F16S20-36	36	2.2500	2.375
F16S20-40	40	2.5000	2.625
F16S20-48	48	3.0000	3.125
F16S20-56	56	3.5000	3.625
F16S20-60	60	3.7500	3.875
F16S20-64	64	4.0000	4.125

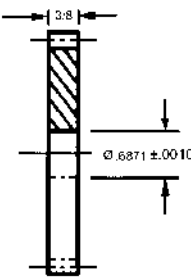
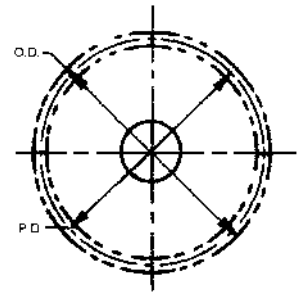
Available on request:
Other numbers of teeth; Pin or Clamp hubs assembled; 14 - 1/2° pressure angle.



For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
16	HUBLESS	11/16"	3/8"	POLYURETHANE	8	20°



STOCK NO.	NO. OF TEETH	P.D.	O.D.
F16U20-18	18	1.1250	1.250
F16U20-20	20	1.2500	1.375
F16U20-24	24	1.5000	1.625
F16U20-28	28	1.7500	1.875
F16U20-30	30	1.8750	2.000
F16U20-32	32	2.0000	2.120
F16U20-36	36	2.2500	2.375
F16U20-40	40	2.5000	2.625
F16U20-48	48	3.0000	3.125
F16U20-56	56	3.5000	3.625
F16U20-60	60	3.7500	3.875
F16U20-64	64	4.0000	4.125

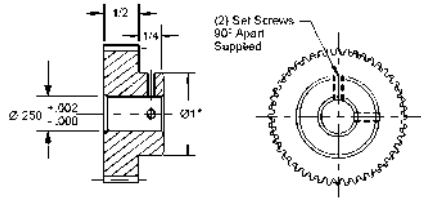
Available on request:
Other numbers of teeth;
Pin or Clamp hubs assembled;
14 - 1/2° pressure angle.

B

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	PIN HUB	1/4"	1/2"	Aluminum Anodized (BLUE)	8	20°

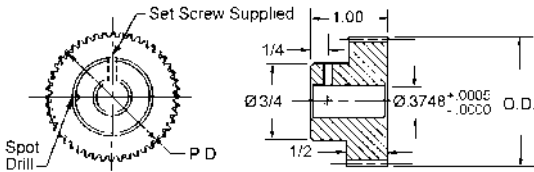


• For 10 - 18 teeth hub diameter equals .47.
Available on request: other numbers of teeth; 14 - 1/2° pressure angle.

STOCK NO.	NO. OF TEETH	P.D.	O.D.
P16A69-12	12•	.7500	.875
P16A69-13	13•	.8125	.937
P16A69-14	14•	.8750	1.000
P16A69-15	15•	.9375	1.062
P16A69-16	16•	1.0000	1.125
P16A69-18	18•	1.1250	1.250
P16A69-20	20	1.2500	1.375
P16A69-22	22	1.3750	1.500
P16A69-24	24	1.5000	1.625
P16A69-26	26	1.6250	1.750
P16A69-28	28	1.7500	1.875
P16A69-30	30	1.8750	2.000
P16A69-32	32	2.0000	2.120



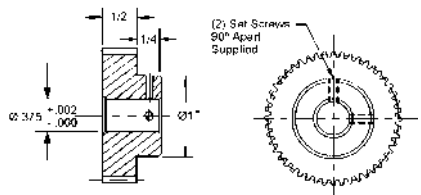
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	PIN HUB	3/8"	1/2"	303 STAINLESS STEEL	10	20°



Available on request:
other numbers of teeth; 14 - 1/2° pressure angle.

STOCK NO.	NO. OF TEETH	P.D.	O.D.
P16S36-18	18	1.1250	1.250
P16S36-20	20	1.2500	1.375
P16S36-24	24	1.5000	1.625
P16S36-28	28	1.7500	1.875
P16S36-30	30	1.8750	2.000
P16S36-32	32	2.0000	2.125
P16S36-36	36	2.2500	2.375
P16S36-40	40	2.5000	2.625
P16S36-48	48	3.0000	3.125
P16S36-56	56	3.5000	3.625
P16S36-64	64	4.0000	4.125

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	PIN HUB	3/8"	1/2"	Aluminum Anodized (BLUE)	8	20°



• For 12 - 18 teeth hub diameter equals .59.
Available on request: other numbers of teeth; 14 - 1/2° pressure angle.

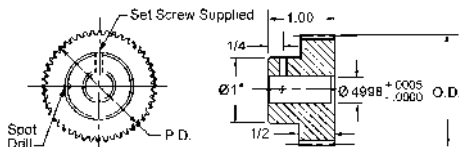
STOCK NO.	NO. OF TEETH	P.D.	O.D.
P16A70-12	12•	.7500	.875
P16A70-13	13•	.8125	.937
P16A70-14	14•	.8750	1.000
P16A70-15	15•	.9375	1.062
P16A70-16	16•	1.0000	1.125
P16A70-18	18•	1.1250	1.250
P16A70-20	20	1.2500	1.375
P16A70-22	22	1.3750	1.500
P16A70-24	24	1.5000	1.625
P16A70-26	26	1.6250	1.750
P16A70-28	28	1.7500	1.875
P16A70-30	30	1.8750	2.000
P16A70-32	32	2.0000	2.120
P16A70-36	36	2.2500	2.375
P16A70-40	40	2.5000	2.625
P16A70-48	48	3.0000	3.125
P16A70-54	54	3.3750	3.500
P16A70-56	56	3.5000	3.625
P16A70-60	60	3.7500	3.875
P16A70-64	64	4.0000	4.125
P16A70-72	72	4.5000	4.625
P16A70-80	80	5.0000	5.125
P16A70-84	84	5.2500	5.375



For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	PIN HUB	1/2"	1/2"	303 STAINLESS STEEL	10	20°



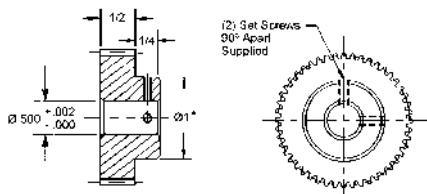
- For 15 - 18 teeth hub diameter equals .78.
- Available on request: other numbers of teeth; 14 - 1/2° pressure angle.

STOCK NO.	NO. OF TEETH	P.D.	O.D.
P16S38-18	18•	1.1250	1.250
P16S38-20	20	1.2500	1.375
P16S38-24	24	1.5000	1.625
P16S38-28	28	1.7500	1.875
P16S38-30	30	1.8750	2.000
P16S38-32	32	2.0000	2.125
P16S38-36	36	2.2500	2.375
P16S38-40	40	2.5000	2.625
P16S38-48	48	3.0000	3.125
P16S38-56	56	3.5000	3.625
P16S38-64	64	4.0000	4.125



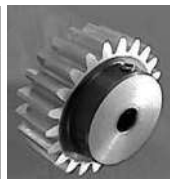
B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	PIN HUB	1/2"	1/2"	Aluminum Anodized (BLUE)	8	20°



- For 16 - 18 teeth hub diameter equals .84.
- Available on request: other numbers of teeth; 14 - 1/2° pressure angle.

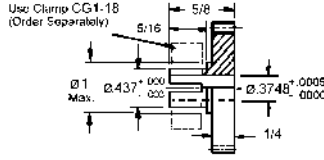
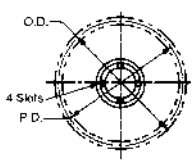
STOCK NO.	NO. OF TEETH	P.D.	O.D.
P16A71-16	16•	1.0000	1.125
P16A71-18	18•	1.1250	1.250
P16A71-20	20	1.2500	1.375
P16A71-22	22	1.3750	1.500
P16A71-24	24	1.5000	1.625
P16A71-26	26	1.6250	1.750
P16A71-28	28	1.7500	1.875
P16A71-30	30	1.8750	2.000
P16A71-32	32	2.0000	2.125
P16A71-36	36	2.2500	2.375
P16A71-40	40	2.5000	2.625
P16A71-48	48	3.0000	3.125
P16A71-54	54	3.3750	3.500
P16A71-56	56	3.5000	3.625
P16A71-60	60	3.7500	3.875
P16A71-64	64	4.0000	4.125
P16A71-72	72	4.5000	4.625
P16A71-80	80	5.0000	5.125
P16A71-84	84	5.2500	5.375



For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

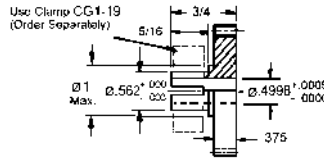
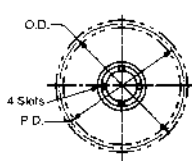
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	CLAMP HUB	3/8"	1/4"	303 STAINLESS STEEL	9	20°



STOCK NO.	NO. OF TEETH	P.D.	O.D.
C16S25-16	16	1.0000	1.125
C16S25-18	18	1.1250	1.250
C16S25-20	20	1.2500	1.375
C16S25-24	24	1.5000	1.625
C16S25-32	32	2.0000	2.125
C16S25-40	40	2.5000	2.625
C16S25-48	48	3.0000	3.125

Available on request: other numbers of teeth;
14 - 1/2° pressure angle.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
16	CLAMP HUB	1/2"	3/8"	303 STAINLESS STEEL	9	20°



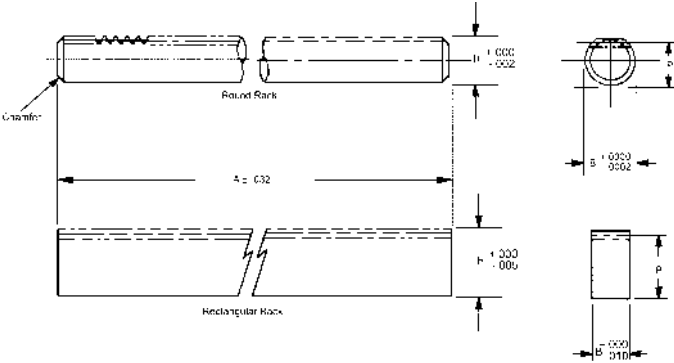
STOCK NO.	NO. OF TEETH	P.D.	O.D.
C16S29-16	16	1.0000	1.125
C16S29-18	18	1.1250	1.250
C16S29-20	20	1.2500	1.375
C16S29-24	24	1.5000	1.625
C16S29-32	32	2.0000	2.125
C16S29-40	40	2.5000	2.625
C16S29-48	48	3.0000	3.125

Available on request: other numbers of teeth;
14 - 1/2° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
16	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	8	20°

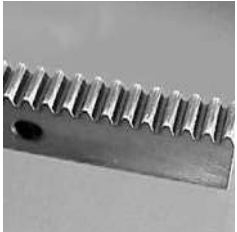
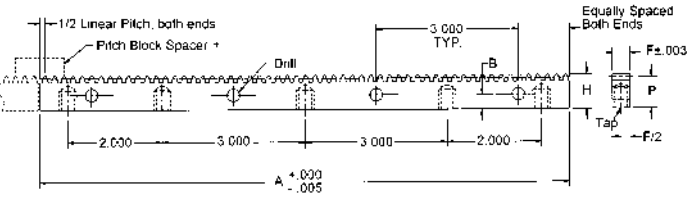


B

STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-1	ROUND	16	.6175	.7497	24	.680	8
R2-7	RECTANGULAR	16	.6625	.365	24	.725	8

Available on request: 14 - 1/2° pressure angle, special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
16	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



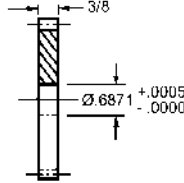
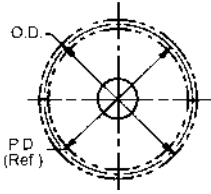
+Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS	SPACER BLOCK	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 - .005	F	B	DRILL	TAP
STOCK NO.	STOCK NO.												
R1-1-G1	R1-1-SB	10*	.0014	.0005	16	.1963	11.185	.6625	.725	.365	.312	17/64	#10-24 x 3/8

* Higher quality on request.

SPUR GEARS

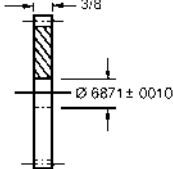
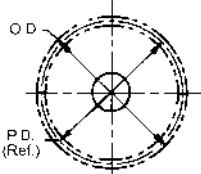
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	HUBLESS	11/16"	3/8"	303 STAINLESS STEEL	9	20°



Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F20S20-24	24	1.2000	1.300
F20S20-25	25	1.2500	1.350
F20S20-30	30	1.5000	1.600
F20S20-35	35	1.7500	1.850
F20S20-40	40	2.0000	2.100
F20S20-45	45	2.2500	2.350
F20S20-50	50	2.5000	2.600
F20S20-60	60	3.0000	3.100
F20S20-70	70	3.5000	3.600
F20S20-80	80	4.0000	4.100

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	HUBLESS	11/16"	3/8"	POLYURETHANE	8	20°



Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2° Pressure Angle

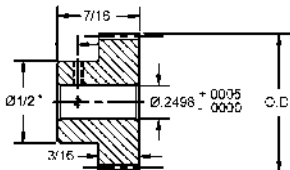
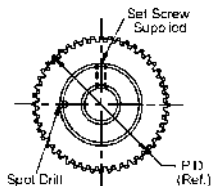
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F20U20-24	24	1.2000	1.300
F20U20-25	25	1.2500	1.350
F20U20-30	30	1.5000	1.600
F20U20-35	35	1.7500	1.850
F20U20-40	40	2.0000	2.100
F20U20-45	45	2.2500	2.350
F20U20-50	50	2.5000	2.600
F20U20-60	60	3.0000	3.100
F20U20-70	70	3.5000	3.600
F20U20-80	80	4.0000	4.100

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

SPUR GEARS

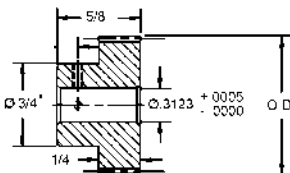
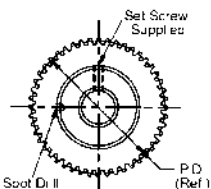
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL	10	20°



- For 14 - 16 teeth hub diameter equals .57.
Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P20S28-14	14•	.7000	.800
P20S28-15	15•	.7500	.850
P20S28-16	16•	.8000	.900
P20S28-18	18	.9000	1.000
P20S28-20	20	1.0000	1.100
P20S28-24	24	1.2000	1.300
P20S28-25	25	1.2500	1.350
P20S28-30	30	1.5000	1.600
P20S28-40	40	2.0000	2.100
P20S28-50	50	2.5000	2.600
P20S28-60	60	3.0000	3.100
P20S28-70	70	3.5000	3.600
P20S28-80	80	4.0000	4.100

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	PIN HUB	5/16"	1/4"	303 STAINLESS STEEL	10	20°



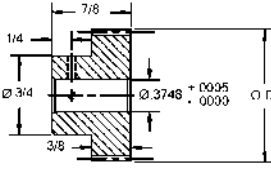
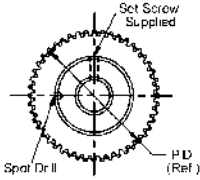
- For 14 - 16 teeth hub diameter equals .57.
Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P20S33-14	14•	.7000	.800
P20S33-15	15•	.7500	.850
P20S33-16	16•	.8000	.900
P20S33-18	18	.9000	1.000
P20S33-20	20	1.0000	1.100
P20S33-24	24	1.2000	1.300
P20S33-25	25	1.2500	1.350
P20S33-30	30	1.5000	1.600
P20S33-40	40	2.0000	2.100
P20S33-50	50	2.5000	2.600
P20S33-60	60	3.0000	3.100
P20S33-70	70	3.5000	3.600
P20S33-80	80	4.0000	4.100

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

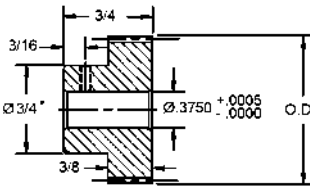
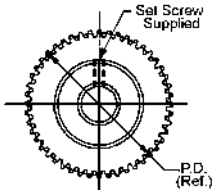
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	PIN HUB	3/8"	3/8"	303 STAINLESS STEEL	10	20°



Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P20S35-24	24	1.2000	1.300
P20S35-25	25	1.2500	1.350
P20S35-30	30	1.5000	1.600
P20S35-35	35	1.7500	1.850
P20S35-40	40	2.0000	2.100
P20S35-45	45	2.5000	2.350
P20S35-50	50	2.5000	2.600
P20S35-60	60	3.0000	3.100
P20S35-70	70	3.5000	3.600
P20S35-80	80	4.0000	4.100

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	PIN HUB	3/8"	3/8"	303 STAINLESS STEEL OR BRONZE ALLOY 464	10	20°

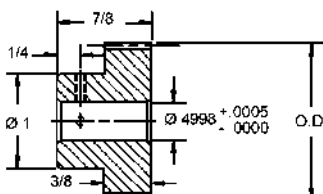
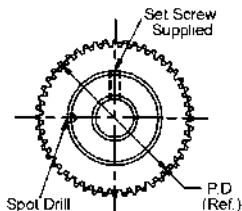


• For 14 - 16 teeth hub diameter equals .57
Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	BRONZE ALLOY 464 STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P20S34-14	P20B34-14	14*	.7000	.800
P20S34-15	P20B34-15	15*	.7500	.850
P20S34-16	P20B34-16	16*	.8000	.900
P20S34-18	P20B34-18	18	.9000	1.000
P20S34-20	P20B34-20	20	1.0000	1.100
P20S34-24	P20B34-24	24	1.2000	1.300
P20S34-28	P20B34-28	28	1.4000	1.500
P20S34-30	P20B34-30	30	1.5000	1.600
P20S34-36	P20B34-36	36	1.8000	1.900
P20S34X-40	P20B34X-40	40	2.0000	2.100
P20S34X-48	P20B34X-48	48	2.4000	2.500
P20S34X-56	P20B34X-56	56	2.8000	2.900
P20S34X-60	P20B34X-60	60	3.0000	3.100
P20S34X-72	P20B34X-72	72	3.6000	3.700
P20S34X-80	P20B34X-80	80	4.0000	4.100
P20S34X-84	P20B34X-84	84	4.2000	4.300
P20S34X-96	P20B34X-96	96	4.8000	4.900
P20S34X-100	P20B34X-100	100	5.0000	5.100

SPUR GEARS

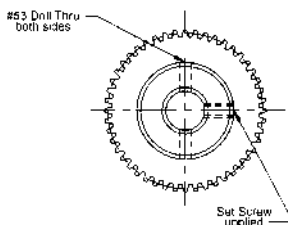
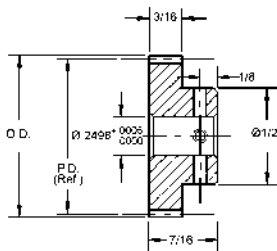
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	PIN HUB	1/2"	3/8"	303 STAINLESS STEEL	10	20°



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P20S37-24	24	1.2000	1.300
P20S37-25	25	1.2500	1.350
P20S37-30	30	1.5000	1.600
P20S37-35	35	1.7500	1.850
P20S37-40	40	2.0000	2.100
P20S37-45	45	2.5000	2.350
P20S37-50	50	2.5000	2.600
P20S37-60	60	3.0000	3.100
P20S37-70	70	3.5000	3.600
P20S37-80	80	4.0000	4.100

Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	PIN HUB	1/4"	3/16"	17-4 PH STAINLESS STEEL RC 32-38	10	20°

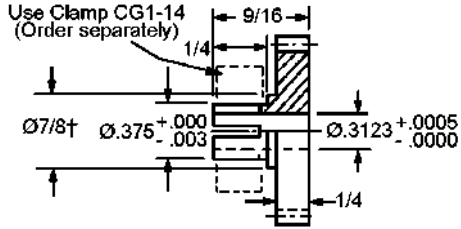
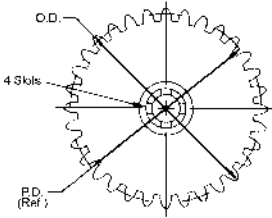


STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P20PH28-12	12	.6000	.700
P20PH28-14	14	.7000	.800
P20PH28-15	15	.7500	.850
P20PH28-16	16	.8000	.900
P20PH28-18	18	.9000	1.000
P20PH28-20	20	1.0000	1.100
P20PH28-24	24	1.2000	1.300
P20PH28-25	25	1.2500	1.350

Available on request, other numbers of teeth, quality 12 and 14-1/2° Pressure Angle.

SPUR GEARS

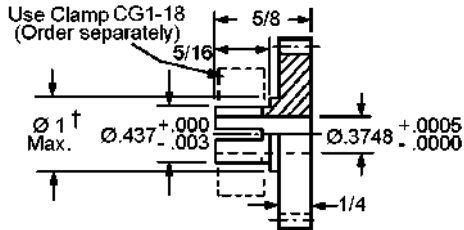
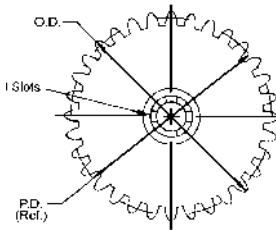
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	CLAMP HUB	5/16"	1/4"	303 STAINLESS STEEL	10	20°



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C20S22-16	16†	.800	.900
C20S22-20	20	1.000	1.100
C20S22-24	24	1.200	1.300
C20S22-32	32	1.600	1.700
C20S22-40	40	2.000	2.100
C20S22-48	48	2.400	2.500
C20S22-50	50	2.500	2.600
C20S22-55	55	2.750	2.850
C20S22-60	60	3.000	3.100

† Teeth may runout on flange diameter.
Available on request, Other numbers of teeth, 14-1/2° Pressure Angle.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
20	CLAMP HUB	3/8"	1/4"	303 STAINLESS STEEL	10	20°

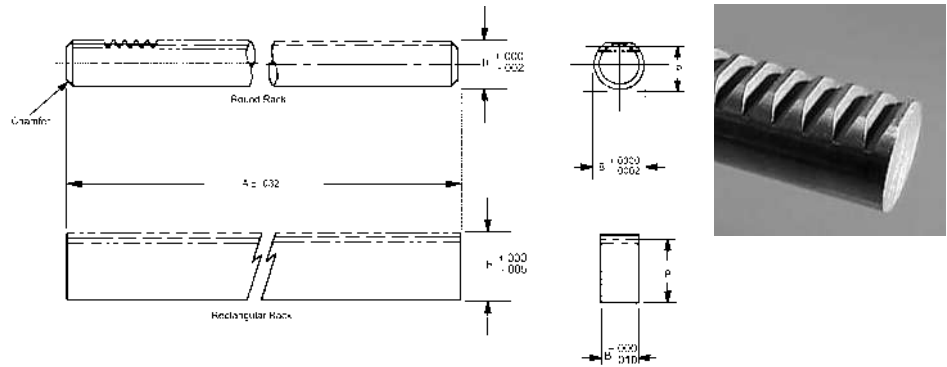


STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C20S25-16	16†	.800	.900
C20S25-20	20	1.000	1.100
C20S25-24	24	1.200	1.300
C20S25-32	32	1.600	1.700
C20S25-40	40	2.000	2.100
C20S25-48	48	2.400	2.500
C20S25-50	50	2.500	2.600
C20S25-55	55	2.750	2.850
C20S25-60	60	3.000	3.100

† Teeth may runout on flange diameter.
Available on request, Other numbers of teeth, 14-1/2° Pressure Angle.

GEAR RACKS

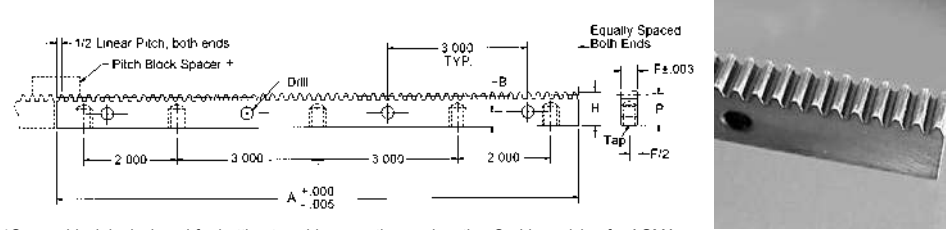
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
20	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	8	20°



STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-2	ROUND	20	.4800	.6247	24	.530	8
R2-8	RECTANGULAR	20	.6750	.365±.010	24	.725	8

Available on request: 14 - 1/2° pressure angle, special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
20	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



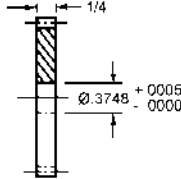
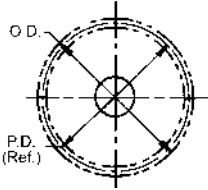
†Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS	SPACER BLOCK	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 / -.005	F	B	DRILL	TAP
STOCK NO.	STOCK NO.	NO.											
R1-2-G1	R1-2-SB	10*	.0014	.0005	20	.1570	11.147	.6750	.725	.365	.312	17/64	#10-24 x 3/8

* Higher quality on request.

SPUR GEARS

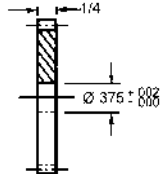
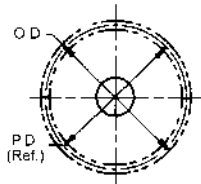
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	HUBLESS	3/8"	1/4"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth 14 -
1 1/2° Pressure Angle

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F24S6-24	F24A6-24	24	1.0000	1.083
F24S6-30	F24A6-30	30	1.2500	1.333
F24S6-32	F24A6-32	32	1.3333	1.416
F24S6-36	F24A6-36	36	1.5000	1.583
F24S6-48	F24A6-48	48	2.0000	2.083
F24S6-60	F24A6-60	60	2.5000	2.583
F24S6-64	F24A6-64	64	2.6666	2.750
F24S6-72	F24A6-72	72	3.0000	3.083
F24S6-96	F24A6-96	96	4.0000	4.083

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	HUBLESS	3/8"	1/4"	ALUMINUM RED ANODIZED	8	20°



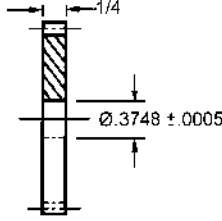
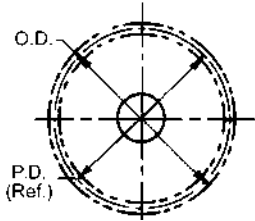
Available on request:
Other numbers of teeth
14-1 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F24A77-15	15	.6250	.708
F24A77-16	16	.6666	.750
F24A77-18	18	.7500	.833
F24A77-20	20	.8333	.916
F24A77-21	21	.8750	.958
F24A77-24	24	1.0000	1.083
F24A77-30	30	1.2500	1.333
F24A77-36	36	1.5000	1.583
F24A77-42	42	1.7500	1.833
F24A77-48	48	2.0000	2.083
F24A77-60	60	2.5000	2.583
F24A77-72	72	3.0000	3.083
F24A77-96	96	4.0000	4.083
F24A77-120	120	5.0000	5.083
F24A77-144	144	6.0000	6.083

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

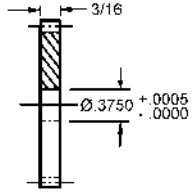
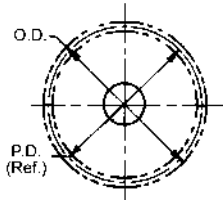
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	HUBLESS	3/8"	1/4"	POLYURETHANE	8	20°



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F24U6-24	24	1.0000	1.083
F24U6-30	30	1.2500	1.333
F24U6-32	32	1.3333	1.416
F24U6-36	36	1.5000	1.583
F24U6-42	42	1.7500	1.833
F24U6-48	48	2.0000	2.083
F24U6-60	60	2.5000	2.583
F24U6-64	64	2.6666	2.750
F24U6-72	72	3.0000	3.083
F24U6-96	96	4.0000	4.083

Available on request:
Other numbers of teeth,
14-1/2° Pressure Angle.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	HUBLESS	3/8"	3/16"	DELTRIN	10	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F24D5-15	15	.6250	.708
F24D5-16	16	.6666	.750
F24D5-17	17	.7083	.791
F24D5-18	18	.7500	.833
F24D5-19	19	.7916	.875
F24D5-20	20	.8333	.916
F24D5-21	21	.8750	.958
F24D5-22	22	.9166	1.000
F24D5-23	23	.9583	1.041
F24D5-24	24	1.0000	1.083
F24D5-25	25	1.0416	1.125
F24D5-28	28	1.1666	1.250
F24D5-30	30	1.2500	1.333
F24D5-32	32	1.3333	1.416
F24D5-33	33	1.3750	1.458
F24D5-36	36	1.5000	1.583
F24D5-40	40	1.6666	1.750
F24D5-42	42	1.7500	1.833
F24D5-45	45	1.8750	1.958
F24D5-46	46	1.9166	2.000
F24D5-48	48	2.0000	2.083
F24D5-50	50	2.0833	2.166
F24D5-52	52	2.1666	2.250
F24D5-55	55	2.2916	2.375
F24D5-56	56	2.3333	2.416
F24D5-57	57	2.3750	2.458
F24D5-60	60	2.5000	2.583
F24D5-64	64	2.6666	2.750
F24D5-66	66	2.7500	2.833
F24D5-69	69	2.8750	2.958
F24D5-72	72	3.0000	3.083
F24D5-78	78	3.2500	3.333
F24D5-84	84	3.5000	3.583
F24D5-90	90	3.7500	3.833
F24D5-93	93	3.8750	3.958

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	X	1/4"	303 STAINLESS STEEL	10	20°

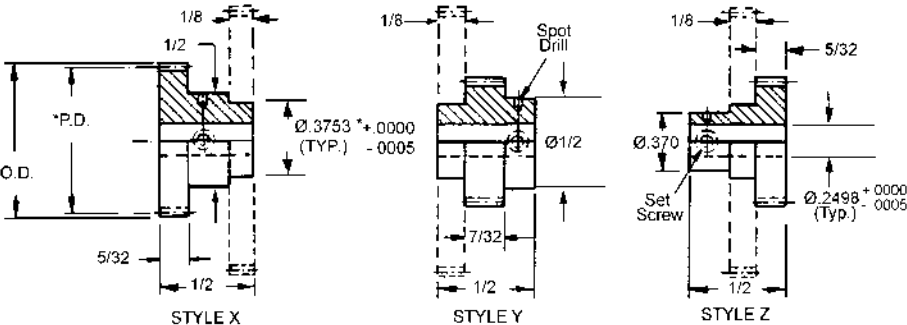
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP24S14-12	24	12	.5000	.583
DP24S14-13		13	.5418	.625
DP24S14-15		15	.6250	.708

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	Y	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP24S16-12	24	12	.5000	.583
DP24S16-13		13	.5418	.625
DP24S16-15		15	.6250	.708

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	Z	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP24S16-12	24	12	.5000	.583
DP24S16-13		13	.5418	.625
DP24S16-15		15	.6250	.708

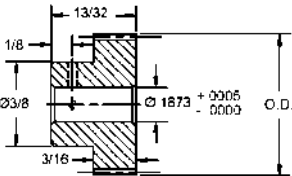
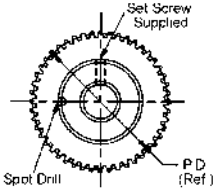


*Concentric within .0003
Order hubless gear separately

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	PIN HUB	3/16"	3/16"	303 STAINLESS STEEL OR ALUMINUM ANODIZED	10	20°



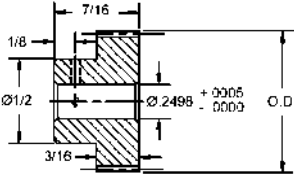
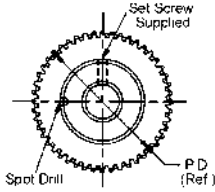
B

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24S21-15	P24A21-15	15	.6250	.708
P24S21-16	P24A21-16	16	.6666	.750
P24S21-18	P24A21-18	18	.7500	.833
P24S21-20	P24A21-20	20	.8333	.916
P24S21-22	P24A21-22	22	.9166	1.000
P24S21-24	P24A21-24	24	1.0000	1.083
P24S21-30	P24A21-30	30	1.2500	1.333
P24S21-36	P24A21-36	36	1.5000	1.583
P24S21-42	P24A21-42	42	1.7500	1.833
P24S21-48	P24A21-48	48	2.0000	2.083
P24S21-54	P24A21-54	54	2.2500	2.333
P24S21-60	P24A21-60	60	2.5000	2.583
P24S21-72	P24A21-72	72	3.0000	3.083
P24S21-84	P24A21-84	84	3.5000	3.583
P24S21-96	P24A21-96	96	4.0000	4.083

Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL OR ALUMINUM ANODIZED	10	20°



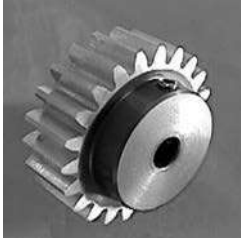
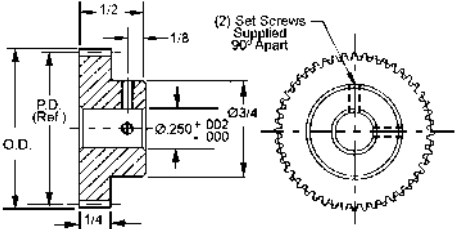
Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24S28-15	P24A28-15	15	.6250	.708
P24S28-16	P24A28-16	16	.6666	.750
P24S28-18	P24A28-18	18	.7500	.833
P24S28-20	P24A28-20	20	.8333	.916
P24S28-21	P24A28-21	21	.8750	.958
P24S28-22	P24A28-22	22	.9166	1.000
P24S28-24	P24A28-24	24	1.0000	1.083
P24S28-27	P24A28-27	27	1.1250	1.208
P24S28-30	P24A28-30	30	1.2500	1.333
P24S28-33	P24A28-33	33	1.3750	1.458
P24S28-36	P24A28-36	36	1.5000	1.583
P24S28-39	P24A28-39	39	1.6250	1.708
P24S28-42	P24A28-42	42	1.7500	1.833
P24S28-45	P24A28-45	45	1.8750	1.958
P24S28-48	P24A28-48	48	2.0000	2.083
P24S28-51	P24A28-51	51	2.1250	2.208
P24S28-54	P24A28-54	54	2.2500	2.333
P24S28-57	P24A28-57	57	2.3750	2.458
P24S28-60	P24A28-60	60	2.5000	2.583
P24S28-63	P24A28-63	63	2.6250	2.708
P24S28-66	P24A28-66	66	2.7500	2.833
P24S28-69	P24A28-69	69	2.8750	2.958
P24S28-72	P24A28-72	72	3.0000	3.083
P24S28-75	P24A28-75	75	3.1250	3.208
P24S28-78	P24A28-78	78	3.2500	3.333
P24S28-81	P24A28-81	81	3.3750	3.458
P24S28-84	P24A28-84	84	3.5000	3.583
P24S28-87	P24A28-87	87	3.6250	3.708
P24S28-90	P24A28-90	90	3.7500	3.833
P24S28-93	P24A28-93	93	3.8750	3.958
P24S28-96	P24A28-96	96	4.0000	4.083
P24S28-99	P24A28-99	99	4.1250	4.208
P24S28-100	P24A28-100	100	4.1666	4.250
P24S28-105	P24A28-105	105	4.3750	4.458

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

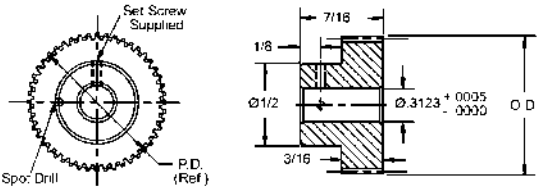
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	1/4"	1/4"	ALUMINUM RED ANODIZED	8	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle
For 14-20 teeth
Hub diameter equals Ø.44

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24A66-14	14	.5833	.666
P24A66-15	15	.6250	.708
P24A66-16	16	.6666	.750
P24A66-18	18	.7500	.833
P24A66-20	20	.8333	.916
P24A66-21	21	.8750	.958
P24A66-24	24	1.0000	1.083
P24A66-30	30	1.2500	1.333
P24A66-36	36	1.5000	1.583
P24A66-42	42	1.7500	1.833
P24A66-48	48	2.0000	2.083
P24A66-60	60	2.5000	2.583
P24A66-72	72	3.0000	3.083
P24A66-96	96	4.0000	4.083
P24A66-120	120	5.0000	5.083
P24A66-144	144	6.0000	6.083

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	5/16"	3/16"	303 STAINLESS STEEL	10	20°

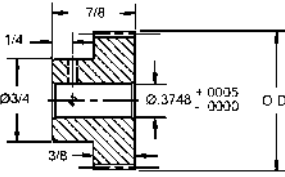
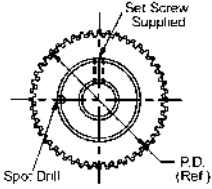


Available on request, other numbers of teeth
and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24S32-15	15	.6250	.708
P24S32-18	18	.7500	.833
P24S32-21	21	.8750	.958
P24S32-24	24	1.0000	1.083
P24S32-30	30	1.2500	1.333
P24S32-36	36	1.5000	1.583
P24S32-48	48	2.0000	2.083
P24S32-72	72	3.0000	3.083
P24S32-84	84	3.5000	3.583
P24S32-96	96	4.0000	4.083

SPUR GEARS

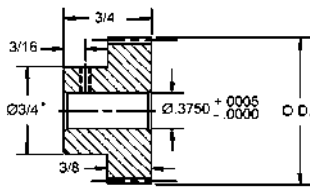
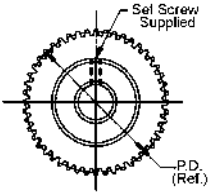
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	3/8"	3/8"	303 STAINLESS STEEL	10	20°



Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24S35-30	30	1.2500	1.333
P24S35-36	36	1.5000	1.583
P24S35-42	42	1.7500	1.833
P24S35-48	48	2.0000	2.083
P24S35-60	60	2.5000	2.583
P24S35-72	72	3.0000	3.083
P24S35-84	84	3.5000	3.583
P24S35-96	96	4.0000	4.083

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	3/8"	3/8"	303 STAINLESS STEEL OR BRONZE ALLOY 464	10	20°



- For 16 - 20 teeth hub diameter equals .56

X In Part Number indicates that part may be supplied as two piece construction (some dimensions may vary.)

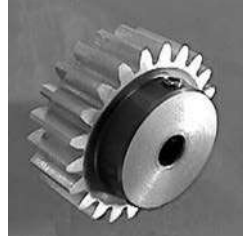
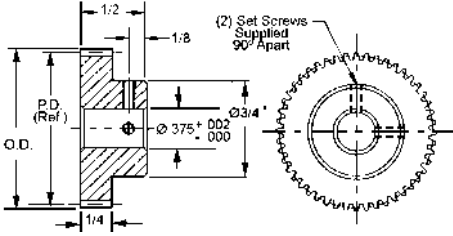
Available on request, other numbers of teeth
and 14-1/2° Pressure Angle.

303 STAINLESS STEEL	BRONZE ALLOY 464	BERG QUALITY #10		
STOCK NO.	STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24S34-16	P24B34-16	16*	.6666	.750
P24S34-18	P24B34-18	18*	.7500	.833
P24S34-20	P24B34-20	20*	.8333	.916
P24S34-24	P24B34-24	24	1.0000	1.083
P24S34-28	P24B34-28	28	1.1666	1.250
P24S34-30	P24B34-30	30	1.2500	1.333
P24S34-36	P24B34-36	36	1.5000	1.583
P24S34-40	P24B34-40	40	1.6666	1.750
P24S34X-48	P24B34X-48	48	2.0000	2.083
P24S34X-56	P24B34X-56	56	2.3333	2.416
P24S34X-60	P24B34X-60	60	2.5000	2.583
P24S34X-72	P24B34X-72	72	3.0000	3.083
P24S34X-80	P24B34X-80	80	3.3333	3.416
P24S34X-96	P24B34X-96	96	4.0000	4.083
P24S34X-112	P24B34X-112	112	4.6666	4.750
P24S34X-120	P24B34X-120	120	5.0000	5.083

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	3/8"	1/4"	ALUMINUM RED ANODIZED	8	20°

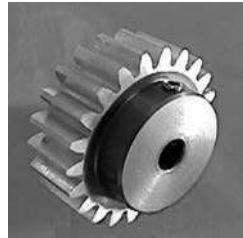
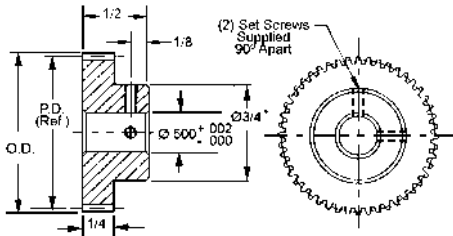


- For 17 - 20 teeth hub diameter is .597

Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24A67-16	16•	.6666	.750
P24A67-18	18•	.7500	.833
P24A67-20	20•	.8333	.916
P24A67-21	21	.8750	.958
P24A67-24	24	1.0000	1.083
P24A67-30	30	1.2500	1.333
P24A67-36	36	1.5000	1.583
P24A67-42	42	1.7500	1.833
P24A67-48	48	2.0000	2.083
P24A67-60	60	2.5000	2.583
P24A67-72	72	3.0000	3.083
P24A67-96	96	4.0000	4.083
P24A67-120	120	5.0000	5.083
P24A67-144	144	6.0000	6.083

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	1/2"	1/4"	ALUMINUM RED ANODIZED	8	20°



- For 19 - 20 teeth hub diameter is .68

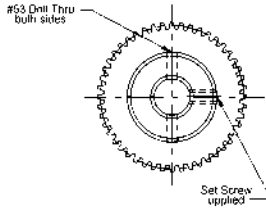
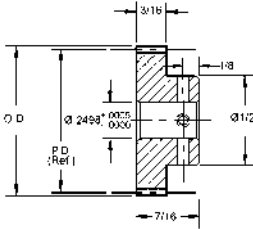
Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24A68-20	20•	.8333	.916
P24A68-21	21	.8750	.958
P24A68-24	24	1.0000	1.083
P24A68-30	30	1.2500	1.333
P24A68-36	36	1.5000	1.583
P24A68-42	42	1.7500	1.833
P24A68-48	48	2.0000	2.083
P24A68-60	60	2.5000	2.583
P24A68-72	72	3.0000	3.083
P24A68-96	96	4.0000	4.083
P24A68-120	120	5.0000	5.083
P24A68-144	144	6.0000	6.083

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

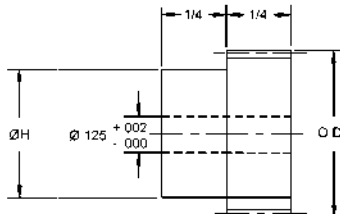
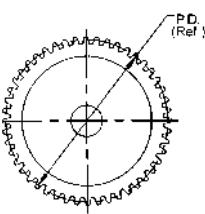
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	1/4"	3/16"	17-4PH STAINLESS STEEL RC 32-38	10	20°



- For 13 - 14 teeth hub diameter equals .43
- Available on request, other numbers of teeth, quality 12 and 14 - 1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24PH28-13	13*	.5416	.625
P24PH28-14	14*	.5833	.666
P24PH28-15	15	.6250	.708
P24PH28-16	16	.6666	.750
P24PH28-18	18	.7500	.833
P24PH28-20	20	.8333	.916
P24PH28-21	21	.8750	.958
P24PH28-24	24	1.0000	1.083
P24PH28-26	26	1.0833	1.166
P24PH28-27	27	1.1250	1.208
P24PH28-28	28	1.1666	1.250
P24PH28-30	30	1.2500	1.333

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	1/8"	1/4"	COLD ROLLED STEEL C12L14 OR C12L15 WITH SELENIUM OR BRASS ALLOY 360	5	20°

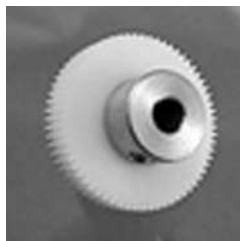
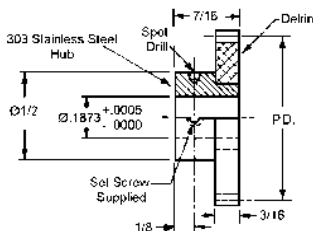


COLD ROLLED STEEL C12L14 OR C12L15 WITH SELENIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	H
PX24S-8	PX24B-8	8	.333	.416	.208
PX24S-9	PX24B-9	9	.375	.458	.250
PX24S-10	PX24B-10	10	.417	.500	.291
PX24S-12	PX24B-12	12	.500	.583	.375
PX24S-16	PX24B-16	16	.666	.750	.542
PX24S-18	PX24B-18	18	.750	.833	.625
-	PX24B-22	22	.916	1.000	.792

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	3/16"	3/16"	DELTRIN WITH STAINLESS STEEL HUB	10	20°



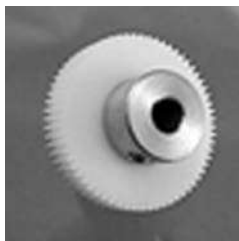
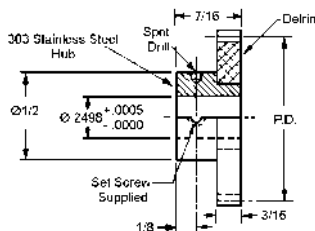
Available on request, other numbers of teeth,
quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24D21X-15	15	.6250	.708
P24D21X-16	16	.6666	.750
P24D21X-17	17	.7083	.791
P24D21X-18	18	.7500	.833
P24D21X-19	19	.7916	.875
P24D21X-20	20	.8333	.916
P24D21X-21	21	.8750	.958
P24D21X-22	22	.9166	1.000
P24D21X-23	23	.9583	1.041
P24D21X-24	24	1.0000	1.083
P24D21X-25	25	1.0416	1.125
P24D21X-28	28	1.1666	1.250
P24D21X-30	30	1.2500	1.333
P24D21X-32	32	1.3333	1.416
P24D21X-33	33	1.3750	1.458
P24D21X-36	36	1.5000	1.583
P24D21X-40	40	1.6666	1.750
P24D21X-42	42	1.7500	1.833
P24D21X-45	45	1.8750	1.958
P24D21X-46	46	1.9166	2.000
P24D21X-48	48	2.0000	2.083
P24D21X-50	50	2.0833	2.166
P24D21X-52	52	2.1666	2.250
P24D21X-55	55	2.2916	2.375
P24D21X-56	56	2.3333	2.416
P24D21X-57	57	2.3750	2.458
P24D21X-60	60	2.5000	2.583
P24D21X-64	64	2.6666	2.750
P24D21X-66	66	2.7500	2.833
P24D21X-69	69	2.8750	2.958
P24D21X-72	72	3.0000	3.083
P24D21X-78	78	3.2500	3.333
P24D21X-84	84	3.5000	3.583
P24D21X-90	90	3.7500	3.833
P24D21X-93	93	3.8750	3.958

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	1/4"	3/16"	DELTRIN WITH STAINLESS STEEL HUB	10	20°



Available on request, other numbers of teeth, quality 12 and 14-1/2° Pressure Angle.

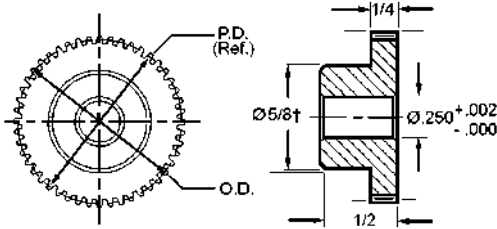
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24D28X-15	15	.6250	.708
P24D28X-16	16	.6666	.750
P24D28X-17	17	.7083	.791
P24D28X-18	18	.7500	.833
P24D28X-19	19	.7916	.875
P24D28X-20	20	.8333	.916
P24D28X-21	21	.8750	.958
P24D28X-22	22	.9166	1.000
P24D28X-23	23	.9583	1.041
P24D28X-24	24	1.0000	1.083
P24D28X-25	25	1.0416	1.125
P24D28X-28	28	1.1666	1.250
P24D28X-30	30	1.2500	1.333
P24D28X-32	32	1.3333	1.416
P24D28X-33	33	1.3750	1.458
P24D28X-36	36	1.5000	1.583
P24D28X-40	40	1.6666	1.750
P24D28X-42	42	1.7500	1.833
P24D28X-45	45	1.8750	1.958
P24D28X-46	46	1.9166	2.000
P24D28X-48	48	2.0000	2.083
P24D28X-50	50	2.0833	2.166
P24D28X-52	52	2.1666	2.250
P24D28X-55	55	2.2916	2.375
P24D28X-56	56	2.3333	2.416
P24D28X-57	57	2.3750	2.458
P24D28X-60	60	2.5000	2.583
P24D28X-64	64	2.6666	2.750
P24D28X-66	66	2.7500	2.833
P24D28X-69	69	2.8750	2.958
P24D28X-72	72	3.0000	3.083
P24D28X-78	78	3.2500	3.333
P24D28X-84	84	3.5000	3.583
P24D28X-90	90	3.7500	3.833
P24D28X-93	93	3.8750	3.958

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	1/4"	1/4"	MOLDED ACETAL	5	20°

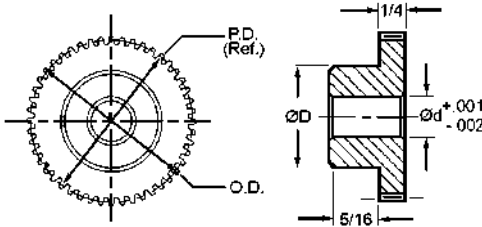


† Teeth runout on hub.
Available on request, other numbers of teeth,
quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P24D4M-15	15†	.6250	.71
P24D4M-16	16†	.6666	.75
P24D4M-18	18	.7500	.83
P24D4M-20	20	.8333	.92
P24D4M-21	21	.8750	.96
P24D4M-24	24	1.0000	1.08
P24D4M-30	30	1.2500	1.33
P24D4M-36	36	1.5000	1.58
P24D4M-42	42	1.7500	1.83
P24D4M-48	48	2.0000	2.08
P24D4M-54	54	2.2500	2.33
P24D4M-60	60	2.5000	2.58

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	3/16" TO 5/16"	1/4"	MOLDED DELRIN	5	20°



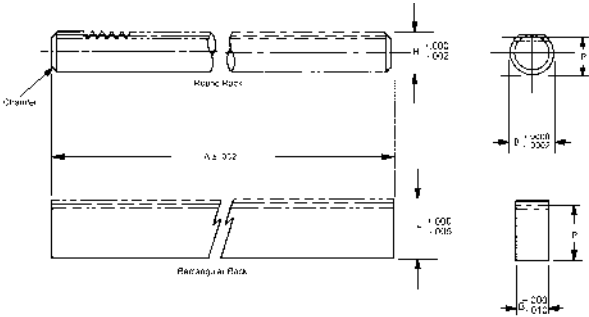
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	Ød	ØD
P24D4P-12	12	.500	.583	3/16	3/8
P24D4P-14	14	.583	.667	3/16	7/16
P24D4P-15	15	.625	.709	3/16	31/64
P24D4P-16	16	.667	.750	3/16	31/64
P24D4P-17	17	.709	.791	3/16	35/64
P24D4P-18	18	.750	.833	3/16	35/64
P24D4P-19	19	.791	.875	3/16	35/64
P24D4P-20	20	.833	.917	3/16	35/64
P24D4P-21	21	.875	.959	3/16	35/64
P24D4P-22	22	.917	1.000	3/16	35/64
P24D4P-23	23	.959	1.041	3/16	35/64
P24D4P-24	24	1.000	1.083	1/4	5/8
P24D4P-25	25	1.041	1.125	1/4	39/64
P24D4P-26	26	1.083	1.167	1/4	5/8
P24D4P-27	27	1.125	1.208	1/4	5/8
P24D4P-28	28	1.167	1.250	1/4	5/8
P24D4P-30	30	1.250	1.333	1/4	5/8
P24D4P-32	32	1.333	1.416	1/4	39/64
P24D4P-33	33	1.375	1.458	1/4	39/64
P24D4P-34	34	1.416	1.500	1/4	39/64
P24D4P-36	36	1.500	1.583	1/4	5/8
P24D4P-39	39	1.625	1.708	5/16	43/64
P24D4P-40	40	1.666	1.750	5/16	43/64
P24D4P-42	42	1.750	1.833	5/16	43/64
P24D4P-44	44	1.833	1.917	5/16	43/64
P24D4P-45	45	1.875	1.958	5/16	43/64
P24D4P-48	48	2.000	2.083	5/16	43/64
P24D4P-50	50	2.083	2.166	5/16	43/64
P24D4P-52	52	2.166	2.250	5/16	43/64
P24D4P-54	54	2.250	2.333	5/16	43/64
P24D4P-56	56	2.333	2.416	5/16	43/64
P24D4P-60	60	2.500	2.583	5/16	43/64
P24D4P-72	72	3.000	3.083	5/16	43/64

Some molded gears may have webs.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°

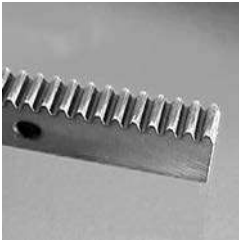
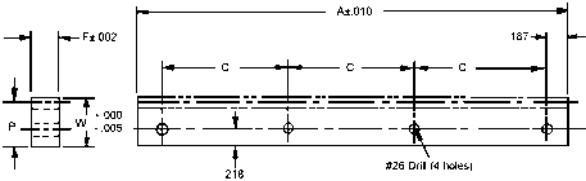


B

STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-3	ROUND	24	.4383	.4997	18	.480	10
R2-9	RECTANGULAR	24	.4383	.230±.005	18	.480	10

Available on request:
14 - 1/2° pressure angle,
special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	RECTANGULAR	416 SERIES STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°

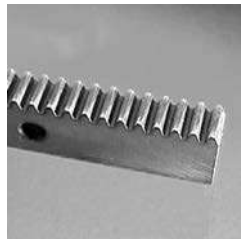
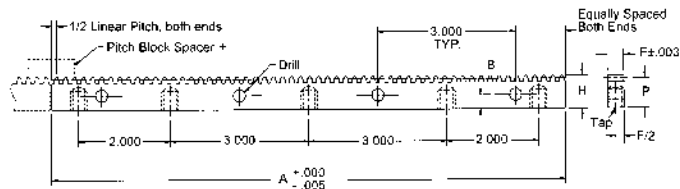


STOCK NO.	MATERIAL	A (Inch)	P (Ref.)	W	F	C
R4-5	STAINLESS ST.	10	.4383	.480	.230	3.208
R4-6	ALUMINUM					

Available on request: special,
modified and custom racks.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



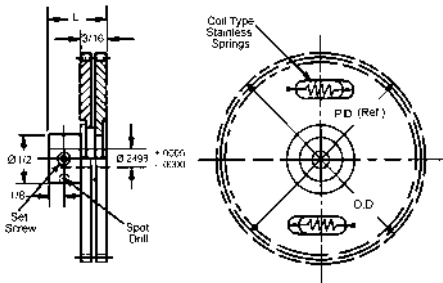
†Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS		SPACER											
STOCK NO.	STOCK NO.	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 / -.005	F	B	DRILL	TAP
R1-3-G1	R1-3-SB	10*	.0014	.0005	24	.1309	11.120	.4333	.475	.230	.218	#26	#6-32 x 1/4

* Higher quality on request.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

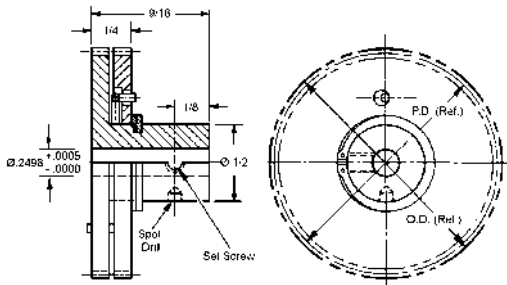
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AP24MS-24	AP24QS-24	15/32	24	1.0000	1.083
AP24MS-25	AP24QS-25		25	1.0417	1.125
AP24MS-26	AP24QS-26		26	1.0833	1.166
AP24MS-28	AP24QS-28		28	1.1667	1.250
AP24M-30	AP24Q-30		30	1.2500	1.333
AP24M-35	AP24Q-35		35	1.4583	1.541
AP24M-36	AP24Q-36		36	1.5000	1.583
AP24M-40	AP24Q-40		40	1.6667	1.750
AP24M-42	AP24Q-42		42	1.7500	1.833
AP24M-45	AP24Q-45		45	1.8750	1.958
AP24M-48	AP24Q-48		48	2.0000	2.083
AP24M-50	AP24Q-50		50	2.0833	2.166
AP24M-54	AP24Q-54		54	2.2500	2.333
AP24M-55	AP24Q-55		55	2.2917	2.375
AP24M-60	AP24Q-60		60	2.5000	2.583
AP24M-65	AP24Q-65		65	2.7083	2.791
AP24M-66	AP24Q-66		66	2.7500	2.833

Available on request:
Other numbers of teeth,
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	PIN HUB	1/4"	1/4"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

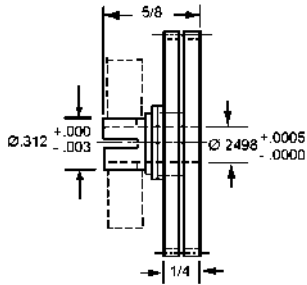


Hub Material: 303 Stainless Steel

STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AP24BS-18	AP24DS-18	24	18	.7500	.833
AP24BS-21	AP24DS-21		21	.8750	.958
AP24BS-24	AP24DS-24		24	1.0000	1.083

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	CLAMP HUB	1/4"	1/4"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



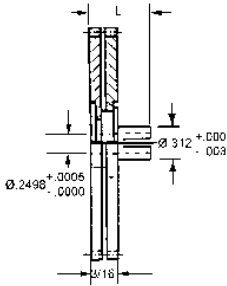
Hub Material: 303 Stainless Steel

STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC24BS-18	AC24DS-18	24	18	.7500	.833
AC24BS-21	AC24DS-21		21	.8750	.958
AC24BS-24	AC24DS-24		24	1.0000	1.083

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
24	CLAMP HUB	1/4"	3/16"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

Hub Material: 303 Stainless Steel

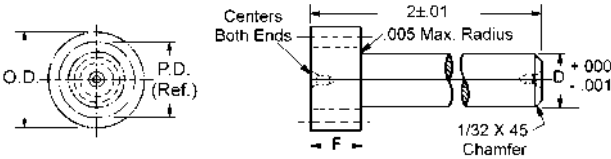
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC24MS-24	AC24QS-24	15/32	24	1.0000	1.083
AC24MS-25	AC24QS-25		25	1.0417	1.125
AC24MS-26	AC24QS-26		26	1.0833	1.166
AC24MS-28	AC24QS-28		28	1.1667	1.250
AC24M-30	AC24Q-30	27/64	30	1.2500	1.333
AC24M-35	AC24Q-35		35	1.4583	1.541
AC24M-36	AC24Q-36		36	1.5000	1.583
AC24M-40	AC24Q-40		40	1.6667	1.750
AC24M-42	AC24Q-42		42	1.7500	1.833
AC24M-45	AC24Q-45		45	1.8750	1.958
AC24M-48	AC24Q-48		48	2.0000	2.083
AC24M-50	AC24Q-50		50	2.0833	2.166
AC24M-54	AC24Q-54		54	2.2500	2.333
AC24M-55	AC24Q-55		55	2.2917	2.375
AC24M-60	AC24Q-60		60	2.5000	2.583
AC24M-65	AC24Q-65		65	2.7083	2.791
AC24M-66	AC24Q-66		66	2.7500	2.833

Available on request:
Other numbers of teeth,
AGMA Quality 12 and 14 (some dimensions may vary),
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

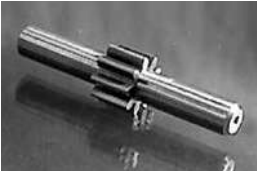
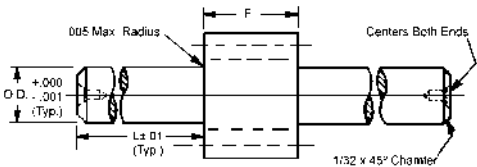
PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	BRASS AND COLD ROLLED STEEL	5	20°



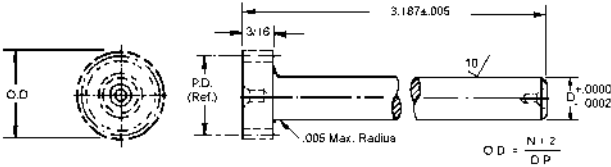
COLD ROLLED STEEL 12L14 OR 12L15 W/SELENIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NUMBER OF TEETH	PITCH DIAMETER	OUTSIDE DIAMETER	D	F
PSX24S-8	PSX24B-8	8	.3333	.416	.187	5/16
PSX24S-9	PSX24B-9	9	.3750	.458	.250	
PSX24S-10	PSX24B-10	10	.4167	.500	.250	
PSX24S-12	PSX24B-12	12	.5000	.583	.375	

PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	BRASS AND COLD ROLLED STEEL	5	20°



COLD ROLLED STEEL 12L14 OR 12L15 W/SELENIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NUMBER OF TEETH	PITCH DIAMETER	OUTSIDE DIAMETER	D	F	L
PSW24S-8	PSW24B-8	8	.3333	.416	.187	5/16	3/4
PSW24S-9	PSW24B-9	9	.3750	.458	.250		
PSW24S-10	PSW24B-10	10	.4167	.500	.250		
PSW24S-12	PSW24B-12	12	.5000	.583	.375		

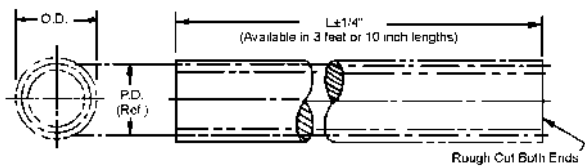
PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	303 STAINLESS STEEL	5	20°



STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS24S4-10H	24	10	.4166	.2497
PS24S4-12H		12	.5000	.2497

SPUR GEAR STOCKS

PITCH	TYPE	MATERIAL	PRESSURE ANGLE
24	PINION WIRE	BRASS AND COLD ROLLED STEEL	20°

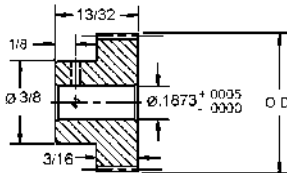
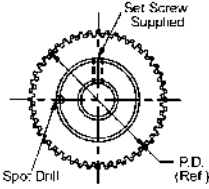


B

BRASS ALLOY 360		COLD ROLLED STEEL C12L14 or C12L15 WITH SELENIUM		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3FT. LONG STOCK NO.	10 IN.LONG STOCK NO.	3FT. LONG STOCK NO.	10 IN.LONG STOCK NO.			
PW24B-8X	PW24B-8A	PW24S-8X	PW24S-8A	8	.3333	.416
PW24B-9X	PW24B-9A	PW24S-9X	PW24S-9A	9	.3750	.458
PW24B-10X	PW24B-10A	PW24S-10X	PW24S-10A	10	.4166	.500
-	-	PW24S-11	PW24S-11A	11	.4583	.541
PW24B-12X	PW24B-12A	PW24S-12X	PW24S-12A	12	.5000	.583
PW24B-14	PW24B-14A	PW24S-14	PW24S-14A	14	.5833	.666
PW24B-15	PW24B-15A	PW24S-15	PW24S-15A	15	.6250	.708
PW24B-16	PW24B-16A	PW24S-16	PW24S-16A	16	.6666	.750
PW24B-18	PW24B-18A	PW24S-18	PW24S-18A	18	.7500	.833
PW24B-22	PW24B-22A	-	-	22	.9166	1.000

SPUR GEARS

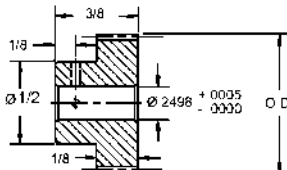
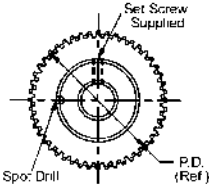
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
1/10	PIN HUB	3/16"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



Available on request, other numbers of teeth,
AGMA Quality 12 and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	BERG QUALITY #10		
		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P31S21-20	P31A21-20	20	.6366	.700
P31S21-25	P31A21-25	25	.7957	.859
P31S21-30	P31A21-30	30	.9549	1.018
P31S21-35	P31A21-35	35	1.1140	1.177
P31S21-40	P31A21-40	40	1.2732	1.336
P31S21-45	P31A21-45	45	1.4323	1.496
P31S21-50	P31A21-50	50	1.5915	1.655

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
1/10	PIN HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



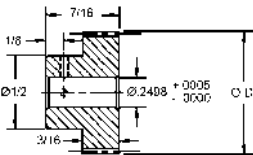
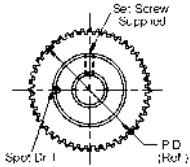
Available on request, other numbers of teeth,
AGMA Quality 12 and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	BERG QUALITY #10		
		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P31S26-20	P31A26-20	20	.6366	.700
P31S26-25	P31A26-25	25	.7957	.859
P31S26-30	P31A26-30	30	.9549	1.018
P31S26-35	P31A26-35	35	1.1140	1.177
P31S26-40	P31A26-40	40	1.2732	1.336
P31S26-45	P31A26-45	45	1.4323	1.496
P31S26-50	P31A26-50	50	1.5915	1.655

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

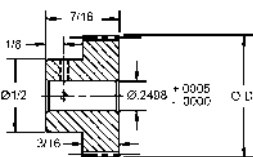
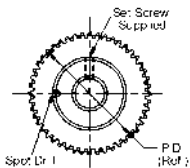
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
1/10	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



Available on request, other numbers of teeth, 14-1/2° Pressure Angle.

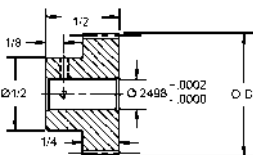
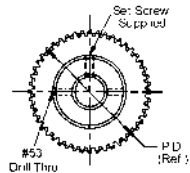
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	BERG QUALITY #10		
		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P31S28-20	P31A28-20	20	.6366	.700
P31S28-25	P31A28-25	25	.7957	.859
P31S28-30	P31A28-30	30	.9549	1.018
P31S28-35	P31A28-35	35	1.1140	1.177
P31S28-40	P31A28-40	40	1.2732	1.336
P31S28-45	P31A28-45	45	1.4323	1.496
P31S28-50	P31A28-50	50	1.5915	1.655

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
1/10	PIN HUB	1/4"	3/16"	17-4PH STAINLESS STEEL HARDENED RC 28-35	10	20°



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P31PH28-20	20	.6366	.700
P31PH28-25	25	.7957	.859
P31PH28-30	30	.9549	1.019
P31PH28-40	40	1.2732	1.337

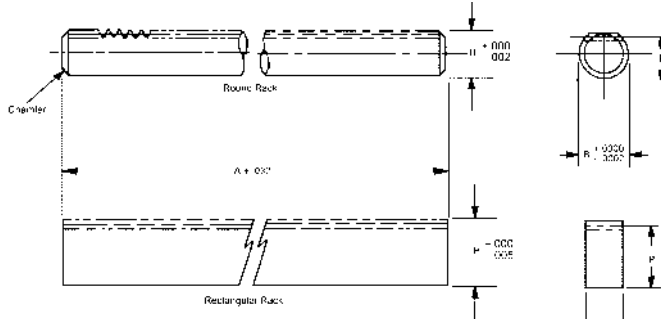
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
1/10	PIN HUB	1/4"	1/4"	17-4PH STAINLESS STEEL HARDENED RC 28-35	13	20°



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P31PH41-20-Q10	20	.6366	.700
P31PH41-40-Q10	40	1.2732	1.337

GEAR RACKS

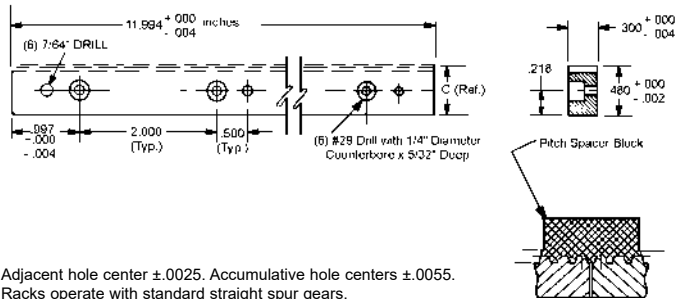
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/10	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-4	ROUND	1/10	.3082	.3747	18	.340	10
R2-10	RECTANGULAR	1/10	.4482	.230±.005	18	.480	10

Available on request:
14 - 1/2° pressure angle,
special, modified and custom racks.

PITCH	STYLES	MATERIAL	AGMA QUALITY	PRES. ANGLE
1/10	Order With or Without Spacer Block	416 SERIES STAINLESS STEEL RC26-36	10	20°



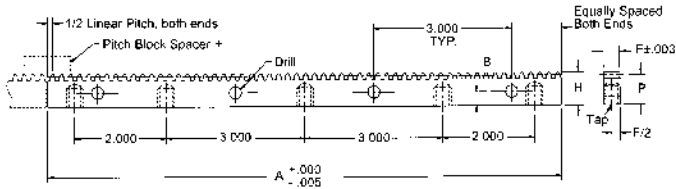
Adjacent hole center ±.0025. Accumulative hole centers ±.0055.
Racks operate with standard straight spur gears.
Custom racks available on request.

WITHOUT SPACER BLOCK STOCK NO.	SPACER BLOCK STOCK NO.	AGMA QUALITY NO.	TOTAL COMPOSITE ERROR	TOTAL TOOTH ERROR	PITCH PLANE PARALLELISM TO BASE SURFACE	LINEAR PITCH	C REF
R8-2-G1	R8-2-G1-SB	Q10*	.0014	.0005	.0015	1/10	.4480

* Higher quality on request.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/10	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



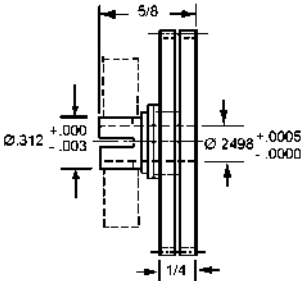
† Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS	SPACER BLOCK	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 / -.005	F	B	DRILL	TAP
STOCK NO.	STOCK NO.												
R1-4-G1	R1-4-SB	10*	.0014	.0005	1/10	.1000	10.994	.4432	.475	.230	.218	#26	#6-32 x 1/4
R3-2G1	R3-2-SB	10*	.0014	.0005	1/10	.1000	10.994	.4482	.480	.230	.218	#26	#6-32 x 1/4

* Higher quality on request.

ANTI-BACKLASH GEARS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRES. ANGLE
1/10	CLAMP HUB	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



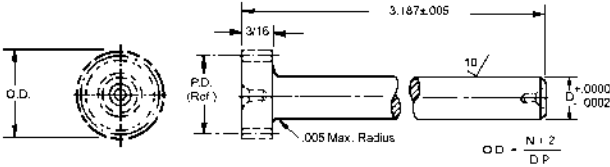
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC31BS-25	AC31DS-25	1/10	25	.7958	.859
AC31BS-30	AC31DS-30		30	.9549	1.018

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/10	303 STAINLESS STEEL	10	20°

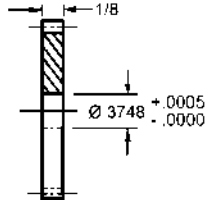
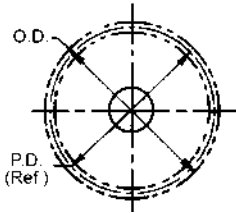


STOCK NO	PITCH	NO. OF TEETH	PITCH DIA.	D
PS31S4-10H	1/10	10	.3183	.2497

Other numbers of teeth available on request.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	HUBLESS	3/8"	1/8"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



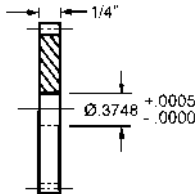
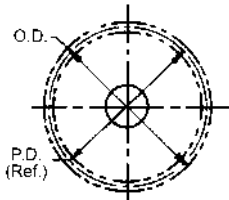
Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2° Pressure Angle

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F32S3-20	F32A3-20	20	.6250	.687
F32S3-24	F32A3-24	24	.7500	.812
F32S3-26	F32A3-26	26	.8125	.875
F32S3-28	F32A3-28	28	.8750	.937
F32S3-30	F32A3-30	30	.9375	1.000
F32S3-32	F32A3-32	32	1.0000	1.062
F32S3-36	F32A3-36	36	1.1250	1.187
F32S3-40	F32A3-40	40	1.2500	1.312
F32S3-42	F32A3-42	42	1.3125	1.375
F32S3-44	F32A3-44	44	1.3750	1.437
F32S3-48	F32A3-48	48	1.5000	1.562
F32S3-60	F32A3-60	60	1.8750	1.937
F32S3-64	F32A3-64	64	2.0000	2.062
F32S3-72	F32A3-72	72	2.2500	2.312
F32S3-75	F32A3-75	75	2.3437	2.406
F32S3-76	F32A3-76	76	2.3750	2.437
F32S3-80	F32A3-80	80	2.5000	2.562
F32S3-81	F32A3-81	81	2.5312	2.593
F32S3-86	F32A3-86	86	2.6875	2.750
F32S3-88	F32A3-88	88	2.7500	2.812
F32S3-90	F32A3-90	90	2.8125	2.875
F32S3-92	F32A3-92	92	2.8750	2.937
F32S3-95	F32A3-95	95	2.9687	3.031
F32S3-96	F32A3-96	96	3.0000	3.062
F32S3-100	F32A3-100	100	3.1250	3.187
F32S3-105	F32A3-105	105	3.2812	3.343
F32S3-108	F32A3-108	108	3.3750	3.437
F32S3-110	F32A3-110	110	3.4375	3.500
F32S3-112	F32A3-112	112	3.5000	3.562
F32S3-115	F32A3-115	115	3.5937	3.656
F32S3-116	F32A3-116	116	3.6250	3.687
F32S3-120	F32A3-120	120	3.7500	3.812
F32S3-124	F32A3-124	124	3.8750	3.937
F32S3-126	F32A3-126	126	3.9375	4.000
F32S3-128	F32A3-128	128	4.0000	4.062
F32S3-132	F32A3-132	132	4.1250	4.187

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

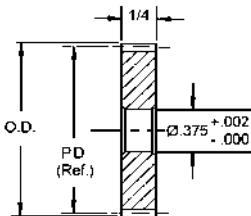
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	HUBLESS	3/8"	1/4"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2° Pressure Angle

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F32S6-32	F32A6-32	32	1.0000	1.062
F32S6-36	F32A6-36	36	1.1250	1.187
F32S6-40	F32A6-40	40	1.2500	1.312
F32S6-48	F32A6-48	48	1.5000	1.562
F32S6-60	F32A6-60	60	1.8750	1.937
F32S6-64	F32A6-64	64	2.0000	2.062
F32S6-72	F32A6-72	72	2.2500	2.312
F32S6-75	F32A6-75	75	2.3437	2.406
F32S6-80	F32A6-80	80	2.5000	2.562
F32S6-96	F32A6-96	96	3.0000	3.062
F32S6-120	F32A6-120	120	3.7500	3.812
F32S6-128	F32A6-128	128	4.0000	4.062

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	HUBLESS	3/8"	1/4"	ALUMINUM RED ANODIZED	8	20°

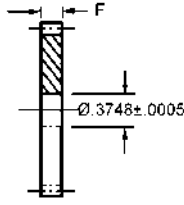
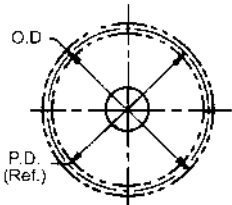


Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F32A77-20	20	.6250	.687
F32A77-24	24	.7500	.812
F32A77-30	30	.9375	1.000
F32A77-32	32	1.0000	1.062
F32A77-36	36	1.1250	1.187
F32A77-40	40	1.2500	1.312
F32A77-48	48	1.5000	1.562
F32A77-56	56	1.7500	1.812
F32A77-60	60	1.8750	1.937
F32A77-64	64	2.0000	2.062
F32A77-80	80	2.5000	2.562
F32A77-96	96	3.0000	3.062
F32A77-112	112	3.5000	3.562
F32A77-128	128	4.0000	4.062
F32A77-160	160	5.0000	5.062
F32A77-192	192	6.0000	6.062

SPUR GEARS

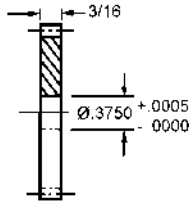
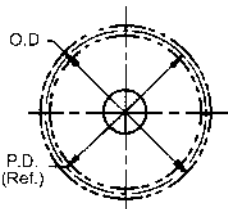
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	HUBLESS	3/8"	1/8"	POLYURETHANE	8	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F32U3-32	32	1.0000	1.062
F32U3-36	36	1.1250	1.187
F32U3-40	40	1.2500	1.312
F32U3-48	48	1.5000	1.562
F32U3-60	60	1.8750	1.937
F32U3-64	64	2.0000	2.062
F32U3-72	72	2.2500	2.312

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	HUBLESS	3/8"	3/16"	DELTRIN	10	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

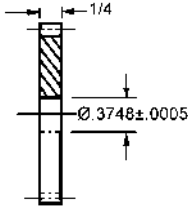
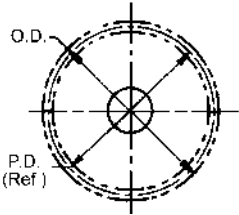


STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F32D5-20	20	.6250	.687
F32D5-21	21	.6562	.718
F32D5-22	22	.6875	.750
F32D5-23	23	.7187	.781
F32D5-24	24	.7500	.812
F32D5-25	25	.7812	.843
F32D5-26	26	.8125	.875
F32D5-28	28	.8750	.937
F32D5-30	30	.9375	1.000
F32D5-32	32	1.0000	1.062
F32D5-36	36	1.1250	1.187
F32D5-40	40	1.2500	1.312
F32D5-42	42	1.3125	1.375
F32D5-44	44	1.3750	1.437
F32D5-46	46	1.4375	1.500
F32D5-48	48	1.5000	1.562
F32D5-50	50	1.5625	1.625
F32D5-52	52	1.6250	1.687
F32D5-56	56	1.7500	1.812
F32D5-60	60	1.8750	1.937
F32D5-63	63	1.9687	2.031
F32D5-64	64	2.0000	2.062
F32D5-66	66	2.0625	2.125
F32D5-69	69	2.1562	2.218
F32D5-72	72	2.2500	2.312
F32D5-75	75	2.3437	2.406
F32D5-80	80	2.5000	2.562
F32D5-84	84	2.6250	2.687
F32D5-88	88	2.7500	2.812
F32D5-92	92	2.8750	2.937
F32D5-96	96	3.0000	3.062
F32D5-104	104	3.2500	3.312
F32D5-108	108	3.3750	3.437
F32D5-112	112	3.5000	3.562
F32D5-124	124	3.8750	3.937

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	HUBLESS	3/8"	1/4"	POLYURETHANE	8	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F32U6-32	32	1.00	1.062
F32U6-36	36	1.13	1.187
F32U6-40	40	1.25	1.312
F32U6-48	48	1.50	1.562
F32U6-60	60	1.88	1.937
F32U6-64	64	2.00	2.062
F32U6-72	72	2.25	2.312
F32U6-75	75	2.34	2.406
F32U6-80	80	2.50	2.562
F32U6-96	96	3.00	3.062
F32U6-112	112	3.50	3.562
F32U6-120	120	3.75	3.812
F32U6-128	128	4.00	4.062

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	X	1/4"	303 STAINLESS STEEL	10	20°

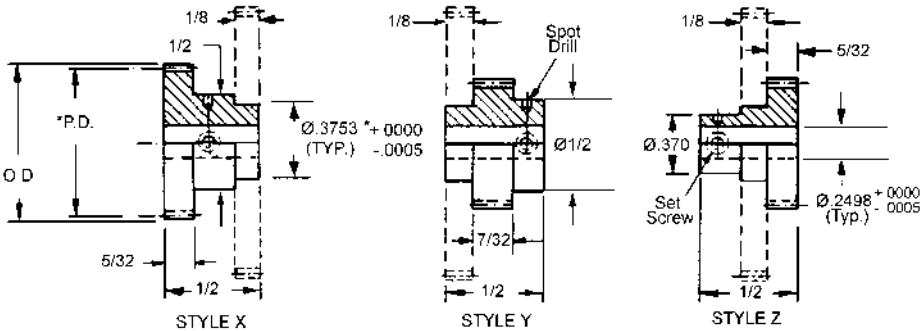
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP32S14-15	32	15	.4688	.531
DP32S14-16		16	.5000	.563
DP32S14-18		18	.5625	.625
DP32S14-19		19	.5983	.656
DP32S14-20		20	.6250	.688

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	Y	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP32S16-15	32	15	.4688	.531
DP32S16-16		16	.5000	.563
DP32S16-18		18	.5625	.625
DP32S16-19		19	.5983	.656
DP32S16-20		20	.6250	.688

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	Z	1/4"	303 STAINLESS STEEL	10	20°

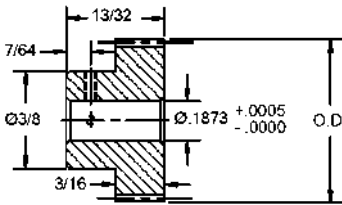
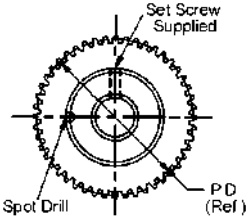
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP32S18-15	32	15	.4688	.531
DP32S18-16		16	.5000	.563
DP32S18-18		18	.5625	.625
DP32S18-19		19	.5983	.656
DP32S18-20		20	.6250	.688



*Concentric within .0003
Order hubless gear separately.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	3/16"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



B

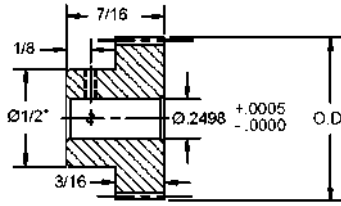
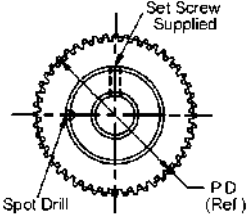
Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32S21-15	P32A21-15	15	.4687	.531
P32S21-16	P32A21-16	16	.5000	.562
P32S21-17	P32A21-17	17	.5312	.593
P32S21-18	P32A21-18	18	.5625	.625
P32S21-20	P32A21-20	20	.6250	.687
P32S21-22	P32A21-22	22	.6875	.750
P32S21-24	P32A21-24	24	.7500	.812
P32S21-26	P32A21-26	26	.8125	.875
P32S21-28	P32A21-28	28	.8750	.937
P32S21-30	P32A21-30	30	.9375	1.000
P32S21-32	P32A21-32	32	1.0000	1.062
P32S21-36	P32A21-36	36	1.1250	1.187
P32S21-40	P32A21-40	40	1.2500	1.312
P32S21-48	P32A21-48	48	1.5000	1.562
P32S21-52	P32A21-52	52	1.6250	1.687
P32S21-56	P32A21-56	56	1.7500	1.812
P32S21-60	P32A21-60	60	1.8750	1.937
P32S21-64	P32A21-64	64	2.0000	2.062
P32S21-68	P32A21-68	68	2.1250	2.187
P32S21-72	P32A21-72	72	2.2500	2.312
P32S21-80	P32A21-80	80	2.5000	2.562
P32S21-84	P32A21-84	84	2.6250	2.687
P32S21-88	P32A21-88	88	2.7500	2.812
P32S21-92	P32A21-92	92	2.8750	2.937
P32S21-96	P32A21-96	96	3.0000	3.062
P32S21-100	P32A21-100	100	3.1250	3.187
P32S21-104	P32A21-104	104	3.2500	3.312
P32S21-108	P32A21-108	108	3.3750	3.437
P32S21-112	P32A21-112	112	3.5000	3.562
P32S21-116	P32A21-116	116	3.6250	3.687
P32S21-120	P32A21-120	120	3.7500	3.812
P32S21-128	P32A21-128	128	4.0000	4.062
P32S21-130	P32A21-130	130	4.0625	4.125
P32S21-135	P32A21-135	135	4.2187	4.281
P32S21-140	P32A21-140	140	4.3750	4.437

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



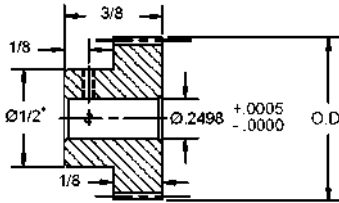
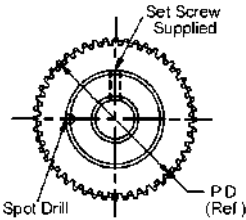
• For tooth counts 17-18 new hub diameter is .44.
Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32S28-18	P32A28-18	18•	.5625	.625
P32S28-20	P32A28-20	20•	.6250	.687
P32S28-28	P32A28-28	28	.8750	.937
P32S28-30	P32A28-30	30	.9375	1.000
P32S28-32	P32A28-32	32	1.0000	1.062
P32S28-36	P32A28-36	36	1.1250	1.187
P32S28-40	P32A28-40	40	1.2500	1.312
P32S28-48	P32A28-48	48	1.5000	1.562
P32S28-52	P32A28-52	52	1.6250	1.687
P32S28-56	P32A28-56	56	1.7500	1.812
P32S28-60	P32A28-60	60	1.8750	1.937
P32S28-64	P32A28-64	64	2.0000	2.062
P32S28-72	P32A28-72	72	2.2500	2.312
P32S28-80	P32A28-80	80	2.5000	2.562
P32S28-88	P32A28-88	88	2.7500	2.812
P32S28-92	P32A28-92	92	2.8750	2.937
P32S28-96	P32A28-96	96	3.0000	3.062
P32S28-100	P32A28-100	100	3.1250	3.187
P32S28-112	P32A28-112	112	3.5000	3.562
P32S28-120	P32A28-120	120	3.7500	3.812
P32S28-128	P32A28-128	128	4.0000	4.062
P32S28-132	P32A28-132	132	4.1250	4.187

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



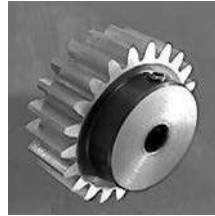
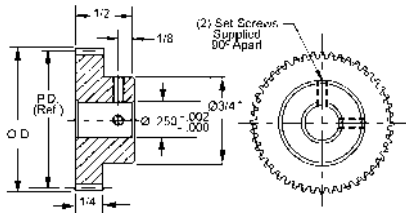
• For 17 - 18 teeth hub diameter equals .45.
Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32S26-18	P32A26-18	18*	.5625	.625
P32S26-20	P32A26-20	20	.6250	.687
P32S26-22	P32A26-22	22	.6875	.750
P32S26-24	P32A26-24	24	.7500	.812
P32S26-25	P32A26-25	25	.7812	.843
P32S26-26	P32A26-26	26	.8125	.875
P32S26-28	P32A26-28	28	.8750	.937
P32S26-30	P32A26-30	30	.9375	1.000
P32S26-32	P32A26-32	32	1.0000	1.062
P32S26-36	P32A26-36	36	1.1250	1.187
P32S26-40	P32A26-40	40	1.2500	1.312
P32S26-42	P32A26-42	42	1.3125	1.375
P32S26-45	P32A26-45	45	1.4062	1.468
P32S26-48	P32A26-48	48	1.5000	1.562
P32S26-50	P32A26-50	50	1.5625	1.625
P32S26-54	P32A26-54	54	1.6875	1.750
P32S26-56	P32A26-56	56	1.7500	1.812
P32S26-60	P32A26-60	60	1.8750	1.937
P32S26-64	P32A26-64	64	2.0000	2.062
P32S26-70	P32A26-70	70	2.1875	2.250
P32S26-72	P32A26-72	72	2.2500	2.312
P32S26-75	P32A26-75	75	2.3437	2.406
P32S26-76	P32A26-76	76	2.3750	2.437
P32S26-80	P32A26-80	80	2.5000	2.562
P32S26-88	P32A26-88	88	2.7500	2.812
P32S26-90	P32A26-90	90	2.8125	2.875
P32S26-96	P32A26-96	96	3.0000	3.062
P32S26-100	P32A26-100	100	3.1250	3.187
P32S26-110	P32A26-110	110	3.4375	3.500
P32S26-120	P32A26-120	120	3.7500	3.812
P32S26-124	P32A26-124	124	3.8750	3.937
P32S26-128	P32A26-128	128	4.0000	4.062

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

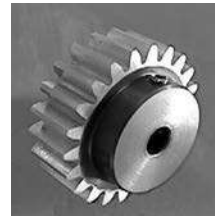
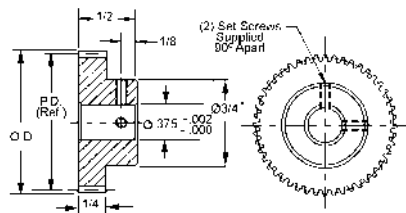
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	1/4"	ALUMINUM ANODIZED	8	20°



- For 17 - 26 teeth hub diameter equals .45
- Available on request, other numbers of teeth, quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32A66-18	18•	.5625	.625
P32A66-20	20•	.6250	.687
P32A66-24	24•	.7500	.812
P32A66-30	30	.9375	1.000
P32A66-32	32	1.0000	1.062
P32A66-36	36	1.1250	1.187
P32A66-40	40	1.2500	1.312
P32A66-48	48	1.5000	1.562
P32A66-56	56	1.7500	1.812
P32A66-60	60	1.8750	1.937
P32A66-64	64	2.0000	2.062
P32A66-80	80	2.5000	2.562
P32A66-96	96	3.0000	3.062
P32A66-112	112	3.5000	3.562
P32A66-128	128	4.0000	4.062
P32A66-160	160	5.0000	5.062
P32A66-192	192	6.0000	6.062

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	3/8"	1/4"	ALUMINUM ANODIZED	8	20°

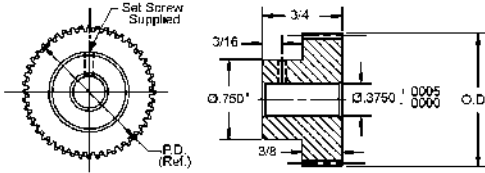


- For 21 - 26 teeth hub diameter equals .57
- Available on request, other numbers of teeth, quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32A67-24	24•	.7500	.812
P32A67-30	30	.9375	1.000
P32A67-32	32	1.0000	1.062
P32A67-36	36	1.1250	1.187
P32A67-40	40	1.2500	1.312
P32A67-48	48	1.5000	1.562
P32A67-56	56	1.7500	1.812
P32A67-60	60	1.8750	1.937
P32A67-64	64	2.0000	2.062
P32A67-80	80	2.5000	2.562
P32A67-96	96	3.0000	3.062
P32A67-112	112	3.5000	3.562
P32A67-128	128	4.0000	4.062
P32A67-160	160	5.0000	5.062
P32A67-192	192	6.0000	6.062

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	3/8"	3/8"	303 STAINLESS STEEL OR BRONZE ALLOY 464	10	20°



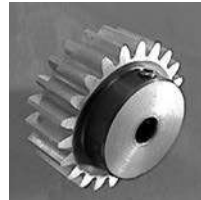
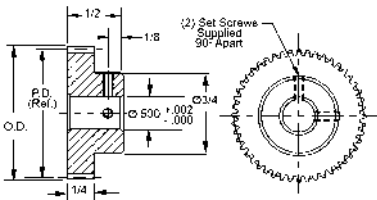
- For 21 - 26 teeth hub diameter equals .57

X In part number indicates part may be supplied as a two piece construction (some dimensions may vary.)

Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL	BRONZE ALLOY 464	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
STOCK NO.	STOCK NO.			
P32S34-24	P32B34-24	24	.7500	.812
P32S34-28	P32B34-28	28	.8750	.937
P32S34-30	P32B34-30	30	.9375	1.000
P32S34-32	P32B34-32	32	1.0000	1.062
P32S34-36	P32B34-36	36	1.1250	1.187
P32S34-40	P32B34-40	40	1.2500	1.312
P32S34-48	P32B34-48	48	1.5000	1.562
P32S34-56	P32B34-56	56	1.7500	1.812
P32S34-60	P32B34-60	60	1.8750	1.937
P32S34X-64	P32B34X-64	64	2.0000	2.062
P32S34X-72	P32B34X-72	72	2.2500	2.312
P32S34X-80	P32B34X-80	80	2.5000	2.562
P32S34X-96	P32B34X-96	96	3.0000	3.062
P32S34X-112	P32B34X-112	112	3.5000	3.562
P32S34X-128	P32B34X-128	128	4.0000	4.062
P32S34X-160	P32B34X-160	160	5.0000	5.062

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/2"	1/4"	ALUMINUM ANODIZED	8	20°

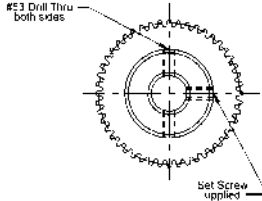
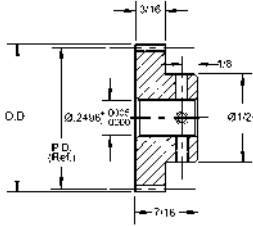


Available on request, other numbers of teeth, quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32A68-30	30	.9375	1.000
P32A68-32	32	1.0000	1.062
P32A68-36	36	1.1250	1.187
P32A68-40	40	1.2500	1.312
P32A68-48	48	1.5000	1.562
P32A68-56	56	1.7500	1.812
P32A68-60	60	1.8750	1.937
P32A68-64	64	2.0000	2.062
P32A68-80	80	2.5000	2.562
P32A68-96	96	3.0000	3.062
P32A68-112	112	3.5000	3.562
P32A68-128	128	4.0000	4.062
P32A68-160	160	5.0000	5.062
P32A68-192	192	6.0000	6.062

SPUR GEARS

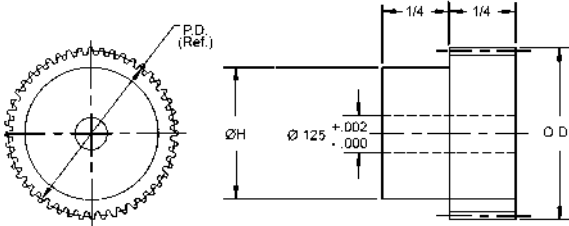
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	3/16"	17-4 PH STAINLESS STEEL RC26 - 32	10	20°



- For 14 - 17 teeth hub diameter equals .35
- Available on request, other numbers of teeth, quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32PH28-14	14*	.4375	.500
P32PH28-15	15*	.4687	.531
P32PH28-16	16*	.5000	.562
P32PH28-17	17*	.5312	.593
P32PH28-18	18	.5625	.625
P32PH28-19	19	.5937	.656
P32PH28-20	20	.6250	.687
P32PH28-24	24	.7500	.812
P32PH28-28	28	.8750	.937
P32PH28-32	32	1.0000	1.062
P32PH28-34	34	1.0625	1.125
P32PH28-36	36	1.1250	1.187
P32PH28-38	38	1.1875	1.250
P32PH28-40	40	1.2500	1.312

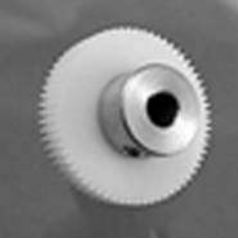
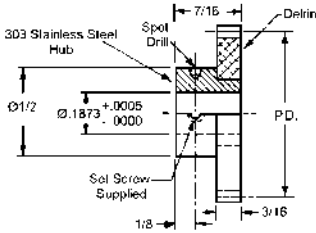
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/8"	1/4"	COLD ROLLED STEEL C12L14 OR C12L15 WITH SELENIUM OR BRASS ALLOY 360	5	20°



COLD ROLLED STEEL C12L14 OR C12L15 WITH SELENIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	H
PX32S-10	PX32B-10	10	.312	.375	.218
PX32S-11	PX32B-11	11	.344	.406	.250
PX32S-12	PX32B-12	12	.375	.437	.281
PX32S-14	PX32B-14	14	.438	.500	.343
PX32S-15	PX32B-15	15	.469	.531	.375
PX32S-16	PX32B-16	16	.500	.562	.406
PX32S-18	PX32B-18	18	.563	.625	.468
PX32S-20	PX32B-20	20	.625	.688	.532
-	PX32B-24	24	.750	.813	.656

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	3/16"	3/16"	DELTRIN WITH STAINLESS STEEL HUB	10	20°



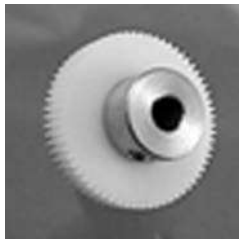
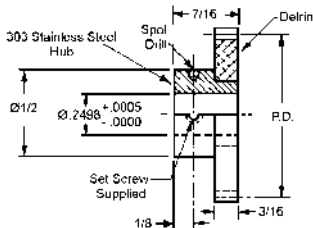
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32D21X-20	20	.6250	.687
P32D21X-21	21	.6562	.718
P32D21X-22	22	.6875	.750
P32D21X-23	23	.7187	.781
P32D21X-24	24	.7500	.812
P32D21X-25	25	.7812	.843
P32D21X-26	26	.8125	.875
P32D21X-28	28	.8750	.937
P32D21X-30	30	.9375	1.000
P32D21X-32	32	1.0000	1.062
P32D21X-36	36	1.1250	1.187
P32D21X-40	40	1.2500	1.312
P32D21X-42	42	1.3125	1.375
P32D21X-44	44	1.3750	1.437
P32D21X-46	46	1.4375	1.500
P32D21X-48	48	1.5000	1.562
P32D21X-50	50	1.5625	1.625
P32D21X-52	52	1.6250	1.687
P32D21X-56	56	1.7500	1.812
P32D21X-60	60	1.8750	1.937
P32D21X-63	63	1.9687	2.031
P32D21X-64	64	2.0000	2.062
P32D21X-66	66	2.0625	2.125
P32D21X-69	69	2.1562	2.218
P32D21X-72	72	2.2500	2.312
P32D21X-75	75	2.3437	2.406
P32D21X-80	80	2.5000	2.562
P32D21X-84	84	2.6250	2.687
P32D21X-88	88	2.7500	2.812
P32D21X-92	92	2.8750	2.937
P32D21X-96	96	3.0000	3.062
P32D21X-104	104	3.2500	3.312
P32D21X-108	108	3.3750	3.437
P32D21X-112	112	3.5000	3.562
P32D21X-124	124	3.8750	3.937

Available on request, other numbers of teeth,
14-1/2° Pressure Angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	3/16"	DELTRIN WITH STAINLESS STEEL HUB	10	20°



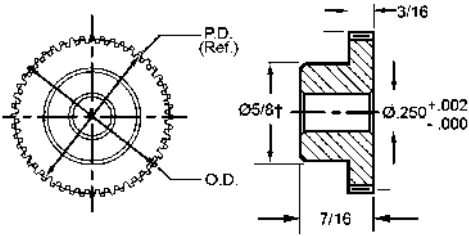
Available on request, other numbers of teeth,
14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32D28X-20	20	.6250	.687
P32D28X-21	21	.6562	.718
P32D28X-22	22	.6875	.750
P32D28X-23	23	.7187	.781
P32D28X-24	24	.7500	.812
P32D28X-25	25	.7812	.843
P32D28X-26	26	.8125	.875
P32D28X-28	28	.8750	.937
P32D28X-30	30	.9375	1.000
P32D28X-32	32	1.0000	1.062
P32D28X-36	36	1.1250	1.187
P32D28X-40	40	1.2500	1.312
P32D28X-42	42	1.3125	1.375
P32D28X-44	44	1.3750	1.437
P32D28X-46	46	1.4375	1.500
P32D28X-48	48	1.5000	1.562
P32D28X-50	50	1.5625	1.625
P32D28X-52	52	1.6250	1.687
P32D28X-56	56	1.7500	1.812
P32D28X-60	60	1.8750	1.937
P32D28X-63	63	1.9687	2.031
P32D28X-64	64	2.0000	2.062
P32D28X-66	66	2.0625	2.125
P32D28X-69	69	2.1562	2.218
P32D28X-72	72	2.2500	2.312
P32D28X-75	75	2.3437	2.406
P32D28X-80	80	2.5000	2.562
P32D28X-84	84	2.6250	2.687
P32D28X-88	88	2.7500	2.812
P32D28X-92	92	2.8750	2.937
P32D28X-96	96	3.0000	3.062
P32D28X-104	104	3.2500	3.312
P32D28X-108	108	3.3750	3.437
P32D28X-112	112	3.5000	3.562
P32D28X-124	124	3.8750	3.937

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	3/16"	MOLDED ACETAL	5	20°

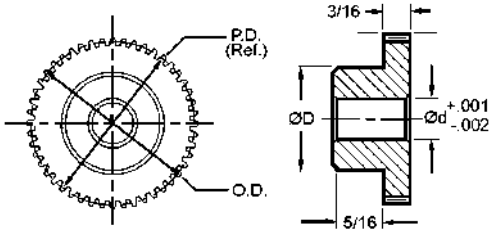


† Teeth runout on hub.
Available on request, other bore sizes and
numbers of teeth on request.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P32D4M-20	20†	.6250	.69
P32D4M-24	24	.7500	.81
P32D4M-28	28	.8750	.94
P32D4M-30	30	.9375	1.00
P32D4M-32	32	1.0000	1.06
P32D4M-40	40	1.2500	1.31
P32D4M-48	48	1.5000	1.56
P32D4M-50	50	1.5625	1.63
P32D4M-56	56	1.7500	1.81
P32D4M-60	60	1.8750	1.94
P32D4M-64	64	2.0000	2.06
P32D4M-70	70	2.1875	2.25
P32D4M-72	72	2.2500	2.31
P32D4M-76	76	2.3750	2.44
P32D4M-80	80	2.5000	2.56
P32D4M-88	88	2.7500	2.81
P32D4M-90	90	2.8125	2.88

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	5/32" TO 5/16"	3/16"	MOLDED DELRIN	5	20°



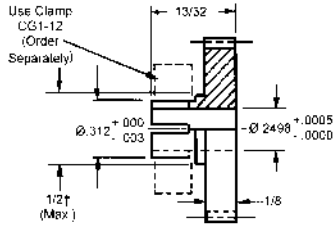
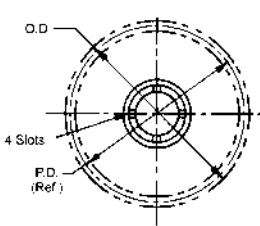
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	ϕd	ϕD
P32D4P-12	12	.375	.438	5/32	9/32
P32D4P-14	14	.438	.500	5/32	5/16
P32D4P-15	15	.469	.532	5/32	5/16
P32D4P-16	16	.500	.562	5/32	11/32
P32D4P-18	18	.562	.625	5/32	11/32
P32D4P-20	20	.625	.688	3/16	15/32
P32D4P-22	22	.688	.750	3/16	1/2
P32D4P-24	24	.750	.812	3/16	1/2
P32D4P-25	25	.782	.844	3/16	9/16
P32D4P-26	26	.813	.875	3/16	9/16
P32D4P-28	28	.875	.938	3/16	1/2
P32D4P-30	30	.938	1.000	3/16	9/16
P32D4P-32	32	1.000	1.062	1/4	5/8
P32D4P-34	34	1.062	1.125	1/4	39/64
P32D4P-36	36	1.125	1.187	1/4	39/64
P32D4P-38	38	1.187	1.250	1/4	39/64
P32D4P-40	40	1.250	1.312	1/4	39/64
P32D4P-42	42	1.312	1.375	1/4	39/64
P32D4P-44	44	1.375	1.438	1/4	39/64
P32D4P-48	48	1.500	1.562	1/4	5/8
P32D4P-52	52	1.625	1.688	5/16	43/64
P32D4P-56	56	1.750	1.812	5/16	43/64
P32D4P-64	64	2.000	2.062	5/16	43/64
P32D4P-72	72	2.250	2.312	5/16	13/16
P32D4P-80	80	2.500	2.562	5/16	13/16
P32D4P-96	96	3.000	3.062	5/16	13/16

Some molded gears may have webs.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	CLAMP HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



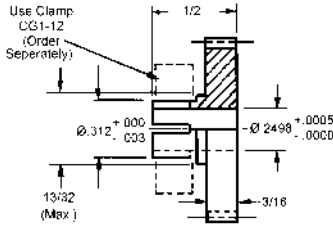
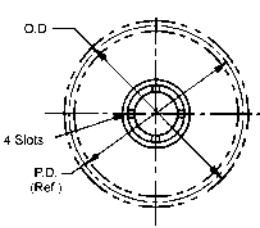
† Teeth may runout on flange diameter.
Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED 5 STOCK NO.	BERG QUALITY #10		
		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C32S18-14	C32A18-14	14†	.4375	.500
C32S18-15	C32A18-15	15†	.4687	.531
C32S18-16	C32A18-16	16†	.5000	.562
C32S18-17	C32A18-17	17†	.5312	.593
C32S18-18	C32A18-18	18†	.5625	.625
C32S18-19	C32A18-19	19	.5937	.656
C32S18-20	C32A18-20	20	.6250	.687
C32S18-22	C32A18-22	22	.6875	.750
C32S18-24	C32A18-24	24	.7500	.812
C32S18-25	C32A18-25	25	.7812	.843
C32S18-26	C32A18-26	26	.8125	.875
C32S18-28	C32A18-28	28	.8750	.937
C32S18-30	C32A18-30	30	.9375	1.000
C32S18-32	C32A18-32	32	1.0000	1.062
C32S18-34	C32A18-34	34	1.0625	1.125
C32S18-36	C32A18-36	36	1.1250	1.187
C32S18-38	C32A18-38	38	1.1875	1.250
C32S18-39	C32A18-39	39	1.2187	1.281
C32S18-40	C32A18-40	40	1.2500	1.312
C32S18-45	C32A18-45	45	1.4062	1.468
C32S18-48	C32A18-48	48	1.5000	1.562
C32S18-50	C32A18-50	50	1.5625	1.625
C32S18-54	C32A18-54	54	1.6875	1.750
C32S18-55	C32A18-55	55	1.7187	1.781
C32S18-56	C32A18-56	56	1.7500	1.812
C32S18-60	C32A18-60	60	1.8750	1.937
C32S18-64	C32A18-64	64	2.0000	2.062
C32S18-65	C32A18-65	65	2.0312	2.093
C32S18-68	C32A18-68	68	2.1250	2.187
C32S18-70	C32A18-70	70	2.1875	2.250
C32S18-72	C32A18-72	72	2.2500	2.312
C32S18-76	C32A18-76	76	2.3750	2.437
C32S18-80	C32A18-80	80	2.5000	2.562
C32S18-88	C32A18-88	88	2.7500	2.812
C32S18-90	C32A18-90	90	2.8125	2.875
C32S18-96	C32A18-96	96	3.0000	3.062
C32S18-112	C32A18-112	112	3.5000	3.562
C32S18-127	C32A18-127	127	3.9687	4.031
C32S18-128	C32A18-128	128	4.0000	4.062
C32S18-132	C32A18-132	132	4.1250	4.187

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	CLAMP HUB	1/4"	3/16"	303 STAINLESS STEEL	10	20°



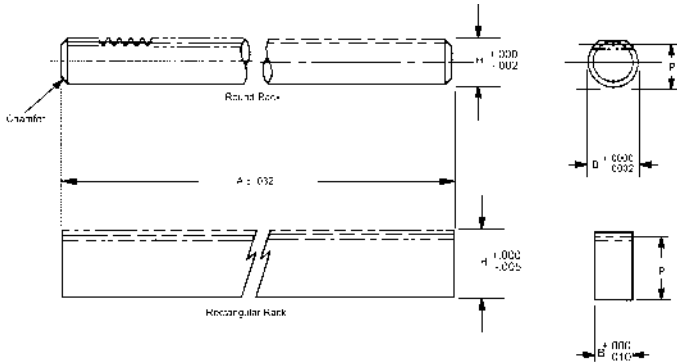
Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C32S20-20	20	.6250	.687
C32S20-21	21	.6562	.718
C32S20-22	22	.6875	.750
C32S20-23	23	.7187	.781
C32S20-24	24	.7500	.812
C32S20-25	25	.7812	.843
C32S20-28	28	.8750	.937
C32S20-30	30	.9375	1.000
C32S20-32	32	1.0000	1.062
C32S20-36	36	1.1250	1.187
C32S20-40	40	1.2500	1.312
C32S20-48	48	1.5000	1.562
C32S20-56	56	1.7500	1.812
C32S20-60	60	1.8750	1.937
C32S20-64	64	2.0000	2.062
C32S20-72	72	2.2500	2.312
C32S20-80	80	2.5000	2.562
C32S20-96	96	3.0000	3.062
C32S20-112	112	3.5000	3.562
C32S20-128	128	4.0000	4.062
C32S20-132	132	4.1250	4.187

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
32	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°

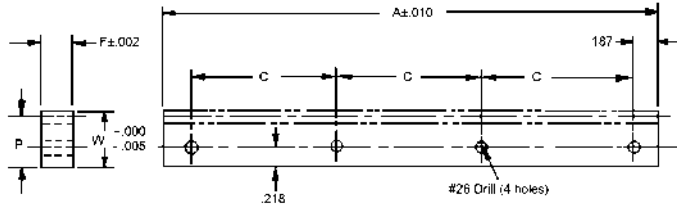


B

STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-5	ROUND	32	.3087	.3747	18	.340	10
R2-11	RECTANGULAR	32	.4487	.230±.005	18	.480	10

Available on request:
14 - 1/2° pressure angle,
special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
32	RECTANGULAR	416 SERIES STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



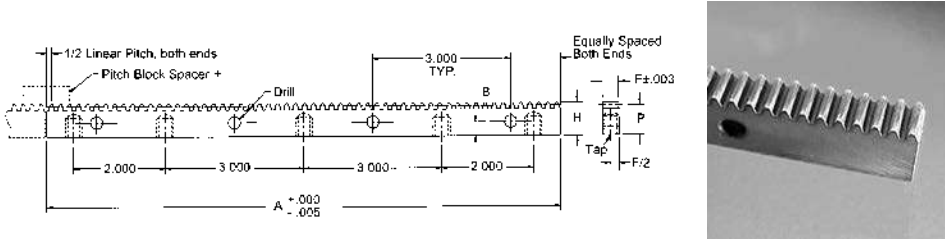
STOCK NO.	MATERIAL	A (Inch)	P (Ref.)	W	F	C
R4-9	STAINLESS ST.	10	.4487	.480	.230	3.208
R4-10	ALUMINUM					

Available on request: special,
modified and custom racks.

* Higher quality on request.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
32	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



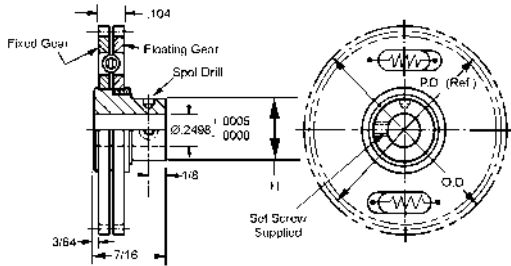
†Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS	SPACER BLOCK	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 -.005	F	B	DRILL	TAP
STOCK NO.	STOCK NO.	NO.											
R1-5-G1	R1-5-SB	10*	.0014	.0005	32	.0982	11.087	.4437	.475	.230	.218	#26	#6-32 x 1/4
R3-3-G1	R3-3-SB	10*	.0014	.0005	32	.0982	11.087	.4487	.480	.230	.218	#26	#6-32 x 1/4

* Higher quality on request.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

Hub Material: 303 Stainless Steel

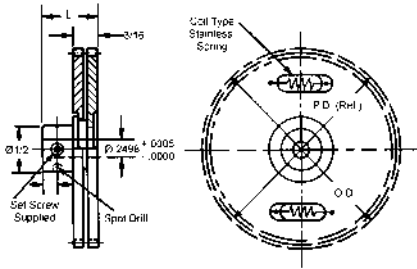
STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE	H
AP32ES-20	-	20	.6250	.687	SCISSOR	3/8
AP32ES-24	AP32RS-24	24	.7500	.812		
AP32ES-28	AP32RS-28	28	.8750	.937		
AP32ES-30	AP32RS-30	30	.9375	1.000		
AP32ES-32	AP32RS-32	32	1.0000	1.062		
AP32ES-36	AP32RS-36	36	1.1250	1.187		
AP32E-40	AP32R-40	40	1.2500	1.312		
AP32E-42	AP32R-42	42	1.3125	1.375		
AP32E-48	AP32R-48	48	1.5000	1.562		
AP32E-50	AP32R-50	50	1.5625	1.625		
AP32E-54	AP32R-54	54	1.6875	1.750	COIL	7/16
AP32E-56	AP32R-56	56	1.7500	1.812		
AP32E-60	AP32R-60	60	1.8750	1.937		
AP32E-64	AP32R-64	64	2.0000	2.062		
AP32E-70	AP32R-70	70	2.1875	2.250		
AP32E-72	AP32R-72	72	2.2500	2.312		
AP32E-80	AP32R-80	80	2.5000	2.562		
AP32E-96	AP32R-96	96	3.0000	3.062		

Available on request:
Other numbers of teeth;
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

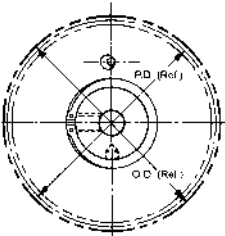
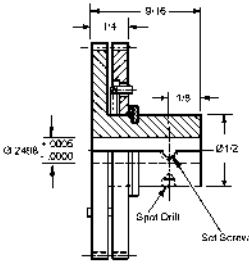
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AP32MS-32	AP32QS-32	15/32	32	1.000	1.062
AP32MS-34	AP32QS-34		34	1.062	1.125
AP32MS-36	AP32QS-36		36	1.125	1.187
AP32MS-38	AP32QS-38		38	1.187	1.250
AP32M-40	AP32Q-40	27/64	40	1.250	1.312
AP32M-45	AP32Q-45		45	1.406	1.468
AP32M-48	AP32Q-48		48	1.500	1.562
AP32M-50	AP32Q-50		50	1.562	1.625
AP32M-55	AP32Q-55		55	1.718	1.781
AP32M-56	AP32Q-56		56	1.750	1.812
AP32M-60	AP32Q-60		60	1.875	1.937
AP32M-64	AP32Q-64		64	2.000	2.062
AP32M-65	AP32Q-65		65	2.031	2.093
AP32M-70	AP32Q-70		70	2.187	2.250
AP32M-72	AP32Q-72		72	2.250	2.312
AP32M-75	AP32Q-75		75	2.343	2.406
AP32M-80	AP32Q-80		80	2.500	2.562
AP32M-85	AP32Q-85		85	2.656	2.718

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PIN HUB	1/4"	1/4"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

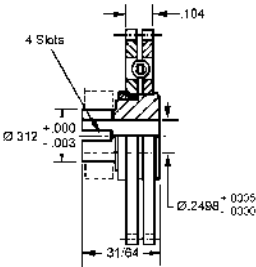
STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	PITCH	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.
AP32BS-24	AP32DS-24	32	24	.7500	.813
AP32BS-28	AP32DS-28		28	.8750	.938
AP32BS-32	AP32DS-32		32	1.0000	1.063

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	CLAMP HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

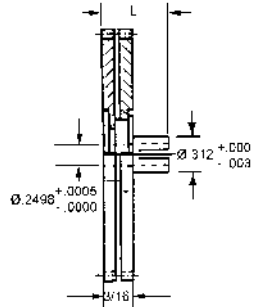
STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE
AC32ES-20	-	20	.6250	.687	SCISSOR
AC32ES-24	AC32RS-24	24	.7500	.812	
AC32ES-28	AC32RS-28	28	.8750	.937	COIL
AC32ES-30	AC32RS-30	30	.9375	1.000	
AC32E-32	AC32R-32	32	1.0000	1.062	
AC32E-36	AC32R-36	36	1.1250	1.187	
AC32E-40	AC32R-40	40	1.2500	1.312	
AC32E-42	AC32R-42	42	1.3125	1.375	
AC32E-48	AC32R-48	48	1.5000	1.562	
AC32E-50	AC32R-50	50	1.5625	1.625	
AC32E-54	AC32R-54	54	1.6875	1.750	
AC32E-56	AC32R-56	56	1.7500	1.812	
AC32E-60	AC32R-60	60	1.8750	1.937	
AC32E-64	AC32R-64	64	2.0000	2.062	
AC32E-70	AC32R-70	70	2.1875	2.250	
AC32E-72	AC32R-72	72	2.2500	2.312	
AC32E-80	AC32R-80	80	2.5000	2.562	
AC32E-96	AC32R-96	96	3.0000	3.062	

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14;
14-12° pressure angle.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	CLAMP HUB	1/4"	3/16"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

Hub Material: 303 Stainless Steel

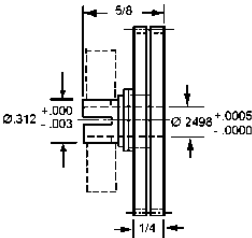


303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	L	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC32MS-32	AC32QS-32	15/32	32	1.000	1.062
AC32MS-34	AC32QS-34		34	1.062	1.125
AC32MS-36	AC32QS-36		36	1.125	1.187
AC32MS-38	AC32QS-38		38	1.187	1.250
AC32M-40	AC32Q-40		40	1.250	1.312
AC32M-45	AC32Q-45	27/64	45	1.406	1.468
AC32M-48	AC32Q-48		48	1.500	1.562
AC32M-50	AC32Q-50		50	1.562	1.625
AC32M-55	AC32Q-55		55	1.718	1.781
AC32M-56	AC32Q-56		56	1.750	1.812
AC32M-60	AC32Q-60		60	1.875	1.937
AC32M-64	AC32Q-64		64	2.000	2.062
AC32M-65	AC32Q-65		65	2.031	2.093
AC32M-70	AC32Q-70		70	2.187	2.250
AC32M-72	AC32Q-72		72	2.250	2.312
AC32M-75	AC32Q-75		75	2.343	2.406
AC32M-80	AC32Q-80		80	2.500	2.562
AC32M-85	AC32Q-85		85	2.656	2.718

Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	CLAMP HUB	1/4"	1/4"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303
Stainless Steel

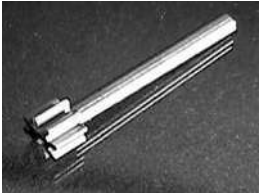
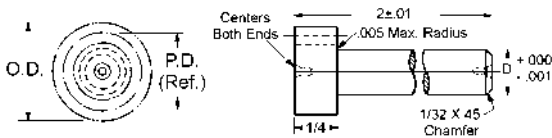
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC32BS-24	AC32DS-24	32	24	.7500	.813
AC32BS-28	AC32DS-28		28	.8750	.938
AC32BS-32	AC32DS-32		32	1.0000	1.063

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

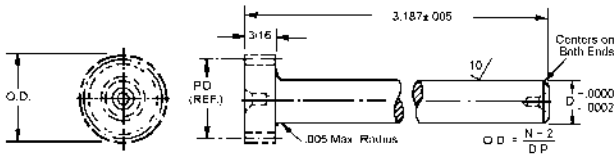
PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	BRASS AND COLD ROLLED STEEL	4	20°



303 STAINLESS STEEL STOCK NO.	BRASS ALLOY 360 STOCK NO.	NUMBER OF TEETH	PITCH DIAMETER	OUTSIDE DIAMETER	D
PSX32S-11	PSX32B-11	11	.3438	.406	.250
PSX32S-12	PSX32B-12	12	.3750	.437	.250
PSX32S-14	PSX32B-14	14	.4375	.500	.312
PSX32S-15	PSX32B-15	15	.4688	.531	.375
PSX32S-16	PSX32B-16	16	.5000	.562	.375

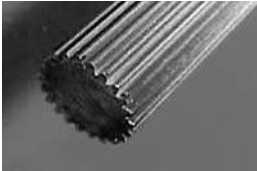
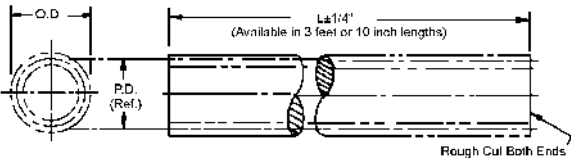
PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	303 STAINLESS STEEL	10	20°



STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS32S4-12H	32	12	.3750	.2497
PS32S4-14H		14	.4375	.2497
PS32S4-16H		16	.5000	.2497

SPUR GEAR STOCKS

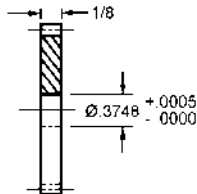
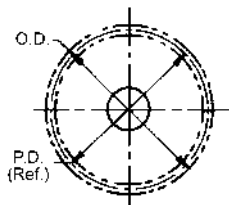
PITCH	TYPE	MATERIAL	AGMA QUALITY	PRES. ANGLE
32	PINION WIRE	BRASS AND COLD ROLLED STEEL	4	20°



BRASS ALLOY 360		COLD ROLLED STEEL WITH 12L14 or 12L15 SELENIUM		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3FT. LONG STOCK NO.	10 IN. LONG STOCK NO.	3FT. LONG STOCK NO.	10 IN. LONG STOCK NO.			
PW32B-6	PW32B-6A	PW32S-6	PW32S-6A	6	.1875	.250
PW32B-8	PW32B-8A	PW32S-8	PW32S-8A	8	.2500	.312
PW32B-9	PW32B-9A	PW32S-9	PW32S-9A	9	.2812	.343
PW32B-10	PW32B-10A	PW32S-10	PW32S-10A	10	.3125	.375
PW32B-11	PW32B-11A	PW32S-11	PW32S-11A	11	.3437	.406
PW32B-12X	PW32B-12A	PW32S-12X	PW32S-12A	12	.3750	.437
PW32B-14X	PW32B-14A	PW32S-14X	PW32S-14A	14	.4375	.500
PW32B-15X	PW32B-15A	PW32S-15X	PW32S-15A	15	.4687	.531
PW32B-16X	PW32B-16A	PW32S-16X	PW32S-16A	16	.5000	.562
PW32B-18	PW32B-18A	PW32S-18	PW32S-18A	18	.5625	.625
PW32B-20	PW32B-20A	PW32S-20	PW32S-20A	20	.6250	.687
PW32B-24	PW32B-24A	-	-	24	.7500	.812

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	HUBLESS	3/8"	1/8"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



Available on request:

Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2" Pressure Angle

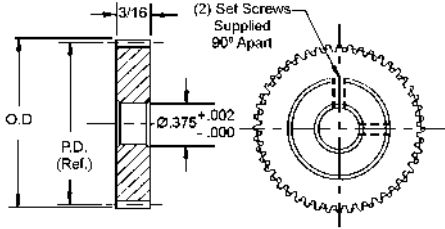
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F48S3-30	F48A3-30	30	.6250	.666
F48S3-32	F48A3-32	32	.6666	.708
F48S3-40	F48A3-40	40	.8333	.875
F48S3-42	F48A3-42	42	.8750	.916
F48S3-44	F48A3-44	44	.9166	.958
F48S3-48	F48A3-48	48	1.0000	1.041
F48S3-50	F48A3-50	50	1.0416	1.083
F48S3-54	F48A3-54	54	1.1250	1.166
F48S3-60	F48A3-60	60	1.2500	1.291
F48S3-64	F48A3-64	64	1.3333	1.375
F48S3-65	F48A3-65	65	1.3541	1.395
F48S3-70	F48A3-70	70	1.4583	1.500
F48S3-72	F48A3-72	72	1.5000	1.541
F48S3-75	F48A3-75	75	1.5625	1.604
F48S3-80	F48A3-80	80	1.6666	1.708
F48S3-84	F48A3-84	84	1.7500	1.791
F48S3-85	F48A3-85	85	1.7708	1.812
F48S3-90	F48A3-90	90	1.8750	1.916
F48S3-96	F48A3-96	96	2.0000	2.041
F48S3-100	F48A3-100	100	2.0833	2.125
F48S3-105	F48A3-105	105	2.1875	2.229
F48S3-108	F48A3-108	108	2.2500	2.291
F48S3-110	F48A3-110	110	2.2916	2.333
F48S3-114	F48A3-114	114	2.3750	2.416
F48S3-120	F48A3-120	120	2.5000	2.541
F48S3-125	F48A3-125	125	2.6041	2.645
F48S3-130	F48A3-130	130	2.7083	2.750
F48S3-132	F48A3-132	132	2.7500	2.791
F48S3-135	F48A3-135	135	2.8125	2.854
F48S3-138	F48A3-138	138	2.8750	2.916
F48S3-140	F48A3-140	140	2.9166	2.958
F48S3-144	F48A3-144	144	3.0000	3.041
F48S3-150	F48A3-150	150	3.1250	3.166
F48S3-156	F48A3-156	156	3.2500	3.291
F48S3-160	F48A3-160	160	3.3333	3.375
F48S3-168	F48A3-168	168	3.5000	3.541
F48S3-170	F48A3-170	170	3.5416	3.583
F48S3-180	F48A3-180	180	3.7500	3.791
F48S3-186	F48A3-186	186	3.8750	3.916
F48S3-190	F48A3-190	190	3.9583	4.000
F48S3-192	F48A3-192	192	4.0000	4.041

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

SPUR GEARS

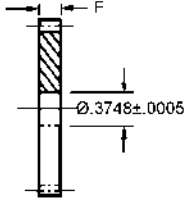
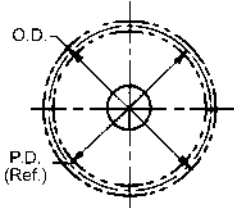
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	HUBLESS	3/8"	3/16"	ALUMINUM GOLD ANODIZED	8	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F48A76-28	28	.5833	.625
F48A76-30	30	.6250	.666
F48A76-36	36	.7500	.791
F48A76-40	40	.8333	.875
F48A76-46	46	.9583	1.000
F48A76-48	48	1.0000	1.041
F48A76-60	60	1.2500	1.291
F48A76-70	70	1.4583	1.500
F48A76-72	72	1.5000	1.541
F48A76-80	80	1.6666	1.708
F48A76-90	90	1.8750	2.041
F48A76-96	96	2.0000	2.125
F48A76-100	100	2.0833	2.333
F48A76-110	110	2.2916	2.541
F48A76-132	132	2.7500	2.791
F48A76-144	144	3.0000	3.041
F48A76-150	150	3.1250	3.166
F48A76-168	168	3.5000	3.541
F48A76-192	192	4.0000	4.041

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	HUBLESS	3/8"	1/8" AND 1/4"	POLYURETHANE	8	20°

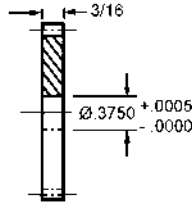
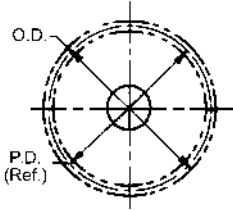


Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	F
F48U3-48	48	1.0000	1.041	.125
F48U3-60	60	1.2500	1.291	.125
F48U3-72	72	1.5000	1.541	.125
F48U3-84	84	1.7500	1.791	.125
F48U3-96	96	2.0000	2.041	.125
F48U3-108	108	2.2500	2.291	.125
F48U6-120	120	2.5000	2.541	.250
F48U6-144	144	3.0000	3.041	.250
F48U6-168	168	3.5000	3.541	.250
F48U6-192	192	4.0000	4.041	.250

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	HUBLESS	3/8"	3/16"	DELTRIN	10	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F48D5-28	28	.5833	.625
F48D5-29	29	.6041	.645
F48D5-30	30	.6250	.666
F48D5-32	32	.6666	.708
F48D5-34	34	.7083	.750
F48D5-36	36	.7500	.791
F48D5-38	38	.7916	.833
F48D5-40	40	.8333	.875
F48D5-42	42	.8750	.916
F48D5-44	44	.9166	.958
F48D5-46	46	.9583	1.000
F48D5-48	48	1.0000	1.041
F48D5-50	50	1.0416	1.083
F48D5-55	55	1.1458	1.187
F48D5-56	56	1.1666	1.208
F48D5-60	60	1.2500	1.291
F48D5-64	64	1.3333	1.375
F48D5-68	68	1.4166	1.458
F48D5-72	72	1.5000	1.541
F48D5-75	75	1.5625	1.604
F48D5-80	80	1.6666	1.708
F48D5-84	84	1.7500	1.791
F48D5-90	90	1.8750	1.916
F48D5-92	92	1.9166	1.958
F48D5-96	96	2.0000	2.041
F48D5-100	100	2.0833	2.125
F48D5-110	110	2.2916	2.333
F48D5-120	120	2.5000	2.541
F48D5-132	132	2.7500	2.791
F48D5-138	138	2.8750	2.916
F48D5-144	144	3.0000	3.041
F48D5-156	156	3.2500	3.291
F48D5-168	168	3.5000	3.541
F48D5-180	180	3.7500	3.791
F48D5-186	186	3.8750	3.916

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	X	1/4"	303 STAINLESS STEEL	10	20°

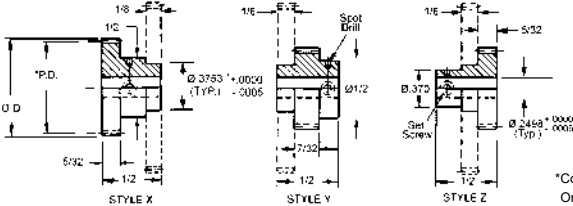
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP48S14-20	48	20	.4166	.458
DP48S14-21		21	.4375	.479
DP48S14-22		22	.4583	.500
DP48S14-23		23	.4791	.521
DP48S14-24		24	.5000	.542
DP48S14-25		25	.5208	.563
DP48S14-26		26	.5416	.583
DP48S14-30		30	.6250	.667
DP48S14-32		32	.6666	.708
DP48S14-40		40	.8333	.875
DP48S14-48		48	1.0000	1.041
DP48S14-50		50	1.0416	1.083

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	Y	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP48S16-20	48	20	.4166	.458
DP48S16-21		21	.4375	.479
DP48S16-22		22	.4583	.500
DP48S16-23		23	.4791	.521
DP48S16-24		24	.5000	.542
DP48S16-25		25	.5208	.563
DP48S16-26		26	.5416	.583
DP48S16-30		30	.6250	.667
DP48S16-32		32	.6666	.708
DP48S16-40		40	.8333	.875
DP48S16-48		48	1.0000	1.041
DP48S16-50		50	1.0416	1.083

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	Z	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP48S18-20	48	20	.4166	.458
DP48S18-21		21	.4375	.479
DP48S18-22		22	.4583	.500
DP48S18-23		23	.4791	.521
DP48S18-24		24	.5000	.542
DP48S18-25		25	.5208	.563
DP48S18-26		26	.5416	.583
DP48S18-30		30	.6250	.667
DP48S18-32		32	.6666	.708
DP48S18-40		40	.8333	.875
DP48S18-48		48	1.0000	1.041
DP48S18-50		50	1.0416	1.083



*Concentric within .0003
Order hubless gear separately.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	X	3/16"	303 STAINLESS STEEL	10	20°

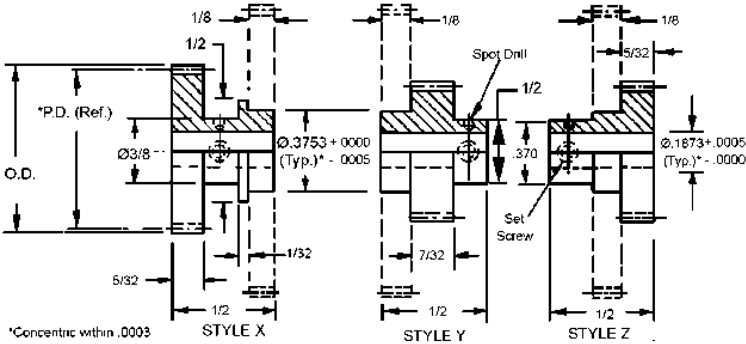
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP48S8-20	48	20	.4166	.458
DP48S8-21		21	.4375	.479
DP48S8-23		23	.4701	.521
DP48S8-24		24	.5000	.542
DP48S8-40		40	.8333	.875

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	Y	3/16"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP48S10-20	48	20	.4166	.458
DP48S10-21		21	.4375	.479
DP48S10-23		23	.4701	.521
DP48S10-24		24	.5000	.542
DP48S10-40		40	.8333	.875

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	Z	3/16"	303 STAINLESS STEEL	10	20°

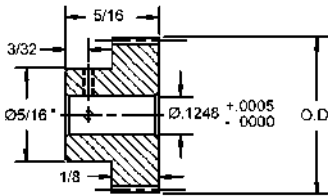
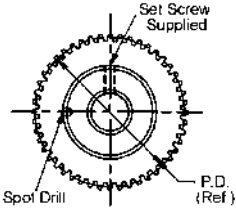
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP48S12-20	48	20	.4166	.458
DP48S12-21		21	.4375	.479
DP48S12-23		23	.4701	.521
DP48S12-24		24	.5000	.542
DP48S12-40		40	.8333	.875



Order hubless gear separately
Available on request:
Other numbers of teeth; AGMA quality 12 and 14; 14-1/2° Pressure Angle.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



B

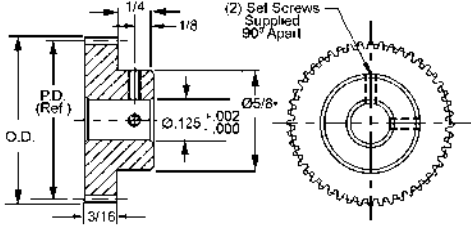
• For 14-15 teeth hub diameter equals .23
Available on request, other numbers of
teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48S10-15	P48A10-15	15•	.3125	.354
P48S10-18	P48A10-18	18	.3750	.416
P48S10-19	P48A10-19	19	.3958	.437
P48S10-20	P48A10-20	20	.4166	.458
P48S10-21	P48A10-21	21	.4375	.479
P48S10-22	P48A10-22	22	.4583	.500
P48S10-24	P48A10-24	24	.5000	.541
P48S10-25	P48A10-25	25	.5208	.562
P48S10-26	P48A10-26	26	.5416	.583
P48S10-27	P48A10-27	27	.5625	.604
P48S10-28	P48A10-28	28	.5833	.625
P48S10-30	P48A10-30	30	.6250	.666
P48S10-32	P48A10-32	32	.6666	.708
P48S10-34	P48A10-34	34	.7083	.750
P48S10-36	P48A10-36	36	.7500	.791
P48S10-40	P48A10-40	40	.8333	.875
P48S10-42	P48A10-42	42	.8750	.916
P48S10-46	P48A10-46	46	.9583	1.000
P48S10-48	P48A10-48	48	1.0000	1.041
P48S10-50	P48A10-50	50	1.0416	1.083
P48S10-55	P48A10-55	55	1.1458	1.187
P48S10-56	P48A10-56	56	1.1666	1.208
P48S10-60	P48A10-60	60	1.2500	1.291
P48S10-64	P48A10-64	64	1.3333	1.375
P48S10-65	P48A10-65	65	1.3541	1.395
P48S10-70	P48A10-70	70	1.4583	1.500
P48S10-72	P48A10-72	72	1.5000	1.541
P48S10-75	P48A10-75	75	1.5625	1.604
P48S10-80	P48A10-80	80	1.6666	1.708
P48S10-84	P48A10-84	84	1.7500	1.791
P48S10-85	P48A10-85	85	1.7708	1.812
P48S10-90	P48A10-90	90	1.8750	1.916
P48S10-96	P48A10-96	96	2.0000	2.041
P48S10-100	P48A10-100	100	2.0833	2.125
P48S10-102	P48A10-102	102	2.1250	2.166
P48S10-105	P48A10-105	105	2.1875	2.229
P48S10-110	P48A10-110	110	2.2916	2.333
P48S10-120	P48A10-120	120	2.5000	2.541

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES.ANGLE
48	PIN HUB	1/8"	3/16"	ALUMINUM ANODIZED	8	20°



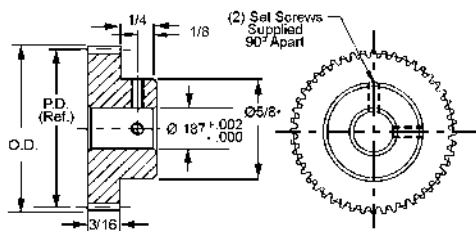
- For 16-32 teeth hub diameter equals .27
- Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48A65-16	16	.3333	.375
P48A65-18	18	.3750	.416
P48A65-20	20	.4166	.458
P48A65-22	22	.4583	.500
P48A65-24	24	.5000	.541
P48A65-28	28	.5833	.625
P48A65-30	30	.6250	.666
P48A65-36	36	.7500	.79
P48A65-40	40	.8333	.875
P48A65-46	46	.9583	1.000
P48A65-48	48	1.0000	1.041
P48A65-60	60	1.2500	1.291
P48A65-70	70	1.4583	1.500
P48A65-72	72	1.5000	1.541
P48A65-80	80	1.6666	1.708
P48A65-90	90	1.8750	1.916
P48A65-96	96	2.0000	2.041
P48A65-100	100	2.0833	2.125
P48A65-110	110	2.2916	2.333
P48A65-120	120	2.5000	2.541
P48A65-132	132	2.7500	2.791
P48A65-144	144	3.0000	3.041
P48A65-150	150	3.1250	3.166
P48A65-168	168	3.5000	3.541
P48A65-192	192	4.0000	4.041

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	3/16"	3/16"	ALUMINUM ANODIZED	8	20°



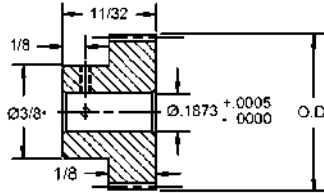
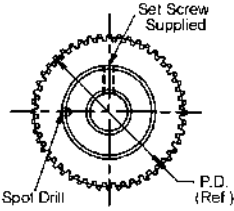
- For 19-32 teeth hub diameter equals .34
- Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48A64-20	20•	.4166	.458
P48A64-22	22•	.4583	.500
P48A64-24	24•	.5000	.541
P48A64-28	28•	.5833	.625
P48A64-30	30•	.6250	.666
P48A64-36	36	.7500	.79
P48A64-40	40	.8333	.875
P48A64-46	46	.9583	1.000
P48A64-48	48	1.0000	1.041
P48A64-60	60	1.2500	1.291
P48A64-70	70	1.4583	1.500
P48A64-72	72	1.5000	1.541
P48A64-80	80	1.6666	1.708
P48A64-90	90	1.8750	1.916
P48A64-96	96	2.0000	2.041
P48A64-100	100	2.0833	2.125
P48A64-110	110	2.2916	2.333
P48A64-120	120	2.5000	2.541
P48A64-132	132	2.7500	2.791
P48A64-144	144	3.0000	3.041
P48A64-150	150	3.1250	3.166
P48A64-168	168	3.5000	3.541
P48A64-192	192	4.0000	4.041

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



- For 19-20 teeth hub diameter equals .34

Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

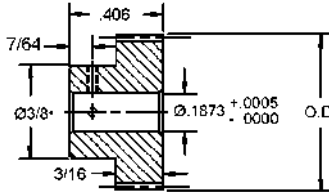
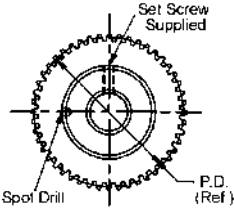
X in part number indicates part may be supplied as two piece construction (some dimensions may vary).

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48S19-19	P48A19-19	19•	.3958	.437
P48S19-20	P48A19-20	20•	.4166	.458
P48S19-21	P48A19-21	21	.4375	.479
P48S19-22	P48A19-22	22	.4583	.500
P48S19-23	P48A19-23	23	.4791	.520
P48S19-24	P48A19-24	24	.5000	.541
P48S19-25	P48A19-25	25	.5208	.562
P48S19-28	P48A19-28	28	.5833	.625
P48S19-30	P48A19-30	30	.6250	.666
P48S19-32	P48A19-32	32	.6666	.708
P48S19-34	P48A19-34	34	.7083	.750
P48S19-36	P48A19-36	36	.7500	.791
P48S19-40	P48A19-40	40	.8333	.875
P48S19-42	P48A19-42	42	.8750	.916
P48S19-46	P48A19-46	46	.9583	1.000
P48S19-48	P48A19-48	48	1.0000	1.041
P48S19-50	P48A19-50	50	1.0416	1.083
P48S19-60	P48A19-60	60	1.2500	1.291
P48S19-64	P48A19-64	64	1.3333	1.375
P48S19-70	P48A19-70	70	1.4583	1.500
P48S19-72	P48A19-72	72	1.5000	1.541
P48S19-80	P48A19-80	80	1.6666	1.708
P48S19-84	P48A19-84	84	1.7500	1.791
P48S19-90	P48A19-90	90	1.8750	1.916
P48S19-96	P48A19-96	96	2.0000	2.041
P48S19-105	P48A19-105	105	2.1875	2.229
P48S19-120	P48A19-120	120	2.5000	2.541
P48S19-132	P48A19-132	132	2.7500	2.791
P48S19-144	P48A19-144	144	3.0000	3.041
P48S19X-156	P48A19X-156	156	3.2500	3.291
P48S19X-168	P48A19X-168	168	3.5000	3.541
P48S19X-190	P48A19X-190	190	3.9583	4.000
P48S19X-192	P48A19X-192	192	4.0000	4.041

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	3/16"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



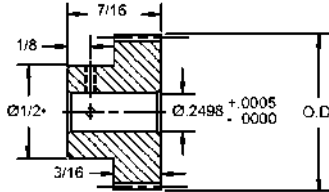
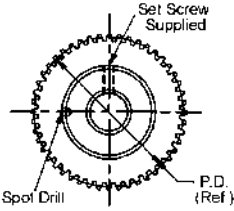
• For 19-20 teeth hub diameter equals .34
Available on request, other numbers of
teeth, AGMA quality 12 and 14, and 14-1/2°
Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48S21-20	P48A21-20	20*	.4166	.458
P48S21-21	P48A21-21	21	.4375	.479
P48S21-22	P48A21-22	22	.4583	.500
P48S21-23	P48A21-23	23	.4791	.520
P48S21-24	P48A21-24	24	.5000	.541
P48S21-25	P48A21-25	25	.5208	.562
P48S21-26	P48A21-26	26	.5416	.583
P48S21-27	P48A21-27	27	.5625	.604
P48S21-28	P48A21-28	28	.5833	.625
P48S21-29	P48A21-29	29	.6041	.645
P48S21-30	P48A21-30	30	.6250	.666
P48S21-32	P48A21-32	32	.6666	.708
P48S21-34	P48A21-34	34	.7083	.750
P48S21-36	P48A21-36	36	.7500	.791
P48S21-40	P48A21-40	40	.8333	.875
P48S21-44	P48A21-44	44	.9166	.958
P48S21-48	P48A21-48	48	1.0000	1.041
P48S21-50	P48A21-50	50	1.0416	1.083
P48S21-55	P48A21-55	55	1.1458	1.187
P48S21-60	P48A21-60	60	1.2500	1.291
P48S21-64	P48A21-64	64	1.3333	1.375
P48S21-65	P48A21-65	65	1.3541	1.395
P48S21-72	P48A21-72	72	1.5000	1.541
P48S21-84	P48A21-84	84	1.7500	1.791
P48S21-85	P48A21-85	85	1.7708	1.812
P48S21-90	P48A21-90	90	1.8750	1.916
P48S21-92	P48A21-92	92	1.9166	1.958
P48S21-95	P48A21-95	95	1.9791	2.020
P48S21-96	P48A21-96	96	2.0000	2.041
P48S21-100	P48A21-100	100	2.0833	2.125
P48S21-108	P48A21-108	108	2.2500	2.291
P48S21-120	P48A21-120	120	2.5000	2.541
P48S21-127	P48A21-127	127	2.6458	2.687
P48S21-144	P48A21-144	144	3.0000	3.041
P48S21-156	P48A21-156	156	3.2500	3.291
P48S21-180	P48A21-180	180	3.7500	3.791
P48S21-192	P48A21-192	192	4.0000	4.041

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



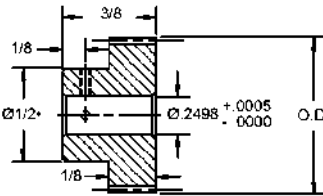
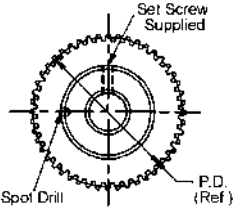
- For 24-26 teeth hub diameter equals .44
- Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48S28-24	P48A28-24	24•	.5000	.541
P48S28-25	P48A28-25	25•	.5208	.562
P48S28-26	P48A28-26	26•	.5416	.583
P48S28-27	P48A28-27	27	.5625	.604
P48S28-28	P48A28-28	28	.5833	.625
P48S28-29	P48A28-29	29	.6041	.645
P48S28-30	P48A28-30	30	.6250	.666
P48S28-32	P48A28-32	32	.6666	.708
P48S28-34	P48A28-34	34	.7083	.750
P48S28-36	P48A28-36	36	.7500	.791
P48S28-40	P48A28-40	40	.8333	.875
P48S28-42	P48A28-42	42	.8750	.916
P48S28-45	P48A28-45	45	.9375	.979
P48S28-48	P48A28-48	48	1.0000	1.041
P48S28-50	P48A28-50	50	1.0416	1.083
P48S28-55	P48A28-55	55	1.1458	1.187
P48S28-56	P48A28-56	56	1.1666	1.208
P48S28-60	P48A28-60	60	1.2500	1.291
P48S28-64	P48A28-64	64	1.3333	1.375
P48S28-65	P48A28-65	65	1.3541	1.395
P48S28-70	P48A28-70	70	1.4583	1.500
P48S28-72	P48A28-72	72	1.5000	1.541
P48S28-75	P48A28-75	75	1.5625	1.604
P48S28-80	P48A28-80	80	1.6666	1.708
P48S28-84	P48A28-84	84	1.7500	1.791
P48S28-85	P48A28-85	85	1.7708	1.812
P48S28-90	P48A28-90	90	1.8750	1.916
P48S28-95	P48A28-95	95	1.9791	2.020
P48S28-96	P48A28-96	96	2.0000	2.041
P48S28-100	P48A28-100	100	2.0833	2.125
P48S28-105	P48A28-105	105	2.1875	2.229
P48S28-108	P48A28-108	108	2.2500	2.291
P48S28-110	P48A28-110	110	2.2916	2.333
P48S28-120	P48A28-120	120	2.5000	2.541
P48S28-128	P48A28-128	128	2.6666	2.708
P48S28-168	P48A28-168	168	3.5000	3.541
P48S28-192	P48A28-192	192	4.0000	4.041
P48S28-198	P48A28-198	198	4.1250	4.166

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



B

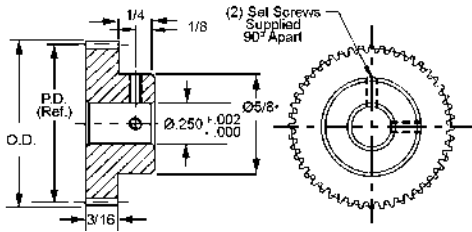
• For 24-26 teeth hub diameter equals .44
Available on request, other numbers of
teeth, AGMA quality 12 and 14, and 14-1/2°
Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48S26-24	P48A26-24	24•	.5000	.541
P48S26-25	P48A26-25	25•	.5208	.562
P48S26-26	P48A26-26	26•	.5416	.583
P48S26-28	P48A26-28	28	.5833	.625
P48S26-30	P48A26-30	30	.6250	.666
P48S26-32	P48A26-32	32	.6666	.708
P48S26-35	P48A26-35	35	.7291	.770
P48S26-36	P48A26-36	36	.7500	.791
P48S26-40	P48A26-40	40	.8333	.875
P48S26-42	P48A26-42	42	.8750	.916
P48S26-44	P48A26-44	44	.9166	.958
P48S26-45	P48A26-45	45	.9375	.979
P48S26-46	P48A26-46	46	.9583	1.000
P48S26-48	P48A26-48	48	1.0000	1.041
P48S26-50	P48A26-50	50	1.0416	1.083
P48S26-54	P48A26-54	54	1.1250	1.166
P48S26-55	P48A26-55	55	1.1458	1.187
P48S26-56	P48A26-56	56	1.1666	1.208
P48S26-60	P48A26-60	60	1.2500	1.291
P48S26-64	P48A26-64	64	1.3333	1.375
P48S26-65	P48A26-65	65	1.3541	1.395
P48S26-70	P48A26-70	70	1.4583	1.500
P48S26-72	P48A26-72	72	1.5000	1.541
P48S26-75	P48A26-75	75	1.5625	1.604
P48S26-78	P48A26-78	78	1.6250	1.666
P48S26-80	P48A26-80	80	1.6666	1.708
P48S26-84	P48A26-84	84	1.7500	1.791
P48S26-85	P48A26-85	85	1.7708	1.812
P48S26-90	P48A26-90	90	1.8750	1.916
P48S26-96	P48A26-96	96	2.0000	2.041
P48S26-100	P48A26-100	100	2.0833	2.125
P48S26-105	P48A26-105	105	2.1875	2.229
P48S26-108	P48A26-108	108	2.2500	2.291
P48S26-110	P48A26-110	110	2.2916	2.333
P48S26-120	P48A26-120	120	2.5000	2.541
P48S26-126	P48A26-126	126	2.6250	2.666
P48S26-132	P48A26-132	132	2.7500	2.791
P48S26-140	P48A26-140	140	2.9166	2.958
P48S26-144	P48A26-144	144	3.0000	3.041
P48S26-145	P48A26-145	145	3.0208	3.062
P48S26-150	P48A26-150	150	3.1250	3.166
P48S26-156	P48A26-156	156	3.2500	3.291
P48S26-160	P48A26-160	160	3.3333	3.375
P48S26-168	P48A26-168	168	3.5000	3.541
P48S26-180	P48A26-180	180	3.7500	3.791
P48S26-192	P48A26-192	192	4.0000	4.041

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/4"	3/16"	ALUMINUM ANODIZED	8	20°



Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

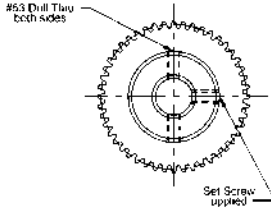
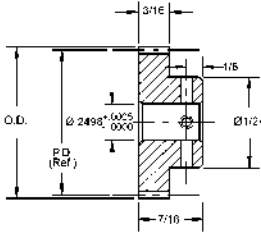
- For tooth counts 22-32 new hub diameter is .40.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48A63-22	22	.4583	.500
P48A63-24	24	.5000	.541
P48A63-28	28	.5833	.625
P48A63-30	30	.6250	.666
P48A63-36	36	.7500	.79
P48A63-40	40	.8333	.875
P48A63-46	46	.9583	1.000
P48A63-48	48	1.0000	1.041
P48A63-60	60	1.2500	1.291
P48A63-70	70	1.4583	1.500
P48A63-72	72	1.5000	1.541
P48A63-80	80	1.6666	1.708
P48A63-90	90	1.8750	1.916
P48A63-96	96	2.0000	2.041
P48A63-100	100	2.0833	2.125
P48A63-110	110	2.2916	2.333
P48A63-120	120	2.5000	2.541
P48A63-132	132	2.7500	2.791
P48A63-144	144	3.0000	3.041
P48A63-150	150	3.1250	3.166
P48A63-168	168	3.5000	3.541
P48A63-192	192	4.0000	4.041

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

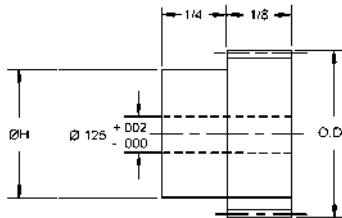
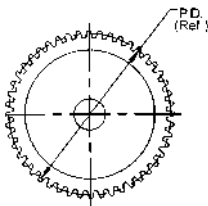
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/4"	3/16"	17-4 PH STAINLESS STEEL RC26-32	10	20°



- For 24-26 teeth hub diameter equals .44
- Available on request, other numbers of teeth, quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48PH28-24	24•	.5000	.542
P48PH28-25	25•	.5208	.563
P48PH28-26	26•	.5416	.583
P48PH28-27	27	.5625	.604
P48PH28-28	28	.5833	.625
P48PH28-29	29	.6041	.646
P48PH28-30	30	.6250	.667
P48PH28-32	32	.6666	.708
P48PH28-36	36	.7500	.792
P48PH28-40	40	.8333	.875
P48PH28-42	42	.8750	.917
P48PH28-48	48	1.0000	1.042
P48PH28-50	50	1.0416	1.083

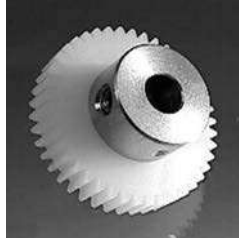
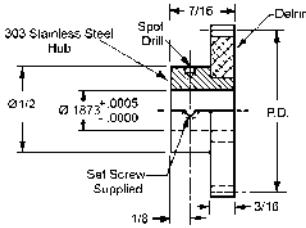
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/8"	COLD ROLLED STEEL C12L14 OR C12L15 WITH SELENIUM OR BRASS ALLOY 360	10	20°



COLD ROLLED STEEL C12L14 OR C12L15 WITH SELENIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	H
PX48S-14	PX48B-14	14	.292	.333	.229
PX48S-15	PX48B-15	15	.312	.353	.250
PX48S-16	PX48B-16	16	.333	.375	.271
PX48S-18	PX48B-18	18	.375	.417	.312
PX48S-24	PX48B-24	24	.500	.542	.437
PX48S-32	PX48B-32	32	.666	.708	.604
-	PX48B-36	36	.750	.792	.687
-	PX48B-40	40	.833	.875	.770

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	3/16"	3/16"	DELTRIN WITH STAINLESS STEEL HUB	10	20°



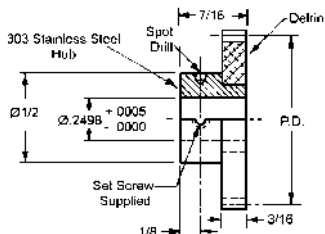
Available on request, other numbers of teeth,
14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48D21X-28	28	.5833	.625
P48D21X-29	29	.6041	.645
P48D21X-30	30	.6250	.666
P48D21X-32	32	.6666	.708
P48D21X-34	34	.7083	.750
P48D21X-36	36	.7500	.791
P48D21X-38	38	.7916	.833
P48D21X-40	40	.8333	.875
P48D21X-42	42	.8750	.916
P48D21X-44	44	.9166	.958
P48D21X-46	46	.9583	1.000
P48D21X-48	48	1.0000	1.041
P48D21X-50	50	1.0416	1.083
P48D21X-55	55	1.1458	1.187
P48D21X-56	56	1.1666	1.208
P48D21X-60	60	1.2500	1.291
P48D21X-64	64	1.3333	1.375
P48D21X-68	68	1.4166	1.458
P48D21X-72	72	1.5000	1.541
P48D21X-75	75	1.5625	1.604
P48D21X-80	80	1.6666	1.708
P48D21X-84	84	1.7500	1.791
P48D21X-90	90	1.8750	1.916
P48D21X-92	92	1.9166	1.958
P48D21X-96	96	2.0000	2.041
P48D21X-100	100	2.0833	2.125
P48D21X-110	110	2.2916	2.333
P48D21X-120	120	2.5000	2.541
P48D21X-132	132	2.7500	2.791
P48D21X-138	138	2.8750	2.916
P48D21X-144	144	3.0000	3.041
P48D21X-156	156	3.2500	3.291
P48D21X-168	168	3.5000	3.541
P48D21X-180	180	3.7500	3.791
P48D21X-186	186	3.8750	3.916

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/4"	3/16"	DELTRIN WITH STAINLESS STEEL HUB	10	20°



Available on request, other numbers of teeth,
14-1/2° Pressure Angle.

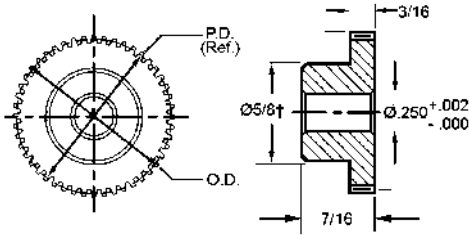
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48D28X-28	28	.5833	.625
P48D28X-29	29	.6041	.645
P48D28X-30	30	.6250	.666
P48D28X-32	32	.6666	.708
P48D28X-34	34	.7083	.750
P48D28X-36	36	.7500	.791
P48D28X-38	38	.7916	.833
P48D28X-40	40	.8333	.875
P48D28X-42	42	.8750	.916
P48D28X-44	44	.9166	.958
P48D28X-46	46	.9583	1.000
P48D28X-48	48	1.0000	1.041
P48D28X-50	50	1.0416	1.083
P48D28X-55	55	1.1458	1.187
P48D28X-56	56	1.1666	1.208
P48D28X-60	60	1.2500	1.291
P48D28X-64	64	1.3333	1.375
P48D28X-68	68	1.4166	1.458
P48D28X-72	72	1.5000	1.541
P48D28X-75	75	1.5625	1.604
P48D28X-80	80	1.6666	1.708
P48D28X-84	84	1.7500	1.791
P48D28X-90	90	1.8750	1.916
P48D28X-92	92	1.9166	1.958
P48D28X-96	96	2.0000	2.041
P48D28X-100	100	2.0833	2.125
P48D28X-110	110	2.2916	2.333
P48D28X-120	120	2.5000	2.541
P48D28X-132	132	2.7500	2.791
P48D28X-138	138	2.8750	2.916
P48D28X-144	144	3.0000	3.041
P48D28X-156	156	3.2500	3.291
P48D28X-168	168	3.5000	3.541
P48D28X-180	180	3.7500	3.791
P48D28X-186	186	3.8750	3.916

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESS. ANGLE
48	PIN HUB	1/4"	3/16"	MOLDED ACETAL	5	20°



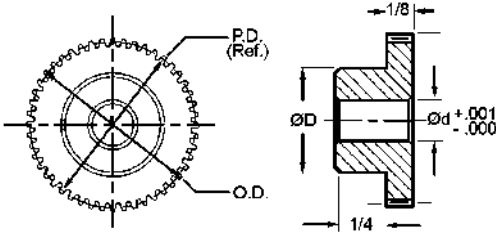
† Teeth runout on hub.

Available on request, other bore sizes and numbers of teeth on request.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P48D4M-28	28†	.5833	.63
P48D4M-30	30†	.6250	.66
P48D4M-36	36	.7500	.79
P48D4M-40	40	.8333	.87
P48D4M-42	42	.8750	.92
P48D4M-48	48	1.0000	1.04
P48D4M-50	50	1.0416	1.08
P48D4M-60	60	1.2500	1.29
P48D4M-70	70	1.4583	1.50
P48D4M-72	72	1.5000	1.54
P48D4M-80	80	1.6666	1.71
P48D4M-84	84	1.7500	1.79
P48D4M-90	90	1.8750	1.92
P48D4M-96	96	2.0000	2.04
P48D4M-100	100	2.0833	2.12
P48D4M-108	108	2.2500	2.29
P48D4M-120	120	2.5000	2.54

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	5/32" TO 1/4"	1/8"	MOLDED DELRIN	5	20°



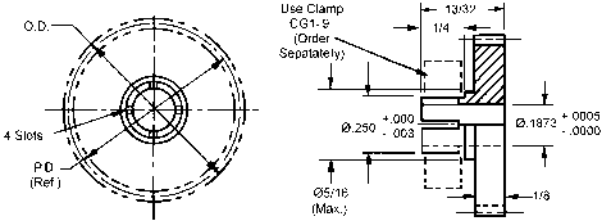
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	Ød	ØD
P48D4P-18	18	.375	.417	5/32	5/16
P48D4P-19	19	.396	.438	5/32	5/16
P48D4P-20	20	.417	.458	5/32	11/32
P48D4P-21	21	.438	.479	5/32	11/32
P48D4P-22	22	.458	.500	5/32	3/8
P48D4P-23	23	.479	.521	5/32	3/8
P48D4P-24	24	.500	.542	5/32	13/32
P48D4P-25	25	.521	.562	5/32	13/32
P48D4P-26	26	.542	.583	5/32	29/64
P48D4P-27	27	.562	.604	5/32	29/64
P48D4P-28	28	.583	.625	5/32	31/64
P48D4P-29	29	.604	.646	5/32	31/64
P48D4P-30	30	.625	.667	5/32	1/2
P48D4P-31	31	.646	.688	3/16	35/64
P48D4P-32	32	.667	.708	3/16	35/64
P48D4P-33	33	.688	.729	3/16	35/64
P48D4P-34	34	.708	.750	3/16	35/64
P48D4P-35	35	.729	.771	3/16	35/64
P48D4P-36	36	.750	.792	3/16	35/64
P48D4P-37	37	.771	.813	3/16	35/64
P48D4P-38	38	.792	.833	3/16	35/64
P48D4P-39	39	.813	.854	3/16	35/64
P48D4P-40	40	.833	.875	3/16	35/64
P48D4P-42	42	.875	.917	3/16	35/64
P48D4P-44	44	.917	.958	3/16	35/64
P48D4P-45	45	.938	.979	3/16	35/64
P48D4P-48	48	1.000	1.042	1/4	39/64
P48D4P-52	52	1.083	1.125	1/4	39/64
P48D4P-54	54	1.125	1.168	1/4	39/64
P48D4P-56	56	1.168	1.208	1/4	39/64
P48D4P-60	60	1.250	1.292	1/4	39/64
P48D4P-64	64	1.333	1.375	1/4	39/64
P48D4P-66	66	1.375	1.416	1/4	39/64
P48D4P-72	72	1.500	1.542	1/4	39/64
P48D4P-80	80	1.667	1.708	1/4	39/64
P48D4P-84	84	1.750	1.792	1/4	39/64
P48D4P-96	96	2.000	2.042	1/4	39/64
P48D4P-100	100	2.083	2.125	1/4	39/64
P48D4P-108	108	2.250	2.292	1/4	39/64
P48D4P-120	120	2.500	2.542	1/4	39/64

Some molded gears may have webs.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	CLAMP HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

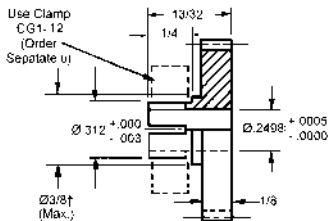
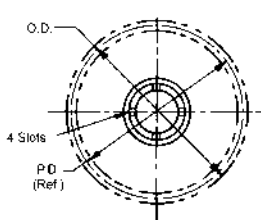
X in part number indicates part may be supplied in two piece construction with stainless steel hub (some dimensions may vary).

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C48S14-20	C48A14-20	20	.4166	.458
C48S14-24	C48A14-24	24	.5000	.541
C48S14-28	C48A14-28	28	.5833	.625
C48S14-30	C48A14-30	30	.6250	.666
C48S14-32	C48A14-32	32	.6666	.708
C48S14-40	C48A14-40	40	.8333	.875
C48S14-46	C48A14-46	46	.9583	1.000
C48S14-48	C48A14-48	48	1.0000	1.041
C48S14-56	C48A14-56	56	1.1666	1.208
C48S14-60	C48A14-60	60	1.2500	1.291
C48S14-66	C48A14-66	66	1.3750	1.416
C48S14-70	C48A14-70	70	1.4583	1.500
C48S14-72	C48A14-72	72	1.5000	1.541
C48S14-84	C48A14-84	84	1.7500	1.791
C48S14-90	C48A14-90	90	1.8750	1.916
C48S14-96	C48A14-96	96	2.0000	2.041
C48S14-100	C48A14-100	100	2.0833	2.125
C48S14-102	C48A14-102	102	2.1250	2.166
C48S14-105	C48A14-105	105	2.1875	2.229
C48S14-108	C48A14-108	108	2.2500	2.291
C48S14-110	C48A14-110	110	2.2916	2.333
C48S14-114	C48A14-114	114	2.3750	2.416
C48S15X-120	C48A15X-120	120	2.5000	2.541
C48S15X-126	C48A15X-126	126	2.6250	2.666
C48S15X-132	C48A15X-132	132	2.7500	2.791
C48S15X-138	C48A15X-138	138	2.8750	2.916
C48S15X-140	C48A15X-140	140	2.9166	2.958
C48S15X-144	C48A15X-144	144	3.0000	3.041
C48S15X-150	C48A15X-150	150	3.1250	3.166
C48S15X-156	C48A15X-156	156	3.2500	3.291
C48S15X-160	C48A15X-160	160	3.3333	3.375
C48S15X-168	C48A15X-168	168	3.5000	3.541
C48S15X-170	C48A15X-170	170	3.5416	3.583
C48S15X-180	C48A15X-180	180	3.7500	3.791
C48S15X-190	C48A15X-190	190	3.9583	4.000
C48S15X-192	C48A15X-192	192	4.0000	4.041

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	CLAMP HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



† Teeth may runout on flange diameter.

Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

X in part number indicates part may be supplied in two piece construction with stainless steel hub (some dimensions may vary).

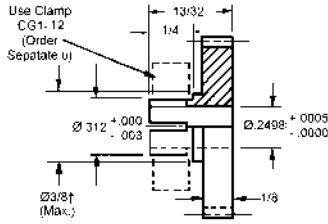
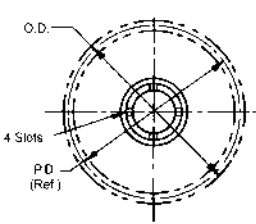
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
	STOCK NO.			
C48S18-20	C48A18-20	20†	.4166	.458
C48S18-21	C48A18-21	21	.4375	.479
C48S18-22	C48A18-22	22	.4583	.500
C48S18-23	C48A18-23	23	.4791	.520
C48S18-24	C48A18-24	24	.5000	.541
C48S18-25	C48A18-25	25	.5208	.562
C48S18-26	C48A18-26	26	.5416	.583
C48S18-27	C48A18-27	27	.5625	.604
C48S18-28	C48A18-28	28	.5833	.625
C48S18-29	C48A18-29	29	.6041	.645
C48S18-30	C48A18-30	30	.6250	.666
C48S18-32	C48A18-32	32	.6666	.708
C48S18-34	C48A18-34	34	.7083	.750
C48S18-35	C48A18-35	35	.7291	.770
C48S18-36	C48A18-36	36	.7500	.791
C48S18-38	C48A18-38	38	.7916	.833
C48S18-40	C48A18-40	40	.8333	.875
C48S18-42	C48A18-42	42	.8750	.916
C48S18-44	C48A18-44	44	.9166	.958
C48S18-45	C48A18-45	45	.9375	.979
C48S18-46	C48A18-46	46	.9583	1.000
C48S18-47	C48A18-47	47	.9791	1.020
C48S18-48	C48A18-48	48	1.0000	1.041
C48S18-50	C48A18-50	50	1.0416	1.083
C48S18-54	C48A18-54	54	1.1250	1.166
C48S18-55	C48A18-55	55	1.1458	1.187
C48S18-56	C48A18-56	56	1.1666	1.208
C48S18-60	C48A18-60	60	1.2500	1.291
C48S18-64	C48A18-64	64	1.3333	1.375
C48S18-66	C48A18-66	66	1.3750	1.416
C48S18-68	C48A18-68	68	1.4166	1.458
C48S18-70	C48A18-70	70	1.4583	1.500
C48S18-72	C48A18-72	72	1.5000	1.541
C48S18-75	C48A18-75	75	1.5625	1.604
C48S18-78	C48A18-78	78	1.6250	1.666

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	CLAMP HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



† Teeth may runout on flange diameter.

Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

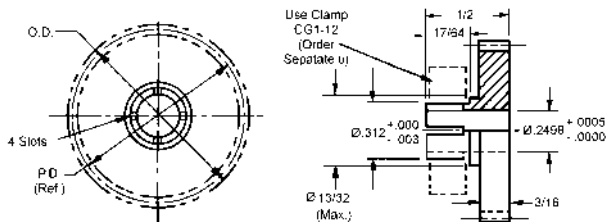
X in part number indicates part may be supplied
in two piece construction with stainless steel hub
(some dimensions may vary).

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C48S18-80	C48A18-80	80	1.6666	1.708
C48S18-81	C48A18-81	81	1.6875	1.729
C48S18-84	C48A18-84	84	1.7500	1.791
C48S18-85	C48A18-85	85	1.7708	1.812
C48S18-88	C48A18-88	88	1.8333	1.875
C48S18-90	C48A18-90	90	1.8750	1.916
C48S18-91	C48A18-91	91	1.8958	1.937
C48S18-92	C48A18-92	92	1.9166	1.958
C48S18-93	C48A18-93	93	1.9375	1.979
C48S18-96	C48A18-96	96	2.0000	2.041
C48S18-100	C48A18-100	100	2.0833	2.125
C48S18-102	C48A18-102	102	2.1250	2.166
C48S18-104	C48A18-104	104	2.1666	2.208
C48S18-105	C48A18-105	105	2.1875	2.229
C48S18-108	C48A18-108	108	2.2500	2.291
C48S18-112	C48A18-112	112	2.3333	2.375
C48S18-114	C48A18-114	114	2.3750	2.416
C48S18-120	C48A18-120	120	2.5000	2.541
C48S18-126	C48A18-126	126	2.6250	2.666
C48S18-127	C48A18-127	127	2.6458	2.687
C48S18-128	C48A18-128	128	2.6666	2.708
C48S18-132	C48A18-132	132	2.7500	2.791
C48S18-136	C48A18-136	136	2.8333	2.875
C48S18-138	C48A18-138	138	2.8750	2.916
C48S18-144	C48A18-144	144	3.0000	3.041
C48S18-150	C48A18-150	150	3.1250	3.166
C48S18-152	C48A18-152	152	3.1666	3.208
C48S18-156	C48A18-156	156	3.2500	3.291
C48S18-162	C48A18-162	162	3.3750	3.416
C48S18-168	C48A18-168	168	3.5000	3.541
C48S18-171	C48A18-171	171	3.5625	3.604
C48S18-175	C48A18-175	175	3.6458	3.687
C48S18-180	C48A18-180	180	3.7500	3.791
C48S18-186	C48A18-186	186	3.8750	3.916
C48S18-192	C48A18-192	192	4.0000	4.041

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	CLAMP HUB	1/4"	3/16"	303 STAINLESS STEEL	10	20°



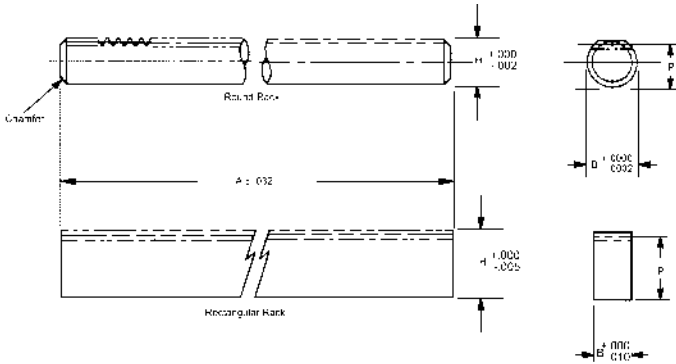
Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C48S20-23	23	4791	520
C48S20-24	24	5000	541
C48S20-25	25	5208	562
C48S20-28	28	5833	625
C48S20-30	30	6250	666
C48S20-32	32	6666	708
C48S20-36	36	7500	791
C48S20-40	40	8333	875
C48S20-42	42	8750	916
C48S20-45	45	9375	979
C48S20-48	48	10000	1041
C48S20-50	50	10416	1083
C48S20-54	54	1.1250	1.166
C48S20-60	60	1.2500	1.291
C48S20-70	70	1.4583	1.500
C48S20-72	72	1.5000	1.541
C48S20-75	75	1.5625	1.604
C48S20-78	78	1.6250	1.666
C48S20-80	80	1.6666	1.708
C48S20-84	84	1.7500	1.791
C48S20-88	88	1.8333	1.875
C48S20-90	90	1.8750	1.916
C48S20-96	96	2.0000	2.041
C48S20-100	100	2.0833	2.125
C48S20-108	108	2.2500	2.291
C48S20-112	112	2.3333	2.375
C48S20-120	120	2.5000	2.541
C48S20-128	128	2.6666	2.708
C48S20-132	132	2.7500	2.791
C48S20-144	144	3.0000	3.041
C48S20-150	150	3.1250	3.166
C48S20-162	162	3.3750	3.416
C48S20-168	168	3.5000	3.541
C48S20-180	180	1.7500	1.791
C48S20-192	192	4.0000	4.041
C48S20-198	198	4.1250	4.066

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

GEAR RACKS

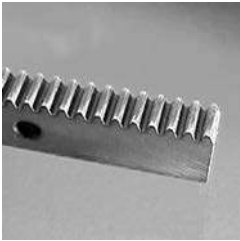
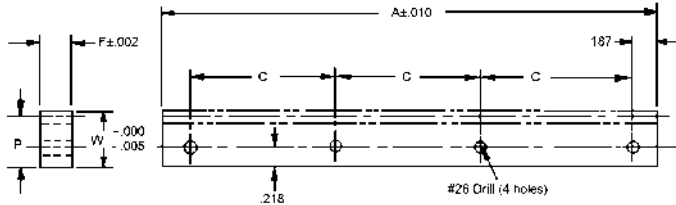
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-6	ROUND	48	.1992	.2497	18	.220	10
R2-12	RECTANGULAR	48	.4592	.230±.005	18	.480	10

Available on request:
14 - 1/2° pressure angle,
special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	RECTANGULAR	416 SERIES STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°

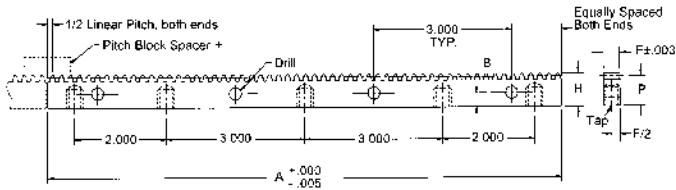


STOCK NO.	MATERIAL	A (Inch)	P (Ref.)	W	F	C
R4-11	STAINLESS ST.	9	.4592	.480	.230	2.879
R4-12	ALUMINUM					

Available on request: special,
modified and custom racks.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



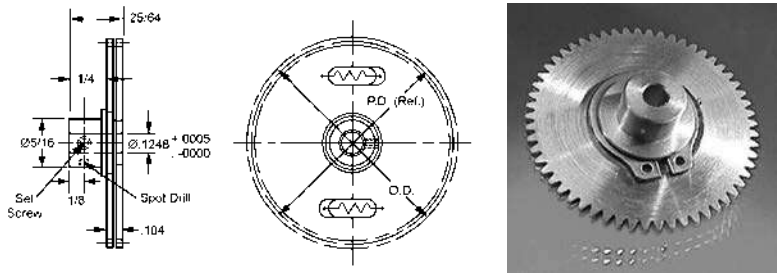
†Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS	SPACER BLOCK	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 -.005	F	B	DRILL	TAP
STOCK NO.	STOCK NO.												
R1-6-G1	R1-6-SB	10*	.0014	.0005	48	.0354	11.055	.4542	.475	.230	.218	#26	#6-32 x 1/4
R3-4-G1	R3-4-SB	10*	.0014	.0005	48	.0654	11.055	.4542	.480	.230	.218	#26	#6-32 x 1/4

* Higher quality on request.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/8"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

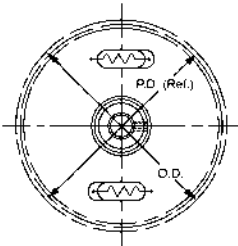
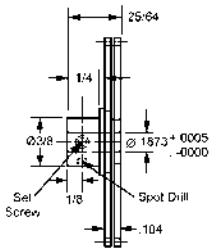
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP48SS-40	AP48TS-40	40	.8333
AP48SS-42	AP48TS-42	42	.8750
AP48SS-44	AP48TS-44	44	.9166
AP48SS-46	AP48TS-46	46	.9583
AP48SS-48	AP48TS-48	48	1.0000
AP48SS-50	AP48TS-50	50	1.0416
AP48SS-55	AP48TS-55	55	1.1458
AP48SS-56	AP48TS-56	56	1.1666
AP48SS-60	AP48TS-60	60	1.2500
AP48SS-64	AP48TS-64	64	1.3333
AP48S-65	AP48T-65	65	1.3541
AP48S-70	AP48T-70	70	1.4583
AP48S-72	AP48T-72	72	1.5000
AP48S-75	AP48T-75	75	1.5625
AP48S-80	AP48T-80	80	1.6666
AP48S-84	AP48T-84	84	1.7500
AP48S-85	AP48T-85	85	1.7708
AP48S-90	AP48T-90	90	1.8750
AP48S-95	AP48T-95	95	1.9791
AP48S-96	AP48T-96	96	2.0000
AP48S-100	AP48T-100	100	2.0833
AP48S-105	AP48T-105	105	2.1875
AP48S-110	AP48T-110	110	2.2916
AP48S-115	AP48T-115	115	2.3958
AP48S-120	AP48T-120	120	2.5000
AP48S-125	AP48T-125	125	2.6041
AP48S-130	AP48T-130	130	2.7083
AP48S-132	AP48T-132	132	2.7500
AP48S-140	AP48T-140	140	2.9166
AP48S-144	AP48T-144	144	3.0000
AP48S-150	AP48T-150	150	3.1250

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	3/16"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP48US-46	AP48VS-46	46	.9583
AP48US-48	AP48VS-48	48	1.0000
AP48US-50	AP48VS-50	50	1.0416
AP48US-55	AP48VS-55	55	1.1458
AP48US-56	AP48VS-56	56	1.1666
AP48US-60	AP48VS-60	60	1.2500
AP48US-64	AP48VS-64	64	1.3333
AP48U-65	AP48V-65	65	1.3541
AP48U-70	AP48V-70	70	1.4583
AP48U-72	AP48V-72	72	1.5000
AP48U-75	AP48V-75	75	1.5625
AP48U-80	AP48V-80	80	1.6666
AP48U-84	AP48V-84	84	1.7500
AP48U-85	AP48V-85	85	1.7708
AP48U-90	AP48V-90	90	1.8750
AP48U-95	AP48V-95	95	1.9791
AP48U-96	AP48V-96	96	2.0000
AP48U-100	AP48V-100	100	2.0833
AP48U-105	AP48V-105	105	2.1875
AP48U-110	AP48V-110	110	2.2916
AP48U-115	AP48V-115	115	2.3958
AP48U-120	AP48V-120	120	2.5000
AP48U-125	AP48V-125	125	2.6041
AP48U-130	AP48V-130	130	2.7083
AP48U-132	AP48V-132	132	2.7500
AP48U-140	AP48V-140	140	2.9166
AP48U-144	AP48V-144	144	3.0000
AP48U-150	AP48V-150	150	3.1250

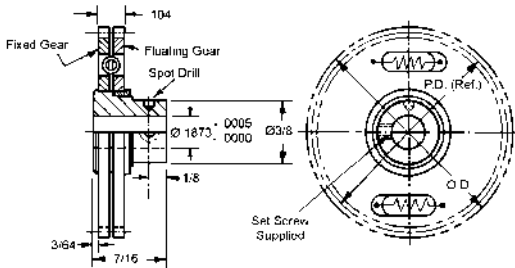
Available on request:

- Other numbers of teeth;
- AGMA Quality 12 and 14 (some dimensions may vary);
- 14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	3/16"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE
AP48CS-28	-	28	.5833	.625	SCISSOR
AP48CS-30	-	30	.6250	.666	
AP48CS-32	-	32	.6666	.708	
AP48CS-36	AP48PS-36	36	.7500	.791	
AP48CS-40	AP48PS-40	40	.8333	.875	
AP48CS-44	AP48PS-42	42	.8750	.916	
AP48C-48	AP48P-48	48	1.0000	1.041	
AP48C-50	AP48P-50	50	1.0416	1.083	
AP48C-54	AP48P-54	54	1.1250	1.166	
AP48C-60	AP48P-60	60	1.2500	1.291	
AP48C-64	AP48P-64	64	1.3333	1.375	COIL
AP48C-70	AP48P-70	70	1.4583	1.500	
AP48C-72	AP48P-72	72	1.5000	1.541	
AP48C-80	AP48P-80	80	1.6666	1.708	
AP48C-90	AP48P-90	90	1.8750	1.916	
AP48C-96	AP48P-96	96	2.0000	2.041	
AP48C-100	AP48P-100	100	2.0833	2.125	
AP48C-108	AP48P-108	108	2.2500	2.291	
AP48C-120	AP48P-120	120	2.5000	2.541	
AP48C-144	AP48P-144	144	3.0000	3.041	

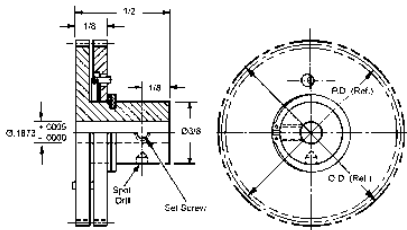
Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14;
14-12° pressure angle.

**For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.**

ANTI-BACKLASH GEARS

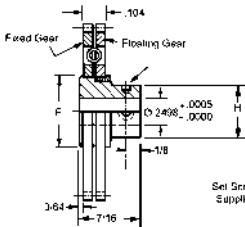
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AP48HS-30	AP48JS-30	30	.6250	.666
AP48HS-32	AP48JS-32	32	.6666	.708
AP48HS-36	AP48JS-36	36	.7500	.792
AP48HS-48	AP48JS-48	48	1.0000	1.042

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel



STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE	H
AP48ES-28	-	28	.5833	.625	SCISSOR	3/8
AP48ES-30	-	30	.6250	.666		
AP48ES-32	-	32	.6666	.708		
AP48ES-36	AP48RS-36	36	.7500	.791		
AP48ES-40	AP48RS-40	40	.8333	.875		
AP48ES-42	AP48RS-42	42	.8750	.916		
AP48ES-45	AP48RS-45	45	.9375	.979		
AP48E-48	AP48R-48	48	1.0000	1.041		
AP48E-50	AP48R-50	50	1.0416	1.083		
AP48E-54	AP48R-54	54	1.1250	1.166		
AP48E-56	AP48R-56	56	1.1666	1.208	COIL	7/16
AP48E-60	AP48R-60	60	1.2500	1.291		
AP48E-64	AP48R-64	64	1.3333	1.375		
AP48E-65	AP48R-65	65	1.3541	1.395		
AP48E-70	AP48R-70	70	1.4583	1.500		
AP48E-72	AP48R-72	72	1.5000	1.541		
AP48E-75	AP48R-75	75	1.5625	1.604		
AP48E-78	AP48R-78	78	1.6250	1.666		
AP48E-80	AP48R-80	80	1.6666	1.708		
AP48E-90	AP48R-90	90	1.8750	1.916		
AP48E-96	AP48R-96	96	2.0000	2.041		
AP48E-100	AP48R-100	100	2.0833	2.125		
AP48E-105	AP48R-105	105	2.1875	2.229		
AP48E-108	AP48R-108	108	2.2500	2.291		
AP48E-120	AP48R-120	120	2.5000	2.541		
AP48E-144	AP48R-144	144	3.0000	3.041		

Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14;
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS- STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP48WS-50	AP48XS-50	50	1.0416
AP48WS-55	AP48XS-55	55	1.1458
AP48WS-56	AP48XS-56	56	1.1666
AP48WS-60	AP48XS-60	60	1.2500
AP48WS-64	AP48XS-64	64	1.3333
AP48W-65	AP48X-65	65	1.3541
AP48W-70	AP48X-70	70	1.4583
AP48W-72	AP48X-72	72	1.5000
AP48W-75	AP48X-75	75	1.5625
AP48W-80	AP48X-80	80	1.6666
AP48W-84	AP48X-84	84	1.7500
AP48W-85	AP48X-85	85	1.7708
AP48W-90	AP48X-90	90	1.8750
AP48W-95	AP48X-95	95	1.9791
AP48W-96	AP48X-96	96	2.0000
AP48W-100	AP48X-100	100	2.0833
AP48W-105	AP48X-105	105	2.1875
AP48W-110	AP48X-110	110	2.2916
AP48W-115	AP48X-115	115	2.3958
AP48W-120	AP48X-120	120	2.5000
AP48W-125	AP48X-125	125	2.6041
AP48W-130	AP48X-130	130	2.7083
AP48W-132	AP48X-132	132	2.7500
AP48W-140	AP48X-140	140	2.9166
AP48W-144	AP48X-144	144	3.0000
AP48W-150	AP48X-150	150	3.1250

Available on request:

Other numbers of teeth:

AGMA Quality 12 and 14 (some dimensions may vary);

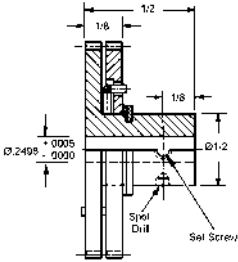
14-12° pressure angle.

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	PIN HUB	1/4"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material:
303 Stainless Steel

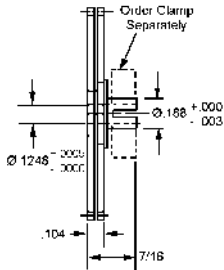
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AP48KS-32	AP48LS-32	32		.6666	.708
AP48KS-36	AP48LS-36	36		.7500	.792
AP48KS-48	AP48LS-48	48	.2498	1.0000	1.042

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	CLAMP HUB	1/8"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC48SS-40	AC48TS-40	40	.8333
AC48SS-42	AC48TS-42	42	.8750
AC48SS-44	AC48TS-44	44	.9166
AC48SS-46	AC48TS-46	46	.9583
AC48SS-48	AC48TS-48	48	1.0000
AC48SS-50	AC48TS-50	50	1.0416
AC48SS-55	AC48TS-55	55	1.1458
AC48SS-56	AC48TS-56	56	1.1666
AC48SS-60	AC48TS-60	60	1.2500
AC48SS-64	AC48TS-64	64	1.3333
AC48S-65	AC48T-65	65	1.3541
AC48S-70	AC48T-70	70	1.4583
AC48S-72	AC48T-72	72	1.5000
AC48S-75	AC48T-75	75	1.5625
AC48S-80	AC48T-80	80	1.6666
AC48S-84	AC48T-84	84	1.7500
AC48S-85	AC48T-85	85	1.7708
AC48S-90	AC48T-90	90	1.8750
AC48S-95	AC48T-95	95	1.9791
AC48S-96	AC48T-96	96	2.0000
AC48S-100	AC48T-100	100	2.0833
AC48S-105	AC48T-105	105	2.1875
AC48S-110	AC48T-110	110	2.2916
AC48S-115	AC48T-115	115	2.3958
AC48S-120	AC48T-120	120	2.5000
AC48S-125	AC48T-125	125	2.6041
AC48S-130	AC48T-130	130	2.7083
AC48S-132	AC48T-132	132	2.7500
AC48S-140	AC48T-140	140	2.9166
AC48S-144	AC48T-144	144	3.0000
AC48S-150	AC48T-150	150	3.1250

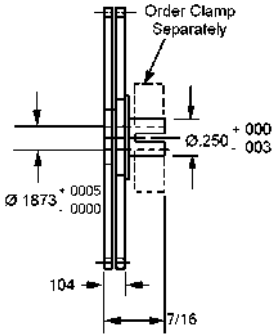
Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	CLAMP HUB	3/16"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC48US-46	AC48VS-46	46	.9583
AC48US-48	AC48VS-48	48	1.0000
AC48US-50	AC48VS-50	50	1.0416
AC48US-55	AC48VS-55	55	1.1458
AC48US-56	AC48VS-56	56	1.1666
AC48US-60	AC48VS-60	60	1.2500
AC48US-64	AC48VS-64	64	1.3333
AC48U-65	AC48V-65	65	1.3541
AC48U-70	AC48V-70	70	1.4583
AC48U-72	AC48V-72	72	1.5000
AC48U-75	AC48V-75	75	1.5625
AC48U-80	AC48V-80	80	1.6666
AC48U-84	AC48V-84	84	1.7500
AC48U-85	AC48V-85	85	1.7708
AC48U-90	AC48V-90	90	1.8750
AC48U-95	AC48V-95	95	1.9791
AC48U-96	AC48V-96	96	2.0000
AC48U-100	AC48V-100	100	2.0833
AC48U-105	AC48V-105	105	2.1875
AC48U-110	AC48V-110	110	2.2916
AC48U-115	AC48V-115	115	2.3958
AC48U-120	AC48V-120	120	2.5000
AC48U-125	AC48V-125	125	2.6041
AC48U-130	AC48V-130	130	2.7083
AC48U-132	AC48V-132	132	2.7500
AC48U-140	AC48V-140	140	2.9166
AC48U-144	AC48V-144	144	3.0000
AC48U-150	AC48V-150	150	3.1250

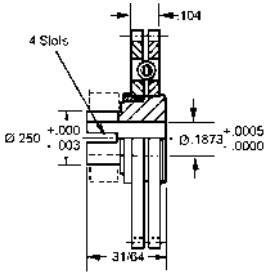
Available on request:

- Other numbers of teeth;
- AGMA Quality 12 and 14 (some dimensions may vary);
- 14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	CLAMP HUB	3/16"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE
AC48CS-28	---	28	.5833	.625	SCISSOR
AC48CS-30	---	30	.6250	.666	
AC48CS-32	---	32	.6666	.708	
AC48CS-34	AC48PS-34	34	.7083	.750	
AC48CS-36	AC48PS-36	36	.7500	.791	
AC48CS-40	AC48PS-40	40	.8333	.875	
AC48CS-44	AC48PS-44	44	.9166	.958	COIL
AC48C-48	AC48P-48	48	1.0000	1.041	
AC48C-50	AC48P-50	50	1.0416	1.083	
AC48C-54	AC48P-54	54	1.1250	1.166	
AC48C-60	AC48P-60	60	1.2500	1.291	
AC48C-64	AC48P-64	64	1.3333	1.375	
AC48C-70	AC48P-70	70	1.4583	1.500	
AC48C-72	AC48P-72	72	1.5000	1.541	
AC48C-80	AC48P-80	80	1.6666	1.708	
AC48C-90	AC48P-90	90	1.8750	1.916	
AC48C-96	AC48P-96	96	2.0000	2.041	
AC48C-100	AC48P-100	100	2.0833	2.125	
AC48C-108	AC48P-108	108	2.2500	2.291	
AC48C-120	AC48P-120	120	2.5000	2.541	
AC48C-144	AC48P-144	144	3.0000	3.041	

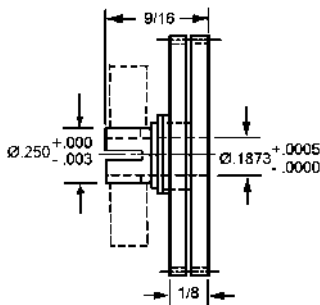
Available on request:

- Other numbers of teeth;
- AGMA Quality 12 and 14;
- 14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	CLAMP HUB	3/16"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material:
303 Stainless Steel

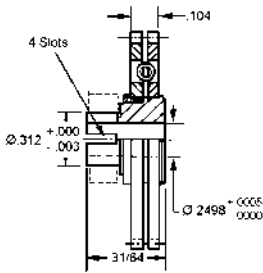
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AC48HS-30	AC48JS-30	48	30	.6250	.666
AC48HS-32	AC48JS-32		32	.6666	.708
AC48HS-36	AC48JS-36		36	.7500	.792
AC48HS-48	AC48JS-48		48	1.0000	1.042

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	CLAMP HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE
AC48ES-28	-	28	.5833	.625	SCISSOR
AC48ES-30	-	30	.6250	.666	
AC48ES-32	-	32	.6666	.708	
AC48ES-36	AC48RS-36	36	.7500	.791	
AC48ES-40	AC48RS-40	40	.8333	.875	
AC48ES-42	AC48RS-42	42	.8750	.916	
AC48ES-45	AC48RS-45	45	.9375	.979	COIL
AC48E-48	AC48R-48	48	1.0000	1.041	
AC48E-50	AC48R-50	50	1.0416	1.083	
AC48E-54	AC48R-54	54	1.1250	1.166	
AC48E-56	AC48R-56	56	1.1666	1.208	
AC48E-60	AC48R-60	60	1.2500	1.291	
AC48E-64	AC48R-64	64	1.3333	1.375	
AC48E-65	AC48R-65	65	1.3541	1.395	
AC48E-70	AC48R-70	70	1.4583	1.500	
AC48E-72	AC48R-72	72	1.5000	1.541	
AC48E-75	AC48R-75	75	1.5625	1.604	
AC48E-78	AC48R-78	78	1.6250	1.666	
AC48E-80	AC48R-80	80	1.6666	1.708	
AC48E-90	AC48R-90	90	1.8750	1.916	
AC48E-96	AC48R-96	96	2.0000	2.041	
AC48E-100	AC48R-100	100	2.0833	2.125	
AC48E-105	AC48R-105	105	2.1875	2.229	
AC48E-108	AC48R-108	108	2.2500	2.291	
AC48E-120	AC48R-120	120	2.5000	2.541	
AC48E-144	AC48R-144	144	3.0000	3.041	

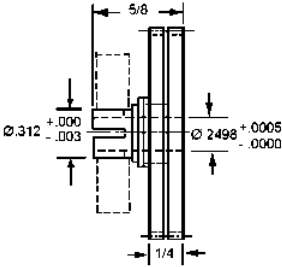
Available on request:

- Other numbers of teeth;
- AGMA Quality 12 and 14;
- 14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	CLAMP HUB	1/4"	1/4"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



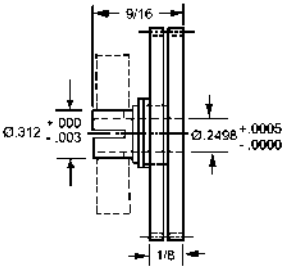
B

Hub Material:
303 Stainless Steel

STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC48BS-36	AC48DS-36	48	36	.7500	.792
AC48BS-42	AC48DS-42		42	.8750	.917
AC48BS-48	AC48DS-48		48	1.0000	1.042

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	CLAMP STYLE	1/4"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material:
303 Stainless Steel

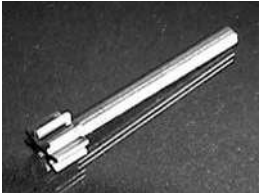
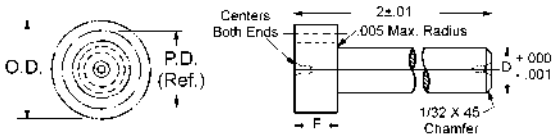
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC48KS-32	AC48LS-32	32	.6666	.708
AC48KS-36	AC48LS-36	36	.7500	.792
AC48KS-48	AC48LS-48	48	1.0000	1.042

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

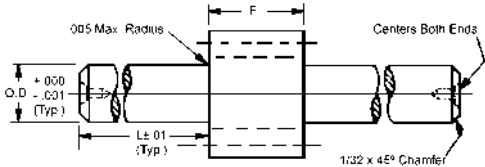
PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	BRASS AND COLD ROLLED STEEL	5	20°



COLD ROLLED STAINLESS STEEL 12L15 W/SELINIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NUMBER OF TEETH	PITCH DIAMETER	OUTSIDE DIAMETER	D	F
PSX48S-9	PSX48B-9	9	.1875	.230	.125	3/16
PSX48S-10	PSX48B-10	10	.2083	.250	.125	
PSX48S-12	PSX48B-12	12	.2500	.291	.187	
PSX48S-14	PSX48B-14	14	.2917	.333	.187	
PSX48S-15	PSX48B-15	15	.3125	.353	.250	
PSX48S-16	PSX48B-16	16	.3333	.375	.250	
PSX48S-18	PSX48B-18	18	.3750	.417	.312	

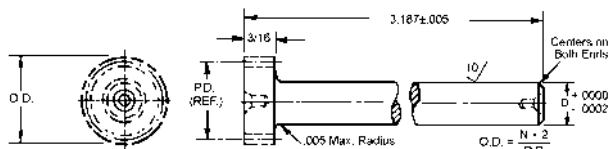
PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	BRASS AND COLD ROLLED STEEL	5	20°



COLD ROLLED STAINLESS STEEL 12L15 W/SELINIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NUMBER OF TEETH	PITCH DIAMETER	OUTSIDE DIAMETER	D	F	L
PSW48S-9	PSW48B-9	9	.1875	.230	.125	3/16	1/2
PSW48S-10	PSW48B-10	10	.2083	.250	.125		
PSW48S-12	PSW48B-12	12	.2500	.291	.125		
PSW48S-14	PSW48B-14	14	.2917	.333	.125		
PSW48S-15	PSW48B-15	15	.3125	.353	.250		
PSW48S-16	PSW48B-16	16	.3333	.375	.250		
PSW48S-18	PSW48B-18	18	.3750	.417	.250		

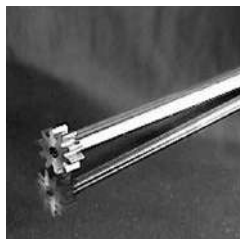
PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	303 STAINLESS STEEL	10	20°



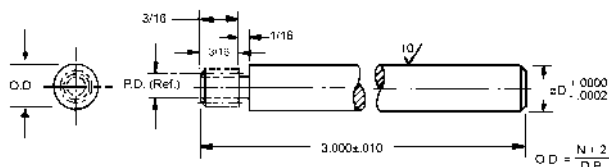
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS48S3-12H	48	12	.2500	.1872
PS48S4-12H		12	.2500	.2497
PS48S4-14H		14	.2917	.2497
PS48S4-16H		16	.3333	.2497
PS48S4-18H		18	.3750	.2497
PS48S4-20H		20	.4166	.2497
PS48S4-24H		24	.5000	.2497

Other numbers of teeth available on request.



B

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	303 STAINLESS STEEL	10	20°

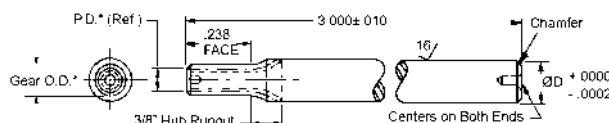


STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS48S4-10	48	10	.2083	.2497

Other numbers of teeth available on request.



PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
48	303 STAINLESS STEEL	10	20°



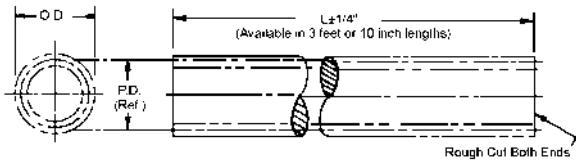
STOCK NO.	PITCH	NO. OF TEETH	D	ENLARGED	
				PITCH DIAMETER	OUTSIDE DIA.
B-PS48S5-10	48	10	.3122	.2256	.267
B-PS48S5-11		11		.2440	.285
B-PS48S5-12		12		.2624	.304

Other numbers of teeth available on request.



SPUR GEAR STOCKS

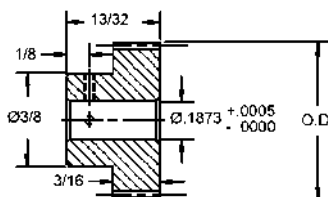
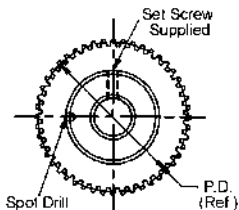
PITCH	TYPE	MATERIAL	PRESSURE ANGLE
48	PINION WIRE	BRASS AND COLD ROLLED STEEL	20°



BRASS ALLOY 360		COLD ROLLED STEEL 12L14 or 12L15 WITH SELENIUM		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3FT. LONG STOCK NO.	10 IN. LONG STOCK NO.	3FT. LONG STOCK NO.	10 IN. LONG STOCK NO.			
PW48B-8	PW48B-8A	PW48S-8	PW48S-8A	8	.1666	.208
PW48B-9	PW48B-9A	PW48S-9	PW48S-9A	9	.1875	.229
PW48B-10	PW48B-10A	PW48S-10	PW48S-10A	10	.2083	.250
PW48B-11	PW48B-11A	PW48S-11	PW48S-11A	11	.2291	.270
PW48B-12	PW48B-12A	PW48S-12	PW48S-12A	12	.2500	.291
PW48B-14	PW48B-14A	PW48S-14	PW48S-14A	14	.2916	.333
PW48B-15	PW48B-15A	PW48S-15	PW48S-15A	15	.3125	.354
PW48B-16	PW48B-16A	PW48S-16	PW48S-16A	16	.3333	.375
PW48B-18X	PW48B-18A	PW48S-18X	PW48S-18A	18	.3750	.416
PW48B-20	PW48B-20A	PW48S-20	PW48S-20A	20	.4166	.458
PW48B-22	PW48B-22A	PW48S-22	PW48S-22A	22	.4583	.500
PW48B-24	PW48B-24A	PW48S-24	PW48S-24A	24	.5000	.541
PW48B-30	PW48B-30A	PW48S-30	PW48S-30A	30	.6250	.666
PW48B-32	PW48B-32A	PW48S-32	PW48S-32A	32	.6666	.708
PW48B-36	PW48B-36A	-	-	36	.7500	.791
PW48B-40	PW48B-40A	-	-	40	.8333	.875

SPUR GEARS

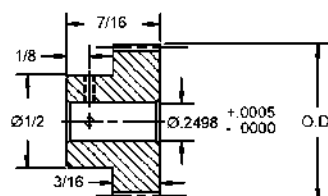
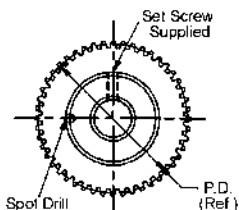
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/20	PIN HUB	3/16"	3/16"	303 STAINLESS STEEL	10	20°



Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P62S21-40	40	.6366	.668
P62S21-50	50	.7957	.827
P62S21-60	60	.9549	.986
P62S21-70	70	1.1140	1.145
P62S21-80	80	1.2732	1.305
P62S21-90	90	1.4323	1.464
P62S21-100	100	1.5915	1.623

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/20	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL	10	20°



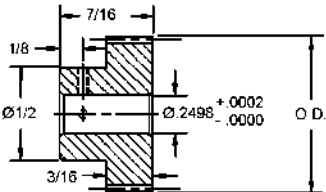
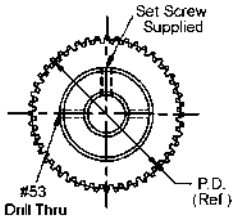
Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P62S28-40	40	.6366	.668
P62S28-50	50	.7957	.827
P62S28-60	60	.9549	.986
P62S28-70	70	1.1140	1.145
P62S28-80	80	1.2732	1.305
P62S28-90	90	1.4323	1.464
P62S28-100	100	1.5915	1.623

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

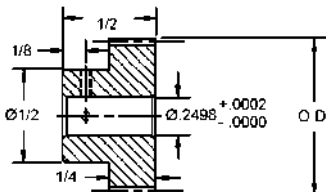
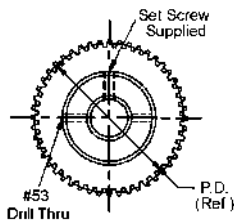
SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/20	PIN HUB	1/4"	3/16"	17-4 PH STAINLESS STEEL HARDENED RC 28-35	10	20°



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P62PH28-40	40	.6366	.668
P62PH28-50	50	.7958	.828
P62PH28-60	60	.9549	.987
P62PH28-70	70	1.1141	1.146
P62PH28-80	80	1.2732	1.305

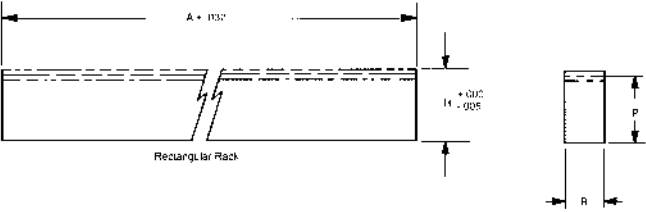
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/20	PIN HUB	1/4"	1/4"	17-4 PH STAINLESS STEEL HARDENED RC 28-35	10	20°



STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P62PH41-40-Q10	40	.6366	.668
P62PH41-80-Q10	80	1.2732	1.305

GEAR RACKS

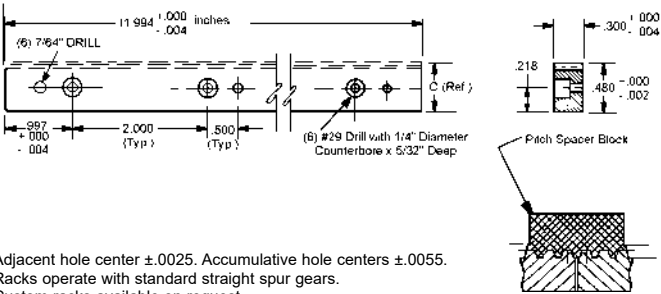
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/20	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-13	RECTANGULAR	1/20	.4641	.230 ± .005	11	.480	10

Available on request: 14 - 1/2° pressure angle, special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
1/20	RECTANGULAR	416 SERIES STAINLESS STEEL RC26-36	10	20°



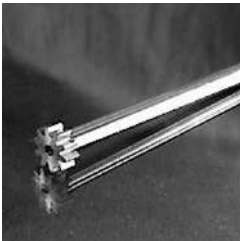
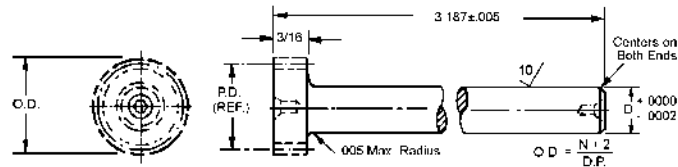
Adjacent hole center $\pm .0025$. Accumulative hole centers $\pm .0055$.
Racks operate with standard straight spur gears.
Custom racks available on request.

WITHOUT SPACER BLOCK STOCK NO.	WITH SPACER BLOCK STOCK NO.	AGMA QUALITY NO.	TOTAL COMPOSITE ERROR	TOTAL TOOTH ERROR	PITCH PLANE PARALLELISM TO BASE SURFACE	LINEAR PITCH	C REF
R8-3-G1	R8-3-G1-SB	Q10*	.0014	.0005	.0015	1/20	.4639

* Higher quality on request.

PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
1/20	303 STAINLESS STEEL	10	20°

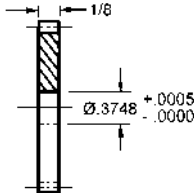
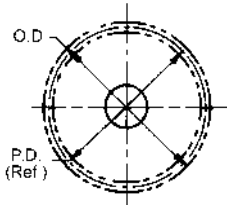


STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS62S4-20H	1/20	20	.3183	.2497

Other numbers of teeth available on request.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	HUBLESS	3/8"	1/8"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



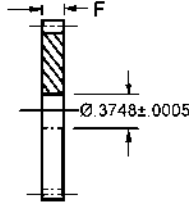
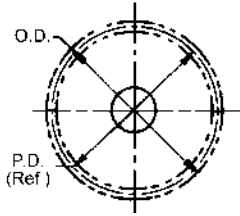
Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2" Pressure Angle

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F64S3-38	F64A3-38	38	.5937	.625
F64S3-40	F64A3-40	40	.6250	.656
F64S3-48	F64A3-48	48	.7500	.781
F64S3-50	F64A3-50	50	.7812	.812
F64S3-64	F64A3-64	64	1.0000	1.031
F64S3-66	F64A3-66	66	1.0312	1.062
F64S3-70	F64A3-70	70	1.0937	1.125
F64S3-72	F64A3-72	72	1.1250	1.156
F64S3-75	F64A3-75	75	1.1718	1.203
F64S3-80	F64A3-80	80	1.2500	1.281
F64S3-84	F64A3-84	84	1.3125	1.343
F64S3-90	F64A3-90	90	1.4062	1.437
F64S3-96	F64A3-96	96	1.5000	1.531
F64S3-100	F64A3-100	100	1.5625	1.593
F64S3-110	F64A3-110	110	1.7187	1.750
F64S3-120	F64A3-120	120	1.8750	1.906
F64S3-128	F64A3-128	128	2.0000	2.031
F64S3-130	F64A3-130	130	2.0312	2.062
F64S3-140	F64A3-140	140	2.1875	2.218
F64S3-144	F64A3-144	144	2.2500	2.281
F64S3-150	F64A3-150	150	2.3437	2.375
F64S3-155	F64A3-155	155	2.4218	2.453
F64S3-160	F64A3-160	160	2.5000	2.531
F64S3-165	F64A3-165	165	2.5781	2.609
F64S3-170	F64A3-170	170	2.6562	2.687
F64S3-176	F64A3-176	176	2.7500	2.781
F64S3-180	F64A3-180	180	2.8125	2.843
F64S3-190	F64A3-190	190	2.9687	3.000
F64S3-192	F64A3-192	192	3.0000	3.031
F64S3-224	F64A3-224	224	3.5000	3.531
F64S3-256	F64A3-256	256	4.0000	4.031
F64S3-264	F64A3-264	264	4.1250	4.156

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

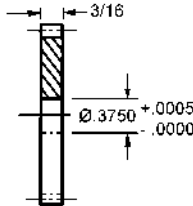
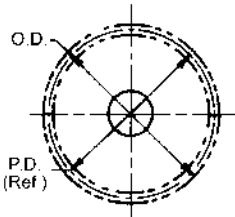
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	HUBLESS	3/8"	1/8" & 1/4"	POLYURETHANE	10	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	F
F64U3-64	64	1.0000	1.031	.125
F64U3-80	80	1.2500	1.281	.125
F64U3-96	96	1.5000	1.531	.125
F64U3-112	112	1.7500	1.781	.125
F64U3-128	128	2.0000	2.031	.125
F64U3-144	144	2.2500	2.281	.125
F64U6-160	160	2.5000	2.531	.250
F64U6-192	192	3.0000	3.031	.250
F64U6-224	224	3.5000	3.531	.250
F64U6-256	256	4.0000	4.031	.250

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	HUBLESS	3/8"	3/16"	DELRIN	10	20°



Available on request:
Other numbers of teeth
14 - 1/2° Pressure Angle

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F64D5-36	36	.5625	.593
F64D5-37	37	.5781	.609
F64D5-38	38	.5937	.625
F64D5-40	40	.6250	.656
F64D5-42	42	.6562	.687
F64D5-44	44	.6875	.718
F64D5-46	46	.7187	.750
F64D5-48	48	.7500	.781
F64D5-50	50	.7812	.812
F64D5-56	56	.8750	.906
F64D5-60	60	.9375	.968
F64D5-64	64	1.0000	1.031
F64D5-72	72	1.1250	1.156
F64D5-74	74	1.1562	1.187
F64D5-80	80	1.2500	1.281
F64D5-84	84	1.3125	1.343
F64D5-88	88	1.3750	1.406
F64D5-90	90	1.4062	1.437
F64D5-96	96	1.5000	1.531
F64D5-100	100	1.5625	1.593
F64D5-112	112	1.7500	1.781
F64D5-120	120	1.8750	1.906
F64D5-127	127	1.9843	2.015
F64D5-128	128	2.0000	2.031
F64D5-144	144	2.2500	2.281
F64D5-152	152	2.3750	2.406
F64D5-160	160	2.5000	2.531
F64D5-168	168	2.6250	2.656
F64D5-176	176	2.7500	2.781
F64D5-184	184	2.8750	2.906
F64D5-192	192	3.0000	3.031
F64D5-224	224	3.5000	3.531

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	X	1/4"	303 STAINLESS STEEL	10	20°

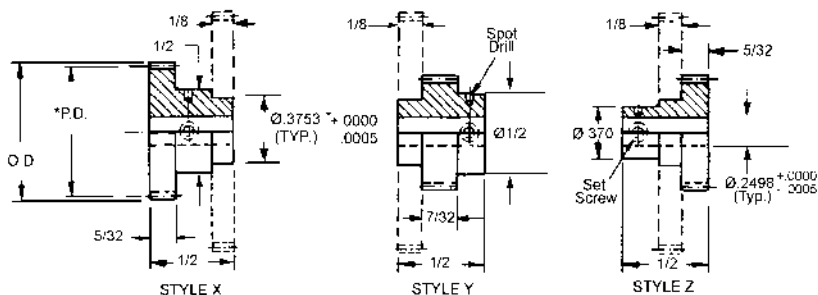
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP64S14-27	64	27	.4218	.453
DP64S14-28		28	.4375	.469
DP64S14-30		30	.4687	.500
DP64S14-32		32	.5000	.531
DP64S14-34		34	.5312	.563
DP64S14-36		36	.5625	.594
DP64S14-40		40	.6250	.656
DP64S14-50		50	.7812	.812

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	Y	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP64S16-27	64	27	.4218	.453
DP64S16-28		28	.4375	.469
DP64S16-30		30	.4687	.500
DP64S16-32		32	.5000	.531
DP64S16-34		34	.5312	.563
DP64S16-36		36	.5625	.594
DP64S16-40		40	.6250	.656
DP64S16-50		50	.7812	.812

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	Z	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP64S18-27	64	27	.4218	.453
DP64S18-28		28	.4375	.469
DP64S18-30		30	.4687	.500
DP64S18-32		32	.5000	.531
DP64S18-34		34	.5312	.563
DP64S18-36		36	.5625	.594
DP64S18-40		40	.6250	.656
DP64S18-50		50	.7812	.812



*Concentric within .0003
Order hubless gear separately.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	X	3/16"	303 STAINLESS STEEL	10	20°

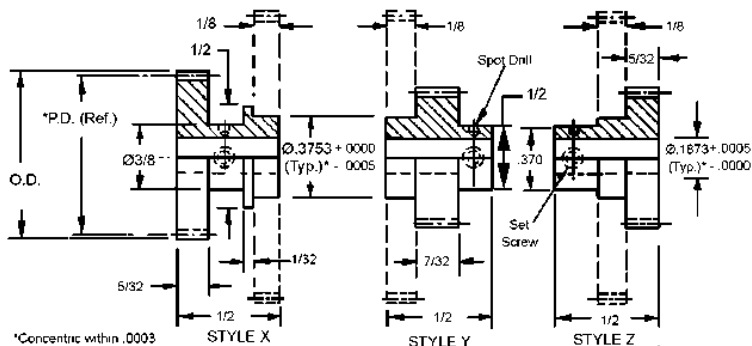
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP64S8-25	64	25	.3906	.422
DP64S8-26		26	.4062	.438
DP64S8-28		28	.4375	.469
DP64S8-30		30	.4687	.500
DP64S8-31		31	.4843	.516
DP64S8-32		32	.4531	.531
DP64S8-40		40	.6250	.656

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	Y	3/16"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
•DP64S10-25	64	25	.3906	.422
•DP64S10-26		26	.4062	.438
DP64S10-28		28	.4375	.469
DP64S10-30		30	.4687	.500
DP64S10-31		31	.4843	.516
DP64S10-32		32	.4531	.531
DP64S10-40		40	.6250	.656

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	Z	3/16"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
•DP64S12-25	64	25	.3906	.422
•DP64S12-26		26	.4062	.438
DP64S12-28		28	.4375	.469
DP64S12-30		30	.4687	.500
DP64S12-31		31	.4843	.516
DP64S12-32		32	.4531	.531
DP64S12-40		40	.6250	.656

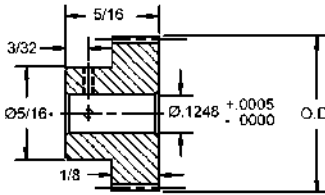
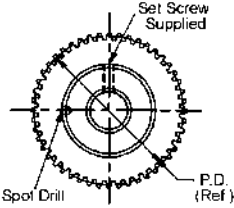


• Hub runout cuts thru shoulder.

Available on request: Other numbers of teeth; AGMA quality 12 and 14; 14-1/2° Pressure Angle.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



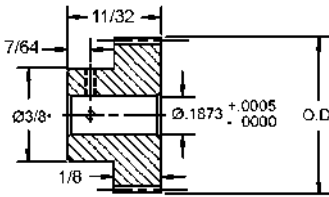
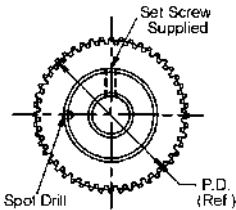
• For 18-23 teeth hub diameter equals .23
Available on request, other numbers of
teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64S10-18	P64A10-18	18•	.2812	.312
P64S10-19	P64A10-19	19•	.2968	.328
P64S10-20	P64A10-20	20•	.3125	.343
P64S10-21	P64A10-21	21•	.3281	.359
P64S10-22	P64A10-22	22•	.3437	.375
P64S10-23	P64A10-23	23•	.3593	.390
P64S10-24	P64A10-24	24	.3750	.406
P64S10-25	P64A10-25	25	.3906	.421
P64S10-26	P64A10-26	26	.4062	.437
P64S10-27	P64A10-27	27	.4218	.453
P64S10-28	P64A10-28	28	.4375	.468
P64S10-29	P64A10-29	29	.4531	.484
P64S10-30	P64A10-30	30	.4687	.500
P64S10-32	P64A10-32	32	.5000	.531
P64S10-34	P64A10-34	34	.5312	.562
P64S10-36	P64A10-36	36	.5625	.593
P64S10-38	P64A10-38	38	.5937	.625
P64S10-40	P64A10-40	40	.6250	.656
P64S10-42	P64A10-42	42	.6562	.687
P64S10-44	P64A10-44	44	.6875	.718
P64S10-46	P64A10-46	46	.7187	.750
P64S10-48	P64A10-48	48	.7500	.781
P64S10-50	P64A10-50	50	.7812	.812
P64S10-55	P64A10-55	55	.8593	.890
P64S10-56	P64A10-56	56	.8750	.906
P64S10-60	P64A10-60	60	.9375	.968
P64S10-64	P64A10-64	64	1.0000	1.031
P64S10-65	P64A10-65	65	1.0156	1.046
P64S10-70	P64A10-70	70	1.0937	1.125
P64S10-72	P64A10-72	72	1.1250	1.156
P64S10-75	P64A10-75	75	1.1718	1.203
P64S10-80	P64A10-80	80	1.2500	1.281
P64S10-84	P64A10-84	84	1.3125	1.343
P64S10-85	P64A10-85	85	1.3281	1.359
P64S10-88	P64A10-88	88	1.3750	1.406
P64S10-90	P64A10-90	90	1.4062	1.437
P64S10-92	P64A10-92	92	1.4375	1.468
P64S10-95	P64A10-95	95	1.4843	1.515
P64S10-96	P64A10-96	96	1.5000	1.531
P64S10-104	P64A10-104	104	1.6250	1.656
P64S10-105	P64A10-105	105	1.6406	1.671
P64S10-112	P64A10-112	112	1.7500	1.781
P64S10-120	P64A10-120	120	1.8750	1.906
P64S10-121	P64A10-121	121	1.8906	1.921
P64S10-127	P64A10-127	127	1.9843	2.015
P64S10-128	P64A10-128	128	2.0000	2.031
P64S10-136	P64A10-136	136	2.1250	2.156

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



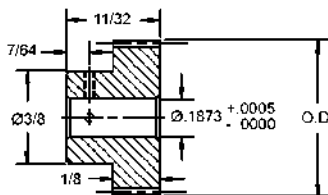
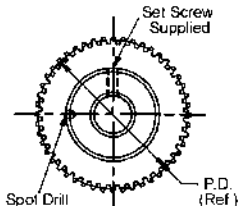
- For 25-26 teeth hub diameter equals .34
Available on request, other numbers of
teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64S19-25	P64A19-25	25	.3906	.421
P64S19-26	P64A19-26	26	.4062	.437
P64S19-28	P64A19-28	28	.4375	.468
P64S19-29	P64A19-29	29	.4531	.484
P64S19-30	P64A19-30	30	.4687	.500
P64S19-31	P64A19-31	31	.4843	.515
P64S19-32	P64A19-32	32	.5000	.531
P64S19-34	P64A19-34	34	.5312	.562
P64S19-35	P64A19-35	35	.5468	.578
P64S19-36	P64A19-36	36	.5625	.593
P64S19-38	P64A19-38	38	.5937	.625
P64S19-40	P64A19-40	40	.6250	.656
P64S19-42	P64A19-42	42	.6562	.687
P64S19-44	P64A19-44	44	.6875	.718
P64S19-45	P64A19-45	45	.7031	.734
P64S19-46	P64A19-46	46	.7187	.750
P64S19-48	P64A19-48	48	.7500	.781
P64S19-50	P64A19-50	50	.7812	.812
P64S19-55	P64A19-55	55	.8593	.890
P64S19-56	P64A19-56	56	.8750	.906
P64S19-60	P64A19-60	60	.9375	.968
P64S19-64	P64A19-64	64	1.0000	1.031
P64S19-65	P64A19-65	65	1.0156	1.046
P64S19-70	P64A19-70	70	1.0937	1.125
P64S19-72	P64A19-72	72	1.1250	1.156
P64S19-75	P64A19-75	75	1.1718	1.203
P64S19-80	P64A19-80	80	1.2500	1.281
P64S19-84	P64A19-84	84	1.3125	1.343
P64S19-85	P64A19-85	85	1.3281	1.359
P64S19-88	P64A19-88	88	1.3750	1.406

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



- For 25-26 teeth hub diameter equals .34

Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

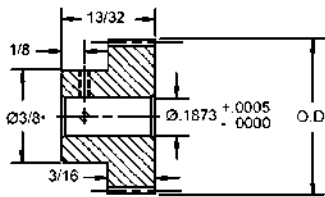
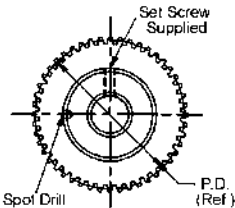
X in part number indicates part may be supplied as two piece construction (some dimensions may vary).

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64S19-90	P64A19-90	90	1.0462	1.437
P64S19-92	P64A19-92	92	1.4375	1.468
P64S19-95	P64A19-95	95	1.4843	1.515
P64S19-96	P64A19-96	96	1.5000	1.531
P64S19-100	P64A19-100	100	1.5625	1.593
P64S19-105	P64A19-105	105	1.6406	1.671
P64S19-110	P64A19-110	110	1.7187	1.750
P64S19-115	P64A19-115	115	1.7968	1.828
P64S19-120	P64A19-120	120	1.8750	1.906
P64S19-122	P64A19-122	122	1.9062	1.937
P64S19-124	P64A19-124	124	1.9375	1.968
P64S19-127	P64A19-127	127	1.9843	2.015
P64S19-128	P64A19-128	128	2.0000	2.031
P64S19-130	P64A19-130	130	2.0312	2.062
P64S19-136	P64A19-136	136	2.1250	2.156
P64S19-140	P64A19-140	140	2.1875	2.218
P64S19-144	P64A19-144	144	2.2500	2.281
P64S19-150	P64A19-150	150	2.3437	2.375
P64S19-152	P64A19-152	152	2.3750	2.406
P64S19-156	P64A19-156	156	2.4375	2.468
P64S19-160	P64A19-160	160	2.5000	2.531
P64S19-164	P64A19-164	164	2.5625	2.593
P64S19-168	P64A19-168	168	2.6250	2.656
P64S19-170	P64A19-170	170	2.6562	2.687
P64S19-176	P64A19-176	176	2.7500	2.781
P64S19-180	P64A19-180	180	2.8125	2.843
P64S19-184	P64A19-184	184	2.8750	2.906
P64S19-190	P64A19-190	190	2.9687	3.000
P64S19-192	P64A19-192	192	3.0000	3.031
P64S19-200	P64A19-200	200	3.1250	3.156
P64S19X-224	P64A19X-224	224	3.5000	3.531
P64S19X-256	P64A19X-256	256	4.0000	4.031

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	3/16"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



- For 25-26 teeth hub diameter equals .34

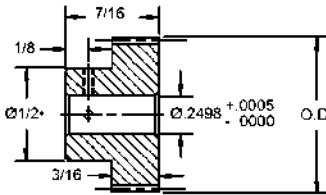
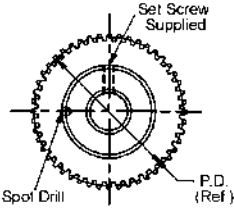
Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64S21-25	P64A21-25	25	.3906	.421
P64S21-26	P64A21-26	26	.4062	.437
P64S21-28	P64A21-28	28	.4375	.468
P64S21-30	P64A21-30	30	.4687	.500
P64S21-32	P64A21-32	32	.5000	.531
P64S21-36	P64A21-36	36	.5625	.593
P64S21-40	P64A21-40	40	.6250	.656
P64S21-44	P64A21-44	44	.6875	.718
P64S21-46	P64A21-46	46	.7187	.750
P64S21-48	P64A21-48	48	.7500	.781
P64S21-50	P64A21-50	50	.7812	.812
P64S21-56	P64A21-56	56	.8750	.906
P64S21-60	P64A21-60	60	.9375	.968
P64S21-64	P64A21-64	64	1.0000	1.031
P64S21-70	P64A21-70	70	1.0937	1.125
P64S21-75	P64A21-75	75	1.1718	1.203
P64S21-80	P64A21-80	80	1.2500	1.281
P64S21-88	P64A21-88	88	1.3750	1.406
P64S21-90	P64A21-90	90	1.4062	1.437
P64S21-96	P64A21-96	96	1.5000	1.531
P64S21-100	P64A21-100	100	1.5625	1.593
P64S21-110	P64A21-110	110	1.7187	1.750
P64S21-112	P64A21-112	112	1.7500	1.781
P64S21-120	P64A21-120	120	1.8750	1.906
P64S21-128	P64A21-128	128	2.0000	2.031
P64S21-136	P64A21-136	136	2.1250	2.156
P64S21-144	P64A21-144	144	2.2500	2.281
P64S21-152	P64A21-152	152	2.3750	2.406
P64S21-160	P64A21-160	160	2.5000	2.531
P64S21-176	P64A21-176	176	2.7500	2.781
P64S21-192	P64A21-192	192	3.0000	3.031
P64S21-200	P64A21-200	200	3.1250	3.156
P64S21-208	P64A21-208	208	3.2500	3.281
P64S21-224	P64A21-224	224	3.5000	3.531
P64S21-240	P64A21-240	240	3.7500	3.781
P64S21-256	P64A21-256	256	4.0000	4.031

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



B

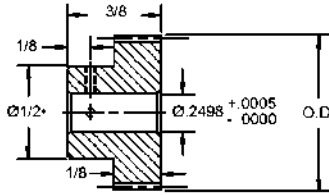
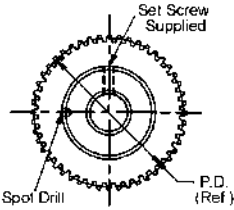
• For 31-34 teeth hub diameter equals .44
Available on request, other numbers of
teeth, AGMA quality 12 and 14, and 14-1/2°
Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64S28-32	P64A28-32	32•	.5000	.531
P64S28-34	P64A28-34	34•	.5312	.562
P64S28-36	P64A28-36	36	.5625	.593
P64S28-38	P64A28-38	38	.5937	.625
P64S28-40	P64A28-40	40	.6250	.656
P64S28-42	P64A28-42	42	.6562	.687
P64S28-48	P64A28-48	48	.7500	.781
P64S28-50	P64A28-50	50	.7812	.812
P64S28-56	P64A28-56	56	.8750	.906
P64S28-60	P64A28-60	60	.9375	.968
P64S28-64	P64A28-64	64	1.0000	1.031
P64S28-70	P64A28-70	70	1.0937	1.125
P64S28-72	P64A28-72	72	1.1250	1.156
P64S28-75	P64A28-75	75	1.1718	1.203
P64S28-80	P64A28-80	80	1.2500	1.281
P64S28-84	P64A28-84	84	1.3125	1.343
P64S28-88	P64A28-88	88	1.3750	1.406
P64S28-90	P64A28-90	90	1.4062	1.437
P64S28-96	P64A28-96	96	1.5000	1.531
P64S28-104	P64A28-104	104	1.6250	1.656
P64S28-112	P64A28-112	112	1.7500	1.781
P64S28-120	P64A28-120	120	1.8750	1.906
P64S28-128	P64A28-128	128	2.0000	2.031
P64S28-130	P64A28-130	130	2.0312	2.062
P64S28-144	P64A28-144	144	2.2500	2.281
P64S28-160	P64A28-160	160	2.5000	2.531
P64S28-176	P64A28-176	176	2.7500	2.781
P64S28-192	P64A28-192	192	3.0000	3.031
P64S28-208	P64A28-208	208	3.2500	3.281
P64S28-224	P64A28-224	224	3.5000	3.531
P64S28-240	P64A28-240	240	3.7500	3.781
P64S28-256	P64A28-256	256	4.0000	4.031
P64S28-264	P64A28-264	264	4.1250	4.156

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



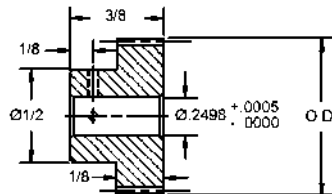
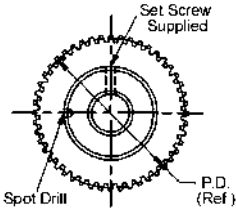
- For 31-34 teeth hub diameter equals .44
- Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64S26-32	P64A26-32	32•	.5000	.531
P64S26-34	P64A26-34	34•	.5312	.562
P64S26-35	P64A26-35	35	.5468	.578
P64S26-36	P64A26-36	36	.5625	.593
P64S26-40	P64A26-40	40	.6250	.656
P64S26-42	P64A26-42	42	.6562	.687
P64S26-44	P64A26-44	44	.6875	.718
P64S26-45	P64A26-45	45	.7031	.734
P64S26-46	P64A26-46	46	.7187	.750
P64S26-48	P64A26-48	48	.7500	.781
P64S26-50	P64A26-50	50	.7812	.812
P64S26-54	P64A26-54	54	.8437	.875
P64S26-55	P64A26-55	55	.8593	.890
P64S26-56	P64A26-56	56	.8750	.906
P64S26-60	P64A26-60	60	.9375	.968
P64S26-64	P64A26-64	64	1.0000	1.031
P64S26-70	P64A26-70	70	1.0937	1.125
P64S26-72	P64A26-72	72	1.1250	1.156
P64S26-75	P64A26-75	75	1.1718	1.203
P64S26-80	P64A26-80	80	1.2500	1.281
P64S26-84	P64A26-84	84	1.3125	1.343
P64S26-85	P64A26-85	85	1.3281	1.359
P64S26-86	P64A26-86	86	1.3437	1.375
P64S26-90	P64A26-90	90	1.4062	1.437
P64S26-95	P64A26-95	95	1.4843	1.515

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



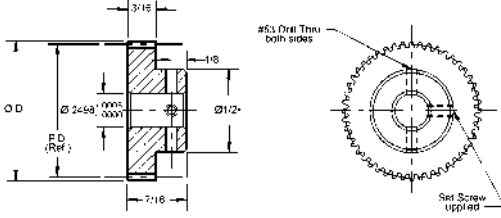
Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64S26-100	P64A26-100	100	1.5625	1.593
P64S26-105	P64A26-105	105	1.6406	1.671
P64S26-110	P64A26-110	110	1.7187	1.750
P64S26-112	P64A26-112	112	1.7500	1.781
P64S26-120	P64A26-120	120	1.8750	1.906
P64S26-124	P64A26-124	124	1.9375	1.968
P64S26-128	P64A26-128	128	2.0000	2.031
P64S26-130	P64A26-130	130	2.0312	2.062
P64S26-140	P64A26-140	140	2.1875	2.218
P64S26-144	P64A26-144	144	2.2500	2.281
P64S26-150	P64A26-150	150	2.3437	2.375
P64S26-160	P64A26-160	160	2.5000	2.531
P64S26-168	P64A26-168	168	2.6250	2.656
P64S26-170	P64A26-170	170	2.6562	2.687
P64S26-176	P64A26-176	176	2.7500	2.781
P64S26-180	P64A26-180	180	2.8125	2.843
P64S26-184	P64A26-184	184	2.8750	2.906
P64S26-190	P64A26-190	190	2.9687	3.000
P64S26-192	P64A26-192	192	3.0000	3.031
P64S26-200	P64A26-200	200	3.1250	3.156
P64S26-208	P64A26-208	208	3.2500	3.281
P64S26-216	P64A26-216	216	3.3750	3.406
P64S26-224	P64A26-224	224	3.5000	3.531
P64S26-232	P64A26-232	232	3.6250	3.656
P64S26-240	P64A26-240	240	3.7500	3.781
P64S26-248	P64A26-248	248	3.8750	3.906
P64S26-256	P64A26-256	256	4.0000	4.031
P64S26-264	P64A26-264	264	4.1250	4.156

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

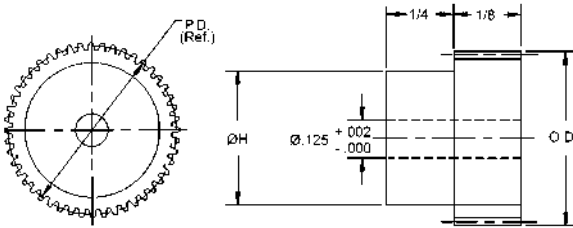
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	1/4"	3/16"	17-4 STAINLESS STEEL RC 28 - 35	10	20°



- For 32-34 teeth hub diameter equals .45.
- Available on request, other numbers of teeth, quality 12 and 14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64PH28-32	32•	.5000	.531
P64PH28-34	34•	.5312	.563
P64PH28-36	36	.5625	.594
P64PH28-38	38	.5937	.625
P64PH28-40	40	.6250	.656
P64PH28-42	42	.6562	.687
P64PH28-44	44	.6875	.719
P64PH28-48	48	.7500	.781
P64PH28-50	50	.7812	.813
P64PH28-56	56	.8750	.906
P64PH28-64	60	1.0000	1.031
P64PH28-72	72	1.1250	1.156

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	1/8"	1/8"	COLD ROLLED STEEL C12L14 OR C12L15 WITH SELENIUM OR BRASS ALLOY 360	4	20°

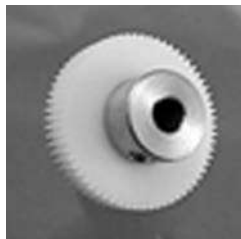
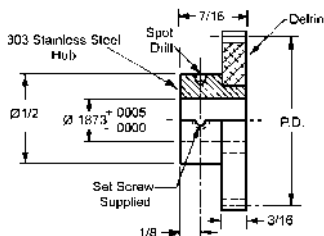


COLD ROLLED STEEL C12L14 OR C12L15 WITH SELENIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	H
PX64S-15	PX64B-15	15	.234	.265	.187
PX64S-16	PX64B-16	16	.250	.281	.203
PX64S-18	PX64B-18	18	.281	.312	.234
-	PX64B-24	24	.375	.406	.328
-	PX64B-40	40	.625	.656	.578
-	PX64B-48	48	.750	.781	.703

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	3/16"	3/16"	DELTRIN WITH STAINLESS STEEL HUB	10	20°



Available on request, other numbers of teeth,
14-1/2° Pressure Angle.

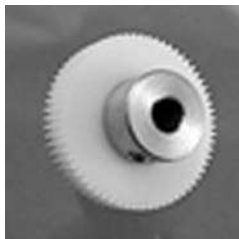
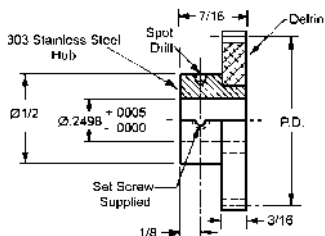
STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64D21X-36	36	.5625	.593
P64D21X-37	37	.5781	.609
P64D21X-38	38	.5937	.625
P64D21X-40	40	.6250	.656
P64D21X-42	42	.6562	.687
P64D21X-44	44	.6875	.718
P64D21X-46	46	.7187	.750
P64D21X-48	48	.7500	.781
P64D21X-50	50	.7812	.812
P64D21X-56	56	.8750	.906
P64D21X-60	60	.9375	.968
P64D21X-64	64	1.0000	1.031
P64D21X-72	72	1.1250	1.156
P64D21X-74	74	1.1562	1.187
P64D21X-80	80	1.2500	1.281
P64D21X-84	84	1.3125	1.343
P64D21X-88	88	1.3750	1.406
P64D21X-90	90	1.4062	1.437
P64D21X-96	96	1.5000	1.531
P64D21X-100	100	1.5625	1.593
P64D21X-112	112	1.7500	1.781
P64D21X-120	120	1.8750	1.906
P64D21X-127	127	1.9843	2.015
P64D21X-128	128	2.0000	2.031
P64D21X-144	144	2.2500	2.281
P64D21X-152	152	2.3750	2.406
P64D21X-160	160	2.5000	2.531
P64D21X-168	168	2.6250	2.656
P64D21X-176	176	2.7500	2.781
P64D21X-184	184	2.8750	2.906
P64D21X-192	192	3.0000	3.031
P64D21X-224	224	3.5000	3.531

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PIN HUB	1/4"	3/16"	DELTRIN WITH STAINLESS STEEL HUB	10	20°



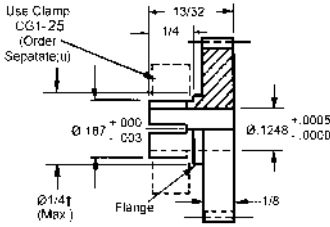
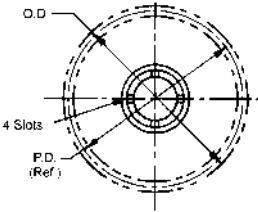
Available on request, other numbers of teeth,
14-1/2° Pressure Angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P64D28X-36	36	.5625	.593
P64D28X-37	37	.5781	.609
P64D28X-38	38	.5937	.625
P64D28X-40	40	.6250	.656
P64D28X-42	42	.6562	.687
P64D28X-44	44	.6875	.718
P64D28X-46	46	.7187	.750
P64D28X-48	48	.7500	.781
P64D28X-50	50	.7812	.812
P64D28X-56	56	.8750	.906
P64D28X-60	60	.9375	.968
P64D28X-64	64	1.0000	1.031
P64D28X-72	72	1.1250	1.156
P64D28X-74	74	1.1562	1.187
P64D28X-80	80	1.2500	1.281
P64D28X-84	84	1.3125	1.343
P64D28X-88	88	1.3750	1.406
P64D28X-90	90	1.4062	1.437
P64D28X-96	96	1.5000	1.531
P64D28X-100	100	1.5625	1.593
P64D28X-112	112	1.7500	1.781
P64D28X-120	120	1.8750	1.906
P64D28X-127	127	1.9843	2.015
P64D28X-128	128	2.0000	2.031
P64D28X-144	144	2.2500	2.281
P64D28X-152	152	2.3750	2.406
P64D28X-160	160	2.5000	2.531
P64D28X-168	168	2.6250	2.656
P64D28X-176	176	2.7500	2.781
P64D28X-184	184	2.8750	2.906
P64D28X-192	192	3.0000	3.031
P64D28X-224	224	3.5000	3.531

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

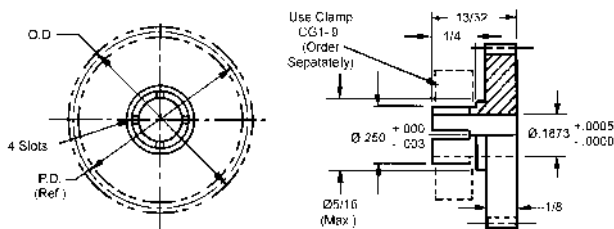
SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	CLAMP HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	CLAMP HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

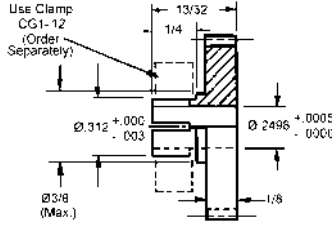
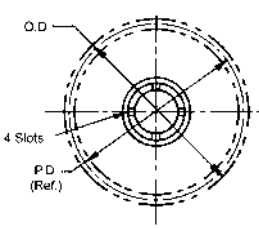
X in part number indicates part may be supplied in two piece construction with stainless steel hub (some dimensions may vary).

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
	STOCK NO.			
C64S14-24	C64A14-24	24	.3750	.406
C64S14-25	C64A14-25	25	.3906	.421
C64S14-28	C64A14-28	28	.4375	.468
C64S14-30	C64A14-30	30	.4687	.500
C64S14-32	C64A14-32	32	.5000	.531
C64S14-40	C64A14-40	40	.6250	.656
C64S14-42	C64A14-42	42	.6562	.687
C64S14-44	C64A14-44	44	.6875	.718
C64S14-46	C64A14-46	46	.7187	.750
C64S14-48	C64A14-48	48	.7500	.781
C64S14-50	C64A14-50	50	.7812	.812
C64S14-52	C64A14-52	52	.8125	.843
C64S14-56	C64A14-56	56	.8750	.906
C64S14-60	C64A14-60	60	.9375	.968
C64S14-64	C64A14-64	64	1.0000	1.031
C64S14-72	C64A14-72	72	1.1250	1.156
C64S14-76	C64A14-76	76	1.1875	1.218
C64S14-80	C64A14-80	80	1.2500	1.281
C64S14-84	C64A14-84	84	1.3125	1.343
C64S14-85	C64A14-85	85	1.3281	1.359
C64S14-88	C64A14-88	88	1.3750	1.406
C94S14-90	C64A14-90	90	1.4062	1.437
C64S14-96	C64A14-96	96	1.5000	1.531
C64S14-100	C64A14-100	100	1.5625	1.593
C64S14-104	C64A14-104	104	1.6250	1.656
C64S14-112	C64A14-112	112	1.7500	1.781
C64S14-120	C64A14-120	120	1.8750	1.906
C64S14-128	C64A14-128	128	2.0000	2.031
C64S14-130	C64A14-130	130	2.0312	2.062
C64S14-144	C64A14-144	144	2.2500	2.281
C64S14-152	C64A14-152	152	2.3750	2.406
C64S15X-160	C64A15X-160	160	2.5000	2.531
C64S15X-176	C64A15X-176	176	2.7500	2.781
C64S15X-180	C64A15X-180	180	2.8125	2.843
C64S15X-192	C64A15X-192	192	3.0000	3.031
C64S15X-224	C64A15X-224	224	3.5000	3.531
C64S15X-256	C64A15X-256	256	4.0000	4.031

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	CLAMP HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



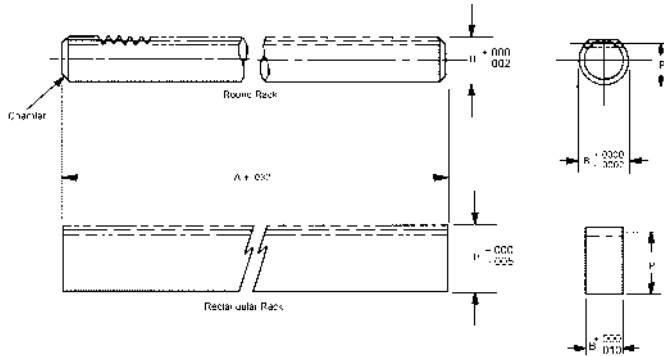
Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C64S18-30	C64A18-30	30	.4687	.500
C64S18-32	C64A18-32	32	.5000	.531
C64S18-35	C64A18-35	35	.5468	.578
C64S18-36	C64A 8-36	36	.5625	.593
C64S18-40	C64A18-40	40	.6250	.656
C64S18-45	C64A18-45	45	.7031	.734
C64S18-48	C64A18-48	48	.7500	.781
C64S18-50	C64A18-50	50	.7812	.812
C64S18-60	C64A18-60	60	.9375	.968
C64S18-64	C64A18-64	64	1.0000	1.031
C64S18-70	C64A18-70	70	1.0937	1.125
C64S18-72	C64A18-72	72	1.1250	1.156
C64S18-75	C64A18-75	75	1.1718	1.203
C64S18-80	C64A18-80	80	1.2500	1.281
C64S18-84	C64A18-84	84	1.3125	1.343
C64S18-88	C64A18-88	88	1.3750	1.406
C64S18-90	C64A18-90	90	1.4062	1.437
C64S18-96	C64A18-96	96	1.5000	1.531
C64S18-112	C64A18-112	112	1.7500	1.781
C64S18-120	C64A18-120	120	1.8750	1.906
C64S18-125	C64A18-125	125	1.9531	1.984
C64S18-128	C64A18-128	128	2.0000	2.031
C64S18-130	C64A18-130	130	2.0312	2.062
C64S18-140	C64A18-140	140	2.1875	2.218
C64S18-144	C64A18-144	144	2.2500	2.281
C64S18-160	C64A18-160	160	2.5000	2.531
C64S18-176	C64A18-176	176	2.7500	2.781
C64S18-180	C64A18-180	180	2.8125	2.843
C64S18-192	C64A18-192	192	3.0000	3.031
C64S18-224	C64A18-224	224	3.5000	3.531
C64S18-256	C64A18-256	256	4.0000	4.031

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

GEAR RACKS

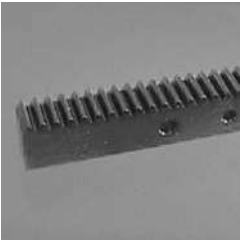
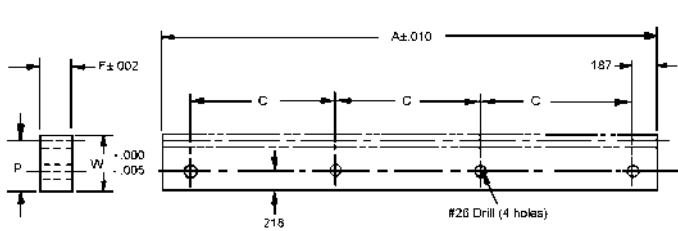
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-18	ROUND	64	.2044	.2497	11	.220	10
R2-14	RECTANGULAR	64	.4644	230±.005	11	.480	10

Available on request: 14 - 1/2° pressure angle, special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	RECTANGULAR	416 SERIES STAINLESS AND 2024-T4 ALUMINUM ANODIZED	10	20°

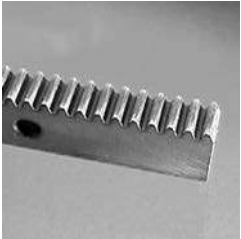
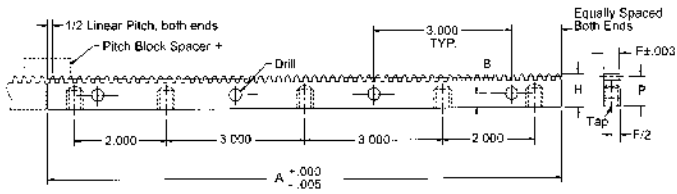


STOCK NO.	MATERIAL	A (Inch)	P (Ref.)	W	F	C
R4-15	STAINLESS ST.	7"	.4644	.480	.230	2.208
R4-16	ALUMINUM					

Available on request: special, modified and custom racks.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



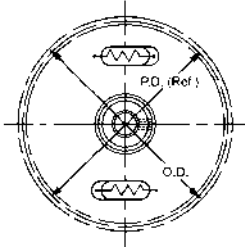
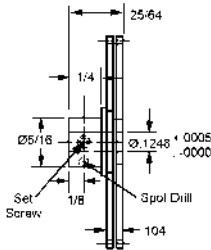
† Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS		SPACER BLOCK											
STOCK NO.	STOCK NO.	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 -.005	F	B	DRILL	TAP
R1-8-G1	R1-8-SB	10*	.0014	.0005	64	.0491	11.038	.4594	.475	.230	.218	#26	#6-32 X 1/4
R3-5-G1	R3-5-SB	10*	.0014	.0005	64	.0491	11.038	.4644	.480	.230	.218	#26	#6-32 X 1/4

* Higher quality on request.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	PIN HUB	1/8"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

O.D. = P.D. +.031

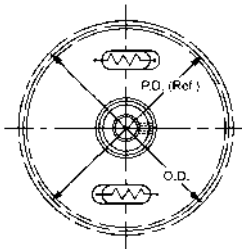
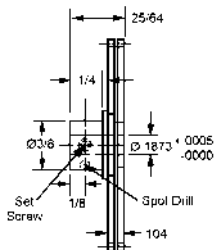
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP64SS-52	AP64TS-52	52	.8125
AP64SS-55	AP64TS-55	55	.8593
AP64SS-56	AP64TS-56	56	.8750
AP64SS-60	AP64TS-60	60	.9375
AP64SS-64	AP64TS-64	64	1.0000
AP64SS-68	AP64TS-68	68	1.0625
AP64SS-70	AP64TS-70	70	1.0937
AP64SS-75	AP64TS-75	75	1.1718
AP64SS-80	AP64TS-80	80	1.2500
AP64S-85	AP64T-85	85	1.3281
AP64S-90	AP64T-90	90	1.4062
AP64S-95	AP64T-95	95	1.4843
AP64S-96	AP64T-96	96	1.5000
AP64S-100	AP64T-100	100	1.5625
AP64S-105	AP64T-105	105	1.6406
AP64S-108	AP64T-108	108	1.6875
AP64S-110	AP64T-110	110	1.7187
AP64S-115	AP64T-115	115	1.7968
AP64S-120	AP64T-120	120	1.8750
AP64S-125	AP64T-125	125	1.9531
AP64S-128	AP64T-128	128	2.0000
AP64S-130	AP64T-130	130	2.0312
AP64S-140	AP64T-140	140	2.1875
AP64S-150	AP64T-150	150	2.3437
AP64S-160	AP64T-160	160	2.5000
AP64S-170	AP64T-170	170	2.6562
AP64S-176	AP64T-176	176	2.7500
AP64S-180	AP64T-180	180	2.8125
AP64S-190	AP64T-190	190	2.9687
AP64S-192	AP64T-192	192	3.0000
AP64S-200	AP64T-200	200	3.1250

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	PIN HUB	3/16"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP64US-60	AP64VS-60	60	.9375
AP64US-64	AP64VS-64	64	1.0000
AP64US-68	AP64VS-68	68	1.0625
AP64US-70	AP64VS-70	70	1.0937
AP64US-75	AP64VS-75	75	1.1718
AP64US-80	AP64VS-80	80	1.2500
AP64US-85	AP64V-85	85	1.3281
AP64U-90	AP64V-90	90	1.4062
AP64U-95	AP64V-95	95	1.4843
AP64U-96	AP64V-96	96	1.5000
AP64U-100	AP64V-100	100	1.5625
AP64U-105	AP64V-105	105	1.6406
AP64U-108	AP64V-108	108	1.6875
AP64U-110	AP64V-110	110	1.7187
AP64U-115	AP64V-115	115	1.7968
AP64U-120	AP64V-120	120	1.8750
AP64U-125	AP64V-125	125	1.9531
AP64U-128	AP64V-128	128	2.0000
AP64U-130	AP64V-130	130	2.0312
AP64U-140	AP64V-140	140	2.1875
AP64U-150	AP64V-150	150	2.3437
AP64U-160	AP64V-160	160	2.5000
AP64U-170	AP64V-170	170	2.6562
AP64U-176	AP64V-176	176	2.7500
AP64U-180	AP64V-180	180	2.8125
AP64U-190	AP64V-190	190	2.9687
AP64U-192	AP64V-192	192	3.0000
AP64U-200	AP64V-200	200	3.1250

$$\text{O.D.} = \text{P.D.} + .031$$

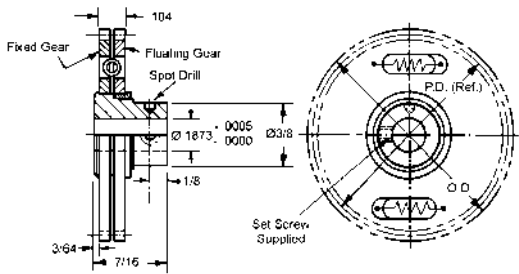
Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	PIN HUB	3/16"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE
AP64CS-37	-	37	.5781	.609	SCISSOR
AP64CS-40	-	40	.6250	.656	
AP64CS-48	AP64PS-48	48	.7500	.781	
AP64CS-56	AP64PS-56	56	.8750	.906	
AP64CS-60	AP64PS-60	60	.9375	.968	COIL
AP64C-64	AP64P-64	64	1.0000	1.031	
AP64C-72	AP64P-72	72	1.1250	1.156	
AP64C-80	AP64P-80	80	1.2500	1.281	
AP64C-88	AP64P-88	88	1.3750	1.406	
AP64C-90	AP64P-90	90	1.4062	1.437	
AP64C-92	AP64P-92	92	1.4375	1.468	
AP64C-96	AP64P-96	96	1.5000	1.531	
AP64C-100	AP64P-100	100	1.5625	1.593	
AP64C-110	AP64P-110	110	1.7187	1.750	
AP64C-120	AP64P-120	120	1.8750	1.906	
AP64C-128	AP64P-128	128	2.0000	2.031	
AP64C-130	AP64P-130	130	2.0312	2.062	
AP64C-140	AP64P-140	140	2.1875	2.218	
AP64C-150	AP64P-150	150	2.3437	2.375	
AP64C-160	AP64P-160	160	2.5000	2.531	
AP64C-180	AP64P-180	180	2.8125	2.843	
AP64C-192	AP64P-192	192	3.0000	3.031	

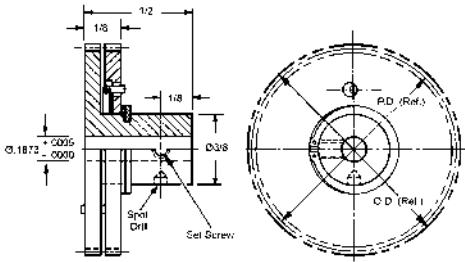
Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14;
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

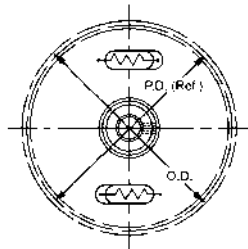
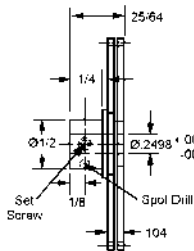
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AP64HS-40	AP64JS-40	40		.6250	.656
AP64HS-48	AP64JS-48	48	.1873	.7500	.781
AP64HS-64	AP64JS-64	64		1.0000	1.031

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	PIN HUB	1/4"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP64WS-68	AP64XS-68	68	1.0625
AP64WS-70	AP64XS-70	70	1.0937
AP64WS-75	AP64XS-75	75	1.1718
AP64WS-80	AP64XS-80	80	1.2500
AP64W-85	AP64X-85	85	1.3281
AP64W-90	AP64X-90	90	1.4062
AP64W-95	AP64X-95	95	1.4843
AP64W-96	AP64X-96	96	1.5000
AP64W-100	AP64X-100	100	1.5625
AP64W-105	AP64X-105	105	1.6406
AP64W-108	AP64X-108	108	1.6875
AP64W-110	AP64X-110	110	1.7187
AP64W-115	AP64X-115	115	1.7968
AP64W-120	AP64X-120	120	1.8750
AP64W-125	AP64X-125	125	1.9531
AP64W-128	AP64X-128	128	2.0000
AP64W-130	AP64X-130	130	2.0312
AP64W-140	AP64X-140	140	2.1875
AP64W-150	AP64X-150	150	2.3437
AP64W-160	AP64X-160	160	2.5000
AP64W-170	AP64X-170	170	2.6562
AP64W-176	AP64X-176	176	2.7500
AP64W-180	AP64X-180	180	2.8125
AP64W-190	AP64X-190	190	2.9687
AP64W-192	AP64X-192	192	3.0000
AP64W-200	AP64X-200	200	3.1250

$$\text{O.D.} = \text{P.D.} + .031$$

Available on request:

Other numbers of teeth:

AGMA Quality 12 and 14 (some dimensions may vary);

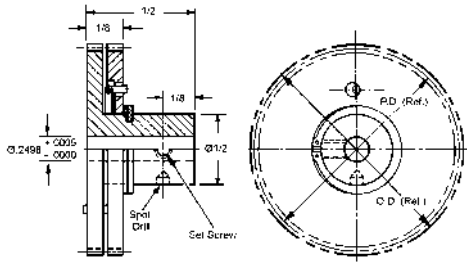
14-12° pressure angle.

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	PIN HUB	1/4"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

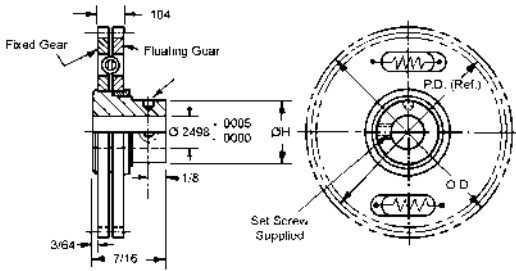
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AP64KS-48	AP64LS-48	48		.7500	.781
AP64KS-64	AP64LS-64	64	.2498	1.0000	1.031

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	PIN HUB	1/4"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



HUB MATERIAL: 303 Stainless Steel

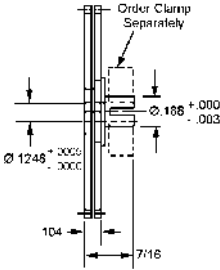
STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE	H
AP64ES-38	-	38	.5937	.625	SCISSOR	3/8
AP64ES-40	-	40	.6250	.656		
AP64ES-48	AP64RS-48	48	.7500	.781		
AP64ES-56	AP64RS-56	56	.8750	.906		
AP64ES-60	AP64RS-60	60	.9375	.968		
AP64ES-62	AP64RS-62	62	.9687	1.000	COIL	7/16
AP64E-64	AP64R-64	64	1.0000	1.031		
AP64E-70	AP64R-70	70	1.0937	1.125		
AP64E-72	AP64R-72	72	1.1250	1.156		
AP64E-80	AP64R-80	80	1.2500	1.281		
AP64E-84	AP64R-84	84	1.3125	1.343		
AP64E-88	AP64R-88	88	1.3750	1.406		
AP64E-96	AP64R-96	96	1.5000	1.531		
AP64E-100	AP64R-100	100	1.5625	1.593		
AP64E-105	AP64R-105	105	1.6406	1.671		
AP64E-110	AP64R-110	110	1.7187	1.750		
AP64E-120	AP64R-120	120	1.8750	1.906		
AP64E-128	AP64R-128	128	2.0000	2.031		
AP64E-140	AP64R-140	140	2.1875	2.218		
AP64E-144	AP64R-144	144	2.2500	2.281		
AP64E-160	AP64R-160	160	2.5000	2.531		
AP64E-176	AP64R-176	176	2.7500	2.781		
AP64E-180	AP64R-180	180	2.8125	2.843		
AP64E-192	AP64R-192	192	3.0000	3.031		

Available on request:

- Other numbers of teeth;
- AGMA Quality 12 and 14;
- 14-12° pressure angle.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	CLAMP HUB	1/8"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

Hub Material: 303 Stainless Steel

O.D. = P.D. +.031

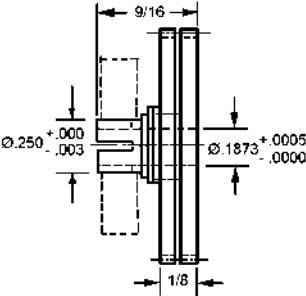
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC64SS-52	AC64TS-52	52	.8125
AC64SS-55	AC64TS-55	55	.8593
AC64SS-56	AC64TS-56	56	.8750
AC64SS-60	AC64TS-60	60	.9375
AC64SS-64	AC64TS-64	64	1.0000
AC64SS-68	AC64TS-68	68	1.0625
AC64SS-70	AC64TS-70	70	1.0937
AC64SS-75	AC64TS-75	75	1.1718
AC64SS-80	AC64TS-80	80	1.2500
AC64S-85	AC64T-85	85	1.3281
AC64S-90	AC64T-90	90	1.4062
AC64S-95	AC64T-95	95	1.4843
AC64S-96	AC64T-96	96	1.5000
AC64S-100	AC64T-100	100	1.5625
AC64S-105	AC64T-105	105	1.6406
AC64S-108	AC64T-108	108	1.6875
AC64S-110	AC64T-110	110	1.7187
AC64S-115	AC64T-115	115	1.7968
AC64S-120	AC64T-120	120	1.8750
AC64S-125	AC64T-125	125	1.9531
AC64S-128	AC64T-128	128	2.0000
AC64S-130	AC64T-130	130	2.0312
AC64S-140	AC64T-140	140	2.1875
AC64S-150	AC64T-150	150	2.3437
AC64S-160	AC64T-160	160	2.5000
AC64S-170	AC64T-170	170	2.6562
AC64S-176	AC64T-176	176	2.7500
AC64S-180	AC64T-180	180	2.8125
AC64S-190	AC64T-190	190	2.9687
AC64S-192	AC64T-192	192	3.0000
AC64S-200	AC64T-200	200	3.1250

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	CLAMP HUB	3/16"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material:
303 Stainless Steel

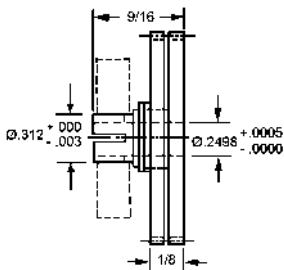
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC64HS-40	AC64JS-40	64	40	.6250	.656
AC64HS-48	AC64JS-48		48	.7500	.781
AC64HS-64	AC64JS-64		64	1.0000	1.031

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	CLAMP HUB	1/4"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material:
303 Stainless Steel

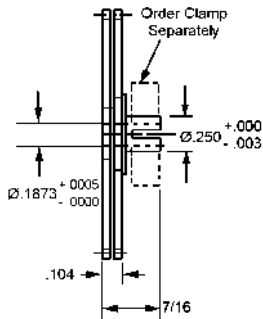
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC64KS-48	AC64LS-48	64	48	0.7500	.781
AC64KS-64	AC64LS-64		64	1.0000	1.031

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	CLAMP HUB	3/16"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

O.D. = P.D. +.031

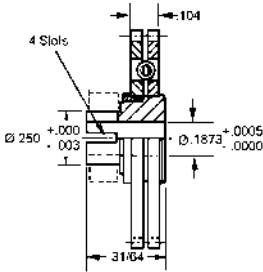
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC64US-60	AC64VS-60	60	.9375
AC64US-64	AC64VS-64	64	1.0000
AC64US-68	AC64VS-68	68	1.0625
AC64US-70	AC64VS-70	70	1.0937
AC64US-75	AC64VS-75	75	1.1718
AC64US-80	AC64VS-80	80	1.2500
AC64U-85	AC64V-85	85	1.3281
AC64U-90	AC64V-90	90	1.4062
AC64U-95	AC64V-95	95	1.4843
AC64U-96	AC64V-96	96	1.5000
AC64U-100	AC64V-100	100	1.5625
AC64U-105	AC64V-105	105	1.6406
AC64U-108	AC64V-108	108	1.6875
AC64U-110	AC64V-110	110	1.7187
AC64U-115	AC64V-115	115	1.7968
AC64U-120	AC64V-120	120	1.8750
AC64U-125	AC64V-125	125	1.9531
AC64U-128	AC64V-128	128	2.0000
AC64U-130	AC64V-130	130	2.0312
AC64U-140	AC64V-140	140	2.1875
AC64U-150	AC64V-150	150	2.3437
AC64U-160	AC64V-160	160	2.5000
AC64U-170	AC64V-170	170	2.6562
AC64U-176	AC64V-176	176	2.7500
AC64U-180	AC64V-180	180	2.8125
AC64U-190	AC64V-190	190	2.9687
AC64U-192	AC64V-192	192	3.0000
AC64U-200	AC64V-200	200	3.1250

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	CLAMP HUB	3/16"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE
AC64CS-37	-	37	.5781	.609	SCISSOR
AC64CS-40	-	40	.6250	.656	
AC64CS-48	AC64PS-48	48	.7500	.781	
AC64CS-56	AC64PS-56	56	.8750	.906	
AC64CS-60	AC64PS-60	60	.9375	.968	
AC64C-64	AC64P-64	64	1.0000	1.031	COIL
AC64C-72	AC64P-72	72	1.1250	1.156	
AC64C-80	AC64P-80	80	1.2500	1.281	
AC64C-88	AC64P-88	88	1.3750	1.406	
AC64C-90	AC64P-90	90	1.4062	1.437	
AC64C-92	AC64P-92	92	1.4375	1.468	
AC64C-96	AC64P-96	96	1.5000	1.531	
AC64C-100	AC64P-100	100	1.5625	1.593	
AC64C-110	AC64P-110	110	1.7187	1.750	
AC64C-120	AC64P-120	120	1.8750	1.906	
AC64C-128	AC64P-128	128	2.0000	2.031	
AC64C-130	AC64P-130	130	2.0312	2.062	
AC64C-140	AC64P-140	140	2.1875	2.218	
AC64C-150	AC64P-150	150	2.3437	2.375	
AC64C-160	AC64P-160	160	2.5000	2.531	
AC64C-180	AC64P-180	180	2.8125	2.843	
AC64C-192	AC64P-192	192	3.0000	3.031	

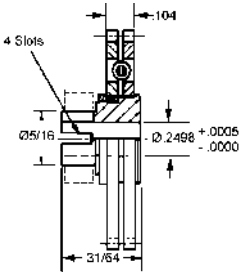
Available on request:

- Other numbers of teeth;
- AGMA Quality 12 and 14;
- 14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	CLAMP HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

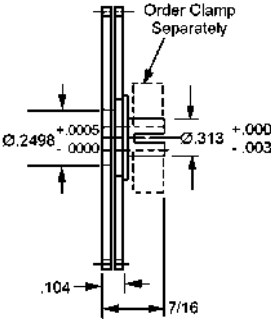
STAINLESS STEEL STOCK NO.	ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE
AC64ES-38	-	38	.5937	.625	SCISSOR
AC64ES-40	-	40	.6250	.656	
AC64ES-48	AC64RS-48	48	.7500	.781	
AC64ES-56	AC64RS-56	56	.8750	.906	
AC64ES-60	AC64RS-60	60	.9375	.968	
AC64ES-62	AC64RS-62	62	.9687	1.000	COIL
AC64E-64	AC64R-64	64	1.0000	1.031	
AC64E-70	AC64R 70	70	1.0937	1.125	
AC64E-72	AC64R-72	72	1.1250	1.156	
AC64E-80	AC64R-80	80	1.2500	1.281	
AC64E-84	AC64R-84	84	1.3125	1.343	
AC64E-88	AC64R-88	88	1.3750	1.406	
AC64E-96	AC64R-96	96	1.5000	1.531	
AC64E-100	AC64R-100	100	1.5625	1.593	
AC64E-105	AC64R-105	105	1.6406	1.671	
AC64E-110	AC64R-110	110	1.7187	1.750	
AC64E-120	AC64R-120	120	1.8750	1.906	
AC64E-128	AC64R-128	128	2.0000	2.031	
AC64E-140	AC64R-140	140	2.1875	2.218	
AC64E-144	AC64R-144	144	2.2500	2.281	
AC64E-160	AC64R-160	160	2.5000	2.531	
AC64E-176	AC64R-176	176	2.7500	2.781	
AC64E-180	AC64R-180	180	2.8125	2.843	
AC64E-192	AC64R-192	192	3.0000	3.031	

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14;
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	CLAMP HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

O.D. = P.D. +.031

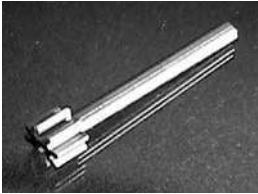
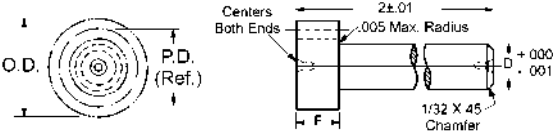
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC64WS-68	AC64XS-68	68	1.0625
AC64WS-70	AC64XS-70	70	1.0937
AC64WS-75	AC64XS-75	75	1.1718
AC64WS-80	AC64XS-80	80	1.2500
AC64W-85	AC64X-85	85	1.3281
AC64W-90	AC64X-90	90	1.4062
AC64W-95	AC64X-95	95	1.4843
AC64W-96	AC64X-96	96	1.5000
AC64W-100	AC64X-100	100	1.5625
AC64W-105	AC64X-105	105	1.6406
AC64W-108	AC64X-108	108	1.6875
AC64W-110	AC64X-110	110	1.7187
AC64W-115	AC64X-115	115	1.7968
AC64W-120	AC64X-120	120	1.8750
AC64W-125	AC64X-125	125	1.9531
AC64W-128	AC64X-128	128	2.0000
AC64W-130	AC64X-130	130	2.0312
AC64W-140	AC64X-140	140	2.1875
AC64W-150	AC64X-150	150	2.3437
AC64W-160	AC64X-160	160	2.5000
AC64W-170	AC64X-170	170	2.6562
AC64W-176	AC64X-176	176	2.7500
AC64W-180	AC64X-180	180	2.8125
AC64W-190	AC64X-190	190	2.9687
AC64W-192	AC64X-192	192	3.0000
AC64W-200	AC64X-200	200	3.1250

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

PINION SHAFTS

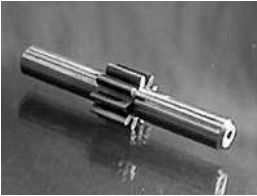
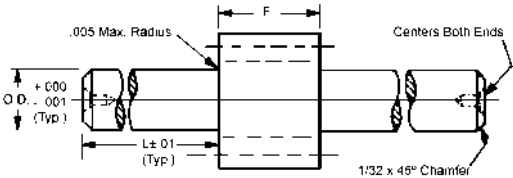
PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	BRASS AND COLD ROLLED STEEL	5	20°



303 STAINLESS STEEL STOCK NO.	BRASS ALLOY 360 STOCK NO.	NUMBER OF TEETH	PITCH DIAMETER	OUTSIDE DIAMETER	D	F
PSX64S-12	PSX64B-12	12	.1875	.218	.125	3/16
PSX64S-14	PSX64B-14	14	.2188	.250	.125	
PSX64S-15	PSX64B-15	15	.2344	.265	.187	
PSX64S-16	PSX64B-16	16	.2500	.281	.187	
PSX64S-18	PSX64B-18	18	.2813	.312	.187	

Made from extruded pinion stock.
Specials made to order - send sketch.

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	BRASS AND COLD ROLLED STEEL	5	20°

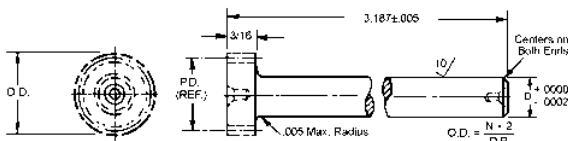


COLD ROLLED STEEL 12L14 OR 12L15 W/SELIUM STOCK NO.	BRASS ALLOY 360 STOCK NO.	NUMBER OF TEETH	PITCH DIAMETER	OUTSIDE DIAMETER	D	F	L
PSW64S-12	PSW64B-12	12	.1875	.218	.125	3/16	3/8
PSW64S-14	PSW64B-14	14	.2188	.250			
PSW64S-15	PSW64B-15	15	.2344	.265			
PSW64S-16	PSW64B-16	16	.2500	.281			
PSW64S-18	PSW64B-18	18	.2813	.312			

Made from extruded pinion stock.
Specials made to order - send sketch.

PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	303 STAINLESS STEEL	10	20°

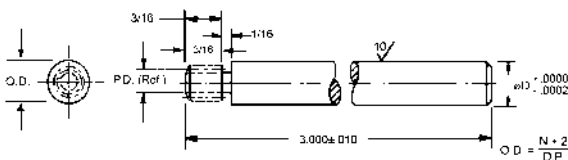


STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS64S2-16H	64	16	.2500	.1247
PS64S3-16H		16	.2500	.1872
PS64S4-16H		16	.2500	.2497
PS64S4-18H		18	.2812	.2497
PS64S2-20H		20	.3125	.1247
PS64S3-20H		20	.3125	.1872
PS64S4-20H		20	.3125	.2497
PS64S4-22H		22	.3437	.2497
PS64S4-24H		24	.3750	.2497

Other numbers of teeth available on request.



PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	303 STAINLESS STEEL	10	20°

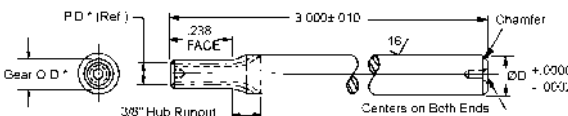


STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS64S4-12	64	12	.1875	.2497
PS64S4-14	64	14	.2187	.2497

Other numbers of teeth available on request.



PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	303 STAINLESS STEEL	10	20°



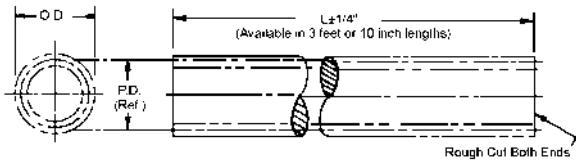
STOCK NO.	PITCH	NO. OF TEETH	D	ENLARGED	
				PITCH DIAMETER	OUTSIDE DIA.
B-PS64S4-10	64	10	.2497	.1692	.200
B-PS64S4-11		11		.1830	.214
B-PS64S4-12		12		.1968	.228
B-PS64S4-13		13		.2106	.241
B-PS64S5-15	64	15	.3122	.2382	.269

Other numbers of teeth available on request.



SPUR GEAR STOCKS

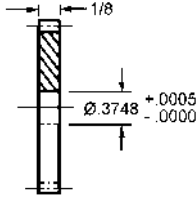
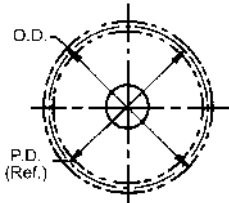
PITCH	TYPE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	PINION WIRE	BRASS AND COLD ROLLED STEEL	4	20°



BRASS ALLOY 360		COLD ROLLED STEEL 12L-14 or 12L-15 WITH SELENIUM		NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
3FT. LONG STOCK NO.	10 IN. LONG STOCK NO.	3FT. LONG STOCK NO.	10 IN. LONG STOCK NO.			
PW64B-8	PW64B-8A	PW64S-8	PW64S-8A	8	.1250	.156
PW64B-9	PW64B-9A	PW64S-9	PW64S-9A	9	.1406	.171
PW64B-10	PW64B-10A	PW64S-10	PW64S-10A	10	.1562	.187
PW64B-11	PW64B-11A	PW64S-11	PW64S-11A	11	.1718	.203
PW64B-12	PW64B-12A	PW64S-12	PW64S-12A	12	.1875	.218
PW64B-14	PW64B-14A	PW64S-14	PW64S-14A	14	.2187	.250
PW64B-15	PW64B-15A	PW64S-15	PW64S-15A	15	.2343	.265
PW64B-16	PW64B-16A	PW64S-16	PW64S-16A	16	.2500	.281
PW64B-18	PW64B-18A	PW64S-18	PW64S-18A	18	.2812	.312
PW64B-20	PW64B-20A	PW64S-20	PW64S-20A	20	.3125	.343
PW64B-24	PW64B-24A	-	-	24	.3750	.406
PW64B-28	PW64B-28A	-	-	28	.4375	.468
PW64B-36	PW64B-36A	-	-	36	.5625	.593
PW64B-40	PW64B-40A	-	-	40	.6250	.656
PW64B-48	PW64B-48A	-	-	48	.7500	.781

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	HUBLESS	3/8"	1/8"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°

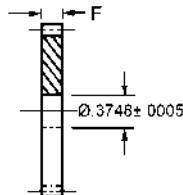
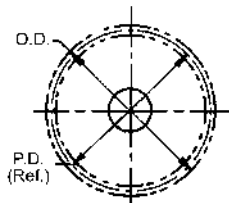


Available on request:

Other numbers of teeth;
Pin or Clamp hubs assembled
AGMA Quality 12 and 14;
14-12° pressure angle.

STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.
F72S3-72	F72A3-72	72	1.0000	1.027
F72S3-80	F72A3-80	80	1.1111	1.138
F72S3-81	F72A3-81	81	1.1250	1.152
F72S3-90	F72A3-90	90	1.2500	1.277
F72S3-96	F72A3-96	96	1.3333	1.361
F72S3-99	F72A3-99	99	1.3750	1.402
F72S3-100	F72A3-100	100	1.3888	1.416
F72S3-108	F72A3-108	108	1.5000	1.527
F72S3-115	F72A3-115	115	1.5972	1.625
F72S3-130	F72A3-130	130	1.8055	1.833
F72S3-135	F72A3-135	135	1.8750	1.902
F72S3-140	F72A3-140	140	1.9444	1.972
F72S3-144	F72A3-144	144	2.0000	2.027
F72S3-150	F72A3-150	150	2.0833	2.111
F72S3-160	F72A3-160	160	2.2222	2.250
F72S3-180	F72A3-180	180	2.5000	2.527
F72S3-192	F72A3-192	192	2.6666	2.694
F72S3-200	F72A3-200	200	2.7777	2.805
F72S3-216	F72A3-216	216	3.0000	3.027
F72S3-288	F72A3-288	288	4.0000	4.027

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	HUBLESS	3/8"	1/8"	POLYURETHANE	8	20°



Available on request:

Other numbers of teeth;
14-12° pressure angle.

STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F72U3-72	72	1.0000	1.027
F72U3-96	96	1.3333	1.361
F72U3-100	100	1.3888	1.416
F72U3-108	108	1.5000	1.527
F72U3-120	120	1.6666	1.694
F72U3-125	125	1.7361	1.763
F72U3-135	135	1.8750	1.902
F72U3-140	140	1.9444	1.972
F72U3-150	150	2.0833	2.111

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	X	1/4"	303 STAINLESS STEEL	10	20°

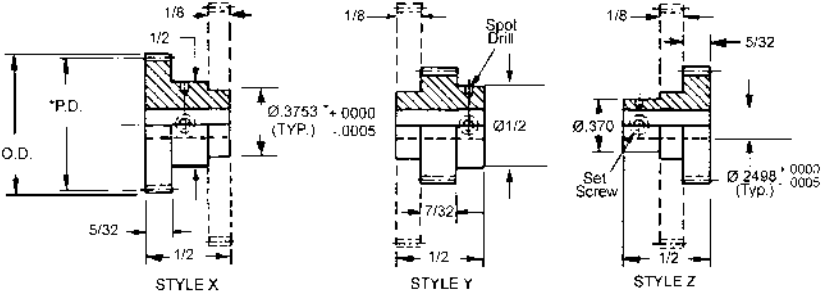
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP72S14-30	72	30	.4166	.444
DP72S14-36		36	.5000	.528
DP72S14-40		40	.5555	.583

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	Y	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP72S16-30	72	30	.4166	.444
DP72S16-36		36	.5000	.528
DP72S16-40		40	.5555	.583

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	Z	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP72S18-30	72	30	.4166	.444
DP72S18-36		36	.5000	.528
DP72S18-40		40	.5555	.583



*Concentric within .0003
Order hubless gear separately.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	X	3/16"	303 STAINLESS STEEL	10	20°

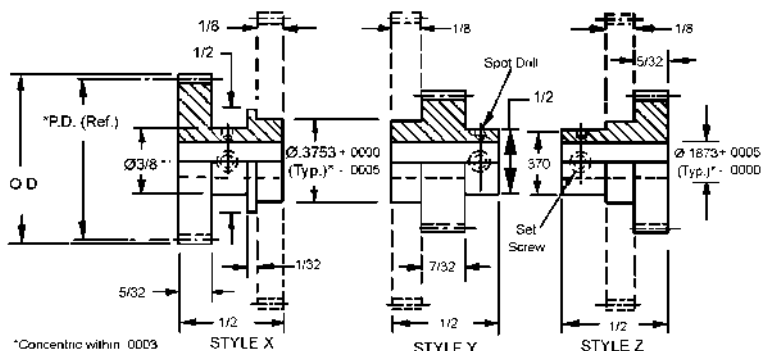
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP72S8-30	72	30	.4166	.444
DP72S8-32		32	.4444	.472
DP72S8-34		34	.4722	.500
DP72S8-35		35	.4861	.514
DP72S8-36		36	.5000	.528

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	Y	3/16"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP72S10-30	72	30	.4166	.444
DP72S10-32		32	.4444	.472
DP72S10-34		34	.4722	.500
DP72S10-35		35	.4861	.514
DP72S10-36		36	.5000	.528

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	Z	3/16"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP72S12-30	72	30	.4166	.444
DP72S12-32		32	.4444	.472
DP72S12-34		34	.4722	.500
DP72S12-35		35	.4861	.514
DP72S12-36		36	.5000	.528



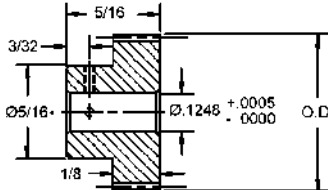
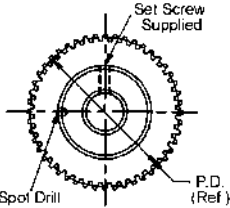
*Concentric within .0003

• Hub runout cuts thru shoulder.

Available on request: Other numbers of teeth; AGMA quality 12 and 14; 14-1/2° Pressure Angle.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	PIN HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



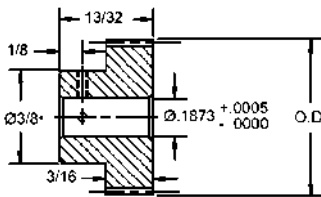
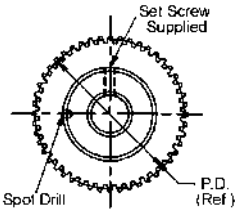
- For 20-25 teeth hub diameter equals .24
Available on request, other numbers of
teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P72S10-20	P72A10-20	20•	.2777	.305
P72S10-22	P72A10-22	22•	.3055	.333
P72S10-23	P72A10-23	23•	.3194	.347
P72S10-24	P72A10-24	24•	.3333	.361
P72S10-25	P72A10-25	25•	.3472	.375
P72S10-26	P72A10-26	26	.3611	.388
P72S10-27	P72A10-27	27	.3750	.402
P72S10-28	P72A10-28	28	.3888	.416
P72S10-29	P72A10-29	29	.4027	.430
P72S10-30	P72A10-30	30	.4166	.444
P72S10-32	P72A10-32	32	.4444	.472
P72S10-34	P72A10-34	34	.4722	.500
P72S10-36	P72A10-36	36	.5000	.527
P72S10-38	P72A10-38	38	.5277	.555
P72S10-40	P72A10-40	40	.5555	.583
P72S10-42	P72A10-42	42	.5833	.611
P72S10-44	P72A10-44	44	.6111	.638
P72S10-45	P72A10-45	45	.6250	.652
P72S10-46	P72A10-46	46	.6388	.666
P72S10-48	P72A10-48	48	.6666	.694
P72S10-50	P72A10-50	50	.6944	.722
P72S10-54	P72A10-54	54	.7500	.777
P72S10-56	P72A10-56	56	.7777	.805
P72S10-60	P72A10-60	60	.8333	.861
P72S10-64	P72A10-64	64	.8888	.916
P72S10-70	P72A10-70	70	.9722	1.000
P72S10-72	P72A10-72	72	1.0000	1.027
P72S10-75	P72A10-75	75	1.0416	1.069
P72S10-80	P72A10-80	80	1.1111	1.138
P72S10-84	P72A10-84	84	1.1666	1.194
P72S10-85	P72A10-85	85	1.1805	1.208
P72S10-90	P72A10-90	90	1.2500	1.277
P72S10-92	P72A10-92	92	1.2777	1.305
P72S10-96	P72A10-96	96	1.3333	1.361
P72S10-100	P72A10-100	100	1.3888	1.416
P72S10-110	P72A10-110	110	1.5277	1.555
P72S10-117	P72A10-117	117	1.6250	1.652
P72S10-120	P72A10-120	120	1.6666	1.694
P72S10-130	P72A10-130	130	1.8055	1.833
P72S10-144	P72A10-144	144	2.0000	2.027
P72S10-150	P72A10-150	150	2.0833	2.111
P72S10-153	P72A10-153	153	2.1250	2.152

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	PIN HUB	3/16"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



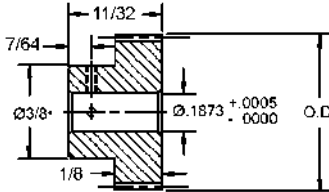
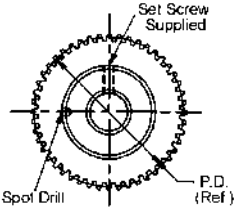
• For 27-29 teeth hub diameter equals .33
Available on request, other numbers of
teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P72S21-27	P72A21-27	27•	.3750	.402
P72S21-28	P72A21-28	28•	.3888	.416
P72S21-30	P72A21-30	30	.4166	.444
P72S21-32	P72A21-32	32	.4444	.472
P72S21-34	P72A21-34	34	.4722	.500
P72S21-36	P72A21-36	36	.5000	.527
P72S21-38	P72A21-38	38	.5277	.555
P72S21-40	P72A21-40	40	.5555	.583
P72S21-42	P72A21-42	42	.5833	.611
P72S21-44	P72A21-44	44	.6111	.638
P72S21-46	P72A21-46	46	.6388	.666
P72S21-48	P72A21-48	48	.6666	.694
P72S21-50	P72A21-50	50	.6944	.722
P72S21-54	P72A21-54	54	.7500	.777
P72S21-56	P72A21-56	56	.7777	.805
P72S21-60	P72A21-60	60	.8333	.861
P72S21-63	P72A21-63	63	.8750	.902
P72S21-64	P72A21-64	64	.8888	.916
P72S21-70	P72A21-70	70	.9722	1.000
P72S21-72	P72A21-72	72	1.0000	1.027
P72S21-80	P72A21-80	80	1.1111	1.138
P72S21-90	P72A21-90	90	1.2500	1.277
P72S21-96	P72A21-96	96	1.3333	1.361
P72S21-100	P72A21-100	100	1.3888	1.416
P72S21-105	P72A21-105	105	1.4583	1.486
P72S21-108	P72A21-108	108	1.5000	1.527
P72S21-144	P72A21-144	144	2.0000	2.027

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



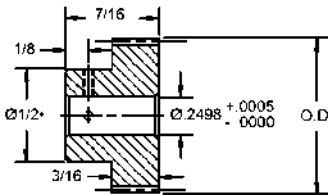
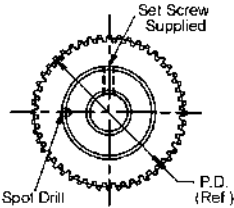
- For 27-29 teeth hub diameter equals .33
- Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P72S19-28	P72A19-28	28•	.3888	.416
P72S19-30	P72A19-30	30	.4166	.444
P72S19-32	P72A19-32	32	.4444	.472
P72S19-36	P72A19-36	36	.5000	.527
P72S19-38	P72A19-38	38	.5277	.555
P72S19-40	P72A19-40	40	.5555	.583
P72S19-42	P72A19-42	42	.5833	.611
P72S19-44	P72A19-44	44	.6111	.638
P72S19-45	P72A19-45	45	.6250	.652
P72S19-46	P72A19-46	46	.6388	.666
P72S19-48	P72A19-48	48	.6666	.694
P72S19-50	P72A19-50	50	.6944	.722
P72S19-54	P72A19-54	54	.7500	.777
P72S19-55	P72A19-55	55	.7638	.791
P72S19-56	P72A19-56	56	.7777	.805
P72S19-60	P72A10-60	60	.8333	.861
P72S19-64	P72A19-64	64	.8888	.916
P72S19-70	P72A19-70	70	.9722	1.000
P72S19-72	P72A19-72	72	1.0000	1.027
P72S19-75	P72A19-75	76	1.0416	1.069
P72S19-80	P72A19-80	80	1.1111	1.138
P72S19-81	P72A19-81	81	1.1250	1.152
P72S19-90	P72A19-90	90	1.2500	1.277
P72S19-96	P72A19-96	96	1.3333	1.361
P72S19-99	P72A19-99	99	1.3750	1.402
P72S19-100	P72A19-100	100	1.3888	1.416
P72S19-108	P72A19-108	108	1.5000	1.527
P72S19-110	P72A19-110	110	1.5277	1.555
P72S19-120	P72A19-120	120	1.6666	1.694
P72S19-126	P72A19-126	126	1.7500	1.777
P72S19-130	P72A19-130	130	1.8055	1.833
P72S19-140	P72A19-140	140	1.9444	1.972
P72S19-144	P72A19-144	144	2.0000	2.027
P72S19-150	P72A19-150	150	2.0833	2.111
P72S19-153	P72A19-153	153	2.1250	2.152
P72S19-162	P72A19-162	162	2.2500	2.277
P72S19-168	P72A19-168	168	2.3333	2.361
P72S19-170	P72A19-170	170	2.3611	2.388
P72S19-180	P72A19-180	180	2.5000	2.527
P72S19-198	P72A19-198	198	2.7500	2.777
P72S19-200	P72A19-200	200	2.7777	2.805
P72S19-216	P72A19-216	216	3.0000	3.027
P72S19-288	P72A19-288	288	4.0000	4.027

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	PIN HUB	1/4"	3/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



B

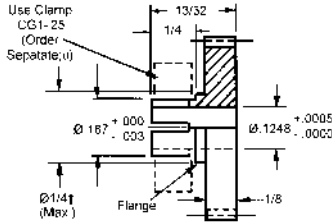
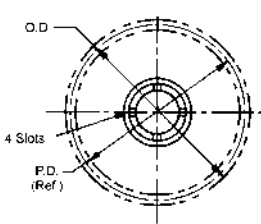
• For 35-38 teeth hub diameter equals .44
Available on request, other numbers
of teeth, AGMA quality 12 and 14, and
14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P72S28-38	P72A28-38	38•	.5277	.555
P72S28-40	P72A28-40	40	.5555	.583
P72S28-42	P72A28-42	42	.5833	.611
P72S28-44	P72A28-44	44	.6111	.638
P72S28-45	P72A28-45	45	.6250	.652
P72S28-46	P72A28-46	46	.6388	.666
P72S28-48	P72A28-48	48	.6666	.694
P72S28-50	P72A28-50	50	.6944	.722
P72S28-54	P72A28-54	54	.7500	.777
P72S28-55	P72A28-55	55	.7638	.791
P72S28-60	P72A28-60	60	.8333	.861
P72S28-63	P72A28-63	63	.8750	.902
P72S28-64	P72A28-64	64	.8888	.916
P72S28-65	P72A28-65	65	.9027	.930
P72S28-70	P72A28-70	70	.9722	1.000
P72S28-72	P72A28-72	72	1.0000	1.027
P72S28-80	P72A28-80	80	1.1111	1.138
P72S28-90	P72A28-90	90	1.2500	1.277
P72S28-96	P72A28-96	96	1.3333	1.361
P72S28-100	P72A28-100	100	1.3888	1.416
P72S28-105	P72A28-105	105	1.4583	1.486
P72S28-110	P72A28-110	110	1.5277	1.555
P72S28-120	P72A28-120	120	1.6666	1.694
P72S28-126	P72A28-126	126	1.7500	1.777
P72S28-130	P72A28-130	130	1.8055	1.833
P72S28-136	P72A28-136	136	1.8888	1.916
P72S28-140	P72A28-140	140	1.9444	1.972
P72S28-150	P72A28-150	150	2.0833	2.111
P72S28-160	P72A28-160	160	2.2222	2.250
P72S28-170	P72A28-170	170	2.3611	2.388
P72S28-180	P72A28-180	180	2.5000	2.527

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

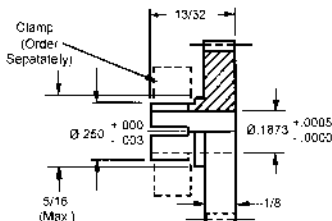
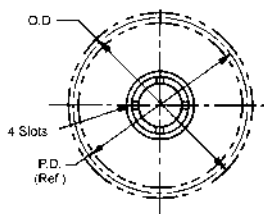
SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	CLAMP HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	CLAMP HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°

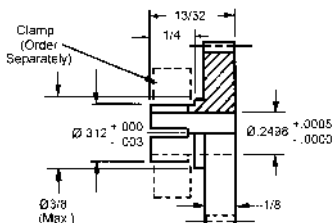
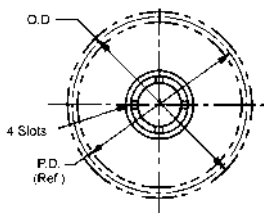


Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

X in part number indicates part may be supplied in two piece construction with stainless steel hub (some dimensions may vary).

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C72S14-30	C72A14-30	30	.4166	.444
C72S14-36	C72A14-36	36	.5000	.527
C72S14-72	C72A14-72	72	1.0000	1.027
C72S14-100	C72A14-100	100	1.3888	1.416
C72S14-126	C72A14-126	126	1.7500	1.777
C72S14-160	C72A14-160	160	2.2222	2.250
C72S15X-180	C72A15X-180	180	2.5000	2.527
C72S15X-216	C72A15X-216	216	3.0000	3.027
C72S15X-288	C72A15X-288	288	4.0000	4.027

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	CLAMP HUB	1/4"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°

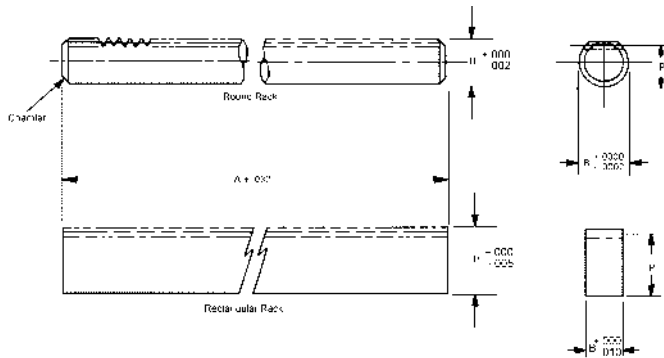


Available on request, other numbers of teeth,
Agma Quality 12 and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
C72S18-45	C72A18-45	45	.6250	.652
C72S18-63	C72A18-63	63	.8750	.902
C72S18-72	C72A18-72	72	1.0000	1.027
C72S18-90	C72A18-90	90	1.2500	1.277
C72S18-99	C72A18-99	99	1.3750	1.402
C72S18-108	C72A18-108	108	1.5000	1.527
C72S18-126	C72A18-126	126	1.7500	1.777
C72S18-144	C72A18-144	144	2.0000	2.027
C72S18-180	C72A18-180	180	2.5000	2.527
C72S18-216	C72A18-216	216	3.0000	3.027
C72S18-288	C72A18-288	288	4.0000	4.027

GEAR RACKS

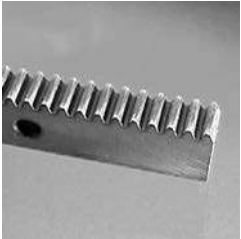
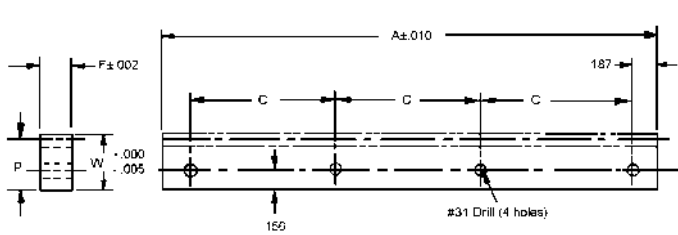
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-19	ROUND	72	.1421	.1872	11	.156	10
R2-15	RECTANGULAR	72	.3411	.167±.005	11	.355	10

Available on request: 14 - 1/2° pressure angle, special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	RECTANGULAR	416 SERIES STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°

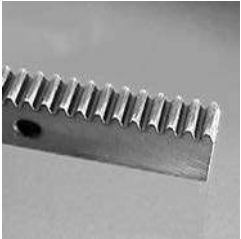
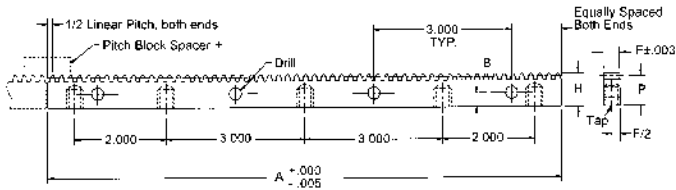


STOCK NO.	MATERIAL	A (Inch)	P (Ref.)	W	F	C
R4-17	STAINLESS ST.	5"	.3411	.355	.167	1.541
R4-18	ALUMINUM					

Available on request: special, modified and custom racks.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



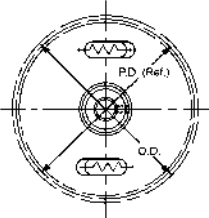
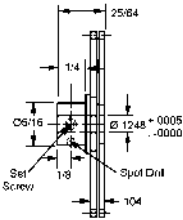
† Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS		SPACER BLOCK											
STOCK NO.	STOCK NO.	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 - .005	F	B	DRILL	TAP
R1-9-G1	R1-9-SB	10*	.0014	.0005	72	.0436	11.033	.3361	.350	.167	.156	#31	#4-40 X 3/16
R3-6-G1	R3-6-SB	10*	.0014	.0005	72	.0436	11.033	.3411	.355	.167	.156	#31	#4-40 X 3/16

* Higher quality on request.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	PIN HUB	1/8"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP72SS-58	AP72TS-58	58	.8055
AP72SS-60	AP72TS-60	60	.8333
AP72SS-64	AP72TS-64	64	.8888
AP72SS-68	AP72TS-68	68	.9444
AP72SS-70	AP72TS-70	70	.9722
AP72SS-72	AP72TS-72	72	1.0000
AP72SS-75	AP72TS-75	75	1.0416
AP72SS-80	AP72TS-80	80	1.1111
AP72SS-84	AP72TS-84	84	1.1666
AP72SS-90	AP72TS-90	90	1.2500
AP72SS-96	AP72TS-96	96	1.3333
AP72S-100	AP72T-100	100	1.3888
AP72S-105	AP72T-105	105	1.4583
AP72S-108	AP72T-108	108	1.5000
AP72S-110	AP72T-110	110	1.5277
AP72S-115	AP72T-115	115	1.5972
AP72S-120	AP72T-120	120	1.6666
AP72S-125	AP72T-125	125	1.7361
AP72S-130	AP72T-130	130	1.8055
AP72S-140	AP72T-140	140	1.9444
AP72S-144	AP72T-144	144	2.0000
AP72S-150	AP72T-150	150	2.0833
AP72S-160	AP72T-160	160	2.2222
AP72S-170	AP72T-170	170	2.3611
AP72S-180	AP72T-180	180	2.5000
AP72S-190	AP72T-190	190	2.6388
AP72S-200	AP72T-200	200	2.7777
AP72S-210	AP72T-210	210	2.9166
AP72S-216	AP72T-216	216	3.0000
AP72S-220	AP72T-220	220	3.0555
AP72S-225	AP72T-225	225	3.1250

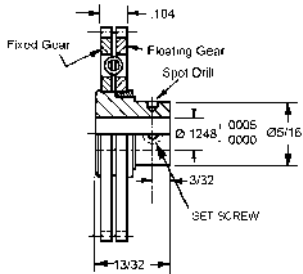
O.D. = P.D. +.031

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	PIN HUB	1/8"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER	OUTSIDE DIA.
AP72AS-45	-	45	.6250	.652
AP72AS-56	AP72NS-56	56	.7777	.805
AP72AS-60	AP72NS-60	60	.8333	.861
AP72AS-63	AP72NS-63	63	.8750	.902
AP72AS-65	AP72NS-65	65	.9027	.930
AP72AS-70	AP72NS-70	70	.9722	1.000

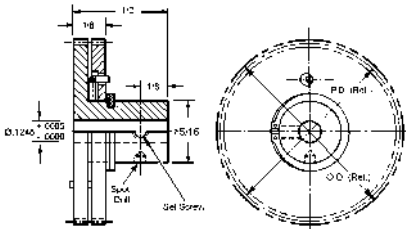
Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

ANTI-BACKLASH PINIONS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	PIN HUB	1/8"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material:
303 Stainless Steel

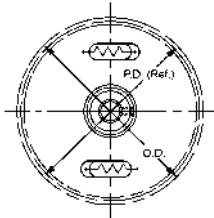
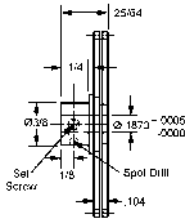
STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AP72FS-44	AP72GS-44	44		.6111	.639
AP72FS-56	AP72GS-56	56	.1248	.7777	.805
AP72FS-72	AP72GS-72	72		1.0000	1.028

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	PIN HUB	3/16"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

Hub Material: 303 Stainless Steel

O.D. = P.D. +.031

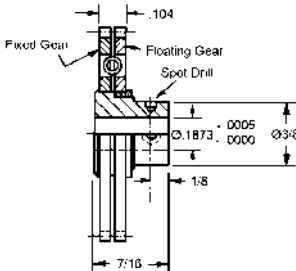
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP72US-68	AP72VS-68	68	.9444
AP72US-70	AP72VS-70	70	.9722
AP72US-72	AP72VS-72	72	1.0000
AP72US-75	AP72VS-75	75	1.0416
AP72US-80	AP72VS-80	80	1.1111
AP72US-84	AP72VS-84	84	1.1666
AP72US-90	AP72VS-90	90	1.2500
AP72US-96	AP72VS-96	96	1.3333
AP72U-100	AP72V-100	100	1.3888
AP72U-105	AP72V-105	105	1.4583
AP72U-108	AP72V-108	108	1.5000
AP72U-110	AP72V-110	110	1.5277
AP72U-115	AP72V-115	115	1.5972
AP72U-120	AP72V-120	120	1.6666
AP72U-125	AP72V-125	125	1.7361
AP72U-130	AP72V-130	130	1.8055
AP72U-140	AP72V-140	140	1.9444
AP72U-144	AP72V-144	144	2.0000
AP72U-150	AP72V-150	150	2.0833
AP72U-160	AP72V-160	160	2.2222
AP72U-170	AP72V-170	170	2.3611
AP72U-180	AP72V-180	180	2.5000
AP72U-190	AP72V-190	190	2.6388
AP72U-200	AP72V-200	200	2.7777
AP72U-210	AP72V-210	210	2.9166
AP72U-216	AP72V-216	216	3.0000
AP72U-220	AP72V-220	220	3.0555
AP72U-225	AP72V-225	225	3.1250

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	PIN HUB	3/16"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



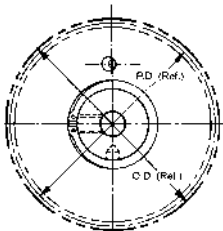
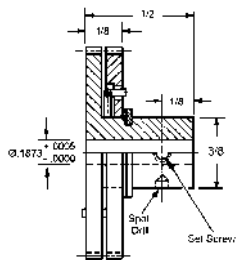
Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER	OUTSIDE DIA.
AP72CS-50	-	50	.6944	.722
AP72CS-52	AP72PS-52	52	.7222	.750
AP72CS-54	AP72PS-54	54	.7500	.777
AP72CS-60	AP72PS-60	60	.8333	.861
AP72CS-63	AP72PS-63	63	.8750	.902
AP72CS-65	AP72PS-65	65	.9027	.930
AP72CS-70	AP72PS-70	70	.9722	1.000

Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



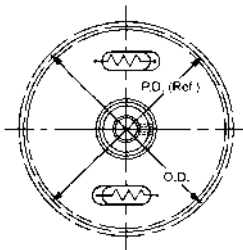
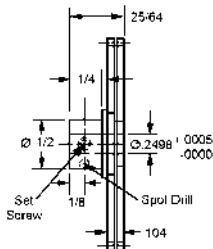
Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER	OUTSIDE DIA.
AP72HS-44	AP72JS-44	44	.6111	.639
AP72HS-56	AP72JS-56	56	.7777	.805
AP72HS-72	AP72JS-72	72	1.0000	1.028

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	PIN HUB	1/4"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP72WS-72	AP72XS-72	72	1.0000
AP72WS-75	AP72XS-75	75	1.0416
AP72WS-80	AP72XS-80	80	1.1111
AP72WS-84	AP72XS-84	84	1.1666
AP72WS-90	AP72XS-90	90	1.2500
AP72WS-96	AP72XS-96	96	1.3333
AP72W-100	AP72X-100	100	1.3888
AP72W-105	AP72X-105	105	1.4583
AP72W-108	AP72X-108	108	1.5000
AP72W-110	AP72X-110	110	1.5277
AP72W-115	AP72X-115	115	1.5972
AP72W-120	AP72X-120	120	1.6666
AP72W-125	AP72X-125	125	1.7361
AP72W-130	AP72X-130	130	1.8055
AP72W-140	AP72X-140	140	1.9444
AP72W-144	AP72X-144	144	2.0000
AP72W-150	AP72X-150	150	2.0833
AP72W-160	AP72X-160	160	2.2222
AP72W-170	AP72X-170	170	2.3611
AP72W-180	AP72X-180	180	2.5000
AP72W-190	AP72X-190	190	2.6388
AP72W-200	AP72X-200	200	2.7777
AP72W-210	AP72X-210	210	2.9166
AP72W-216	AP72X-216	216	3.0000
AP72W-220	AP72X-220	220	3.0555
AP72W-225	AP72X-225	225	3.1250

$$\text{O.D.} = \text{P.D.} + .031$$

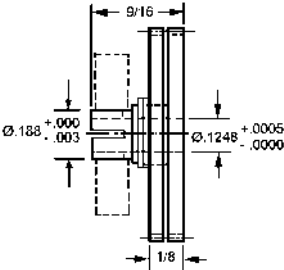
Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH PINIONS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	CLAMP HUB	1/8"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material:
303 Stainless Steel

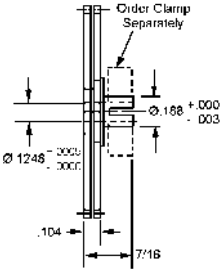
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
AC72FS-44	AC72GS-44	44	.6111	.639
AC72FS-56	AC72GS-56	56	.7777	.805
AC72FS-72	AC72GS-72	72	1.0000	1.028

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	CLAMP HUB	1/8"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

Hub Material: 303 Stainless Steel

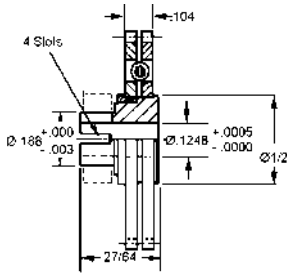
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC72SS-58	AC72TS-58	58	.8055
AC72SS-60	AC72TS-60	60	.8333
AC72SS-64	AC72TS-64	64	.8888
AC72SS-68	AC72TS-68	68	.9444
AC72SS-70	AC72TS-70	70	.9722
AC72SS-72	AC72TS-72	72	1.0000
AC72SS-75	AC72TS-75	75	1.0416
AC72SS-80	AC72TS-80	80	1.1111
AC72SS-84	AC72TS-84	84	1.1666
AC72SS-90	AC72TS-90	90	1.2500
AC72SS-96	AC72TS-96	96	1.3333
AC72S-100	AC72T-100	100	1.3888
AC72S-105	AC72T-105	105	1.4583
AC72S-108	AC72T-108	108	1.5000
AC72S-110	AC72T-110	110	1.5277
AC72S-115	AC72T-115	115	1.5972
AC72S-120	AC72T-120	120	1.6666
AC72S-125	AC72T-125	125	1.7361
AC72S-130	AC72T-130	130	1.8055
AC72S-140	AC72T-140	140	1.9444
AC72S-144	AC72T-144	144	2.0000
AC72S-150	AC72T-150	150	2.0833
AC72S-160	AC72T-160	160	2.2222
AC72S-170	AC72T-170	170	2.3611
AC72S-180	AC72T-180	180	2.5000
AC72S-190	AC72T-190	190	2.6388
AC72S-200	AC72T-200	200	2.7777
AC72S-210	AC72T-210	210	2.9166
AC72S-216	AC72T-216	216	3.0000
AC72S-220	AC72T-220	220	3.0555
AC72S-225	AC72T-225	225	3.1250

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	CLAMP HUB	1/8"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

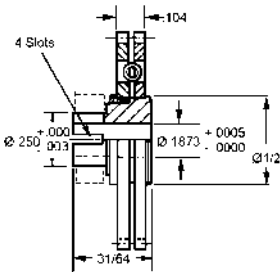


Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER.	OUTSIDE DIA.
AC72AS-56	AC72NS-56	56	.7777	.805
AC72AS-60	AC72NS-60	60	.8333	.861
AC72AS-63	AC72NS-63	63	.8750	.902
AC72AS-65	AC72NS-65	65	.9027	.930
AC72AS-70	AC72NS-70	70	.9722	1.000

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	CLAMP STYLE	3/16"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



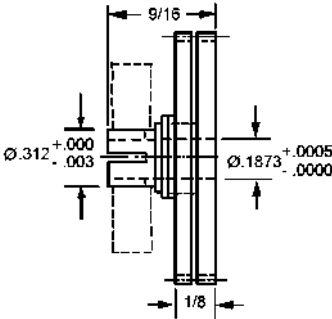
Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14
(some dimensions may vary);
14-12° pressure angle.

Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER.	OUTSIDE DIA.
AC72CS-50	-	50	.6944	.722
AC72CS-52	AC72PS-52	52	.7222	.750
AC72CS-54	AC72PS-54	54	.7500	.777
AC72CS-60	AC72PS-60	60	.8333	.861
AC72CS-63	AC72PS-63	63	.8750	.902
AC72CS-65	AC72PS-65	65	.9027	.930
AC72CS-70	AC72PS-70	70	.9722	1.000

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	CLAMP HUB	3/16"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER.	OUTSIDE DIA.
AC72HS-44	AC72JS-44	44	.6111	.639
AC72HS-56	AC72JS-56	56	.7777	.805
AC72HS-72	AC72JS-72	72	1.0000	1.028

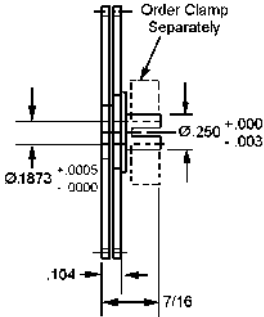
Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	CLAMP HUB	3/16"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC72US-68	AC72VS-68	68	.9444
AC72US-70	AC72VS-70	70	.9722
AC72US-72	AC72VS-72	72	1.0000
AC72US-75	AC72VS-75	75	1.0416
AC72US-80	AC72VS-80	80	1.1111
AC72US-84	AC72VS-84	84	1.1666
AC72US-90	AC72VS-90	90	1.2500
AC72US-96	AC72VS-96	96	1.3333
AC72U-100	AC72V-100	100	1.3888
AC72U-105	AC72V-105	105	1.4583
AC72U-108	AC72V-108	108	1.5000
AC72U-110	AC72V-110	110	1.5277
AC72U-115	AC72V-115	115	1.5972
AC72U-120	AC72V-120	120	1.6666
AC72U-125	AC72V-125	125	1.7361
AC72U-130	AC72V-130	130	1.8055
AC72U-140	AC72V-140	140	1.9444
AC72U-144	AC72V-144	144	2.0000
AC72U-150	AC72V-150	150	2.0833
AC72U-160	AC72V-160	160	2.2222
AC72U-170	AC72V-170	170	2.3611
AC72U-180	AC72V-180	180	2.5000
AC72U-190	AC72V-190	190	2.6388
AC72U-200	AC72V-200	200	2.7777
AC72U-210	AC72V-210	210	2.9166
AC72U-216	AC72V-216	216	3.0000
AC72U-220	AC72V-220	220	3.0555
AC72U-225	AC72V-225	225	3.1250

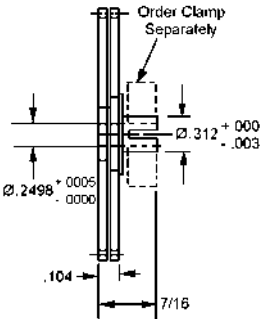
Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	CLAMP HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

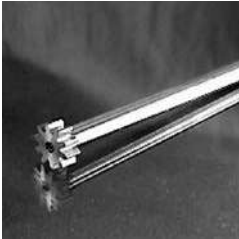
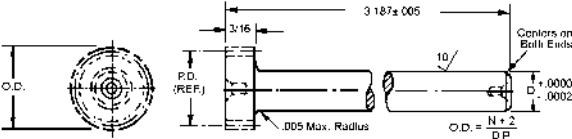
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC72WS-72	AC72XS-72	72	1.0000
AC72WS-75	AC72XS-75	75	1.0416
AC72WS-80	AC72XS-80	80	1.1111
AC72WS-84	AC72XS-84	84	1.1666
AC72WS-90	AC72XS-90	90	1.2500
AC72WS-96	AC72XS-96	96	1.3333
AC72W-100	AC72X-100	100	1.3888
AC72W-105	AC72X-105	105	1.4583
AC72W-108	AC72X-108	108	1.5000
AC72W-110	AC72X-110	110	1.5277
AC72W-115	AC72X-115	115	1.5972
AC72W-120	AC72X-120	120	1.6666
AC72W-125	AC72X-125	125	1.7361
AC72W-130	AC72X-130	130	1.8055
AC72W-140	AC72X-140	140	1.9444
AC72W-144	AC72X-144	144	2.0000
AC72W-150	AC72X-150	150	2.0833
AC72W-160	AC72X-160	160	2.2222
AC72W-170	AC72X-170	170	2.3611
AC72W-180	AC72X-180	180	2.5000
AC72W-190	AC72X-190	190	2.6388
AC72W-200	AC72X-200	200	2.7777
AC72W-210	AC72X-210	210	2.9166
AC72W-216	AC72X-216	216	3.0000
AC72W-220	AC72X-220	220	3.0555
AC72W-225	AC72X-225	225	3.1250

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

PINION SHAFTS

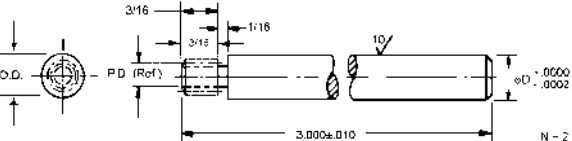
PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	303 STAINLESS STEEL	10	20°



STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS72S3-18H	72	18	.2500	.1872
PS72S2-24H		24	.3333	.1247
PS72S3-24H		24	.3333	.1872

Other numbers of teeth available on request.

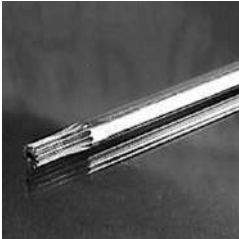
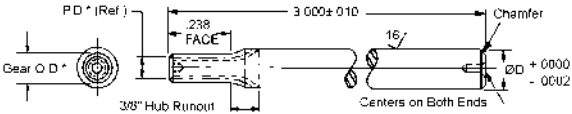
PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	303 STAINLESS STEEL	10	20°



STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS72S3-10	72	10	.1388	.1872
PS72S4-14	72	14	.1944	.2497

Other numbers of teeth available on request.

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
72	303 STAINLESS STEEL	10	20°

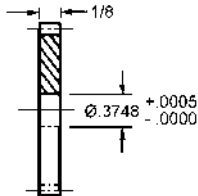
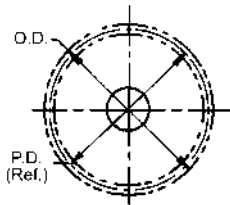


STOCK NO.	PITCH	NO. OF TEETH	D	ENLARGED	
				PITCH DIAMETER	OUTSIDE DIA.
B-PS72S3-10		10	.1872	.1504	.178
B-PS72S4-12	72	12	.2497	.1750	.202
B-PS72S4-15		15		.2117	.239

Other numbers of teeth available on request.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
80	HUBLESS	3/8"	1/8"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



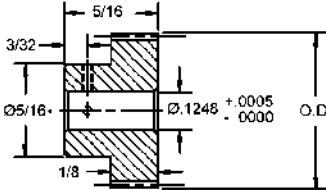
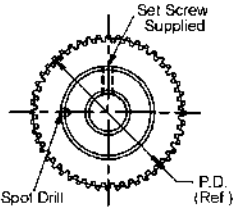
Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2° Pressure Angle

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F80S3-80	F80A3-80	80	1.0000	1.025
F80S3-90	F80A3-90	90	1.1250	1.150
F80S3-100	F80A3-100	100	1.2500	1.275
F80S3-110	F80A3-110	110	1.3750	1.400
F80S3-120	F80A3-120	120	1.5000	1.525
F80S3-140	F80A3-140	140	1.7500	1.775
F80S3-150	F80A3-150	150	1.8750	1.900
F80S3-160	F80A3-160	160	2.0000	2.025
F80S3-180	F80A3-180	180	2.2500	2.275
F80S3-200	F80A3-200	200	2.5000	2.525
F80S3-240	F80A3-240	240	3.0000	3.025
F80S3-280	F80A3-280	280	3.5000	3.525
F80S3-320	F80A3-320	320	4.0000	4.025

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
80	PIN HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



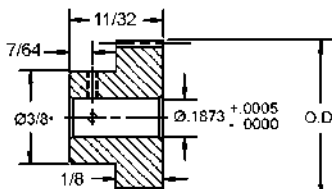
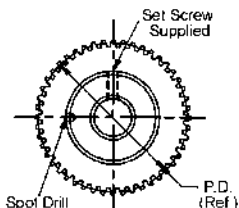
- For 22-27 teeth hub diameter equals .24
Available on request, other numbers of
teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P80S10-24	P80A10-24	24•	.3000	.325
P80S10-26	P80A10-26	26•	.3250	.350
P80S10-27	P80A10-27	27•	.3375	.362
P80S10-28	P80A10-28	28	.3500	.375
P80S10-30	P80A10-30	30	.3750	.400
P80S10-32	P80A10-32	32	.4000	.425
P80S10-36	P80A10-36	36	.4500	.475
P80S10-40	P80A10-40	40	.5000	.525
P80S10-42	P80A10-42	42	.5250	.550
P80S10-44	P80A10-44	44	.5500	.575
P80S10-50	P80A10-50	50	.6250	.650
P80S10-60	P80A10-60	60	.7500	.775
P80S10-80	P80A10-80	80	1.0000	1.025
P80S10-90	P80A10-90	90	1.1250	1.150
P80S10-100	P80A10-100	100	1.2500	1.275
P80S10-110	P80A10-110	110	1.3750	1.400
P80S10-120	P80A10-120	120	1.5000	1.525
P80S10-130	P80A10-130	130	1.6250	1.650
P80S10-140	P80A10-140	140	1.7500	1.775
P80S10-150	P80A10-150	150	1.8750	1.900
P80S10-160	P80A10-160	160	2.0000	2.025
P80S10-170	P80A10-170	170	2.1250	2.150
P80S10-180	P80A10-180	180	2.2500	2.275

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

B

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
80	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



- For 30 teeth hub diameter equals .34

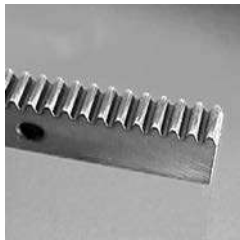
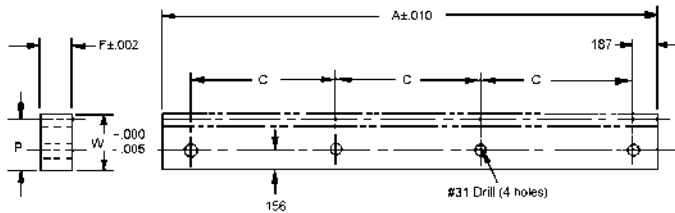
Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P80S19-30	P80A19-30	30	.3750	.400
P80S19-40	P80A19-40	40	.5000	.525
P80S19-44	P80A19-44	44	.5500	.575
P80S19-50	P80A19-50	50	.6250	.650
P80S19-60	P80A19-60	60	.7500	.775
P80S19-65	P80A19-65	65	.8125	.837
P80S19-70	P80A19-70	70	.8750	.900
P80S19-80	P80A19-80	80	1.0000	1.025
P80S19-85	P80A19-85	85	1.0625	1.087
P80S19-90	P80A19-90	90	1.1250	1.150
P80S19-100	P80A19-100	100	1.2500	1.275
P80S19-110	P80A19-110	110	1.3750	1.400
P80S19-120	P80A19-120	120	1.5000	1.525
P80S19-130	P80A19-130	130	1.6250	1.650
P80S19-140	P80A19-140	140	1.7500	1.775
P80S19-150	P80A19-150	150	1.8750	1.900
P80S19-160	P80A19-160	160	2.0000	2.025

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

GEAR RACKS

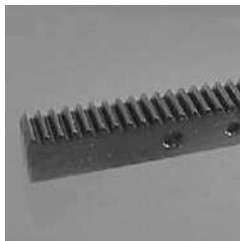
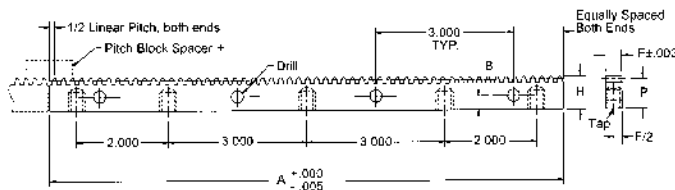
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
80	RECTANGULAR	416 SERIES STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



STOCK NO.	MATERIAL	A (Inch)	P (Ref.)	W	F	C
R4-19 R4-20	STAINLESS ST. ALUMINUM	5"	.3425	.355	.167	1.541

Available on request: special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
80	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



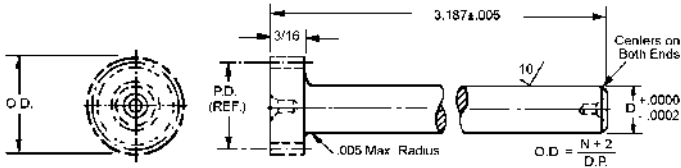
† Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS	SPACER BLOCK												
		AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +0.000 -0.005	F	B	DRILL	TAP
R1-10-G1	R1-10-SB	10*	.0014	.0005	80	.0393	11.028	.3375	.350	.167	.156	#31	#4-40 X 3/16

* Higher quality on request.

PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
80	303 STAINLESS STEEL	10	20°

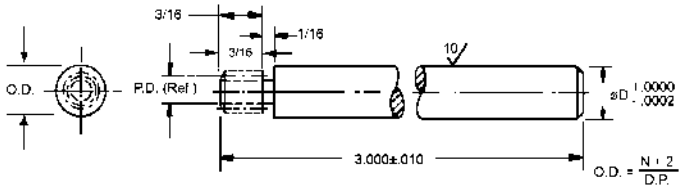


Other numbers of teeth available on request.



B

PITCH	MATERIAL	AGMA QUALITY	PRES. ANGLE
80	303 STAINLESS STEEL	10	20°

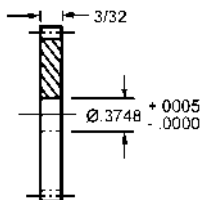
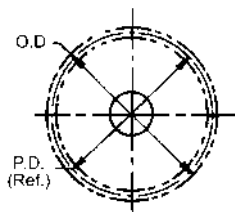


Other numbers of teeth available on request.



SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	HUBLESS	3/8"	3/32"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2° Pressure Angle
1/16" Face

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F96S2-96	F96A2-96	96	1.0000	1.020
F96S2-100	F96A2-100	100	1.0416	1.062
F96S2-105	F96A2-105	105	1.0937	1.114
F96S2-108	F96A2-108	108	1.1250	1.145
F96S2-110	F96A2-110	110	1.1458	1.166
F96S2-120	F96A2-120	120	1.2500	1.270
F96S2-125	F96A2-125	125	1.3020	1.322
F96S2-132	F96A2-132	132	1.3750	1.395
F96S2-140	F96A2-140	140	1.4583	1.479
F96S2-144	F96A2-144	144	1.5000	1.520
F96S2-150	F96A2-150	150	1.5625	1.583
F96S2-160	F96A2-160	160	1.6666	1.687
F96S2-180	F96A2-180	180	1.8750	1.895
F96S2-190	F96A2-190	190	1.9791	2.000
F96S2-192	F96A2-192	192	2.0000	2.020

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	X	3/16"	303 STAINLESS STEEL	10	20°

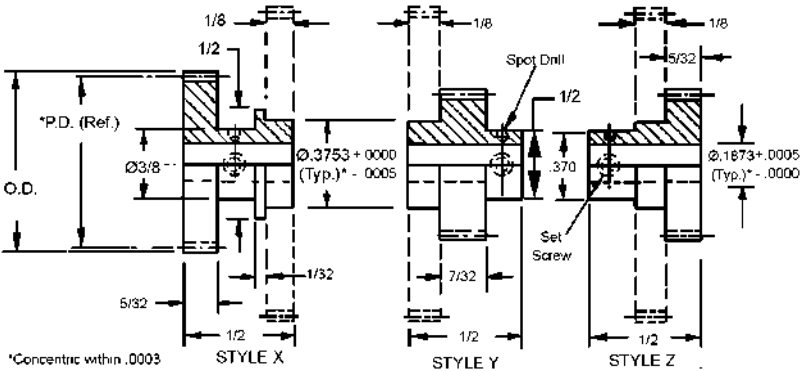
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP96S8-40	96	40	.4166	.428
DP96S8-42		42	.4375	.458
DP96S8-44		44	.4583	.479
DP96S8-45		45	.4687	.490
DP96S8-46		46	.4791	.500
DP96S8-48		48	.5000	.521
DP96S8-50		50	.5208	.542

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	Y	3/16"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP96S10-40	96	40	.4166	.428
DP96S10-42		42	.4375	.458
DP96S10-44		44	.4583	.479
DP96S10-45		45	.4687	.490
DP96S10-46		46	.4791	.500
DP96S10-48		48	.5000	.521
DP96S10-50		50	.5208	.542

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	Z	3/16"	303 STAINLESS STEEL	10	20°

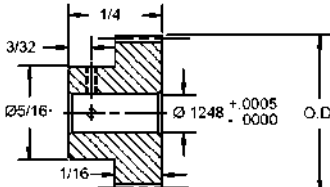
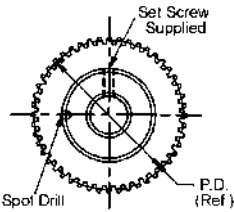
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP96S12-40	96	40	.4166	.428
DP96S12-42		42	.4375	.458
DP96S12-44		44	.4583	.479
DP96S12-45		45	.4687	.490
DP96S12-46		46	.4791	.500
DP96S12-48		48	.5000	.521
DP96S12-50		50	.5208	.542



• Hub runout cuts thru shoulder.
Available on request: Other numbers of teeth; AGMA quality 12 and 14; 14-1/2° Pressure Angle.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	PIN HUB	1/8"	1/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



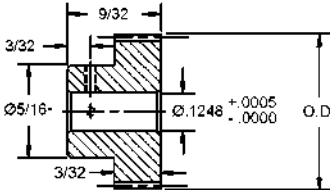
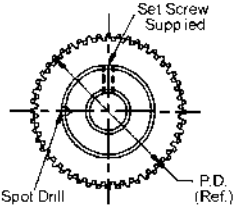
- For 26-30 teeth hub diameter equals .24
- Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P96S5-30	P96A5-30	30	.3125	.333
P96S5-34	P96A5-34	34	.3541	.375
P96S5-35	P96A5-35	35	.3645	.385
P96S5-36	P96A5-36	36	.3750	.395
P96S5-38	P96A5-38	38	.3958	.416
P96S5-40	P96A5-40	40	.4166	.437
P96S5-45	P96A5-45	45	.4687	.489
P96S5-50	P96A5-50	50	.5208	.541
P96S5-52	P96A5-52	52	.5416	.562
P96S5-54	P96A5-54	54	.5625	.583
P96S5-55	P96A5-55	55	.5729	.593
P96S5-56	P96A5-56	56	.5833	.604
P96S5-57	P96A5-57	57	.5937	.614
P96S5-58	P96A5-58	58	.6041	.625
P96S5-60	P96A5-60	60	.6250	.645
P96S5-61	P96A5-61	61	.6354	.656
P96S5-64	P96A5-64	64	.6666	.687
P96S5-65	P96A5-65	65	.6770	.697
P96S5-66	P96A5-66	66	.6875	.708
P96S5-67	P96A5-67	67	.6979	.718
P96S5-70	P96A5-70	70	.7291	.750
P96S5-72	P96A5-72	72	.7500	.770
P96S5-75	P96A5-75	75	.7812	.802
P96S5-76	P96A5-76	76	.7916	.812
P96S5-78	P96A5-78	78	.8125	.833
P96S5-80	P96A5-80	80	.8333	.854
P96S5-82	P96A5-82	82	.8541	.875
P96S5-85	P96A5-85	85	.8854	.906
P96S5-86	P96A5-86	86	.8958	.916
P96S5-88	P96A5-88	88	.9166	.937
P96S5-90	P96A5-90	90	.9375	.958
P96S5-95	P96A5-95	95	.9895	1.010
P96S5-96	P96A5-96	96	1.0000	1.020
P96S5-100	P96A5-100	100	1.0416	1.062
P96S5-102	P96A5-102	102	1.0625	1.083
P96S5-105	P96A5-105	105	1.0937	1.114
P96S5-108	P96A5-108	108	1.1250	1.145
P96S5-110	P96A5-110	110	1.1458	1.166
P96S5-111	P96A5-111	111	1.1562	1.177
P96S5-120	P96A5-120	120	1.2500	1.270
P96S5-140	P96A5-140	140	1.4583	1.479
P96S5-160	P96A5-160	160	1.6666	1.687
P96S5-180	P96A5-180	180	1.8750	1.895

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	PIN HUB	1/8"	3/32"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



B

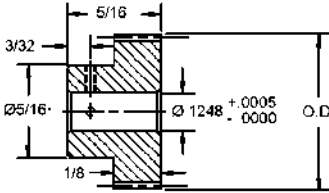
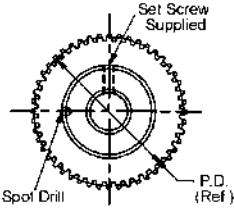
• For 26-30 teeth hub diameter equals .24
Available on request, other numbers of
teeth, AGMA quality 12 and 14, and 14-1/2°
Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P96S7-26	P96A7-26	26•	.2708	.291
P96S7-28	P96A7-28	28•	.2916	.312
P96S7-30	P96A7-30	30•	.3125	.333
P96S7-32	P96A7-32	32•	.3333	.354
P96S7-34	P96A7-34	34	.3541	.375
P96S7-35	P96A7-35	35	.3645	.385
P96S7-36	P96A7-36	36	.3750	.395
P96S7-38	P96A7-38	38	.3958	.416
P96S7-40	P96A7-40	40	.4166	.437
P96S7-42	P96A7-42	42	.4375	.458
P96S7-45	P96A7-45	45	.4687	.489
P96S7-46	P96A7-46	46	.4791	.500
P96S7-48	P96A7-48	48	.5000	.520
P96S7-50	P96A7-50	50	.5208	.541
P96S7-54	P96A7-54	54	.5625	.583
P96S7-55	P96A7-55	55	.5729	.593
P96S7-56	P96A7-56	56	.5833	.604
P96S7-60	P96A7-60	60	.6250	.645
P96S7-62	P96A7-62	62	.6458	.666
P96S7-64	P96A7-64	64	.6666	.687
P96S7-65	P96A7-65	65	.6770	.697
P96S7-70	P96A7-70	70	.7291	.750
P96S7-72	P96A7-72	72	.7500	.770
P96S7-75	P96A7-75	75	.7812	.802
P96S7-78	P96A7-78	78	.8125	.833
P96S7-80	P96A7-80	80	.8333	.854
P96S7-84	P96A7-84	84	.8750	.895
P96S7-90	P96A7-90	90	.9375	.958
P96S7-96	P96A7-96	96	1.0000	1.020
P96S7-100	P96A7-100	100	1.0416	1.062
P96S7-105	P96A7-105	105	1.0937	1.114
P96S7-108	P96A7-108	108	1.1250	1.145
P96S7-120	P96A7-120	120	1.2500	1.270
P96S7-125	P96A7-125	125	1.3020	1.322
P96S7-132	P96A7-132	132	1.3750	1.395
P96S7-140	P96A7-140	140	1.4583	1.479
P96S7-144	P96A7-144	144	1.5000	1.520
P96S7-150	P96A7-150	150	1.5625	1.583
P96S7-160	P96A7-160	160	1.6666	1.687
P96S7-180	P96A7-180	180	1.8750	1.895
P96S7-190	P96A7-190	190	1.9791	2.000
P96S7-192	P96A7-192	192	2.0000	2.020

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	PIN HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



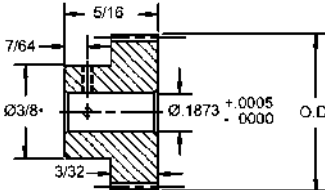
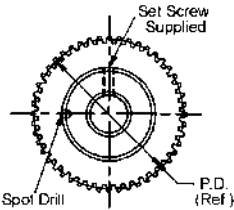
- For 26-32 teeth hub diameter equals .24
- Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P96S10-26	P96A10-26	26•	.2708	.291
P96S10-27	P96A10-27	27•	.2812	.302
P96S10-28	P96A10-28	28•	.2916	.312
P96S10-29	P96A10-29	29•	.3020	.322
P96S10-30	P96A10-30	30•	.3125	.333
P96S10-32	P96A10-32	32•	.3333	.354
P96S10-34	P96A10-34	34	.3541	.375
P96S10-35	P96A10-35	35	.3645	.385
P96S10-36	P96A10-36	36	.3750	.395
P96S10-38	P96A10-38	38	.3958	.416
P96S10-39	P96A10-39	39	.4062	.427
P96S10-40	P96A10-40	40	.4166	.437
P96S10-42	P96A10-42	42	.4375	.458
P96S10-44	P96A10-44	44	.4583	.479
P96S10-46	P96A10-46	46	.4791	.500
P96S10-47	P96A10-47	47	.4895	.510
P96S10-48	P96A10-48	48	.5000	.520
P96S10-50	P96A10-50	50	.5208	.541
P96S10-52	P96A10-52	52	.5416	.562
P96S10-54	P96A10-54	54	.5625	.583
P96S10-56	P96A10-56	56	.5833	.604
P96S10-58	P96A10-58	58	.6041	.625
P96S10-60	P96A10-60	60	.6250	.645
P96S10-62	P96A10-62	62	.6458	.666
P96S10-64	P96A10-64	64	.6666	.687
P96S10-65	P96A10-65	65	.6770	.697
P96S10-67	P96A10-67	67	.6979	.718
P96S10-70	P96A10-70	70	.7291	.750
P96S10-72	P96A10-72	72	.7500	.770
P96S10-74	P96A10-74	74	.7708	.791
P96S10-75	P96A10-75	75	.7812	.802
P96S10-80	P96A10-80	80	.8333	.854
P96S10-84	P96A10-84	84	.8750	.895
P96S10-88	P96A10-88	88	.9166	.937
P96S10-90	P96A10-90	90	.9375	.958
P96S10-96	P96A10-96	96	1.0000	1.020
P96S10-100	P96A10-100	100	1.0416	1.062
P96S10-105	P96A10-105	105	1.0937	1.114
P96S10-127	P96A10-127	127	1.3229	1.343
P96S10-144	P96A10-144	144	1.5000	1.520
P96S10-156	P96A10-156	156	1.6250	1.645
P96S10-168	P96A10-168	168	1.7500	1.770

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	PIN HUB	3/16"	3/32"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



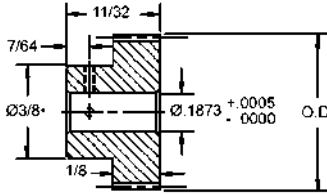
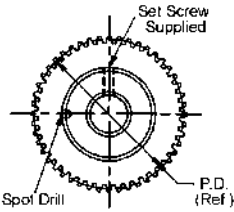
- For 36 teeth hub diameter equals .34
- Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P96S17-36	P96A17-36	36	.3750	.395
P96S17-40	P96A17-40	40	.4166	.437
P96S17-42	P96A17-42	42	.4375	.458
P96S17-44	P96A17-44	44	.4583	.479
P96S17-45	P96A17-45	45	.4687	.489
P96S17-48	P96A17-48	48	.5000	.520
P96S17-50	P96A17-50	50	.5208	.541
P96S17-54	P96A17-54	54	.5625	.583
P96S17-60	P96A17-60	60	.6250	.645
P96S17-61	P96A17-61	61	.6354	.656
P96S17-64	P96A17-64	64	.6666	.687
P96S17-70	P96A17-70	70	.7291	.750
P96S17-72	P96A17-72	72	.7500	.770
P96S17-77	P96A17-77	77	.8020	.822
P96S17-79	P96A17-79	79	.8229	.843
P96S17-80	P96A17-80	80	.8333	.854
P96S17-85	P96A17-85	85	.8854	.906
P96S17-90	P96A17-90	90	.9375	.958
P96S17-92	P96A17-92	92	.9583	.979
P96S17-95	P96A17-95	95	.9895	1.010
P96S17-96	P96A17-96	96	1.0000	1.020
P96S17-100	P96A17-100	100	1.0416	1.062
P96S17-108	P96A17-108	108	1.1250	1.145
P96S17-110	P96A17-110	110	1.1458	1.166
P96S17-120	P96A17-120	120	1.2500	1.270
P96S17-130	P96A17-130	130	1.3541	1.375
P96S17-132	P96A17-132	132	1.3750	1.395
P96S17-140	P96A17-140	140	1.4583	1.479
P96S17-144	P96A17-144	144	1.5000	1.520
P96S17-150	P96A17-150	150	1.5625	1.583
P96S17-156	P96A17-156	156	1.6250	1.645
P96S17-160	P96A17-160	160	1.6666	1.687
P96S17-168	P96A17-168	168	1.7500	1.770
P96S17-180	P96A17-180	180	1.8750	1.895
P96S17-190	P96A17-190	190	1.9791	2.000
P96S17-192	P96A17-192	192	2.0000	2.020

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



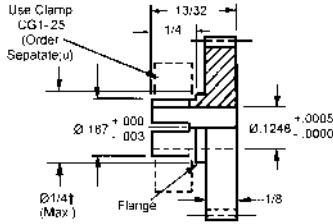
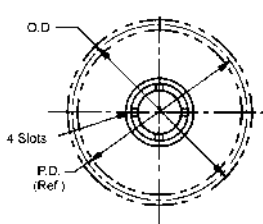
- For 36-38 teeth hub diameter equals .34
- Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P96S19-36	P96A19-36	36•	.3750	.395
P96S19-38	P96A19-38	38•	.3958	.416
P96S19-40	P96A19-40	40	.4166	.437
P96S19-42	P96A19-42	42	.4375	.458
P96S19-44	P96A19-44	44	.4583	.479
P96S19-45	P96A19-45	45	.4687	.489
P96S19-48	P96A19-48	48	.5000	.520
P96S19-50	P96A19-50	50	.5208	.541
P96S19-52	P96A19-52	52	.5416	.562
P96S19-54	P96A19-54	54	.5625	.583
P96S19-60	P96A19-60	60	.6250	.645
P96S19-64	P96A19-64	64	.6666	.687
P96S19-66	P96A19-66	66	.6875	.708
P96S19-70	P96A19-70	70	.7291	.750
P96S19-72	P96A19-72	72	.7500	.770
P96S19-75	P96A19-75	75	.7812	.802
P96S19-77	P96A19-77	77	.8020	.822
P96S19-80	P96A19-80	80	.8333	.854
P96S19-85	P96A19-85	85	.8854	.906
P96S19-90	P96A19-90	90	.9375	.958
P96S19-95	P96A19-95	95	.9895	1.010
P96S19-96	P96A19-96	96	1.0000	1.020
P96S19-100	P96A19-100	100	1.0416	1.062
P96S19-105	P96A19-105	105	1.0937	1.114
P96S19-110	P96A19-110	110	1.1485	1.166
P96S19-120	P96A19-120	120	1.2500	1.270
P96S19-130	P96A19-130	130	1.3541	1.375
P96S19-140	P96A19-140	140	1.4583	1.479
P96S19-160	P96A19-160	160	1.6666	1.687
P96S19-180	P96A19-180	180	1.8750	1.895
P96S19-192	P96A19-192	192	2.0000	2.020

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

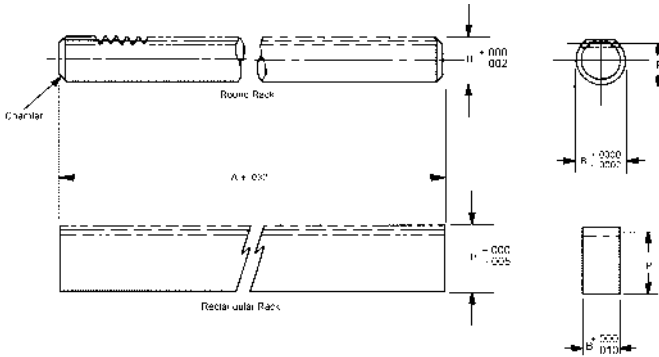
SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	CLAMP HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



GEAR RACKS

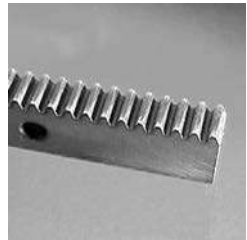
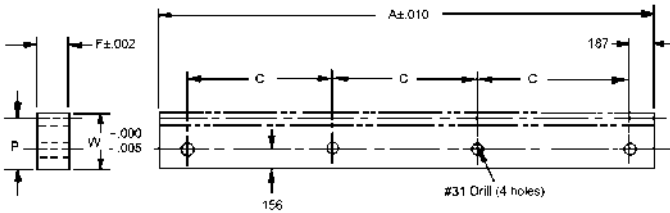
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-20	ROUND	96	.1456	.1872	11	.156	10
R2-16	RECTANGULAR	96	.3466	.167±.005	11	.355	10

Available on request: 14 - 1/2° pressure angle, special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	RECTANGULAR	416 SERIES STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°

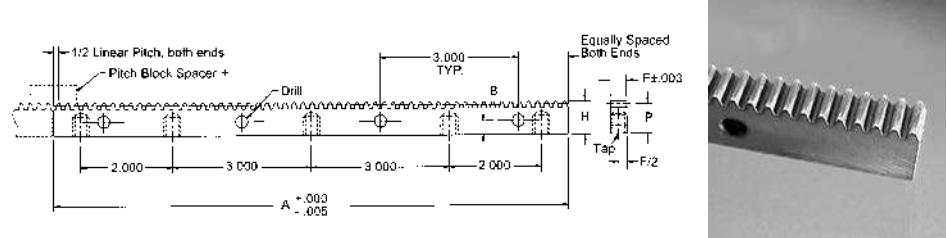


STOCK NO.	MATERIAL	A (Inch)	P (Ref.)	W	F	C
R4-21 R4-22	STAINLESS ST. ALUMINUM	3"	.3446	.355	.167	.875

Available on request: special,
modified and custom racks.

GEAR RACKS

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



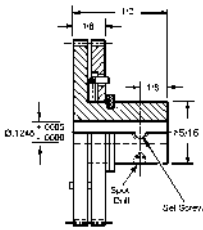
† Spacer block is designed for butting to achieve continuous lengths. On-Line pricing for AGMA 10 only.

RACKS	SPACER BLOCK													
	STOCK NO.	STOCK NO.	AGMA QTY. NO.	MAX ACCUM. ERROR	TOOTH TO TOOTH ERROR	PITCH	LINEAR PITCH	A INCH	P REF.	H +.000 - .005	F	B	DRILL	TAP
R1-11-G1	R1-11-SB		10*	.0014	.0005	96	.0327	11.022	.3396	.350	.167	.156	#31	#4-40 X 3/16
R3-8-G1	R3-8-SB		10*	.0014	.0005	96	.0327	11.022	.3446	.355	.167	.156	#31	#4-40 X 3/16

* Higher quality on request.

ANTI-BACKLASH PINIONS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	PIN HUB	1/8"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



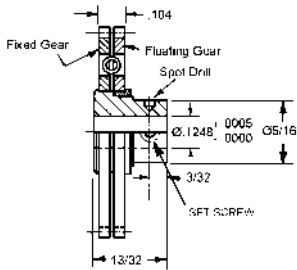
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AP96FS-60	AP96GS-60	60		.6250	.646
AP96FS-72	AP96GS-72	72	.1248	.7500	.771
AP96FS-96	AP96GS-96	96		1.0000	1.021

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

HUB MATERIAL:
303 Stainless Steel

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	PIN HUB	1/8"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



HUB MATERIAL: 303 Stainless Steel

303 STAINLESS STEEL STOCK NO.	2024 T4 ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE
AP96AS-54	-	54	.5625	.583	SCISSOR
AP96AS-55	-	55	.5729	.593	
AP96AS-56	-	56	.5833	.604	
AP96AS-60	-	60	.6250	.645	
AP96AS-64	-	64	.6666	.687	
AP96AS-66	-	66	.6875	.708	
AP96AS-72	AP96NS-72	72	.7500	.770	
AP96AS-80	AP96NS-80	80	.8333	.854	
AP96AS-84	AP96NS-84	84	.8750	.895	
AP96AS-90	AP96NS-90	90	.9375	.958	
AP96AS-95	AP96NS-95	95	.9895	1.010	COIL
AP96A-96	AP96N-96	96	1.0000	1.020	
AP96A-105	AP96N-105	105	1.0937	1.114	
AP96A-108	AP96N-108	108	1.1250	1.145	
AP96A-112	AP96N-112	112	1.1666	1.187	
AP96A-120	AP96N-120	120	1.2500	1.270	
AP96A-126	AP96N-126	126	1.3125	1.333	
AP96A-128	AP96N-128	128	1.3333	1.354	
AP96A-140	AP96N-140	140	1.4583	1.479	
AP96A-144	AP96N-144	144	1.5000	1.520	
AP96A-150	AP96N-150	150	1.5625	1.583	
AP96A-155	AP96N-155	155	1.6145	1.635	
AP96A-160	AP96N-160	160	1.6666	1.687	
AP96A-165	AP96N-165	165	1.7187	1.739	
AP96A-168	AP96N-168	168	1.7500	1.770	
AP96A-192	AP96N-192	192	2.0000	2.020	
AP96A-216	AP96N-216	216	2.2500	2.270	
AP96A-240	AP96N-240	240	2.5000	2.520	
AP96A-264	AP96N-264	264	2.7500	2.770	

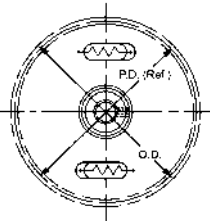
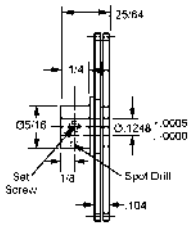
Available on request:

- Other numbers of teeth;
- AGMA Quality 12 and 14;
- 14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	PIN HUB	1/8"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP96SS-76	AP96TS-76	76	.7916
AP96SS-80	AP96TS-80	80	.8333
AP96SS-84	AP96TS-84	84	.8750
AP96SS-90	AP96TS-90	90	.9375
AP96SS-96	AP96TS-96	96	1.0000
AP96SS-100	AP96TS-100	100	1.0416
AP96SS-108	AP96TS-108	108	1.1250
AP96SS-112	AP96TS-112	112	1.1666
AP96SS-120	AP96TS-120	120	1.2500
AP96SS-125	AP96TS-125	125	1.3020
AP96S-130	AP96T-130	130	1.3541
AP96S-135	AP96T-135	135	1.4062
AP96S-140	AP96T-140	140	1.4583
AP96S-144	AP96T-144	144	1.5000
AP96S-145	AP96T-145	145	1.5104
AP96S-150	AP96T-150	150	1.5625
AP96S-160	AP96T-160	160	1.6666
AP96S-170	AP96T-170	170	1.7708
AP96S-180	AP96T-180	180	1.8750
AP96S-190	AP96T-190	190	1.9791
AP96S-192	AP96T-192	192	2.0000
AP96S-200	AP96T-200	200	2.0833
AP96S-210	AP96T-210	210	2.1875
AP96S-220	AP96T-220	220	2.2916
AP96S-230	AP96T-230	230	2.3958
AP96S-240	AP96T-240	240	2.5000
AP96S-250	AP96T-250	250	2.6041
AP96S-260	AP96T-260	260	2.7083
AP96S-264	AP96T-264	264	2.7500
AP96S-270	AP96T-270	270	2.8125
AP96S-288	AP96T-288	288	3.0000
AP96S-300	AP96T-300	300	3.1250

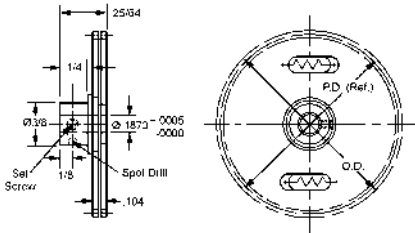
O.D. = P.D. +.031
HUB MATERIAL: 303 Stainless Steel

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	PIN HUB	3/16"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP96US-90	AP96VS-90	90	.9375
AP96US-96	AP96VS-96	96	1.0000
AP96US-100	AP96VS-100	100	1.0416
AP96US-108	AP96VS-108	108	1.1250
AP96US-112	AP96VS-112	112	1.1666
AP96US-120	AP96VS-120	120	1.2500
AP96US-125	AP96VS-125	125	1.3020
AP96U-130	AP96V-130	130	1.3541
AP96U-135	AP96V-135	135	1.4062
AP96U-140	AP96V-140	140	1.4583
AP96U-144	AP96V-144	144	1.5000
AP96U-145	AP96V-145	145	1.5104
AP96U-150	AP96V-150	150	1.5625
AP96U-160	AP96V-160	160	1.6666
AP96U-170	AP96V-170	170	1.7708
AP96U-180	AP96V-180	180	1.8750
AP96U-190	AP96V-190	190	1.9791
AP96U-192	AP96V-192	192	2.0000
AP96U-200	AP96V-200	200	2.0833
AP96U-210	AP96V-210	210	2.1875
AP96U-220	AP96V-220	220	2.2916
AP96U-230	AP96V-230	230	2.3958
AP96U-240	AP96V-240	240	2.5000
AP96U-250	AP96V-250	250	2.6041
AP96U-260	AP96V-260	260	2.7083
AP96U-264	AP96V-264	264	2.7500
AP96U-270	AP96V-270	270	2.8125
AP96U-288	AP96V-288	288	3.0000
AP96U-300	AP96V-300	300	3.1250

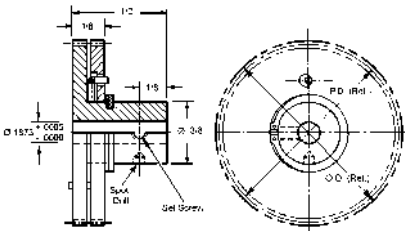
O.D. = P.D. +.031
HUB MATERIAL: 303 Stainless Steel

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH PINIONS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	PIN HUB	3/16"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

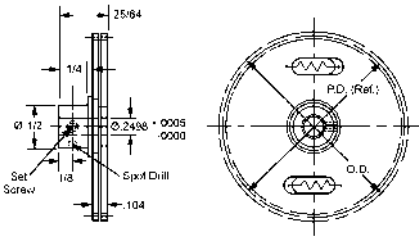


STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AP96HS-60	AP96JS-60	60		.6250	.646
AP96HS-72	AP96JS-72	72	.1873	.7500	.771
AP96HS-96	AP96JS-96	96		1.0000	1.021

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	PIN HUB	1/4"	.104"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AP96WS-96	AP96XS-96	96	1.0000
AP96WS-100	AP96XS-100	100	1.0416
AP96WS-108	AP96XS-108	108	1.1250
AP96WS-112	AP96XS-112	112	1.1666
AP96WS-120	AP96XS-120	120	1.2500
AP96WS-125	AP96XS-125	125	1.3020
AP96W-130	AP96X-130	130	1.3541
AP96W-135	AP96X-135	135	1.4062
AP96W-140	AP96X-140	140	1.4583
AP96W-144	AP96X-144	144	1.5000
AP96W-145	AP96X-145	145	1.5104
AP96W-150	AP96X-150	150	1.5625
AP96W-160	AP96X-160	160	1.6666
AP96W-170	AP96X-170	170	1.7708
AP96W-180	AP96X-180	180	1.8750
AP96W-190	AP96X-190	190	1.9791
AP96W-192	AP96X-192	192	2.0000
AP96W-200	AP96X-200	200	2.0833
AP96W-210	AP96X-210	210	2.1875
AP96W-220	AP96X-220	220	2.2916
AP96W-230	AP96X-230	230	2.3958
AP96W-240	AP96X-240	240	2.5000
AP96W-250	AP96X-250	250	2.6041
AP96W-260	AP96X-260	260	2.7083
AP96W-264	AP96X-264	264	2.7500
AP96W-270	AP96X-270	270	2.8125
AP96W-288	AP96X-288	288	3.0000
AP96W-300	AP96X-300	300	3.1250

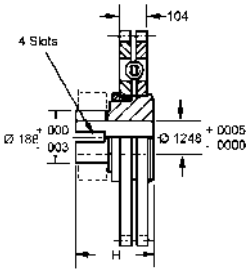
O.D. = P.D. +.031
HUB MATERIAL: 303 Stainless Steel

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	CLAMP HUB	1/8"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



Hub Material: 303 Stainless Steel

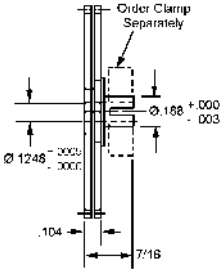
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO.OF TEETH	PITCH DIA.	OUTSIDE DIA.	SPRING STYLE	H
AC96AS-54	-	54	.5625	.583	SCISSOR	27/64
AC96AS-55	-	55	.5729	.593		
AC96AS-56	-	56	.5833	.604		
AC96AS-60	-	60	.6250	.645		
AC96AS-64	-	64	.6666	.687		
AC96AS-66	-	66	.6875	.708		
AC96AS-72	AC96NS-72	72	.7500	.770		
AC96AS-80	AC96NS-80	80	.8333	.854		
AC96AS-84	AC96NS-84	84	.8750	.895		
AC96AS-90	AC96NS-90	90	.9375	.958		
AC96AS-95	AC96NS-95	95	.9895	1.010		
AC96A-96	AC96N-96	96	1.0000	1.020	COIL	25/64
AC96A-105	AC96N-105	105	1.0937	1.114		
AC96A-108	AC96N-108	108	1.1250	1.145		
AC96A-112	AC96N-112	112	1.1666	1.187		
AC96A-120	AC96N-120	120	1.2500	1.270		
AC96A-126	AC96N-126	126	1.3125	1.333		
AC96A-128	AC96N-128	128	1.3333	1.354		
AC96A-140	AC96N-140	140	1.4583	1.479		
AC96A-144	AC96N-144	144	1.5000	1.520		
AC96A-150	AC96N-150	150	1.5625	1.583		
AC96A-155	AC96N-155	155	1.6145	1.635		
AC96A-160	AC96N-160	160	1.6666	1.687		
AC96A-165	AC96N-165	165	1.7187	1.739		
AC96A-168	AC96N-168	168	1.7500	1.770		
AC96A-192	AC96N-192	192	2.0000	2.020		
AC96A-216	AC96N-216	216	2.2500	2.270		
AC96A-240	AC96N-240	240	2.5000	2.520		
AC96A-264	AC96N-264	264	2.7500	2.770		

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	CLAMP HUB	1/8"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC96SS-76	AC96TS-76	76	.7916
AC96SS-80	AC96TS-80	80	.8333
AC96SS-84	AC96TS-84	84	.8750
AC96SS-90	AC96TS-90	90	.9375
AC96SS-96	AC96TS-96	96	1.0000
AC96SS-100	AC96TS-100	100	1.0416
AC96SS-108	AC96TS-108	108	1.1250
AC96SS-112	AC96TS-112	112	1.1666
AC96SS-120	AC96TS-120	120	1.2500
AC96SS-125	AC96TS-125	125	1.3020
AC96S-130	AC96T-130	130	1.3541
AC96S-135	AC96T-135	135	1.4062
AC96S-140	AC96T-140	140	1.4583
AC96S-144	AC96T-144	144	1.5000
AC96S-145	AC96T-145	145	1.5104
AC96S-150	AC96T-150	150	1.5625
AC96S-160	AC96T-160	160	1.6666
AC96S-170	AC96T-170	170	1.7708
AC96S-180	AC96T-180	180	1.8750
AC96S-190	AC96T-190	190	1.9791
AC96S-192	AC96T-192	192	2.0000
AC96S-200	AC96T-200	200	2.0833
AC96S-210	AC96T-210	210	2.1875
AC96S-220	AC96T-220	220	2.2916
AC96S-230	AC96T-230	230	2.3958
AC96S-240	AC96T-240	240	2.5000
AC96S-250	AC96T-250	250	2.6041
AC96S-260	AC96T-260	260	2.7083
AC96S-264	AC96T-264	264	2.7500
AC96S-270	AC96T-270	270	2.8125
AC96S-288	AC96T-288	288	3.0000
AC96S-300	AC96T-300	300	3.1250

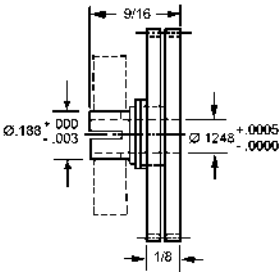
O.D. = P.D. +.031
HUB MATERIAL: 303 Stainless Steel

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	CLAMP HUB	1/8"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



HUB MATERIAL:
303 Stainless Steel

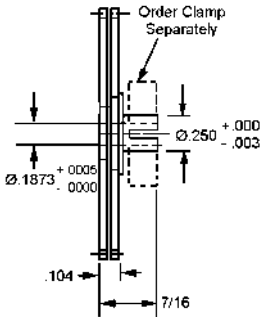
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AC96FS-60	AC96GS-60	60		.6250	.646
AC96FS-72	AC96GS-72	72	.1248	.7500	.771
AC96FS-96	AC96GS-96	96		1.0000	1.021

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	CLAMP HUB	3/16"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC96US-90	AC96VS-90	90	.9375
AC96US-96	AC96VS-96	96	1.0000
AC96US-100	AC96VS-100	100	1.0416
AC96US-108	AC96VS-108	108	1.1250
AC96US-112	AC96VS-112	112	1.1666
AC96US-120	AC96VS-120	120	1.2500
AC96US-125	AC96VS-125	125	1.3020
AC96U-130	AC96V-130	130	1.3541
AC96U-135	AC96V-135	135	1.4062
AC96U-140	AC96V-140	140	1.4583
AC96U-144	AC96V-144	144	1.5000
AC96U-145	AC96V-145	145	1.5104
AC96U-150	AC96V-150	150	1.5625
AC96U-160	AC96V-160	160	1.6666
AC96U-170	AC96V-170	170	1.7708
AC96U-180	AC96V-180	180	1.8750
AC96U-190	AC96V-190	190	1.9791
AC96U-192	AC96V-192	192	2.0000
AC96U-200	AC96V-200	200	2.0833
AC96U-210	AC96V-210	210	2.1875
AC96U-220	AC96V-220	220	2.2916
AC96U-230	AC96V-230	230	2.3958
AC96U-240	AC96V-240	240	2.5000
AC96U-250	AC96V-250	250	2.6041
AC96U-260	AC96V-260	260	2.7083
AC96U-264	AC96V-264	264	2.7500
AC96U-270	AC96V-270	270	2.8125
AC96U-288	AC96V-288	288	3.0000
AC96U-300	AC96V-300	300	3.1250

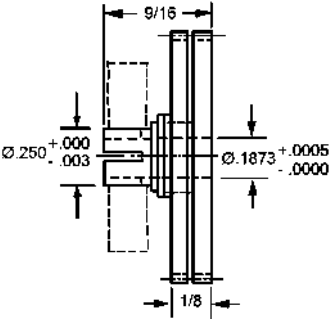
HUB MATERIAL: 303 Stainless Steel

Available on request:
Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRES. ANGLE
96	CLAMP HUB	3/16"	1/8"	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



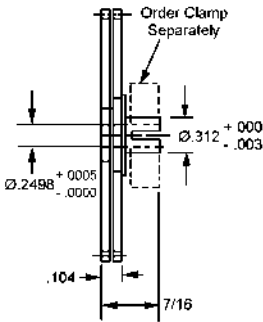
STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	NO. OF TEETH	BORE	PITCH DIA.	OUTSIDE DIA.
AC96HS-60	AC96JS-60	60		.6250	.646
AC96HS-72	AC96JS-72	72	.1873	.7500	.771
AC96HS-96	AC96JS-96	96		1.0000	1.021

Available on request:
Other numbers of teeth
AGMA Quality 12 and 14
14-1/2° Pressure Angle

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ANTI-BACKLASH GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	CLAMP HUB	1/4"	.104	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°



B

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIAMETER
AC96WS-96	AC96XS-96	96	1.0000
AC96WS-100	AC96XS-100	100	1.0416
AC96WS-108	AC96XS-108	108	1.1250
AC96WS-112	AC96XS-112	112	1.1666
AC96WS-120	AC96XS-120	120	1.2500
AC96WS-125	AC96XW-125	125	1.3020
AC96W-130	AC96X-130	130	1.3541
AC96W-135	AC96X-135	135	1.4062
AC96W-140	AC96X-140	140	1.4583
AC96W-144	AC96X-144	144	1.5000
AC96W-145	AC96X-145	145	1.5104
AC96W-150	AC96X-150	150	1.5625
AC96W-160	AC96X-160	160	1.6666
AC96W-170	AC96X-170	170	1.7708
AC96W-180	AC96X-180	180	1.8750
AC96W-190	AC96X-190	190	1.9791
AC96W-192	AC96X-192	192	2.0000
AC96W-200	AC96X-200	200	2.0833
AC96W-210	AC96X-210	210	2.1875
AC96W-220	AC96X-220	220	2.2916
AC96W-230	AC96X-230	230	2.3958
AC96W-240	AC96X-240	240	2.5000
AC96W-250	AC96X-250	250	2.6041
AC96W-260	AC96X-260	260	2.7083
AC96W-264	AC96X-264	264	2.7500
AC96W-270	AC96X-270	270	2.8125
AC96W-288	AC96X-288	288	3.0000
AC96W-300	AC96X-300	300	3.1250

HUB MATERIAL: 303 Stainless Steel

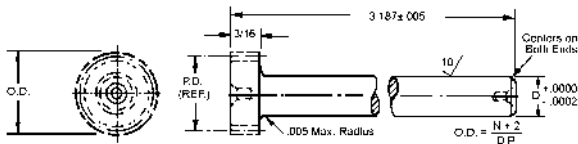
Available on request:

Other numbers of teeth;
AGMA Quality 12 and 14 (some dimensions may vary);
14-12° pressure angle.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

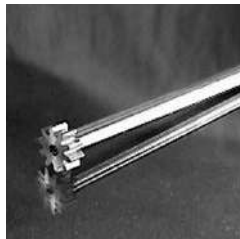
PINION SHAFTS

PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	303 STAINLESS STEEL	10	20°

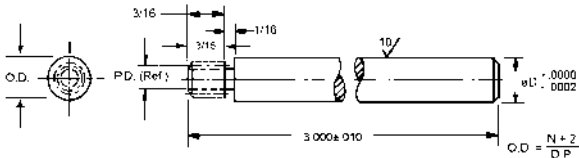


STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS96S2-24H	96	24	.2500	.1247

Other numbers of teeth available on request.



PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	303 STAINLESS STEEL	10	20°

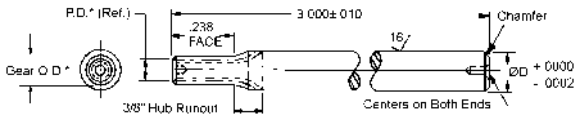


STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS96S2-10	96	10	.1042	.1247
PS96S3-10		10	.1042	.1872
PS96S3-12		12	.1250	.1872
PS96S3-14		14	.1458	.1872
PS96S4-16		16	.1666	.2497
PS96S4-18		18	.1875	.2497
PS96S4-20		20	.2083	.2497

Other numbers of teeth available on request.



PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	303 STAINLESS STEEL	10	20°



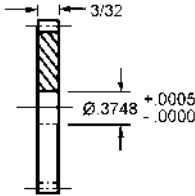
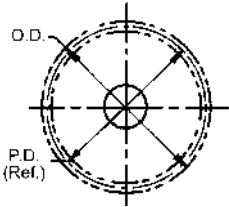
STOCK NO.	PITCH	NO. OF TEETH	D	ENLARGED	
				PITCH DIAMETER	OUTSIDE DIA.
B-PS96S3-10	96	10	.1872	.1128	.133
B-PS96S3-11		11		.1220	.142
B-PS96S3-12		12		.1312	.152
B-PS96S3-13		13		.1404	.161
B-PS96S3-14		14		.1496	.170
B-PS96S3-15		15		.1588	.179
B-PS96S3-16	96	16	.2497	.1680	.187
B-PS96S4-17		17		.1772	.198

Other numbers of teeth available on request.



SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	HUBLESS	3/8"	3/32"	303 STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°



Available on request:
Pin or Clamp hubs assembled
Other numbers of teeth
14 - 1/2° Pressure Angle
1/16" Face

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
F120S2-96	F120A2-96	96	.8000	.816
F120S2-108	F120A2-108	108	.9000	.916
F120S2-120	F120A2-120	120	1.0000	1.016
F120S2-132	F120A2-132	132	1.1000	1.116
F120S2-144	F120A2-144	144	1.2000	1.216
F120S2-168	F120A2-168	168	1.4000	1.416
F120S2-180	F120A2-180	180	1.5000	1.516
F120S2-192	F120A2-192	192	1.6000	1.616

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	X	1/4"	303 STAINLESS STEEL	10	20°

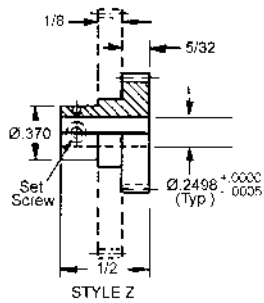
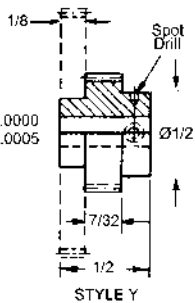
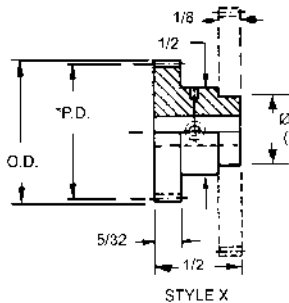
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP120S14-48	120	48	.4000	.417
DP120S14-50		50	.4166	.433
DP120S14-60		60	.5000	.517

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	Y	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP120S16-48	120	48	.4000	.417
DP120S16-50		50	.4166	.433
DP120S16-60		60	.5000	.517

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	Y	1/4"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP120S18-48	120	48	.4000	.417
DP120S18-50		50	.4166	.433
DP120S18-60		60	.5000	.517



*Concentric within .0003
Order hubless gear separately.

CLUSTER GEARS & HUBS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	X	3/16"	303 STAINLESS STEEL	10	20°

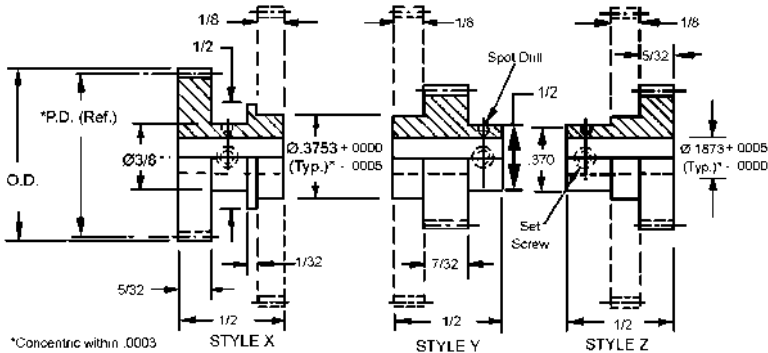
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP120S8-48	120	48	.4000	.417
DP120S8-50		50	.4166	.433
DP120S8-54		54	.4500	.467
DP120S8-55		55	.4583	.475
DP120S8-60		60	.5000	.517
DP120S8-80		80	.6666	.683

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	Y	3/16"	303 STAINLESS STEEL	10	20°

STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP120S10-48	120	48	.4000	.417
DP120S10-50		50	.4166	.433
DP120S10-54		54	.4500	.467
DP120S10-55		55	.4583	.475
DP120S10-60		60	.5000	.517
DP120S10-80		80	.6666	.683

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	Z	3/16"	303 STAINLESS STEEL	10	20°

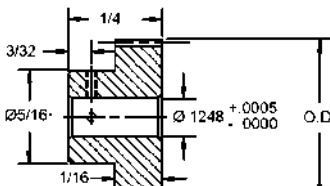
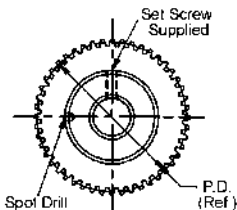
STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
DP120S12-48	120	48	.4000	.417
DP120S12-50		50	.4166	.433
DP120S12-54		54	.4500	.467
DP120S12-55		55	.4583	.475
DP120S12-60		60	.5000	.517
DP120S12-80		80	.6666	.683



• Hub runout cuts thru shoulder.
Available on request: Other numbers of teeth; AGMA quality 12 and 14; 14-1/2° Pressure Angle.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	PIN HUB	1/8"	1/16"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



- For 31-40 teeth hub diameter equals .23

Available on request, other numbers of teeth and 14-1/2° Pressure Angle.

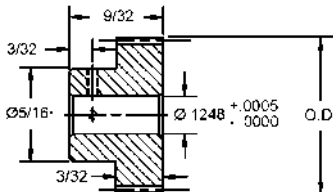
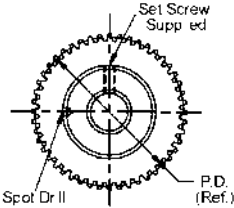
303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P120S5-32	P120A5-32	32•	.2666	.283
P120S5-33	P120A5-33	33•	.2750	.291
P120S5-34	P120A5-34	34•	.2833	.300
P120S5-36	P120A5-36	36•	.3000	.316
P120S5-39	P120A5-39	39•	.3250	.341
P120S5-40	P120A5-40	40•	.3333	.350
P120S5-42	P120A5-42	42	.3500	.366
P120S5-44	P120A5-44	44	.3666	.383
P120S5-45	P120A5-45	45	.3750	.391
P120S5-48	P120A5-48	48	.4000	.416
P120S5-50	P120A5-50	50	.4166	.433
P120S5-54	P120A5-54	54	.4500	.466
P120S5-60	P120A5-60	60	.5000	.516
P120S5-65	P120A5-65	65	.5416	.558
P120S5-66	P120A5-66	66	.5500	.566
P120S5-70	P120A5-70	70	.5833	.600
P120S5-72	P120A5-72	72	.6000	.616
P120S5-75	P120A5-75	75	.6250	.641
P120S5-78	P120A5-78	78	.6500	.666
P120S5-80	P120A5-80	80	.6666	.683
P120S5-84	P120A5-84	84	.7000	.716
P120S5-90	P120A5-90	90	.7500	.766
P120S5-96	P120A5-96	96	.8000	.816
P120S5-100	P120A5-100	100	.8333	.850
P120S5-102	P120A5-102	102	.8500	.866
P120S5-108	P120A5-108	108	.9000	.916
P120S5-114	P120A5-114	114	.9500	.966
P120S5-120	P120A5-120	120	1.0000	1.016
P120S5-126	P120A5-126	126	1.0500	1.066
P120S5-127	P120A5-127	127	1.0583	1.075
P120S5-130	P120A5-130	130	1.0833	1.100
P120S5-132	P120A5-132	132	1.1000	1.116
P120S5-138	P120A5-138	138	1.1500	1.166
P120S5-140	P120A5-140	140	1.1666	1.183
P120S5-144	P120A5-144	144	1.2000	1.216
P120S5-150	P120A5-150	150	1.2500	1.266
P120S5-156	P120A5-156	156	1.3000	1.316
P120S5-162	P120A5-162	162	1.3500	1.366
P120S5-180	P120A5-180	180	1.5000	1.516

For Couplings See Section G.

For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	PIN HUB	1/8"	3/32"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



B

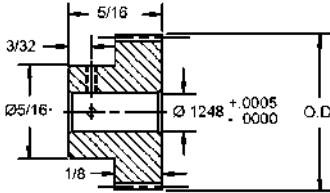
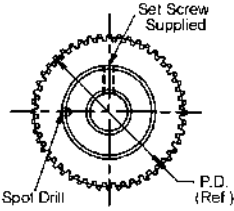
• For 31-40 teeth hub diameter equals .23
Available on request, other numbers of
teeth, AGMA quality 12 and 14, and 14-1/2°
Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P120S7-35	P120A7-35	35	.2916	.308
P120S7-40	P120A7-40	40	.3333	.350
P120S7-41	P120A7-41	41	.3416	.358
P120S7-45	P120A7-45	45	.3750	.391
P120S7-48	P120A7-48	48	.4000	.416
P120S7-50	P120A7-50	50	.4166	.433
P120S7-52	P120A7-52	52	.4333	.450
P120S7-56	P120A7-56	56	.4666	.483
P120S7-57	P120A7-57	57	.4750	.491
P120S7-59	P120A7-59	59	.4916	.508
P120S7-60	P120A7-60	60	.5000	.516
P120S7-61	P120A7-61	61	.5083	.525
P120S7-64	P120A7-64	64	.5333	.550
P120S7-65	P120A7-65	65	.5416	.558
P120S7-67	P120A7-67	67	.5583	.575
P120S7-70	P120A7-70	70	.5833	.600
P120S7-72	P120A7-72	72	.6000	.616
P120S7-73	P120A7-73	73	.6083	.625
P120S7-90	P120A7-90	90	.7500	.766
P120S7-96	P120A7-96	96	.8000	.816
P120S7-100	P120A7-100	100	.8333	.850
P120S7-108	P120A7-108	108	.9000	.916
P120S7-110	P120A7-110	110	.9166	.933
P120S7-120	P120A7-120	120	1.0000	1.016
P120S7-130	P120A7-130	130	1.0833	1.100
P120S7-140	P120A7-140	140	1.1666	1.183
P120S7-144	P120A7-144	144	1.2000	1.216
P120S7-150	P120A7-150	150	1.2500	1.266
P120S7-156	P120A7-156	156	1.3000	1.316
P120S7-160	P120A7-160	160	1.3333	1.350
P120S7-162	P120A7-162	162	1.3500	1.366
P120S7-168	P120A7-168	168	1.4000	1.416
P120S7-170	P120A7-170	170	1.4166	1.433
P120S7-174	P120A7-174	174	1.4500	1.466
P120S7-180	P120A7-180	180	1.5000	1.516
P120S7-185	P120A7-185	185	1.5416	1.558

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

SPUR GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	PIN HUB	1/8"	1/8"	303 STAINLESS STEEL AND ALUMINUM ANODIZED	10	20°



- For 31-40 teeth hub diameter equals .23

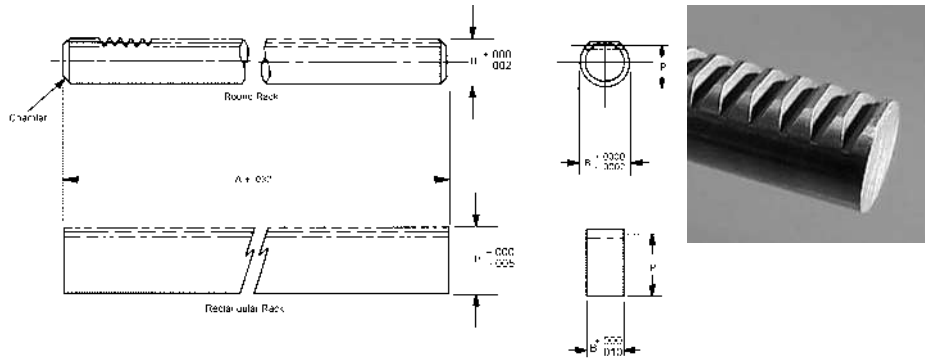
Available on request, other numbers of teeth, AGMA quality 12 and 14, and 14-1/2° Pressure Angle.

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	OUTSIDE DIA.
P120S10-32	P120A10-32	32•	.2666	.283
P120S10-34	P120A10-34	34•	.2833	.300
P120S10-36	P120A10-36	36•	.3000	.316
P120S10-38	P120A10-38	38•	.3166	.333
P120S10-40	P120A10-40	40•	.3333	.350
P120S10-41	P120A10-41	41	.3416	.358
P120S10-43	P120A10-43	43	.3583	.375
P120S10-44	P120A10-44	44	.3666	.383
P120S10-45	P120A10-45	45	.3750	.391
P120S10-47	P120A10-47	47	.3916	.408
P120S10-48	P120A10-48	48	.4000	.416
P120S10-50	P120A10-50	50	.4166	.433
P120S10-55	PI 20A10-55	55	.4583	.475
P120S10-59	P120A10-59	59	.4916	.508
P120S10-60	P120A10-60	60	.5000	.516
P120S10-61	PI 20A10-61	61	.5083	.525
P120S10-64	P120A10-64	64	.5333	.550
P120S10-65	P120A10-65	65	.5416	.558
P120S10-70	P120A10-70	70	.5833	.600
P120S10-72	P120A10-72	72	.6000	.616
P120S10-75	P120A10-75	75	.6250	.641
P120S10-80	P120A10-80	80	.6666	.683
P120S10-85	P120A10-85	85	.7083	.725
P120S10-90	P120A10-90	90	.7500	.766
P120S10-96	P120A10-96	96	.8000	.816
P120S10-100	P120A10-100	100	.8333	.850
P120S10-110	P120A10-110	110	.9166	.933
P120S10-120	P120A10-120	120	1.0000	1.016
P120S10-130	P120A10-130	130	1.0833	1.100
P120S10-140	P120A10-140	140	1.1666	1.183
P120S10-150	P120A10-150	150	1.2500	1.266
P120S10-160	P120A10-160	160	1.3333	1.350
P120S10-170	P120A10-170	170	1.4166	1.433
P120S10-180	P120A10-180	180	1.5000	1.516

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

GEAR RACKS

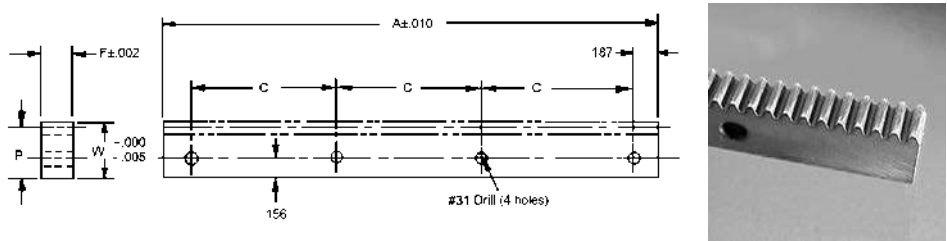
PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	ROUND & RECTANGULAR	416 SERIES STAINLESS STEEL STRESSED RELIEVED	10	20°



STOCK NO.	RACK STYLE	PITCH	P (Ref.)	B	A	H	AGMA QUALITY
R2-21	ROUND	120	.1067	.1247	11	.115	10
R2-17	RECTANGULAR	120	.3467	.167±.005	11	.355	10

Available on request: 14 - 1/2° pressure angle, special, modified and custom racks.

PITCH	STYLE	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	RECTANGULAR	416 SERIES STAINLESS STEEL AND 2024-T4 ALUMINUM ANODIZED	10	20°

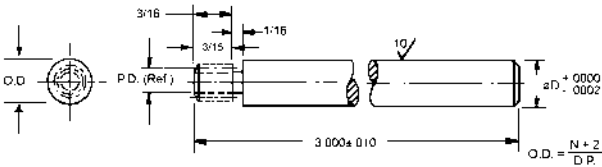


STOCK NO.	MATERIAL	A (Inch)	P (Ref.)	W	F	C
R4-23 R4-24	STAINLESS ST. ALUMINUM	3"	.3467	.355	.167	.875

Available on request: special, modified and custom racks.

PINION SHAFTS

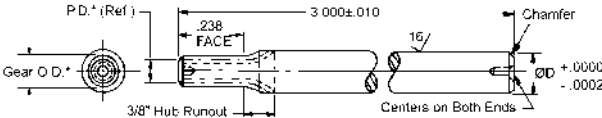
PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	303 STAINLESS STEEL	10	20°



STOCK NO.	PITCH	NO. OF TEETH	PITCH DIA.	D
PS120S2-12	120	12	.10000	.1247

Other numbers of teeth available on request.

PITCH	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	303 STAINLESS STEEL	10	20°

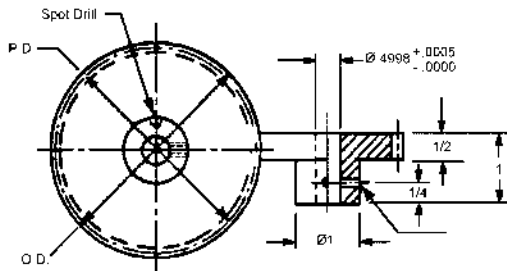
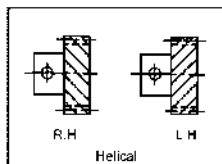


STOCK NO.	PITCH	NO. OF TEETH	D	ENLARGED	
				PITCH DIAMETER	OUTSIDE DIA.
B-PS120S2-10	120	10	.1247	.0902	.106
B-PS120S2-12		12		.1050	.121
B-PS120S3-15	120	15	.1872	.1270	.143
B-PS120S3-17		17		.1418	.158

Other numbers of teeth available on request.

HELICAL GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE	HELIX ANGLE
16	R & L Hand PIN HUB	1/2"	303 Stainless Steel	9	20°	45°

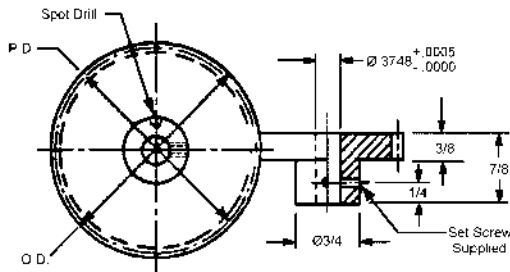
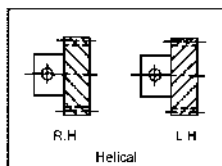


RIGHT HAND STOCK NO.	LEFT HAND STOCK NO.	NO. OF TEETH	P.D.	O.D.
H16S38-R12	H16S38-L12	12•	1.0600	1.185
H16S38-R16	H16S38-L16	16	1.4142	1.539
H16S38-R20	H16S38-L20	20	1.7677	1.892
H16S38-R24	H16S38-L24	24	2.1213	2.246
H16S38-R32	H16S38-L32	32	2.8284	2.953
H16S38-R40	H16S38-L40	40	3.5355	3.660
H16S38-R48	H16S38-L48	48	4.2426	4.367



• For 11-12 teeth hub diameter is .81

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE	HELIX ANGLE
20	R & L Hand PIN HUB	3/8"	303 Stainless Steel	9	20°	45°



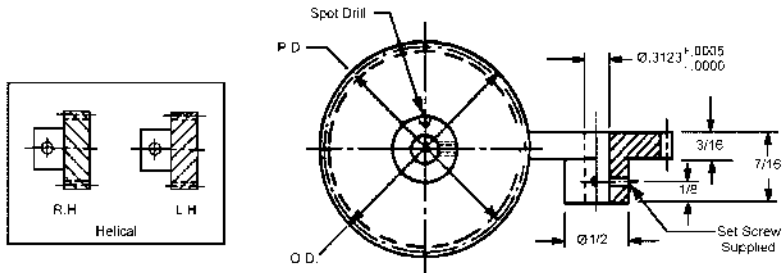
RIGHT HAND STOCK NO.	LEFT HAND STOCK NO.	NO. OF TEETH	P.D.	O.D.
H20S35-R11	H20S35-L11	11•	.7778	.877
H20S35-R15	H20S35-L15	15	1.0606	1.160
H20S35-R20	H20S35-L20	20	1.4142	1.514
H20S35-R25	H20S35-L25	25	1.7677	1.867
H20S35-R30	H20S35-L30	30	2.1213	2.221
H20S35-R40	H20S35-L40	40	2.8284	2.928
H20S35-R50	H20S35-L50	50	3.5355	3.635
H20S35-R60	H20S35-L60	60	4.2426	4.342



• For 11-12 teeth hub diameter is .65

HELICAL GEARS

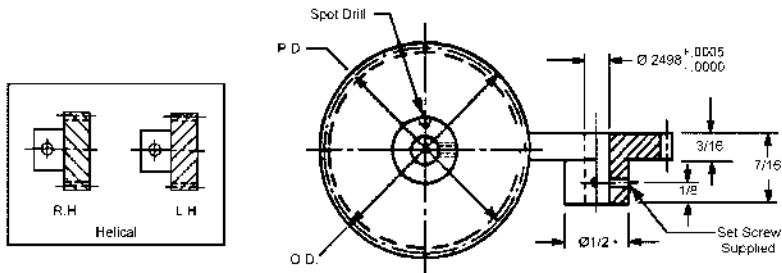
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE	HELIX ANGLE
24	R & L Hand PIN HUB	5/16"	303 Stainless Steel or 2024-T4 Aluminum Anodized	10	20°	45°



RIGHT HAND		LEFT HAND		NO. OF TEETH	P.D.	O.D.
STAINLESS	ALUMINUM	STAINLESS	ALUMINUM			
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.			
H24S32-R12	H24A32-R12	H24S32-L12	H24A32-L12	12	.7071	.790
H24S32-R18	H24A32-R18	H24S32-L18	H24A32-L18	18	1.0606	1.143
H24S32-R24	H24A32-R24	H24S32-L24	H24A32-L24	24	1.4142	1.497
H24S32-R30	H24A32-R30	H24S32-L30	H24A32-L30	30	1.7677	1.850
H24S32-R36	H24A32-R36	H24S32-L36	H24A32-L36	36	2.1213	2.204
H24S32-R48	H24A32-R48	H24S32-L48	H24A32-L48	48	2.8284	2.911
H24S32-R60	H24A32-R60	H24S32-L60	H24A32-L60	60	3.5355	3.618
H24S32-R72	H24A32-R72	H24S32-L72	H24A32-L72	72	4.2426	4.325



PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE	HELIX ANGLE
32	R & L Hand PIN HUB	1/4"	303 Stainless Steel or 2024-T4 Aluminum Anodized	10	20°	45°



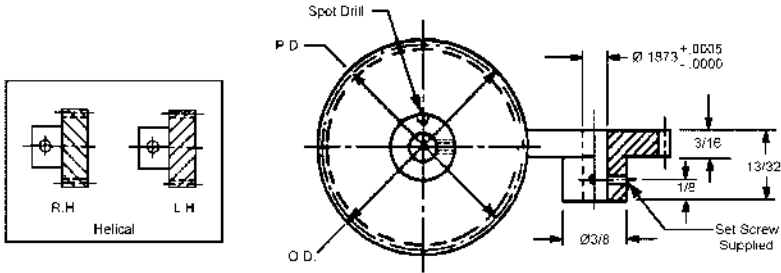
RIGHT HAND		LEFT HAND		NO. OF TEETH	P.D.	O.D.
STAINLESS	ALUMINUM	STAINLESS	ALUMINUM			
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.			
H32S28-R16	H32A28-R16	H32S28-L16	H32A28-L16	16	.7071	.769
H32S28-R24	H32A28-R24	H32S28-L24	H32A28-L24	24	1.0606	1.122
H32S28-R32	H32A28-R32	H32S28-L32	H32A28-L32	32	1.4142	1.476
H32S28-R40	H32A28-R40	H32S28-L40	H32A28-L40	40	1.7677	1.829
H32S28-R48	H32A28-R48	H32S28-L48	H32A28-L48	48	2.1213	2.183
H32S28-R64	H32A28-R64	H32S28-L64	H32A28-L64	64	2.8284	2.890
H32S28-R80	H32A28-R80	H32S28-L80	H32A28-L80	80	3.5355	3.597
H32S28-R96	H32A28-R96	H32S28-L96	H32A28-L96	96	4.2426	4.304



• For 12-13 teeth hub diameter is .45

B

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE	HELIX ANGLE
48	R & L Hand PIN HUB	3/16"	303 Stainless Steel or 2024-T4 Aluminum Anodized	10	20°	45°



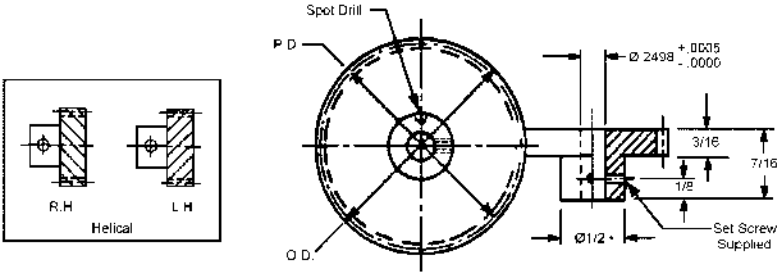
STAINLESS STEEL		ALUMINUM		NO. OF TEETH	P.D.
RIGHT HAND	LEFT HAND	RIGHT HAND	LEFT HAND		
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.		
H48S21-R20	H48S21-L20	H48A21-R20	H48A21-L20	20	.5892
H48S21-R24	H48S21-L24	H48A21-R24	H48A21-L24	24	.7071
H48S21-R25	H48S21-L25	H48A21-R25	H48A21-L25	25	.7365
H48S21-R30	H48S21-L30	H48A21-R30	H48A21-L30	30	.8838
H48S21-R35	H48S21-L35	H48A21-R35	H48A21-L35	35	1.0311
H48S21-R36	H48S21-L36	H48A21-R36	H48A21-L36	36	1.0606
H48S21-R40	H48S21-L40	H48A21-R40	H48A21-L40	40	1.1785
H48S21-R45	H48S21-L45	H48A21-R45	H48A21-L45	45	1.3258
H48S21-R48	H48S21-L48	H48A21-R48	H48A21-L48	48	1.4142
H48S21-R50	H48S21-L50	H48A21-R50	H48A21-L50	50	1.4731
H48S21-R60	H48S21-L60	H48A21-R60	H48A21-L60	60	1.7677
H48S21-R70	H48S21-L70	H48A21-R70	H48A21-L70	70	2.0623
H48S21-R72	H48S21-L72	H48A21-R72	H48A21-L72	72	2.1213
H48S21-R80	H48S21-L80	H48A21-R80	H48A21-L80	80	2.3568
H48S21-R90	H48S21-L90	H48A21-R90	H48A21-L90	90	2.6516
H48S21-R96	H48S21-L96	H48A21-R96	H48A21-L96	96	2.8282
H48S21-R100	H48S21-L100	H48A21-R100	H48A21-L100	100	2.9462
H48S21-R120	H48S21-L120	H48A21-R120	H48A21-L120	120	3.5355
H48S21-R144	H48S21-L144	H48A21-R144	H48A21-L144	144	4.2426



For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

HELICAL GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE	HELIX ANGLE
48	R & L Hand PIN HUB	1/4"	303 Stainless Steel or 2024-T4 Aluminum Anodized	10	20°	45°



STAINLESS STEEL		ALUMINUM		NO. OF TEETH	P.D.
RIGHT HAND	LEFT HAND	RIGHT HAND	LEFT HAND		
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.		
H48S28-R20	H48S28-L20	H48A28-R20	H48A28-L20	20	.5892
H48S28-R24	H48S28-L24	H48A28-R24	H48A28-L24	24	.7071
H48S28-R25	H48S28-L25	H48A28-R25	H48A28-L25	25	.7365
H48S28-R30	H48S28-L30	H48A28-R30	H48A28-L30	30	.8838
H48S28-R35	H48S28-L35	H48A28-R35	H48A28-L35	35	1.0311
H48S28-R36	H48S28-L36	H48A28-R36	H48A28-L36	36	1.0606
H48S28-R40	H48S28-L40	H48A28-R40	H48A28-L40	40	1.1785
H48S28-R45	H48S28-L45	H48A28-R45	H48A28-L45	45	1.3258
H48S28-R48	H48S28-L48	H48A28-R48	H48A28-L48	48	1.4142
H48S28-R50	H48S28-L50	H48A28-R50	H48A28-L50	50	1.4731
H48S28-R60	H48S28-L60	H48A28-R60	H48A28-L60	60	1.7677
H48S28-R70	H48S28-L70	H48A28-R70	H48A28-L70	70	2.0623
H48S28-R72	H48S28-L72	H48A28-R72	H48A28-L72	72	2.1213
H48S28-R80	H48S28-L80	H48A28-R80	H48A28-L80	80	2.3568
H48S28-R90	H48S28-L90	H48A28-R90	H48A28-L90	90	2.6516
H48S28-R96	H48S28-L96	H48A28-R96	H48A28-L96	96	2.8282
H48S28-R100	H48S28-L100	H48A28-R100	H48A28-L100	100	2.9462
H48S28-R120	H48S28-L120	H48A28-R120	H48A28-L120	120	3.5355
H48S28-R144	H48S28-L144	H48A28-R144	H48A28-L144	144	4.2426

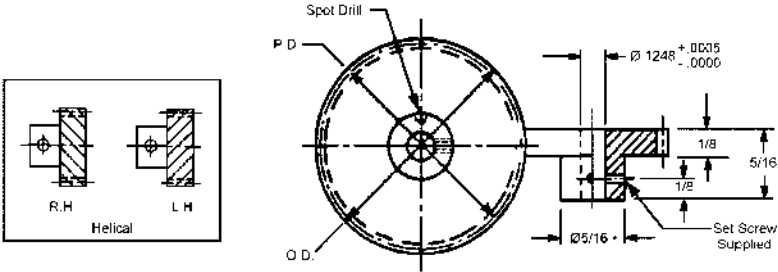


• For 17-19 teeth hub diameter is .44

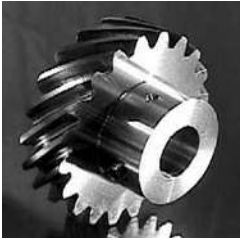
For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

HELICAL GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE	HELIX ANGLE
64	R & L Hand PIN HUB	1/8"	303 Stainless Steel or 2024-T4 Aluminum Anodized	10	20°	45°



STAINLESS STEEL		ALUMINUM		NO. OF TEETH	P.D.
RIGHT HAND	LEFT HAND	RIGHT HAND	LEFT HAND		
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.		
H64S10-R20	H64S10-L20	H64A10-R20	H64A10-L20	20	.4419
H64S10-R25	H64S10-L25	H64A10-R25	H64A10-L25	25	.5524
H64S10-R30	H64S10-L30	H64A10-R30	H64A10-L30	30	.6629
H64S10-R32	H64S10-L32	H64A10-R32	H64A10-L32	32	.7071
H64S10-R35	H64S10-L35	H64A10-R35	H64A10-L35	35	.7733
H64S10-R40	H64S10-L40	H64A10-R40	H64A10-L40	40	.8838
H64S10-R45	H64S10-L45	H64A10-R45	H64A10-L45	45	.9943
H64S10-R48	H64S10-L48	H64A10-R48	H64A10-L48	48	1.0606
H64S10-R50	H64S10-L50	H64A10-R50	H64A10-L50	50	1.1048
H64S10-R60	H64S10-L60	H64A10-R60	H64A10-L60	60	1.3258
H64S10-R64	H64S10-L64	H64A10-R64	H64A10-L64	64	1.4142
H64S10-R70	H64S10-L70	H64A10-R70	H64A10-L70	70	1.5467
H64S10-R80	H64S10-L80	H64A10-R80	H64A10-L80	80	1.7677
H64S10-R90	H64S10-L90	H64A10-R90	H64A10-L90	90	1.9886
H64S10-R96	H64S10-L96	H64A10-R96	H64A10-L96	96	2.1213
H64S10-R100	H64S10-L100	H64A10-R100	H64A10-L100	100	2.2096
H64S10-R128	H64S10-L128	H64A10-R128	H64A10-L128	128	2.8284
H64S10-R160	H64S10-L160	H64A10-R160	H64A10-L160	160	3.5355

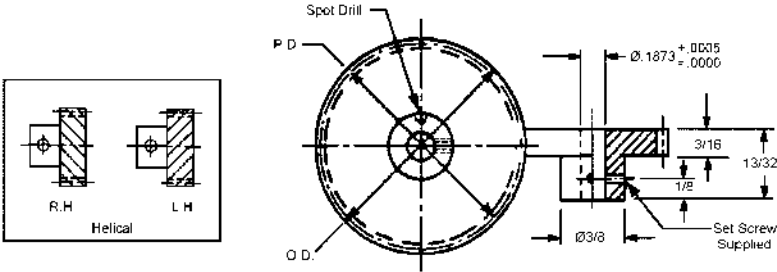


• For 13-15 teeth hub diameter equals .24

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

HELICAL GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE	HELIX ANGLE
64	R & L Hand PIN HUB	3/16"	303 Stainless Steel or 2024-T4 Aluminum Anodized	10	20°	45°



STAINLESS STEEL		ALUMINUM		NO. OF TEETH	P.D.
RIGHT HAND	LEFT HAND	RIGHT HAND	LEFT HAND		
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.		
H64S21-R20	H64S21-L20	H64A21-R20	H64A21-L20	20	.4419
H64S21-R25	H64S21-L25	H64A21-R25	H64A21-L25	25	.5524
H64S21-R30	H64S21-L30	H64A21-R30	H64A21-L30	30	.6629
H64S21-R32	H64S21-L32	H64A21-R32	H64A21-L32	32	.7071
H64S21-R35	H64S21-L35	H64A21-R35	H64A21-L35	35	.7733
H64S21-R40	H64S21-L40	H64A21-R40	H64A21-L40	40	.8838
H64S21-R45	H64S21-L45	H64A21-R45	H64A21-L45	45	.9943
H64S21-R48	H64S21-L48	H64A21-R48	H64A21-L48	48	1.0606
H64S21-R50	H64S21-L50	H64A21-R50	H64A21-L50	50	1.1048
H64S21-R60	H64S21-L60	H64A21-R60	H64A21-L60	60	1.3258
H64S21-R64	H64S21-L64	H64A21-R64	H64A21-L64	64	1.4142
H64S21-R70	H64S21-L70	H64A21-R70	H64A21-L70	70	1.5467
H64S21-R80	H64S21-L80	H64A21-R80	H64A21-L80	80	1.7677
H64S21-R90	H64S21-L90	H64A21-R90	H64A21-L90	90	1.9886
H64S21-R96	H64S21-L96	H64A21-R96	H64A21-L96	96	2.1213
H64S21-R100	H64S21-L100	H64A21-R100	H64A21-L100	100	2.2096
H64S21-R128	H64S21-L128	H64A21-R128	H64A21-L128	128	2.8284
H64S21-R160	H64S21-L160	H64A21-R160	H64A21-L160	160	3.5355



For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

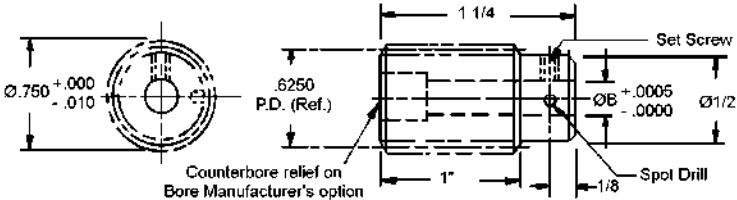
PRECISION WORMS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
16	SINGLE, DOUBLE OR FOUR THREAD	1/4"	303 STAINLESS STEEL	8	RIGHT HAND

STOCK NO.	B	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W16S-4S	.2498	SINGLE	.1963	5° - 43'	14-1/2°
W16S-4D		DOUBLE	.3927	11° - 19'	14-1/2°
W16S-4F		FOUR	.7854	21° - 48'	20°

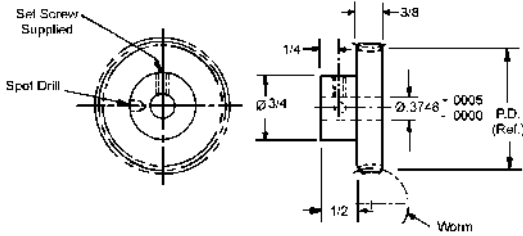
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
16	SINGLE, DOUBLE OR FOUR THREAD	5/16"	303 STAINLESS STEEL	8	RIGHT HAND

STOCK NO.	B	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W16S-5S	.3123	SINGLE	.1963	5° - 43'	14-1/2°
W16S-5D		DOUBLE	.3927	11° - 19'	14-1/2°
W16S-5F		FOUR	.7854	21° - 48'	20°



PRECISION WORM GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
16	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	3/8"	3/8"	BRONZE QQ-B-637 ALLOY 464	8	RIGHT HAND

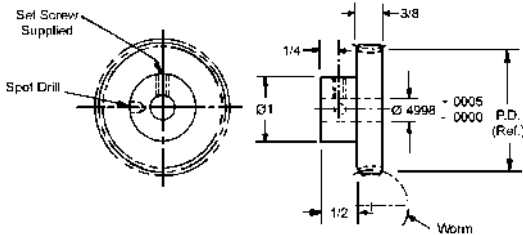


SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .1963 HELIX ANGLE 5° - 43' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .3927 HELIX ANGLE 11° - 19' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .7854 HELIX ANGLE 21°-48' PRESSURE ANGLE 20°		
STOCK NO.	STOCK NO.	STOCK NO.		
W16B35-S20	W16B35-D20	W16B35-F20	20	1.250
W16B35-S30	W16B35-D30	W16B35-F30	30	1.875
W16B35-S40	W16B35-D40	W16B35-F40	40	2.500
W16B35-S50	W16B35-D50	W16B35-F50	50	3.125
W16B35-S60	W16B35-D60	W16B35-F60	60	3.750
W16B35-S80	W16B35-D80	W16B35-F80	80	5.000
W16B35-S100	W16B35-D100	W16B35-F100	100	6.250

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

May be two piece construction.

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
16	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/2"	3/8"	BRONZE QQ-B-637 ALLOY 464	8	RIGHT HAND



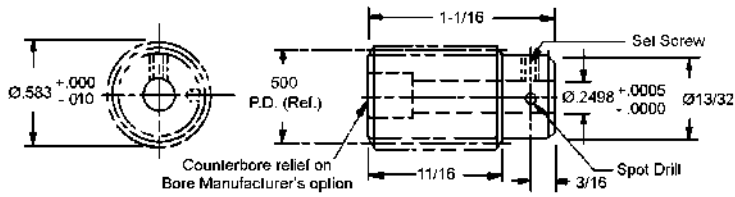
SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .1963 HELIX ANGLE 5° - 43' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .3927 HELIX ANGLE 11° - 19' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .7854 HELIX ANGLE 21°-48' PRESSURE ANGLE 20°		
STOCK NO.	STOCK NO.	STOCK NO.		
W16B37-S20	W16B37-D20	W16B37-F20	20	1.250
W16B37-S30	W16B37-D30	W16B37-F30	30	1.875
W16B37-S40	W16B37-D40	W16B37-F40	40	2.500
W16B37-S50	W16B37-D50	W16B37-F50	50	3.125
W16B37-S60	W16B37-D60	W16B37-F60	60	3.750
W16B37-S80	W16B37-D80	W16B37-F80	80	5.000
W16B37-S100	W16B37-D100	W16B37-F100	100	6.250

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

May be two piece construction.

PRECISION WORMS

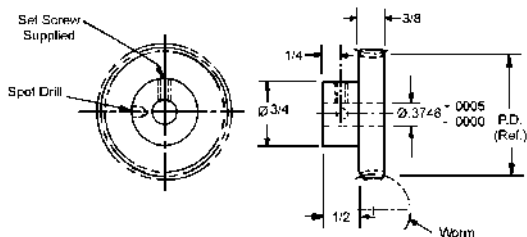
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
24	SINGLE, DOUBLE OR FOUR THREAD	1/4"	303 STAINLESS STEEL	10	RIGHT HAND



STOCK NO.	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W24S-4S	SINGLE	.1309	4° - 46°	14-1/2°
W24S-4D	DOUBLE	.2618	9° - 28°	20°
W24S-4F	FOUR	.5236	18° - 26°	25°

PRECISION WORM GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
24	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	3/8"	3/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

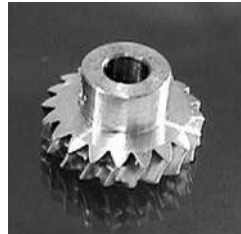
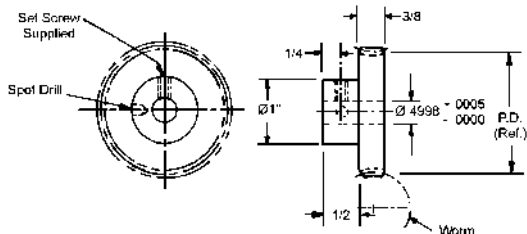


20 tooth hub diameter does not exceed O.D.

SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .1309 HELIX ANGLE 4° - 46° PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .2518 HELIX ANGLE 9° - 28° PRESSURE ANGLE 20°	CIRCULAR PITCH .5236 HELIX ANGLE 18° - 26° PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W24B35-S20	W24B35-D20	W24B35-F20	20	.833
W24B35-S30	W24B35-D30	W24B35-F30	30	1.250
W24B35-S40	W24B35-D40	W24B35-F40	40	1.667
W24B35-S50	W24B35-D50	W24B35-F50	50	2.083
W24B35-S60	W24B35-D60	W24B35-F60	60	2.500
W24B35-S72	W24B35-D72	W24B35-F72	72	3.000
W24B35-S80	W24B35-D80	W24B35-F80	80	3.333
W24B35-S90	W24B35-D90	W24B35-F90	90	3.750
W24B35-S100	W24B35-D100	W24B35-F100	100	4.167

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
24	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/2"	3/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



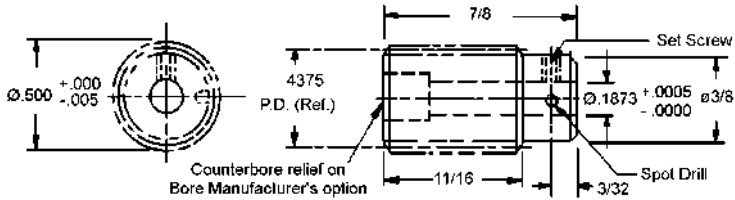
20 tooth hub diameter does not exceed O.D.

SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .1309 HELIX ANGLE 4° - 46° PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .2518 HELIX ANGLE 9° - 28° PRESSURE ANGLE 20°	CIRCULAR PITCH .5236 HELIX ANGLE 18° - 26° PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W24B37-S20	W24B37-D20	W24B37-F20	20	.833
W24B37-S30	W24B37-D30	W24B37-F30	30	1.250
W24B37-S40	W24B37-D40	W24B37-F40	40	1.667
W24B37-S50	W24B37-D50	W24B37-F50	50	2.083
W24B37-S60	W24B37-D60	W24B37-F60	60	2.500
W24B37-S72	W24B37-D72	W24B37-F72	72	3.000
W24B37-S80	W24B37-D80	W24B37-F80	80	3.333
W24B37-S90	W24B37-D90	W24B37-F90	90	3.750
W24B37-S100	W24B37-D100	W24B37-F100	100	4.167

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

B

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
32	SINGLE, DOUBLE OR FOUR THREAD	3/16"	303 STAINLESS STEEL	10	RIGHT HAND

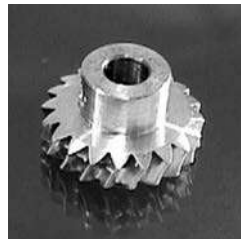
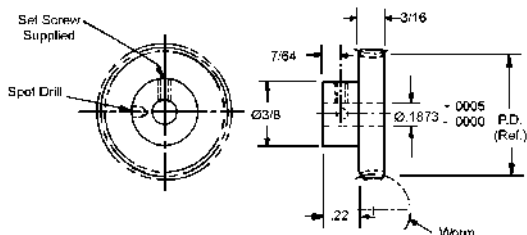


STOCK NO.	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W32S-3S	SINGLE	.0982	4° - 5'	14-1/2°
W32S-3D	DOUBLE	.1963	8° - 8'	20°
W32S-3F	FOUR	.3927	15° - 57'	25°

AGMA Quality 12 on request.

PRECISION WORM GEARS

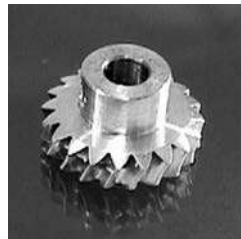
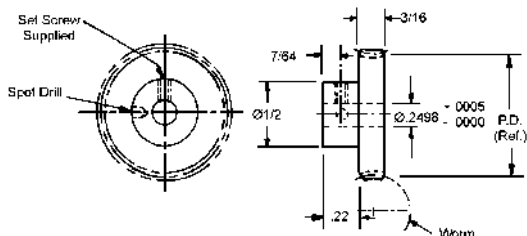
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
32	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	3/16"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0982 HELIX ANGLE 4° - 5° PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .1963 HELIX ANGLE 8° - 8° PRESSURE ANGLE 20°	CIRCULAR PITCH .3927 HELIX ANGLE 15° - 57° PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W32B21-S20	W32B21-D20	W32B21-F20	20	.625
W32B21-S30	W32B21-D30	W32B21-F30	30	.938
W32B21-S40	W32B21-D40	W32B21-F40	40	1.250
W32B21-S50	W32B21-D50	W32B21-F50	50	1.562
W32B21-S60	W32B21-D60	W32B21-F60	60	1.875
W32B21-S80	W32B21-D80	W32B21-F80	80	2.500
W32B21-S96	W32B21-D96	W32B21-F96	96	3.000
W32B21-S100	W32B21-D100	W32B21-F100	100	3.125
W32B21-S120	W32B21-D120	W32B21-F120	120	3.750
W32B21-S180	W32B21-D180	W32B21-F180	180	5.625

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
32	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/4"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

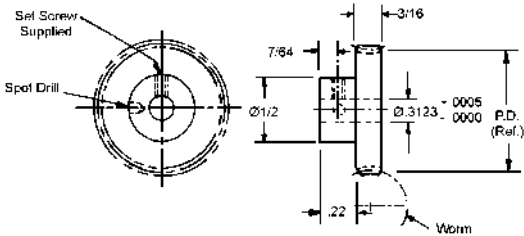


SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0982 HELIX ANGLE 4° - 5° PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .1963 HELIX ANGLE 8° - 8° PRESSURE ANGLE 20°	CIRCULAR PITCH .3927 HELIX ANGLE 15° - 57° PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W32B29-S20	W32B29-D20	W32B29-F20	20	.625
W32B29-S30	W32B29-D30	W32B29-F30	30	.938
W32B29-S40	W32B29-D40	W32B29-F40	40	1.250
W32B29-S50	W32B29-D50	W32B29-F50	50	1.562
W32B29-S60	W32B29-D60	W32B29-F60	60	1.875
W32B29-S80	W32B29-D80	W32B29-F80	80	2.500
W32B29-S96	W32B29-D96	W32B29-F96	96	3.000
W32B29-S100	W32B29-D100	W32B29-F100	100	3.125
W32B29-S120	W32B29-D120	W32B29-F120	120	3.750
W32B29-S180	W32B29-D180	W32B29-F180	180	5.625

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PRECISION WORM GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
32	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	5/16"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



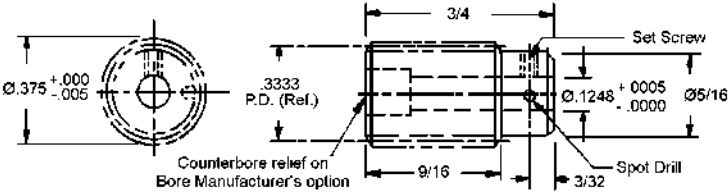
SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0982 HELIX ANGLE 4° - 5° PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .1963 HELIX ANGLE 8° - 8° PRESSURE ANGLE 20°	CIRCULAR PITCH .3927 HELIX ANGLE 15° - 57° PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W32B30-S20	W32B30-D20	W32B30-F20	20	.625
W32B30-S30	W32B30-D30	W32B30-F30	30	.938
W32B30-S40	W32B30-D40	W32B30-F40	40	1.250
W32B30-S50	W32B30-D50	W32B30-F50	50	1.562
W32B30-S60	W32B30-D60	W32B30-F60	60	1.875
W32B30-S80	W32B30-D80	W32B30-F80	80	2.500
W32B30-S96	W32B30-D96	W32B30-F96	96	3.000
W32B30-S100	W32B30-D100	W32B30-F100	100	3.125

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

PRECISION WORMS

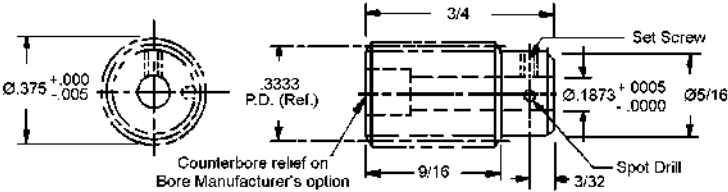
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE, DOUBLE OR FOUR THREAD	1/8"	303 STAINLESS STEEL	10	RIGHT HAND



STOCK NO.	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W48S-2S	SINGLE	.0654	3° - 35°	14-1/2°
W48S-2D	DOUBLE	.1309	7° - 7°	20°
W48S-2F	FOUR	.2618	14° - 2°	25°

AGMA Quality 12 and 14 on request.

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE, DOUBLE OR FOUR THREAD	3/16"	303 STAINLESS STEEL	10	RIGHT HAND

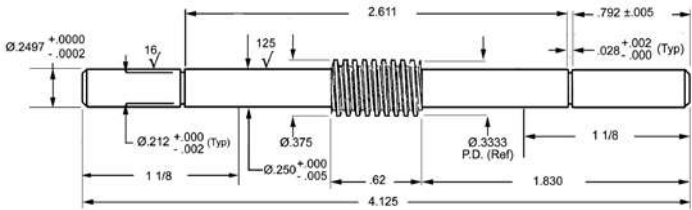


STOCK NO.	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W48S-3S	SINGLE	.0654	3° - 35°	14-1/2°
W48S-3D	DOUBLE	.1309	7° - 7°	20°
W48S-3F	FOUR	.2618	14° - 2°	25°

AGMA Quality 12 and 14 on request.

PRECISION WORM SHAFTS

PITCH	STYLE	SHAFT DIA.	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE START 14.5 P.A.	1/4"	303 STAINLESS STEEL	10 AND 12	RIGHT HAND

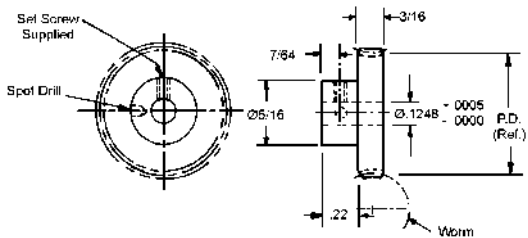


STOCK NO.	AGMA QUALITY
WS48S-4S	10
WS48S-4S-Q12	12

B

PRECISION WORM GEARS

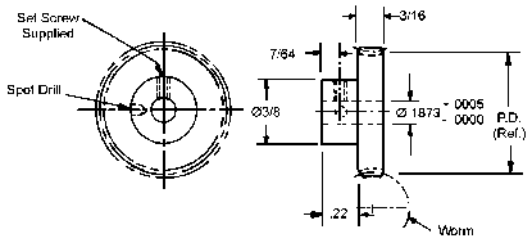
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/8"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0654 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .1309 HELIX ANGLE 7° - 7' PRESSURE ANGLE 20°	CIRCULAR PITCH .2618 HELIX ANGLE 14° - 2' PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W48B13-S30	W48B13-D30	W48B13-F30	30	.625
W48B13-S40	W48B13-D40	W48B13-F40	40	.833
W48B13-S50	W48B13-D50	W48B13-F50	50	1.042
W48B13-S60	W48B13-D60	W48B13-F60	60	1.250
W48B13-S70	W48B13-D70	W48B13-F70	70	1.458
W48B13-S80	W48B13-D80	W48B13-F80	80	1.667
W48B13-S90	W48B13-D90	W48B13-F90	90	1.875
W48B13-S100	W48B13-D100	W48B13-F100	100	2.083
W48B13-S120	W48B13-D120	W48B13-F120	120	2.500

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	3/16"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

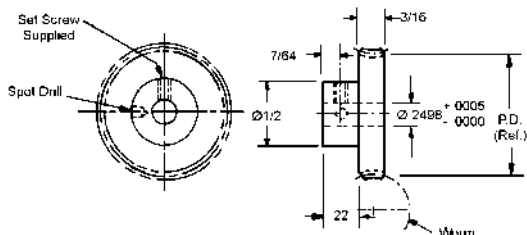


SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0654 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .1309 HELIX ANGLE 7° - 7' PRESSURE ANGLE 20°	CIRCULAR PITCH .2618 HELIX ANGLE 14° - 2' PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W48B21-S30	W48B21-D30	W48B21-F30	30	.625
W48B21-S40	W48B21-D40	W48B21-F40	40	.833
W48B21-S50	W48B21-D50	W48B21-F50	50	1.042
W48B21-S60	W48B21-D60	W48B21-F60	60	1.250
W48B21-S70	W48B21-D70	W48B21-F70	70	1.458
W48B21-S80	W48B21-D80	W48B21-F80	80	1.667
W48B21-S90	W48B21-D90	W48B21-F90	90	1.875
W48B21-S100	W48B21-D100	W48B21-F100	100	2.083
W48B21-S120	W48B21-D120	W48B21-F120	120	2.500

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PRECISION WORM GEARS

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/4"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

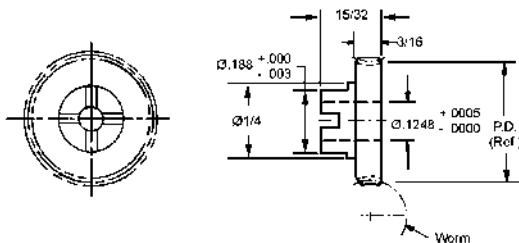


B

SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0654 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .1309 HELIX ANGLE 7° - 7' PRESSURE ANGLE 20°	CIRCULAR PITCH .2618 HELIX ANGLE 14° - 2' PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W48B29-S30	W48B29-D30	W48B29-F30	30	.625
W48B29-S40	W48B29-D40	W48B29-F40	40	.833
W48B29-S50	W48B29-D50	W48B29-F50	50	1.042
W48B29-S60	W48B29-D60	W48B29-F60	60	1.250
W48B29-S70	W48B29-D70	W48B29-F70	70	1.458
W48B29-S80	W48B29-D80	W48B29-F80	80	1.667
W48B29-S90	W48B29-D90	W48B29-F90	90	1.875
W48B29-S100	W48B29-D100	W48B29-F100	100	2.083
W48B29-S120	W48B29-D120	W48B29-F120	120	2.500
W48B29-S180	W48B29-D180	W48B29-F180	180	3.750

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/8"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

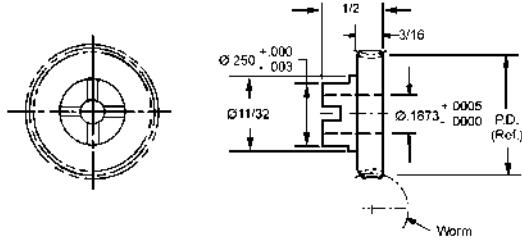


SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0654 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .1309 HELIX ANGLE 7° - 7' PRESSURE ANGLE 20°	CIRCULAR PITCH .2618 HELIX ANGLE 14° - 2' PRESSURE ANGLE 25°		
STOCK NO.	STOCK NO.	STOCK NO.		
W48B13-S30-C	W48B13-D30-C	W48B13-F30-C	30	.625
W48B13-S40-C	W48B13-D40-C	W48B13-F40-C	40	.833
W48B13-S50-C	W48B13-D50-C	W48B13-F50-C	50	1.042
W48B13-S60-C	W48B13-D60-C	W48B13-F60-C	60	1.250
W48B13-S70-C	W48B13-D70-C	W48B13-F70-C	70	1.458
W48B13-S80-C	W48B13-D80-C	W48B13-F80-C	80	1.667
W48B13-S90-C	W48B13-D90-C	W48B13-F90-C	90	1.875
W48B13-S100-C	W48B13-D100-C	W48B13-F100-C	100	2.083
W48B13-S120-C	W48B13-D120-C	W48B13-F120-C	120	2.500

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PRECISION WORM GEARS

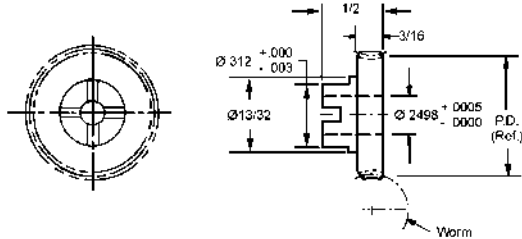
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE, DOUBLE OR FOUR THREAD CLAMP HUB	3/16"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0654 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2° STOCK NO.	CIRCULAR PITCH .1309 HELIX ANGLE 7° - 7' PRESSURE ANGLE 20° STOCK NO.	CIRCULAR PITCH .2618 HELIX ANGLE 14° - 2' PRESSURE ANGLE 25° STOCK NO.		
W48B21-S30-C W48B21-S40-C W48B21-S50-C W48B21-S60-C W48B21-S70-C W48B21-S80-C W48B21-S90-C W48B21-S100-C W48B21-S120-C	W48B21-D30-C W48B21-D40-C W48B21-D50-C W48B21-D60-C W48B21-D70-C W48B21-D80-C W48B21-D90-C W48B21-D100-C W48B21-D120-C	W48B21-F30-C W48B21-F40-C W48B21-F50-C W48B21-F60-C W48B21-F70-C W48B21-F80-C W48B21-F90-C W48B21-F100-C W48B21-F120-C	30 40 50 60 70 80 90 100 120	.625 .833 1.042 1.250 1.458 1.667 1.875 2.083 2.500

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE, DOUBLE OR FOUR THREAD CLAMP HUB	1/4"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .0654 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2° STOCK NO.	CIRCULAR PITCH .1309 HELIX ANGLE 7° - 7' PRESSURE ANGLE 20° STOCK NO.	CIRCULAR PITCH .2618 HELIX ANGLE 14° - 2' PRESSURE ANGLE 25° STOCK NO.		
W48B29-S30-C W48B29-S40-C W48B29-S50-C W48B29-S60-C W48B29-S70-C W48B29-S80-C W48B29-S90-C W48B29-S100-C W48B29-S120-C W48B29-S180-C	W48B29-D30-C W48B29-D40-C W48B29-D50-C W48B29-D60-C W48B29-D70-C W48B29-D80-C W48B29-D90-C W48B29-D100-C W48B29-D120-C W48B29-D180-C	W48B29-F30-C W48B29-F40-C W48B29-F50-C W48B29-F60-C W48B29-F70-C W48B29-F80-C W48B29-F90-C W48B29-F100-C W48B29-F120-C W48B29-F180-C	30 40 50 60 70 80 90 100 120 180	.625 .833 1.042 1.250 1.458 1.667 1.875 2.083 2.500 3.750

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE THREAD PIN HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS13-S40	40	.833
AW48BS13-S48	48	1.000
AW48BS13-S50	50	1.042
AW48BS13-S56	56	1.167
AW48BS13-S60	60	1.250
AW48BC13-S70	70	1.458
AW48BC13-S72	72	1.500
AW48BC13-S80	80	1.667
AW48BC13-S90	90	1.875
AW48BC13-S96	96	2.000
AW48BC13-S100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14 1/2°

Runs with worm #

W48S-2S

OR

W48S-3S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	DOUBLE THREAD PIN HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS13-D40	40	.833
AW48BS13-D48	48	1.000
AW48BS13-D50	50	1.042
AW48BS13-D56	56	1.167
AW48BS13-D60	60	1.250
AW48BC13-D70	70	1.458
AW48BC13-D72	72	1.500
AW48BC13-D80	80	1.667
AW48BC13-D90	90	1.875
AW48BC13-D96	96	2.000
AW48BC13-D100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 20°

Runs with worm #

W48S-2D

OR

W48S-3D

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	FOUR THREAD PIN HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS13-F40	40	.833
AW48BS13-F48	48	1.000
AW48BS13-F50	50	1.042
AW48BS13-F56	56	1.167
AW48BS13-F60	60	1.250
AW48BC13-F70	70	1.458
AW48BC13-F72	72	1.500
AW48BC13-F80	80	1.667
AW48BC13-F90	90	1.875
AW48BC13-F96	96	2.000
AW48BC13-F100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 25°

Runs with worm #

W48S-2F

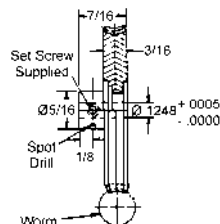
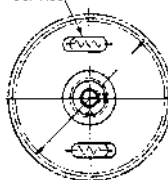
OR

W48S-3F



Hub Material: 303 Stainless Steel
Other numbers of teeth are available on request.

Scissor Spring
Or Coil Hub



ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE THREAD PIN HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS21-S40	40	.833
AW48BS21-S48	48	1.000
AW48BS21-S50	50	1.042
AW48BS21-S56	56	1.167
AW48BS21-S60	60	1.250
AW48BC21-S70	70	1.458
AW48BC21-S72	72	1.500
AW48BC21-S80	80	1.667
AW48BC21-S90	90	1.875
AW48BC21-S96	96	2.000
AW48BC21-S100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14 1/2°

Runs with worm #

W48S-2S

OR

W48S-3S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	DOUBLE THREAD PIN HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS21--D40	40	.833
AW48BS21--D48	48	1.000
AW48BS21--D50	50	1.042
AW48BS21--D56	56	1.167
AW48BS21--D60	60	1.250
AW48BC21-D70	70	1.458
AW48BC21-D72	72	1.500
AW48BC21-D80	80	1.667
AW48BC21-D90	90	1.875
AW48BC21-D96	96	2.000
AW48BC21-D100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 20°

Runs with worm #

W48S-2D

OR

W48S-3D

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	FOUR THREAD PIN HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS21-F40	40	.833
AW48BS21-F48	48	1.000
AW48BS21-F50	50	1.042
AW48BS21-F56	56	1.167
AW48BS21-F60	60	1.250
AW48BC21-F70	70	1.458
AW48BC21-F72	72	1.500
AW48BC21-F80	80	1.667
AW48BC21-F90	90	1.875
AW48BC21-F96	96	2.000
AW48BC21-F100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 25°

Runs with worm #

W48S-2F

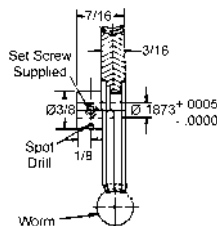
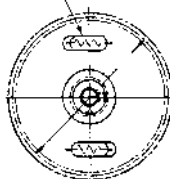
OR

W48S-3F



Hub Material: 303 Stainless Steel
Other numbers of teeth are available on request.

Sensor Spring
Or Coil Hub



ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE THREAD PIN HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS29-S40	40	.833
AW48BS29-S48	48	1.000
AW48BS29-S50	50	1.042
AW48BS29-S56	56	1.167
AW48BS29-S60	60	1.250
AW48BC29-S70	70	1.458
AW48BC29-S72	72	1.500
AW48BC29-S80	80	1.667
AW48BC29-S90	90	1.875
AW48BC29-S96	96	2.000
AW48BC29-S100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14 1/2°

Runs with worm #

W48S-2S

OR

W48S-3S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	DOUBLE THREAD PIN HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS29-D40	40	.833
AW48BS29-D48	48	1.000
AW48BS29-D50	50	1.042
AW48BS29-D56	56	1.167
AW48BS29-D60	60	1.250
AW48BC29-D70	70	1.458
AW48BC29-D72	72	1.500
AW48BC29-D80	80	1.667
AW48BC29-D90	90	1.875
AW48BC29-D96	96	2.000
AW48BC29-D100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 20°

Runs with worm #

W48S-2D

OR

W48S-3D

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	FOUR THREAD PIN HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS29-F40	40	.833
AW48BS29-F48	48	1.000
AW48BS29-F50	50	1.042
AW48BS29-F56	56	1.167
AW48BS29-F60	60	1.250
AW48BC29-F70	70	1.458
AW48BC29-F72	72	1.500
AW48BC29-F80	80	1.667
AW48BC29-F90	90	1.875
AW48BC29-F96	96	2.000
AW48BC29-F100	100	2.083

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 25°

Runs with worm #

W48S-2F

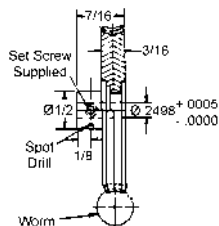
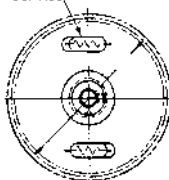
OR

W48S-3F



Hub Material: 303 Stainless Steel
Other numbers of teeth are available on request.

Scraper Spring
Or Coil Hub



ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE THREAD CLAMP HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS13-S40-C	40	.833
AW48BS13-S48-C	48	1.000
AW48BS13-S50-C	50	1.042
AW48BS13-S56-C	56	1.167
AW48BS13-S60-C	60	1.250
AW48BC13-S70-C	70	1.458
AW48BC13-S72-C	72	1.500
AW48BC13-S80-C	80	1.667
AW48BC13-S90-C	90	1.875
AW48BC13-S96-C	96	2.000
AW48BC13-S100-C	100	2.083

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14 1/2°
Runs with worm #
W48S-2S
OR
W48S-3S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	DOUBLE THREAD CLAMP HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS13-D40-C	40	.833
AW48BS13-D48-C	48	1.000
AW48BS13-D50-C	50	1.042
AW48BS13-D56-C	56	1.167
AW48BS13-D60-C	60	1.250
AW48BC13-D70-C	70	1.458
AW48BC13-D72-C	72	1.500
AW48BC13-D80-C	80	1.667
AW48BC13-D90-C	90	1.875
AW48BC13-D96-C	96	2.000
AW48BC13-D100-C	100	2.083

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

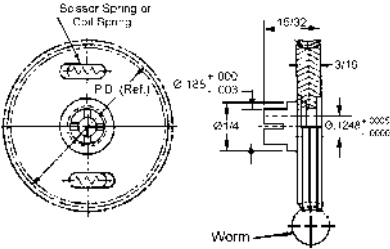
Pressure Angle 20°
Runs with worm #
W48S-2D
OR
W48S-3D

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	FOUR THREAD CLAMP HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS13-F40-C	40	.833
AW48BS13-F48-C	48	1.000
AW48BS13-F50-C	50	1.042
AW48BS13-F56-C	56	1.167
AW48BS13-F60-C	60	1.250
AW48BC13-F70-C	70	1.458
AW48BC13-F72-C	72	1.500
AW48BC13-F80-C	80	1.667
AW48BC13-F90-C	90	1.875
AW48BC13-F96-C	96	2.000
AW48BC13-F100-C	100	2.083

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 25°
Runs with worm #
W48S-2F
OR
W48S-3F



Hub Material: 303 Stainless Steel

ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE THREAD CLAMP HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS21-S40-C	40	.833
AW48BS21-S48-C	48	1.000
AW48BS21-S50-C	50	1.042
AW48BS21-S56-C	56	1.167
AW48BS21-S60-C	60	1.250
AW48BC21-S70-C	70	1.458
AW48BC21-S72-C	72	1.500
AW48BC21-S80-C	80	1.667
AW48BC21-S90-C	90	1.875
AW48BC21-S96-C	96	2.000
AW48BC21-S100-C	100	2.083

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14 1/2°
Runs with worm #
W48S-2S
OR
W48S-3S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	DOUBLE THREAD CLAMP HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS21-D40-C	40	.833
AW48BS21-D48-C	48	1.000
AW48BS21-D50-C	50	1.042
AW48BS21-D56-C	56	1.167
AW48BS21-D60-C	60	1.250
AW48BC21-D70-C	70	1.458
AW48BC21-D72-C	72	1.500
AW48BC21-D80-C	80	1.667
AW48BC21-D90-C	90	1.875
AW48BC21-D96-C	96	2.000
AW48BC21-D100-C	100	2.083

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

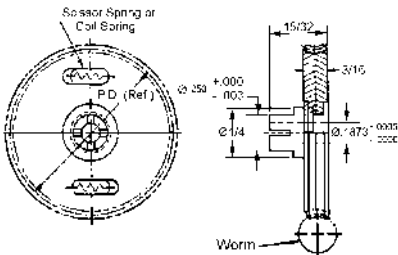
Pressure Angle 20°
Runs with worm #
W48S-2D
OR
W48S-3D

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	FOUR THREAD CLAMP HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS21-F40-C	40	.833
AW48BS21-F48-C	48	1.000
AW48BS21-F50-C	50	1.042
AW48BS21-F56-C	56	1.167
AW48BS21-F60-C	60	1.250
AW48BC21-F70-C	70	1.458
AW48BC21-F72-C	72	1.500
AW48BC21-F80-C	80	1.667
AW48BC21-F90-C	90	1.875
AW48BC21-F96-C	96	2.000
AW48BC21-F100-C	100	2.083

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 25°
Runs with worm #
W48S-2F
OR
W48S-3F



ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	SINGLE THREAD CLAMP HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS29-S40-C	40	.833
AW48BS29-S48-C	48	1.000
AW48BS29-S50-C	50	1.042
AW48BS29-S56-C	56	1.167
AW48BS29-S60-C	60	1.250
AW48BC29-S70-C	70	1.458
AW48BC29-S72-C	72	1.500
AW48BC29-S80-C	80	1.667
AW48BC29-S90-C	90	1.875
AW48BC29-S96-C	96	2.000
AW48BC29-S100-C	100	2.083

Ratio = $\frac{\# \text{ of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14 1/2°

Runs with worm #
W48S-2S
OR
W48S-3S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	DOUBLE THREAD CLAMP HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS29-D40-C	40	.833
AW48BS29-D48-C	48	1.000
AW48BS29-D50-C	50	1.042
AW48BS29-D56-C	56	1.167
AW48BS29-D60-C	60	1.250
AW48BC29-D70-C	70	1.458
AW48BC29-D72-C	72	1.500
AW48BC29-D80-C	80	1.667
AW48BC29-D90-C	90	1.875
AW48BC29-D96-C	96	2.000
AW48BC29-D100-C	100	2.083

Ratio = $\frac{\# \text{ of Teeth}}{\text{Worm Threads}}$

Pressure Angle 20°

Runs with worm #
W48S-2D
OR
W48S-3D

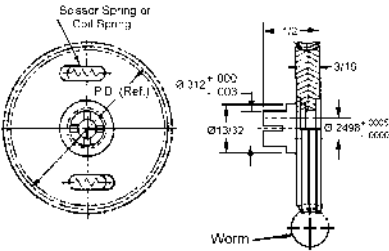
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
48	FOUR THREAD CLAMP HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW48BS29-F40-C	40	.833
AW48BS29-F48-C	48	1.000
AW48BS29-F50-C	50	1.042
AW48BS29-F56-C	56	1.167
AW48BS29-F60-C	60	1.250
AW48BC29-F70-C	70	1.458
AW48BC29-F72-C	72	1.500
AW48BC29-F80-C	80	1.667
AW48BC29-F90-C	90	1.875
AW48BC29-F96-C	96	2.000
AW48BC29-F100-C	100	2.083

Ratio = $\frac{\# \text{ of Teeth}}{\text{Worm Threads}}$

Pressure Angle 25°

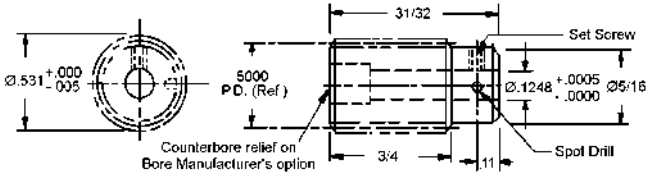
Runs with worm #
W48S-2F
OR
W48S-3F



Hub Material: 303 Stainless Steel

PRECISION WORMS

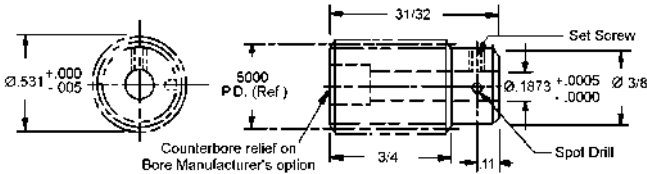
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	SINGLE, DOUBLE OR FOUR THREAD	1/8"	303 STAINLESS STEEL	10	RIGHT HAND



STOCK NO.	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W64S-2S	SINGLE	.04908	1° - 47'	14-1/2°
W64S-2D	DOUBLE	.09817	3° - 35'	
W64S-2F	FOUR	.19635	7° - 8'	

Counterbore relief on bore manufacturer's option.

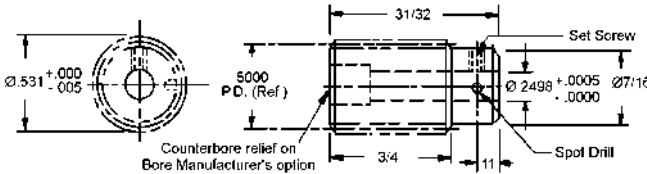
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	SINGLE, DOUBLE OR FOUR THREAD	3/16"	303 STAINLESS STEEL	10	RIGHT HAND



STOCK NO.	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W64S-3S	SINGLE	.04908	1° - 47'	14-1/2°
W64S-3D	DOUBLE	.09817	3° - 35'	
W64S-3F	FOUR	.19635	7° - 8'	

Counterbore relief on bore manufacturer's option.

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	PRES. ANGLE
64	SINGLE, DOUBLE OR FOUR THREAD	1/4"	303 STAINLESS STEEL	10	RIGHT HAND

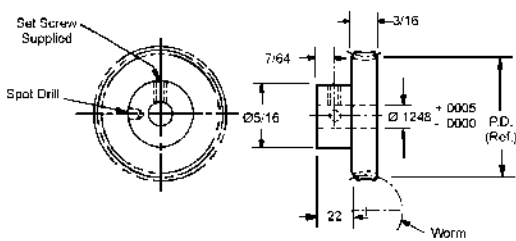


STOCK NO.	THREAD	LEAD	LEAD ANGLE	PRESSURE ANGLE
W64S-4S	SINGLE	.04908	1° - 47'	14-1/2°
W64S-4D	DOUBLE	.09817	3° - 35'	
W64S-4F	FOUR	.19635	7° - 8'	

Counterbore relief on bore manufacturer's option.

PRECISION WORM GEARS

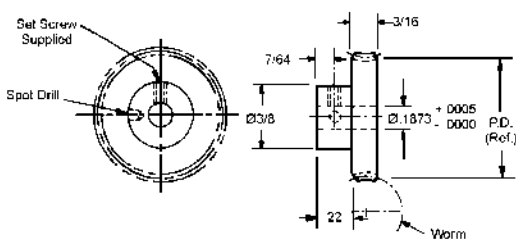
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/8"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .04908 HELIX ANGLE 1° - 47' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .09817 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .19635 HELIX ANGLE 7°-8' PRESSURE ANGLE 14-1/2°		
STOCK NO.	STOCK NO.	STOCK NO.		
W64B13-S40	W64B13-D40	W64B13-F40	40	.625
W64B13-S50	W64B13-D50	W64B13-F50	50	.781
W64B13-S60	W64B13-D60	W64B13-F60	60	.937
W64B13-S70	W64B13-D70	W64B13-F70	70	1.093
W64B13-S80	W64B13-D80	W64B13-F80	80	1.250
W64B13-S90	W64B13-D90	W64B13-F90	90	1.406
W64B13-S100	W64B13-D100	W64B13-F100	100	1.562
W64B13-S110	W64B13-D110	W64B13-F110	110	1.719
W64B13-S120	W64B13-D120	W64B13-F120	120	1.875
W64B13-S180	W64B13-D180	W64B13-F180	180	2.813
W64B13-S360	W64B13-D360	W64B13-F360	360	5.625

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	3/16"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



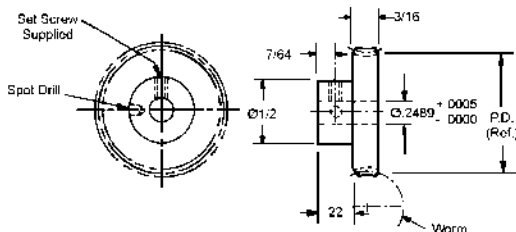
SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .04908 HELIX ANGLE 1° - 47' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .09817 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .19635 HELIX ANGLE 7°-8' PRESSURE ANGLE 14-1/2°		
STOCK NO.	STOCK NO.	STOCK NO.		
W64B21-S40	W64B21-D40	W64B21-F40	40	.625
W64B21-S50	W64B21-D50	W64B21-F50	50	.781
W64B21-S60	W64B21-D60	W64B21-F60	60	.937
W64B21-S70	W64B21-D70	W64B21-F70	70	1.093
W64B21-S80	W64B21-D80	W64B21-F80	80	1.250
W64B21-S90	W64B21-D90	W64B21-F90	90	1.406
W64B21-S100	W64B21-D100	W64B21-F100	100	1.562
W64B21-S110	W64B21-D110	W64B21-F110	110	1.719
W64B21-S120	W64B21-D120	W64B21-F120	120	1.875

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Other numbers of teeth and AGMA Quality 12 and 14 are available on request.

PRECISION WORM GEARS

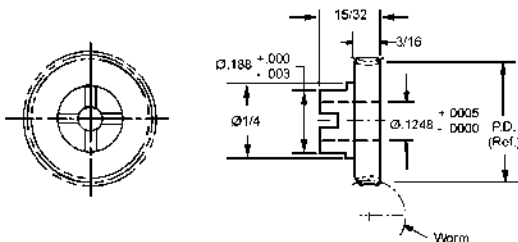
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/4"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .04908 HELIX ANGLE 1° - 47' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .09817 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .19635 HELIX ANGLE 7°-8' PRESSURE ANGLE 14-1/2°		
STOCK NO.	STOCK NO.	STOCK NO.		
W64B29-S40	W64B29-D40	W64B29-F40	40	.625
W64B29-S50	W64B29-D50	W64B29-F50	50	.781
W64B29-S60	W64B29-D60	W64B29-F60	60	.937
W64B29-S70	W64B29-D70	W64B29-F70	70	1.093
W64B29-S80	W64B29-D80	W64B29-F80	80	1.250
W64B29-S90	W64B29-D90	W64B29-F90	90	1.406
W64B29-S100	W64B29-D100	W64B29-F100	100	1.562
W64B29-S110	W64B29-D110	W64B29-F110	110	1.719
W64B29-S120	W64B29-D120	W64B29-F120	120	1.875

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE, DOUBLE OR FOUR THREAD PIN HUB	1/8"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



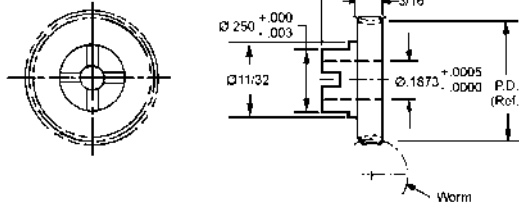
SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .04908 HELIX ANGLE 1° - 47' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .09817 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2°	CIRCULAR PITCH .19635 HELIX ANGLE 7°-8' PRESSURE ANGLE 14-1/2°		
STOCK NO.	STOCK NO.	STOCK NO.		
W64B13-S40-C	W64B13-D40-C	W64B13-F40-C	40	.625
W64B13-S50-C	W64B13-D50-C	W64B13-F50-C	50	.781
W64B13-S60-C	W64B13-D60-C	W64B13-F60-C	60	.937
W64B13-S70-C	W64B13-D70-C	W64B13-F70-C	70	1.093
W64B13-S80-C	W64B13-D80-C	W64B13-F80-C	80	1.250
W64B13-S90-C	W64B13-D90-C	W64B13-F90-C	90	1.406
W64B13-S100-C	W64B13-D100-C	W64B13-F100-C	100	1.562
W64B13-S110-C	W64B13-D110-C	W64B13-F110-C	110	1.719
W64B13-S120-C	W64B13-D120-C	W64B13-F120-C	120	1.875
W64B13-S180-C	W64B13-D180-C	W64B13-F180-C	180	2.813
W64B13-S360-C	W64B13-D360-C	W64B13-F360-C	360	5.625

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Other numbers of teeth and AGMA Quality 12 and 14 are available on request.

PRECISION WORM GEARS

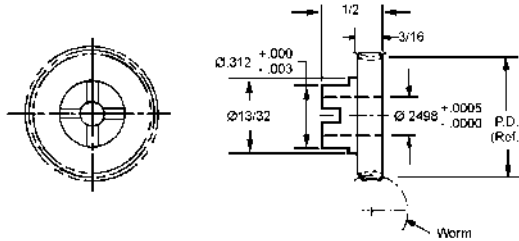
PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE, DOUBLE OR FOUR THREAD CLAMP HUB	3/16"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .04908 HELIX ANGLE 1° - 47' PRESSURE ANGLE 14-1/2° STOCK NO.	CIRCULAR PITCH .09817 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2° STOCK NO.	CIRCULAR PITCH .19635 HELIX ANGLE 7°-8' PRESSURE ANGLE 14-1/2° STOCK NO.		
W64B21-S40-C W64B21-S50-C W64B21-S60-C W64B21-S70-C W64B21-S80-C W64B21-S90-C W64B21-S100-C W64B21-S110-C W64B21-S120-C	W64B21-D40-C W64B21-D50-C W64B21-D60-C W64B21-D70-C W64B21-D80-C W64B21-D90-C W64B21-D100-C W64B21-D110-C W64B21-D120-C	W64B21-F40-C W64B21-F50-C W64B21-F60-C W64B21-F70-C W64B21-F80-C W64B21-F90-C W64B21-F100-C W64B21-F110-C W64B21-F120-C	40 50 60 70 80 90 100 110 120	.625 .781 .937 1.093 1.250 1.406 1.562 1.719 1.875

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

PITCH	STYLE	BORE	FACE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE, DOUBLE OR FOUR THREAD CLAMP HUB	1/4"	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND



SINGLE THREAD WORM	DOUBLE THREAD WORM	FOUR THREAD WORM	NO. OF TEETH	PITCH DIA.
CIRCULAR PITCH .04908 HELIX ANGLE 1° - 47' PRESSURE ANGLE 14-1/2° STOCK NO.	CIRCULAR PITCH .09817 HELIX ANGLE 3° - 35' PRESSURE ANGLE 14-1/2° STOCK NO.	CIRCULAR PITCH .19635 HELIX ANGLE 7°-8' PRESSURE ANGLE 14-1/2° STOCK NO.		
W64B29-S40-C W64B29-S50-C W64B29-S60-C W64B29-S70-C W64B29-S80-C W64B29-S90-C W64B29-S100-C W64B29-S110-C W64B29-S120-C	W64B29-D40-C W64B29-D50-C W64B29-D60-C W64B29-D70-C W64B29-D80-C W64B29-D90-C W64B29-D100-C W64B29-D110-C W64B29-D120-C	W64B29-F40-C W64B29-F50-C W64B29-F60-C W64B29-F70-C W64B29-F80-C W64B29-F90-C W64B29-F100-C W64B29-F110-C W64B29-F120-C	40 50 60 70 80 90 100 110 120	.625 .781 .937 1.093 1.250 1.406 1.562 1.719 1.875

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Other numbers of teeth and AGMA Quality 12 and 14 are available on request.

ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE THREAD PIN HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS13-S50	50	.781
AW64BS13-S52	52	.812
AW64BS13-S60	60	.937
AW64BS13-S64	64	1.000
AW64BS13-S70	70	1.094
AW64BS13-S72	72	1.125
AW64BS13-S80	80	1.250
AW64BC13-S96	96	1.500
AW64BC13-S100	100	1.563
AW64BC13-S110	110	1.719
AW64BC13-S120	120	1.875
AW64BC13-S130	130	2.031
AW64BC13-S140	140	2.187

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14/1/2°

Runs with worm # W64S-2S

B

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	DOUBLE THREAD PIN HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS13-D50	50	.781
AW64BS13-D52	52	.812
AW64BS13-D60	60	.937
AW64BS13-D64	64	1.000
AW64BS13-D70	70	1.094
AW64BS13-D72	72	1.125
AW64BS13-D80	80	1.250
AW64BC13-D96	96	1.500
AW64BC13-D100	100	1.563
AW64BC13-D110	110	1.719
AW64BC13-D120	120	1.875
AW64BC13-D130	130	2.031
AW64BC13-D140	140	2.187

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14/1/2°

Runs with worm # W64S-2D

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	FOUR THREAD PIN HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS13-F50	50	.781
AW64BS13-F52	52	.812
AW64BS13-F60	60	.937
AW64BS13-F64	64	1.000
AW64BS13-F70	70	1.094
AW64BS13-F72	72	1.125
AW64BS13-F80	80	1.250
AW64BC13-F96	96	1.500
AW64BC13-F100	100	1.563
AW64BC13-F110	110	1.719
AW64BC13-F120	120	1.875
AW64BC13-F130	130	2.031
AW64BC13-F140	140	2.187

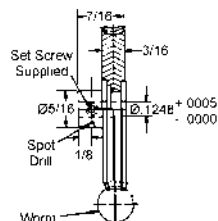
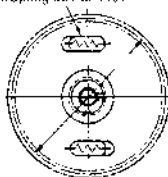
$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14/1/2°

Runs with worm # W64S-2F



Scissor Spring 50T to 80T
Coil Spring 96T to 140T



Hub Material: 303 Stainless Steel
Other numbers of teeth are available on request.

ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE THREAD PIN HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS21-S50	50	.781
AW64BS21-S52	52	.812
AW64BS21-S60	60	.937
AW64BS21-S64	64	1.000
AW64BS21-S70	70	1.094
AW64BS21-S72	72	1.125
AW64BS21-S80	80	1.250
AW64BC21-S96	96	1.500
AW64BC21-S100	100	1.563
AW64BC21-S110	110	1.719
AW64BC21-S120	120	1.875
AW64BC21-S130	130	2.031
AW64BC21-S140	140	2.187

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-3S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	DOUBLE THREAD PIN HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS21-D50	50	.781
AW64BS21-D52	52	.812
AW64BS21-D60	60	.937
AW64BS21-D64	64	1.000
AW64BS21-D70	70	1.094
AW64BS21-D72	72	1.125
AW64BS21-D80	80	1.250
AW64BC21-D96	96	1.500
AW64BC21-D100	100	1.563
AW64BC21-D110	110	1.719
AW64BC21-D120	120	1.875
AW64BC21-D130	130	2.031
AW64BC21-D140	140	2.187

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-3D

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	FOUR THREAD PIN HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS21-F50	50	.781
AW64BS21-F52	52	.812
AW64BS21-F60	60	.937
AW64BS21-F64	64	1.000
AW64BS21-F70	70	1.094
AW64BS21-F72	72	1.125
AW64BS21-F80	80	1.250
AW64BC21-F96	96	1.500
AW64BC21-F100	100	1.563
AW64BC21-F110	110	1.719
AW64BC21-F120	120	1.875
AW64BC21-F130	130	2.031
AW64BC21-F140	140	2.187

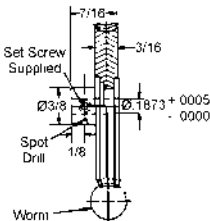
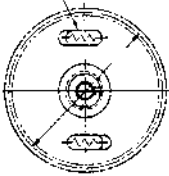
Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-3F



Scissor Spring 50T to 80T
Coil Spring 96T to 140T



Hub Material: 303 Stainless Steel
Other numbers of teeth are available on request.

ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE THREAD PIN HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS29-S50	50	.781
AW64BS29-S52	52	.812
AW64BS29-S60	60	.937
AW64BS29-S64	64	1.000
AW64BS29-S70	70	1.094
AW64BS29-S72	72	1.125
AW64BS29-S80	80	1.250
AW64BC29-S96	96	1.500
AW64BC29-S100	100	1.563
AW64BC29-S110	110	1.719
AW64BC29-S120	120	1.875
AW64BC29-S130	130	2.031
AW64BC29-S140	140	2.187

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14/1/2°

Runs with worm # W64S-4S

B

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	DOUBLE THREAD PIN HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS29-D50	50	.781
AW64BS29-D52	52	.812
AW64BS29-D60	60	.937
AW64BS29-D64	64	1.000
AW64BS29-D70	70	1.094
AW64BS29-D72	72	1.125
AW64BS29-D80	80	1.250
AW64BC29-D96	96	1.500
AW64BC29-D100	100	1.563
AW64BC29-D110	110	1.719
AW64BC29-D120	120	1.875
AW64BC29-D130	130	2.031
AW64BC29-D140	140	2.187

$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14/1/2°

Runs with worm # W64S-4D

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	FOUR THREAD PIN HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS21-F50	50	.781
AW64BS21-F52	52	.812
AW64BS21-F60	60	.937
AW64BS21-F64	64	1.000
AW64BS21-F70	70	1.094
AW64BS21-F72	72	1.125
AW64BS21-F80	80	1.250
AW64BC21-F96	96	1.500
AW64BC21-F100	100	1.563
AW64BC21-F110	110	1.719
AW64BC21-F120	120	1.875
AW64BC21-F130	130	2.031
AW64BC21-F140	140	2.187

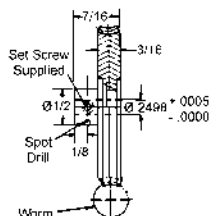
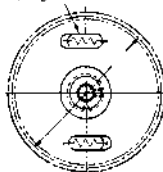
$$\text{Ratio} = \frac{\# \text{ of Teeth}}{\text{Worm Threads}}$$

Pressure Angle 14/1/2°

Runs with worm # W64S-4F



Scissor Spring 50T to 80T
Coil Spring 96T to 140T



Hub Material: 303 Stainless Steel
Other numbers of teeth are available on request.

ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE THREAD CLAMP HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS13-S50-C	50	.781
AW64BS13-S52-C	52	.812
AW64BS13-S60-C	60	.937
AW64BS13-S64-C	64	1.000
AW64BS13-S70-C	70	1.094
AW64BS13-S72-C	72	1.125
AW64BS13-S80-C	80	1.250
AW64BC13-S96-C	96	1.500
AW64BC13-S100-C	100	1.563
AW64BC13-S110-C	110	1.719
AW64BC13-S120-C	120	1.875
AW64BC13-S130-C	130	2.031
AW64BC13-S140-C	140	2.187

$$\text{Ratio} = \frac{\text{\# of Teeth}}{\text{Worm Threads}}$$

Pressure Angle $14\frac{1}{2}^\circ$

Runs with worm # W64S-2S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	DOUBLE THREAD CLAMP HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS13-D50-C	50	.781
AW64BS13-D52-C	52	.812
AW64BS13-D60-C	60	.937
AW64BS13-D64-C	64	1.000
AW64BS13-D70-C	70	1.094
AW64BS13-D72-C	72	1.125
AW64BS13-D80-C	80	1.250
AW64BC13-D96-C	96	1.500
AW64BC13-D100-C	100	1.563
AW64BC13-D110-C	110	1.719
AW64BC13-D120-C	120	1.875
AW64BC13-D130-C	130	2.031
AW64BC13-D140-C	140	2.187

$$\text{Ratio} = \frac{\text{\# of Teeth}}{\text{Worm Threads}}$$

Pressure Angle $14\frac{1}{2}^\circ$

Runs with worm # W64S-2D

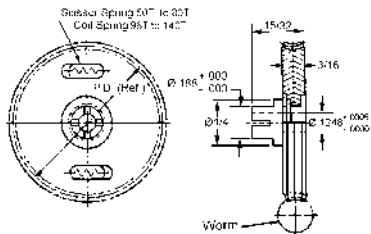
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	FOUR THREAD CLAMP HUB	1/8"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS13-F50-C	50	.781
AW64BS13-F52-C	52	.812
AW64BS13-F60-C	60	.937
AW64BS13-F64-C	64	1.000
AW64BS13-F70-C	70	1.094
AW64BS13-F72-C	72	1.125
AW64BS13-F80-C	80	1.250
AW64BC13-F96-C	96	1.500
AW64BC13-F100-C	100	1.563
AW64BC13-F110-C	110	1.719
AW64BC13-F120-C	120	1.875
AW64BC13-F130-C	130	2.031
AW64BC13-F140-C	140	2.187

$$\text{Ratio} = \frac{\text{\# of Teeth}}{\text{Worm Threads}}$$

Pressure Angle $14\frac{1}{2}^\circ$

Runs with worm # W64S-2F



Hub Material: 303 Stainless Steel

Other numbers of teeth are available on request.

ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE THREAD CLAMP HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS21-S50-C	50	.781
AW64BS21-S52-C	52	.812
AW64BS21-S60-C	60	.937
AW64BS21-S64-C	64	1.000
AW64BS21-S70-C	70	1.094
AW64BS21-S72-C	72	1.125
AW64BS21-S80-C	80	1.250
AW64BC21-S96-C	96	1.500
AW64BC21-S100-C	100	1.563
AW64BC21-S110-C	110	1.719
AW64BC21-S120-C	120	1.875
AW64BC21-S130-C	130	2.031
AW64BC21-S140-C	140	2.187

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-3S

B

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	DOUBLE THREAD CLAMP HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS21-D50-C	50	.781
AW64BS21-D52-C	52	.812
AW64BS21-D60-C	60	.937
AW64BS21-D64-C	64	1.000
AW64BS21-D70-C	70	1.094
AW64BS21-D72-C	72	1.125
AW64BS21-D80-C	80	1.250
AW64BC21-D96-C	96	1.500
AW64BC21-D100-C	100	1.563
AW64BC21-D110-C	110	1.719
AW64BC21-D120-C	120	1.875
AW64BC21-D130-C	130	2.031
AW64BC21-D140-C	140	2.187

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-3D

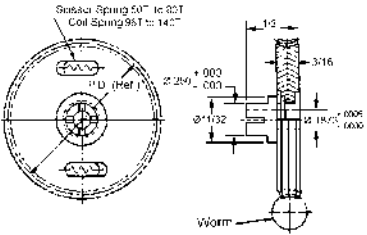
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	FOUR THREAD CLAMP HUB	3/16"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS21-F50-C	50	.781
AW64BS21-F52-C	52	.812
AW64BS21-F60-C	60	.937
AW64BS21-F64-C	64	1.000
AW64BS21-F70-C	70	1.094
AW64BS21-F72-C	72	1.125
AW64BS21-F80-C	80	1.250
AW64BC21-F96-C	96	1.500
AW64BC21-F100-C	100	1.563
AW64BC21-F110-C	110	1.719
AW64BC21-F120-C	120	1.875
AW64BC21-F130-C	130	2.031
AW64BC21-F140-C	140	2.187

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-2F



Hub Material: 303 Stainless Steel
Other numbers of teeth are available on request.

ANTI-BACKLASH WORM GEARS

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	SINGLE THREAD CLAMP HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS29-S50-C	50	.781
AW64BS29-S52-C	52	.812
AW64BS29-S60-C	60	.937
AW64BS29-S64-C	64	1.000
AW64BS29-S70-C	70	1.094
AW64BS29-S72-C	72	1.125
AW64BS29-S80-C	80	1.250
AW64BC29-S96-C	96	1.500
AW64BC29-S100-C	100	1.563
AW64BC29-S110-C	110	1.719
AW64BC29-S120-C	120	1.875
AW64BC29-S130-C	130	2.031
AW64BC29-S140-C	140	2.187

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-4S

PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	DOUBLE THREAD CLAMP HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS29-D50-C	50	.781
AW64BS29-D52-C	52	.812
AW64BS29-D60-C	60	.937
AW64BS29-D64-C	64	1.000
AW64BS29-D70-C	70	1.094
AW64BS29-D72-C	72	1.125
AW64BS29-D80-C	80	1.250
AW64BC29-D96-C	96	1.500
AW64BC29-D100-C	100	1.563
AW64BC29-D110-C	110	1.719
AW64BC29-D120-C	120	1.875
AW64BC29-D130-C	130	2.031
AW64BC29-D140-C	140	2.187

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-4D

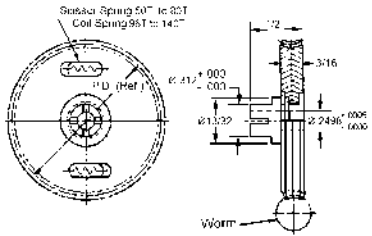
PITCH	STYLE	BORE	MATERIAL	AGMA QUALITY	TYPE
64	FOUR THREAD CLAMP HUB	1/4"	BRONZE QQ-B-637 ALLOY 464	10	RIGHT HAND

STOCK NO.	NO. OF TEETH	PITCH DIA.
AW64BS29-F50-C	50	.781
AW64BS29-F52-C	52	.812
AW64BS29-F60-C	60	.937
AW64BS29-F64-C	64	1.000
AW64BS29-F70-C	70	1.094
AW64BS29-F72-C	72	1.125
AW64BS29-F80-C	80	1.250
AW64BC29-F96-C	96	1.500
AW64BC29-F100-C	100	1.563
AW64BC29-F110-C	110	1.719
AW64BC29-F120-C	120	1.875
AW64BC29-F130-C	130	2.031
AW64BC29-F140-C	140	2.187

Ratio = $\frac{\text{\# of Teeth}}{\text{Worm Threads}}$

Pressure Angle 14/1/2°

Runs with worm # W64S-4F



Hub Material: 303 Stainless Steel
Other numbers of teeth are available on request.

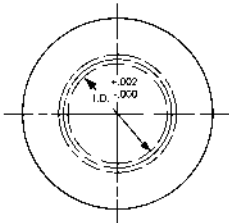
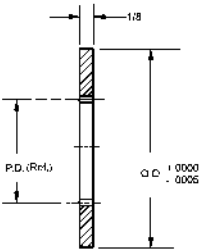
INTERNAL GEARS

PITCH	I.D.	O.D.	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
24	.750 TO 3.166	1.9980 TO 3.9980	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	INSIDE DIA.	OUTSIDE DIA.
N24S2-20	N24A2-20	20	.8333	.750	1.9980
N24S2-25	N24A2-25	25	1.0417	.958	
N24S2-30	N24A2-30	30	1.2500	1.166	
N24S2-35	N24A2-35	35	1.4583	1.375	
N24S3-35	N24A3-35	35	1.4583	1.375	2.9980
N24S3-40	N24A3-40	40	1.6667	1.583	
N24S3-45	N24A3-45	45	1.8750	1.791	
N24S3-50	N24A3-50	50	2.0833	2.000	
N24S3-60	N24A3-60	60	2.5000	2.416	3.9980
N24S4-60	N24A4-60	60	2.5000	2.416	
N24S4-65	N24A4-65	65	2.7083	2.625	
N24S4-70	N24A4-70	70	2.9167	2.834	
N24S4-72	N24A4-72	72	3.0000	2.916	
N24S4-78	N24A4-78	78	3.2500	3.166	

PITCH	I.D.	O.D.	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
32	.718 TO 3.062	1.9980 TO 3.9980	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	INSIDE DIA.	OUTSIDE DIA.
N32S2-25	N32A2-25	25	.7813	.718	1.9980
N32S2-30	N32A2-30	30	.9375	.875	
N32S2-35	N32A2-35	35	1.0938	1.031	
N32S2-40	N32A2-40	40	1.2500	1.187	
N32S2-45	N32A2-45	45	1.4063	1.343	
N32S3-45	N32A3-45	45	1.4063	1.343	2.9980
N32S3-50	N32A3-50	50	1.5625	1.500	
N32S3-60	N32A3-60	60	1.8750	1.812	
N32S3-70	N32A3-70	70	2.1875	2.125	
N32S3-80	N32A3-80	80	2.5000	2.437	
N32S4-80	N32A4-80	80	2.5000	2.437	3.9980
N32S4-85	N32A4-85	85	2.6563	2.593	
N32S4-90	N32A4-90	90	2.8125	2.750	
N32S4-96	N32A4-96	96	3.0000	2.937	
N32S4-100	N32A4-100	100	3.1250	3.062	



Drawing and dimesions apply to all pitches.
Special internal gears on request.

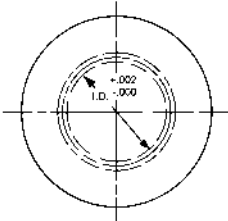
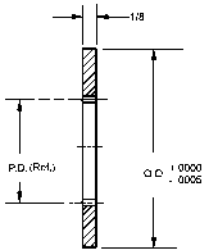
INTERNAL GEARS

PITCH	I.D.	O.D.	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
48	.791 TO 3.208	1.9980 TO 3.9980	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	INSIDE DIA.	OUTSIDE DIA.
N48S2-40	N48A2-40	40	.8333	.791	1.9980
N48S2-50	N48A2-50	50	1.0417	1.000	
N48S2-60	N48A2-60	60	1.2500	1.208	
N48S2-70	N48A2-70	70	1.4583	1.416	
N48S3-70	N48A3-70	70	1.4583	1.416	2.9980
N48S3-80	N48A3-80	80	1.6667	1.625	
N48S3-90	N48A3-90	90	1.8750	1.833	
N48S3-100	N48A3-100	100	2.0833	2.041	
N48S3-120	N48A3-120	120	2.5000	2.458	3.9980
N48S4-120	N48A4-120	120	2.5000	2.458	
N48S4-130	N48A4-130	130	2.7083	2.666	
N48S4-140	N48A4-140	140	2.9167	2.875	
N48S4-144	N48A4-144	144	3.0000	2.958	3.208
N48S4-156	N48A4-156	156	3.2500	3.208	

PITCH	I.D.	O.D.	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
64	.750 TO 3.093	1.9980 TO 3.9980	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	INSIDE DIA.	OUTSIDE DIA.
N64S2-50	N64A2-50	50	.7813	.750	1.9980
N64S2-60	N64A2-60	60	.9375	.906	
N64S2-70	N64A2-70	70	1.0938	1.062	
N64S2-80	N64A2-80	80	1.2500	1.219	
N64S2-90	N64A2-90	90	1.4063	1.375	2.9980
N64S3-90	N64A3-90	90	1.4063	1.375	
N64S3-100	N64A3-100	100	1.5625	1.531	
N64S3-120	N64A3-120	120	1.8750	1.843	
N64S3-140	N64A3-140	140	2.1875	2.156	3.9980
N64S3-160	N64A3-160	160	2.5000	2.468	
N64S4-160	N64A4-160	160	2.5000	2.468	
N64S4-170	N64A4-170	170	2.6563	2.625	
N64S4-180	N64A4-180	180	2.8125	2.781	3.093
N64S4-192	N64A4-192	192	3.0000	2.968	
N64S4-200	N64A4-200	200	3.1250	3.093	



Drawing and dimenions apply to all pitches.
Special internal gears on request.

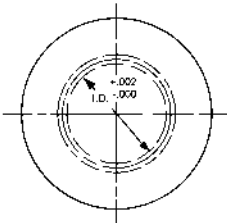
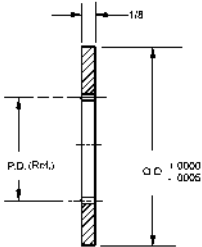
INTERNAL GEARS

PITCH	I.D.	O.D.	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
72	.805 TO 3.027	1.9980 TO 3.9980	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	INSIDE DIA.	OUTSIDE DIA.
N72S2-60	N72A2-60	60	.8333	.805	1.9980
N72S2-80	N72A2-80	80	1.1111	1.083	
N72S2-100	N72A2-100	100	1.3889	1.361	
N72S2-110	N72A2-110	110	1.5278	1.500	
N72S3-110	N72A3-110	110	1.5278	1.500	2.9980
N72S3-120	N72A3-120	120	1.6667	1.639	
N72S3-140	N72A3-140	140	1.9444	1.916	
N72S3-160	N72A3-160	160	2.2222	2.194	
N72S3-180	N72A3-180	180	2.5000	2.472	3.9980
N72S4-180	N72A4-180	180	2.5000	2.472	
N72S4-190	N72A4-190	190	2.6389	2.611	
N72S4-200	N72A4-200	200	2.7778	2.750	
N72S4-216	N72A4-216	216	3.0000	2.972	3.9980
N72S4-220	N72A4-220	220	3.0556	3.027	

PITCH	I.D.	O.D.	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
96	.812 TO 3.105	1.9980 TO 3.9980	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	INSIDE DIA.	OUTSIDE DIA.
N96S2-80	N96A2-80	80	.8333	.812	1.9980
N96S2-100	N96A2-100	100	1.0416	1.021	
N96S2-120	N96A2-120	120	1.2500	1.230	
N96S2-140	N96A2-140	140	1.4583	1.438	
N96S2-150	N96A2-150	150	1.5625	1.542	2.9980
N96S3-150	N96A3-150	150	1.5625	1.542	
N96S3-160	N96A3-160	160	1.6667	1.646	
N96S3-180	N96A3-180	180	1.8750	1.855	
N96S3-200	N96A3-200	200	2.0833	2.063	3.9980
N96S3-240	N96A3-240	240	2.5000	2.480	
N96S4-240	N96A4-240	240	2.5000	2.480	
N96S4-250	N96A4-250	250	2.6042	2.584	
N96S4-260	N96A4-260	260	2.7083	2.688	3.9980
N96S4-280	N96A4-280	280	2.9167	2.896	
N96S4-288	N96A4-288	288	3.0000	2.980	
N96S4-300	N96A4-300	300	3.1250	3.105	

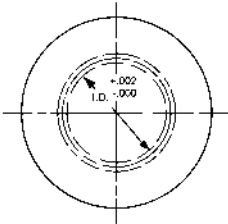
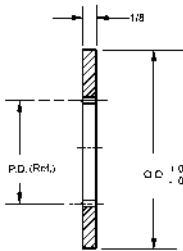


Drawing and dimensions apply to all pitches.
Special internal gears on request.

INTERNAL GEARS

PITCH	I.D.	O.D.	MATERIAL	AGMA QUALITY	PRESSURE ANGLE
120	.816 TO 3.149	1.9980 TO 3.9980	303 STAINLESS STEEL OR 2024-T4 ALUMINUM ANODIZED	10	20°

303 STAINLESS STEEL STOCK NO.	2024-T4 ALUMINUM ANODIZED STOCK NO.	NO. OF TEETH	PITCH DIA.	INSIDE DIA.	OUTSIDE DIA.
N120S2-100	N120A2-100	100	.8333	.816	1.9980
N120S2-120	N120A2-120	120	1.0000	.983	
N120S2-140	N120A2-140	140	1.1667	1.149	
N120S2-160	N120A2-160	160	1.3333	1.316	
N120S2-180	N120A2-180	180	1.5000	1.483	
N120S3-180	N120A3-180	180	1.5000	1.483	2.9980
N120S3-200	N120A3-200	200	1.6667	1.649	
N120S3-240	N120A3-240	240	2.0000	1.983	
N120S3-250	N120A3-250	250	2.0833	2.066	
N120S3-270	N120A3-270	270	2.2500	2.233	
N120S3-300	N120A3-300	300	2.5000	2.483	
N120S4-300	N120A4-300	300	2.5000	2.483	3.9980
N120S4-320	N120A4-320	320	2.6667	2.649	
N120S4-340	N120A4-340	340	2.8333	2.816	
N120S4-350	N120A4-350	350	2.9167	2.900	
N120S4-360	N120A4-360	360	3.0000	2.983	
N120S4-380	N120A4-380	380	3.1667	3.149	



Drawing and dimesions apply to all pitches.
Special internal gears on request.

For Couplings See Section G.
For Shafts, Bearings and Collars See Section I.

ASSEMBLIES

Table of Contents

GEARBOXES - WORM WHEEL & HELICAL GEARS		INTERMITTENT MOTION ASSEMBLIES	
SPEED REDUCER TECHNICAL DATA	C 2	SHAFT SIZE 1/4"	C 12
WORM & WORM WHEEL GEARS		GENEVA MECHANISMS	
SHAFT SIZE 1/8", 3/16" & 1/4"	C 3 - C 4	SHAFT SIZE 1/4"	C 13
HELICAL GEARS		CAM FOLLOWERS	C 14
SHAFT SIZE 1/8", 3/16" & 1/4"	C 5	ROLLER BEARING CAM FOLLOWERS	C 15
MITER GEARBOXES		ADJUSTABLE CAM ASSEMBLIES	C 16
SHAFT SIZE 1/8", 3/16" & 1/4"	C 6	RATCHETS & PAWLS	C 17
MINIATURE MITER GEARBOXES			
SHAFT SIZE 1/8"	C 7		
BEVEL GEARBOXES			
SHAFT SIZE 1/8", 3/16" & 1/4"	C 8		
SERVO GEARBOXES			
SHAFT SIZE 1/8"	C 9		
SHAFT SIZE 3/16"	C 10		
SHAFT SIZE 1/4"	C 11		



GEARBOXES - WORM WHEEL & HELICAL GEARS

SPEED REDUCER TECHNICAL DATA

SHAFT SIZE 1/8", 3/16" AND 1/4"

Materials

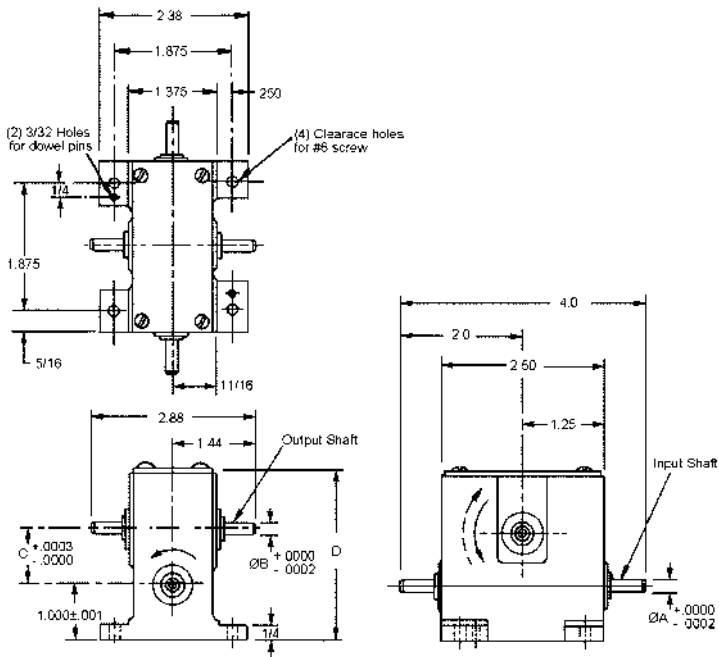
Housing	Cast Aluminum (Anodized)	Bearings	Stainless Steel or Bronze
Worm Wheel	Bronze	Shafts	Stainless Steel
Worm	Stainless Steel	Lubrication	MIL. Spec. Oil and Grease
Helical Gear	Aluminum	Housing Cover	Aluminum
Helical Pinion	Stainless Steel	All other parts	Stainless Steel

Backlash

Ball Bearing Unit 20 Minutes Max.
Bronze Bearing Unit 30 Minutes Max.

Maximum Speed

2000 RPM



Worm and Wheel units can only be driven from input shaft and will only operate as a Speed Reducer.

Helical Gear units can be driven from input shaft as a Speed Reducer or from output shaft as a Speed Increaser. Other ratios available on request.

Anti-Backlash unit available on request.



WORM & WORM WHEEL GEARS

SHAFT SIZE 1/8", 3/16" AND 1/4"

SHAFT SIZE	TYPE
ØA= 1/8 ØB= 1/8	BALL BEARING OR BRONZE BEARING

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
WX64B2-1	WX64P2-1	64 WORM & WHEEL	.1247	.1247	15:1	.7191	2-11/32	112
WX64B2-2	WX64P2-2				20:1	.8753	2-5/8	160
WX64B2-3	WX64P2-3				25:1	1.0315	2-31/32	192
WX64B2-4	WX64P2-4				30:1	1.1878	3-1/4	240
WX64B2-5	WX64P2-5				30:1	.7190	2-11/32	144
WX64B2-6	WX64P2-6				40:1	.8753	2-5/8	192
WX64B2-7	WX64P2-7				50:1	1.0315	2-31/32	240
WX64B2-8	WX64P2-8				60:1	1.1878	3-1/4	288
WX64B2-9	WX64P2-9				60:1	.7190	2-11/32	144
WX64B2-10	WX64P2-10				80:1	.8753	2-5/8	192
WX64B2-11	WX64P2-11				100:1	1.0315	2-31/32	240
WX64B2-12	WX64P2-12				120:1	1.1873	3-1/4	288

SHAFT SIZE	TYPE
ØA= 3/16 ØB= 3/16	BALL BEARING OR BRONZE BEARING

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
WX64B3-1	WX64P3-1	64 WORM & WHEEL	.1872	.1872	15:1	.7190	2-11/32	112
WX64B3-2	WX64P3-2				20:1	.8753	2-5/8	160
WX64B3-3	WX64P3-3				25:1	1.0315	2-31/32	192
WX64B3-4	WX64P3-4				30:1	1.1878	3-1/4	240
WX64B3-5	WX64P3-5				30:1	.7190	2-11/32	144
WX64B3-6	WX64P3-6				40:1	.8753	2-5/8	192
WX64B3-7	WX64P3-7				50:1	1.0315	2-31/32	240
WX64B3-8	WX64P3-8				60:1	1.1878	3-1/4	288
WX64B3-9	WX64P3-9				60:1	.7190	2-11/32	144
WX64B3-10	WX64P3-10				80:1	.8753	2-5/8	192
WX64B3-11	WX64P3-11				100:1	1.0315	2-31/32	240
WX64B3-12	WX64P3-12				120:1	1.1878	3-1/4	288

SHAFT SIZE	TYPE
ØA= 1/4 ØB= 1/4	BALL BEARING OR BRONZE BEARING

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
WX64B4-1	WX64P4-1	64 WORM & WHEEL	.2497	.2497	15:1	.7190	2-11/32	112
WX64B4-2	WX64P4-2				20:1	.8753	2-5/8	160
WX64B4-3	WX64P4-3				25:1	1.0315	2-31/32	192
WX64B4-4	WX64P4-4				30:1	1.1878	3-1/4	240
WX64B4-5	WX64P4-5				30:1	.7190	2-11/32	144
WX64B4-6	WX64P4-6				40:1	.8753	2-5/8	192
WX64B4-7	WX64P4-7				50:1	1.0315	2-31/32	240
WX64B4-8	WX64P4-8				60:1	1.1878	3-1/4	288
WX64B4-9	WX64P4-9				60:1	.7190	2-11/32	144
WX64B4-10	WX64P4-10				80:1	.8753	2-5/8	192
WX64B4-11	WX64P4-11				100:1	1.0315	2-31/32	240
WX64B4-12	WX64P4-12				120:1	1.1878	3-1/4	288

WORM & WORM WHEEL GEARS

SHAFT SIZE 1/8", 3/16" AND 1/4"

SHAFT SIZE	TYPE
ØA= 1/8 ØB= 1/8	BALL BEARING OR BRONZE BEARING

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
WX48B2-1	WX48P2-1	48 WORM & WHEEL	.1247	.1247	12.5:1	.6878	2-11/32	144
WX48B2-2	WX48P2-2				15:1	.7920	2-35/64	176
WX48B2-3	WX48P2-3				20:1	1.0003	2-31/32	240
WX48B2-4	WX48P2-4				22.5:1	1.1045	3-11/64	272
WX48B2-5	WX48P2-5				25:1	.6878	2-11/32	176
WX48B2-6	WX48P2-6				30:1	.7920	2-35/64	208
WX48B2-7	WX48P2-7				40:1	1.0003	2-31/32	288
WX48B2-8	WX48P2-8				45:1	1.1045	3-11/64	320
WX48B2-9	WX48P2-9				50:1	.6878	2-11/32	176
WX48B2-10	WX48P2-10				60:1	.7920	2-35/64	208
WX48B2-11	WX48P2-11				80:1	1.0003	2-31/32	288
WX48B2-12	WX48P2-12				90:1	1.1045	3-11/64	320

SHAFT SIZE	TYPE
ØA= 3/16 ØB= 3/16	BALL BEARING OR BRONZE BEARING

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
WX48B3-1	WX48P3-1	48 WORM & WHEEL	.1872	.1872	12.5:1	.6878	2-11/32	144
WX48B3-2	WX48P3-2				15:1	.7920	2-35/64	176
WX48B3-3	WX48P3-3				20:1	1.0003	2-31/32	240
WX48B3-4	WX48P3-4				22.5:1	1.1045	3-11/64	272
WX48B3-5	WX48P3-5				25:1	.6878	2-11/32	176
WX48B3-6	WX48P3-6				30:1	.7920	2-35/64	208
WX48B3-7	WX48P3-7				40:1	1.0003	2-31/32	288
WX48B3-8	WX48P3-8				45:1	1.1045	3-11/64	320
WX48B3-9	WX48P3-9				50:1	.6878	2-11/32	176
WX48B3-10	WX48P3-10				60:1	.7920	2-35/64	208
WX48B3-11	WX48P3-11				80:1	1.0003	2-31/32	288
WX48B3-12	WX48P3-12				90:1	1.1045	3-11/64	320

SHAFT SIZE	TYPE
ØA= 1/4 ØB= 1/4	BALL BEARING OR BRONZE BEARING

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
WX48B43-1	WX48P43-1	48 WORM & WHEEL	.1872	.2497	12.5:1	.6878	2-11/32	144
WX48B43-2	WX48P43-2				15:1	.7920	2-35/64	176
WX48B43-3	WX48P43-3				20:1	1.0003	2-31/32	240
WX48B43-4	WX48P43-4				22.5:1	1.1045	3-11/64	272
WX48B43-5	WX48P43-5				25:1	.6878	2-11/32	176
WX48B43-6	WX48P43-6				30:1	.7920	2-35/64	208
WX48B43-7	WX48P43-7				40:1	1.0003	2-31/32	288
WX48B43-8	WX48P43-8				45:1	1.1040	3-11/64	320
WX48B43-9	WX48P43-9				50:1	.6878	2-11/32	176
WX48B43-10	WX48P43-10				60:1	.7920	2-35/64	208
WX48B43-11	WX48P43-11				80:1	1.0003	2-31/32	288
WX48B43-12	WX48P43-12				90:1	1.1045	3-11/64	320

HELICAL GEARS

SHAFT SIZE 1/8", 3/16" AND 1/4"

SHAFT SIZE					TYPE			
ØA= 1/8 ØB= 1/8					BALL BEARING OR BRONZE BEARING			

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
HX64B2-1 HX64B2-2 HX64B2-3 HX64B2-4	HX64P2-1 HX64P2-2 HX64P2-3 HX64P2-4	64 HELICAL	.1247	.1247	1:1	.4422	1-25/32	49
					2:1	.6632	2-15/64	
					3:1	.8841	2-43/64	
					4:1	1.1051	3-7/64	

SHAFT SIZE					TYPE			
ØA= 3/16 ØB= 3/16					BALL BEARING OR BRONZE BEARING			

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
HX64B3-1 HX64B3-2 HX64B3-3 HX64B3-4	HX64P3-1 HX64P3-2 HX64P3-3 HX64P3-4	64 HELICAL	.1872	.1872	1:1	.4422	1-25/32	73
					2:1	.6632	2-15/16	
					3:1	.8841	2-43/64	
					4:1	1.1051	3-7/64	

SHAFT SIZE					TYPE			
ØA= 3/16 ØB= 3/16					BALL BEARING OR BRONZE BEARING			

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
HX48B3-1 HX48B3-2 HX48B3-3	HX48P3-1 HX48P3-2 HX48P3-3	48 HELICAL	.1872	.1872	1:1	.5895	2-1/64	73
					2:1	.8841	2-19/32	
					3:1	1.1787	3-3/16	

SHAFT SIZE					TYPE			
ØA= 1/4 ØB= 1/4					BALL BEARING OR BRONZE BEARING			

BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	PITCH	SHAFT SIZE		NOMINAL RATIO	C CENTER	D HEIGHT	MAXIMUM OUTPUT TORQUE (OZ.-IN.)
STOCK NO.	STOCK NO.		ØA	ØB				
HX48B4-1 HX48B4-2 HX48B4-3	HX48P4-1 HX48P4-2 HX49P4-3	48 HELICAL	.2497	.2497	1:1	.5895	2-1/64	130
					2:1	.8841	2-19/32	
					3:1	1.1787	3-3/16	

MITER GEARBOXES

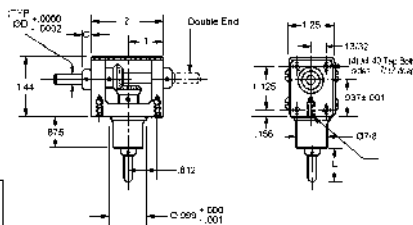
SHAFT SIZE 1/8", 3/16" AND 1/4"

SHAFT SIZE	RATIOS	TYPE
1/8"	1:1	BALL BEARING OR BRONZE BEARING

MATERIAL:

Housing
Shafts and Hardware
Bearings
Gears
Lubrication

Aluminum
Stainless Steel
Stainless Steel or Bronze
Stainless Steel and Aluminum
MIL. Spec. Oil and Grease



Consult Berg's Engineering Department for higher torque units.

ABEC 7 BALL BEARING	OIL-LESS BRONZE BEARING UNIT
STOCK NO.	STOCK NO.
MX-1 MX-1-D	MX-1B MX-1B-D

ØD	C	L	SHAFT END STYLE	R.P.M. (MAX.)	TORQUE (MAX.)
.1247	.187	.71	SINGLE DOUBLE	1000	200 OZ.IN.

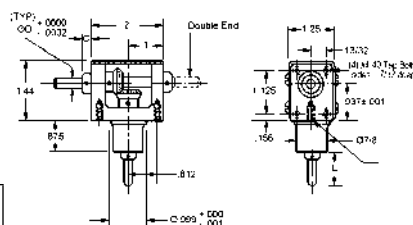


SHAFT SIZE	RATIOS	TYPE
3/16"	1:1	BALL BEARING OR BRONZE BEARING

MATERIAL:

Housing
Shafts and Hardware
Bearings
Gears
Lubrication

Aluminum
Stainless Steel
Stainless Steel or Bronze
Stainless Steel and Aluminum
MIL. Spec. Oil and Grease



Consult Berg's Engineering Department for higher torque units.

ABEC 7 BALL BEARING	OIL-LESS BRONZE BEARING UNIT
STOCK NO.	STOCK NO.
MX-2 MX-2-D	MX-2B MX-2B-D

ØD	C	L	SHAFT END STYLE	R.P.M. (MAX.)	TORQUE (MAX.)
.1872	.220	.87	SINGLE DOUBLE	2000	300 OZ.IN.

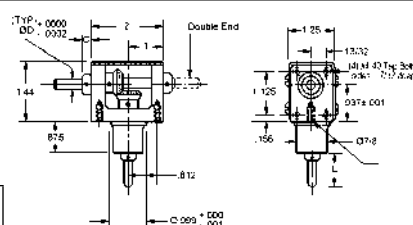


SHAFT SIZE	RATIOS	TYPE
1/4"	1:1	BALL BEARING OR BRONZE BEARING

MATERIAL:

Housing
Shafts and Hardware
Bearings
Gears
Lubrication

Aluminum
Stainless Steel
Stainless Steel or Bronze
Stainless Steel and Aluminum
MIL. Spec. Oil and Grease



Consult Berg's Engineering Department for higher torque units.

ABEC 7 BALL BEARING	OIL-LESS BRONZE BEARING UNIT
STOCK NO.	STOCK NO.
MX-3 MX-3-D	MX-3B MX-3B-D

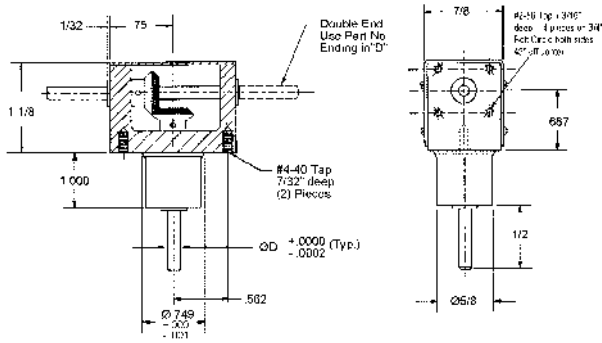
ØD	C	L	SHAFT END STYLE	R.P.M. (MAX.)	TORQUE (MAX.)
.2497	.250	1.03	SINGLE DOUBLE	2500	500 OZ.IN.



MINIATURE MITER GEARBOXES

SHAFT SIZE 1/8"

SHAFT SIZE	RATIOS	TYPE
1/8"	1:1	BALL BEARING OR BRONZE BEARING



MATERIAL:

Housing	Aluminum
Shafts and Hardware	Stainless Steel
Bearings	Stainless Steel or Bronze
Gears	Stainless Steel and Aluminum
Lubrication	MIL. Spec. Oil and Grease

ABEC 7 BALL BEARING	OIL-LESS BRONZE BEARING UNIT				
STOCK NO.	STOCK NO.	ØD	SHAFT END STYLE	R.P.M. (MAX.)	TORQUE (MAX.)
MX-4	MX-4B	.1247	SINGLE	1000	100
MX-4-D	MX-4B-D	.1247	DOUBLE		OZ. IN.

Consult Berg's Engineering Department for higher torque units.
Anti-Backlash units available on request.



BEVEL GEARBOXES

SHAFT SIZE 1/8", 3/16" AND 1/4"

SHAFT SIZE		RATIOS								TYPE		
1/8"		FROM 1:1 TO 1:3								BALL BEARING OR BRONZE BEARING		

ABEC 7 BALL BEARING		OIL-LESS BRONZE BEARING UNIT		NOMINAL RATIO	ØD	B	C	E	F	G	H	A	RPM (MAX.)	STATIC TORQUE (MAX.)
STOCK NO.	STOCK NO.													
MX-5	MX-5B	1:1												
MX-6	MX-6B	1:2	.1247	2-3/4	1-7/8	1-5/8	1-7/8	13/16	1-7/16	1-11/16	1-15/16	1.000	1000	60 OZ. IN.
MX-7	MX-7B	1:3												

- Maximum backlash 10 minutes
- Units can be driven in either direction from any shaft

MATERIAL: Housing
Shafts and Hardware
Bearings
Gears
Lubrication

Aluminum
Stainless Steel
Stainless Steel or Bronze
Stainless Steel and Aluminum
MIL. Spec. Oil and Grease

SHAFT SIZE		RATIOS								TYPE		
3/16"		FROM 1:1 TO 1:3								BALL BEARING OR BRONZE BEARING		

ABEC 7 BALL BEARING		OIL-LESS BRONZE BEARING UNIT		NOMINAL RATIO	ØD	B	C	E	F	G	H	A	RPM (MAX.)	STATIC TORQUE (MAX.)
STOCK NO.	STOCK NO.													
MX-8	MX-8B	1:1												
MX-9	MX-9B	1:2	.1872	2-3/4	1-7/8	1-5/8	1-7/8	13/16	1-7/16	1-11/16	1-15/16	1.000	2000	80 OZ. IN.
MX-10	MX-10B	1:3												

- Maximum backlash 10 minutes
- Units can be driven in either direction from any shaft

MATERIAL: Housing
Shafts and Hardware
Bearings
Gears
Lubrication

Aluminum
Stainless Steel
Stainless Steel or Bronze
Stainless Steel and Aluminum
MIL. Spec. Oil and Grease

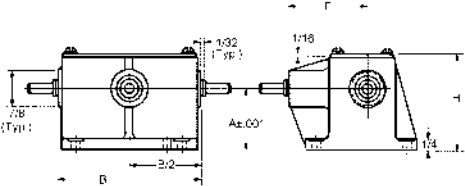
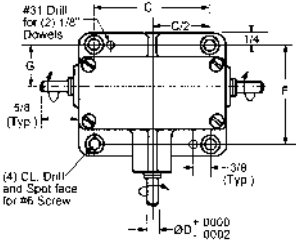
SHAFT SIZE		RATIOS								TYPE		
1/4"		FROM 1:1 TO 1:3								BALL BEARING OR BRONZE BEARING		

ABEC 7 BALL BEARING		OIL-LESS BRONZE BEARING UNIT		NOMINAL RATIO	ØD	B	C	E	F	G	H	A	RPM (MAX.)	STATIC TORQUE (MAX.)
STOCK NO.	STOCK NO.													
MX-11	MX-11B	1:1												
MX-12	MX-12B	1:2	.2498	3-1/2	2-5/8	2	2-1/4	15/16	2	2-5/16	2-9/16	1.500	2500	100 OZ. IN.
MX-13	MX-13B	1:3												

- Maximum backlash 10 minutes
- Units can be driven in either direction from any shaft

MATERIAL: Housing
Shafts and Hardware
Bearings
Gears
Lubrication

Aluminum
Stainless Steel
Stainless Steel or Bronze
Stainless Steel and Aluminum
MIL. Spec. Oil and Grease



SERVO GEARBOXES

SHAFT SIZE 1/8"

SHAFT SIZE	RATIOS	TYPE
1/8"	2:1 TO 625:1	BALL BEARING OR BRONZE BEARING



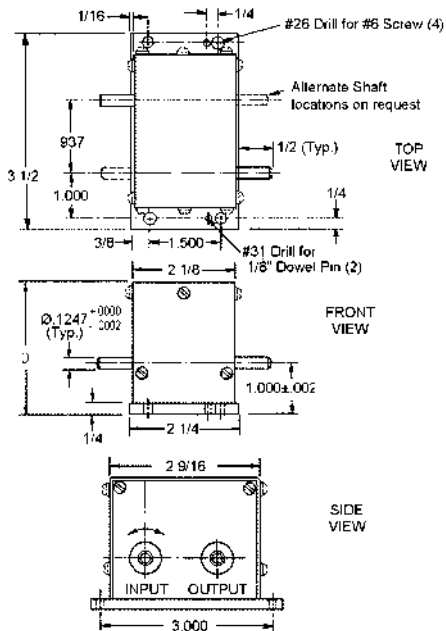
Special units available on request.

Anti-Backlash gear - Output End

Slip Clutch included - Input End

Contact Berg's Engineering Department for recommendations for use as a Speed Increaser.

• See instructions below to order alternate shaft locations.



Alternate Shaft Locations

Add **Style Letter** to complete stock number, if different from that shown.

Style:

O = Opposite of as shown

R = In and Out on R.H. side only

L = In and Out on L.H. side only

A = In and Out on all sides

Send drawing if other than listed above.

Backlash

At Output Shaft

Ball Bearing - 15 Minutes Max.

Bronze Bearing - 30 Minutes Max.

ABEC 7 BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	NOMINAL RATIO	D HEIGHT	DIRECTION ROTATION
STOCK NO.	STOCK NO.			
SX-B2-1	SX-P2-1	2:1	2-1/2	SAME
SX-B2-2	SX-P2-2	3:1		
SX-B2-3	SX-P2-3	4:1		
SX-B2-4	SX-P2-4	5:1		
SX-B2-5	SX-P2-5	6:1		
SX-B2-6	SX-P2-6	7:1		
SX-B2-7	SX-P2-7	8:1		
SX-B2-8	SX-P2-8	9:1		
SX-B2-9	SX-P2-9	10:1		
SX-B2-10	SX-P2-10	12:1		
SX-B2-11	SX-P2-11	15:1		
SX-B2-12	SX-P2-12	16:1		
SX-B2-13	SX-P2-13	20:1		
SX-B2-14	SX-P2-14	25:1		
SX-B2-15	SX-P2-15	30:1	2-5/8	OPPOSITE
SX-B2-16	SX-P2-16	32:1		
SX-B2-17	SX-P2-17	36:1		
SX-B2-18	SX-P2-18	40:1		
SX-B2-19	SX-P2-19	45:1		
SX-B2-20	SX-P2-20	48:1		
SX-B2-21	SX-P2-21	50:1		
SX-B2-22	SX-P2-22	60:1		
SX-B2-23	SX-P2-23	64:1		
SX-B2-24	SX-P2-24	75:1		
SX-B2-25	SX-P2-25	80:1		
SX-B2-26	SX-P2-26	100:1		
SX-B2-27	SX-P2-27	125:1		
SX-B2-28	SX-P2-28	72:1	3-5/16	SAME
SX-B2-29	SX-P2-29	90:1		
SX-B2-30	SX-P2-30	96:1		
SX-B2-31	SX-P2-31	128:1		
SX-B2-32	SX-P2-32	150:1		
SX-B2-33	SX-P2-33	180:1		
SX-B2-34	SX-P2-34	200:1		
SX-B2-35	SX-P2-35	250:1		
SX-B2-36	SX-P2-36	256:1		
SX-B2-37	SX-P2-37	300:1		
SX-B2-38	SX-P2-38	375:1		
SX-B2-39	SX-P2-39	400:1		
SX-B2-40	SX-P2-40	500:1		
SX-B2-41	SX-P2-41	625:1		

Materials

Housing and Cover

Aluminum Anodized

Gears

Stainless Steel and Aluminum

Shafts and Hardware

Stainless Steel

Bearings

Stainless Steel or Bronze

Lubrication

MIL. Spec. Oil and Grease

Maximum Speed

5000 RPM

Maximum Output Torque

300 Oz. In.

SERVO GEARBOXES

SHAFT SIZE 3/16"

SHAFT SIZE	RATIOS	TYPE
3/16"	2:1 TO 625:1	BALL BEARING OR BRONZE BEARING



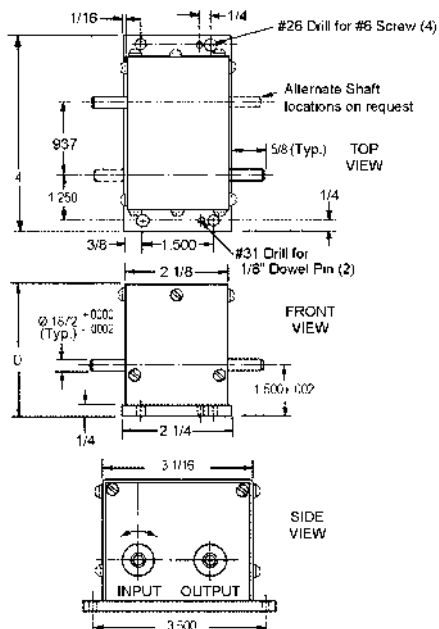
Special units available on request.

Anti-Backlash gear - Output End

Slip Clutch included - Input End

Contact Berg's Engineering Department for recommendations for use as a Speed Increaser.

• See instructions below to order alternate shaft locations.



Alternate Shaft Locations

Add **Style Letter** to complete stock number, if different from that shown.

Style:

- O = Opposite of as shown
- R = In and Out on R.H. side only
- L = In and Out on L.H. side only
- A = In and Out on all sides

Send drawing if other than listed above.

Backlash

At Output Shaft

Ball Bearing - 15 Minutes Max.

Bronze Bearing - 30 Minutes Max.

ABEC 7 BALL BEARINGS UNITS	BRONZE BEARINGS UNITS	NOMINAL RATIO	D HEIGHT	DIRECTION ROTATION
STOCK NO.	STOCK NO.			
SX-B3-1	SX-P3-1	2:1	3-3/8	SAME
SX-B3-2	SX-P3-2	3:1		
SX-B3-3	SX-P3-3	4:1		
SX-B3-4	SX-P3-4	5:1		
SX-B3-5	SX-P3-5	6:1		
SX-B3-6	SX-P3-6	7:1		
SX-B3-7	SX-P3-7	8:1		
SX-B3-8	SX-P3-8	9:1		
SX-B3-9	SX-P3-9	10:1		
SX-B3-10	SX-P3-10	12:1		
SX-B3-11	SX-P3-11	15:1		
SX-B3-12	SX-P3-12	16:1		
SX-B3-13	SX-P3-13	20:1		
SX-B3-14	SX-P3-14	25:1		
SX-B3-15	SX-P3-15	30:1	3-3/8	OPPOSITE
SX-B3-16	SX-P3-16	32:1		
SX-B3-17	SX-P3-17	36:1		
SX-B3-18	SX-P3-18	40:1		
SX-B3-19	SX-P3-19	45:1		
SX-B3-20	SX-P3-20	48:1		
SX-B3-21	SX-P3-21	50:1		
SX-B3-22	SX-P3-22	60:1		
SX-B3-23	SX-P3-23	64:1		
SX-B3-24	SX-P3-24	75:1		
SX-B3-25	SX-P3-25	80:1		
SX-B3-26	SX-P3-26	100:1		
SX-B3-27	SX-P3-27	125:1		
SX-B3-28	SX-P3-28	72:1	4-9/32	SAME
SX-B3-29	SX-P3-29	90:1		
SX-B3-30	SX-P3-30	96:1		
SX-B3-31	SX-P3-31	128:1		
SX-B3-32	SX-P3-32	150:1		
SX-B3-33	SX-P3-33	180:1		
SX-B3-34	SX-P3-34	200:1		
SX-B3-35	SX-P3-35	250:1		
SX-B3-36	SX-P3-36	256:1		
SX-B3-37	SX-P3-37	300:1		
SX-B3-38	SX-P3-38	375:1		
SX-B3-39	SX-P3-39	400:1		
SX-B3-40	SX-P3-40	500:1		
SX-B3-41	SX-P3-41	625:1		

Materials

Housing and Cover

Aluminum Anodized

Gears

Stainless Steel and Aluminum

Shafts and Hardware

Stainless Steel

Bearings

Stainless Steel or Bronze

Lubrication

MIL. Spec. Oil and Grease

Maximum Speed

5000 RPM

Maximum Output Torque

400 Oz. In.

SERVO GEARBOXES

SHAFT SIZE 1/4"

SHAFT SIZE	RATIOS	TYPE
1/4"	2:1 TO 625:1	BALL BEARING OR BRONZE BEARING



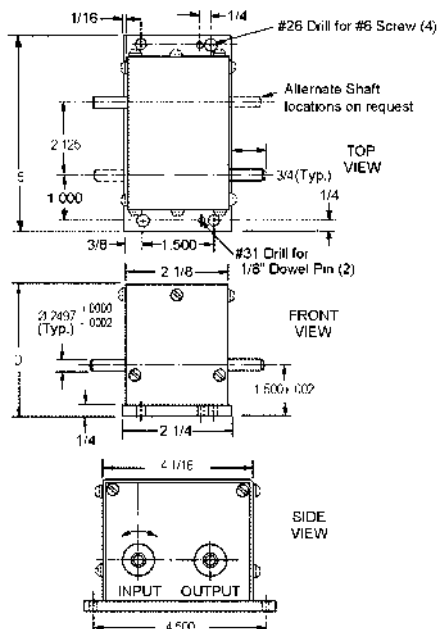
Special units available on request.

Anti-Backlash gear - Output End

Slip Clutch included - Input End

Contact Berg's Engineering Department for recommendations for use as a Speed Increaser.

• See instructions below to order alternate shaft locations.



Alternate Shaft Locations

Add **Style Letter** to complete stock number, if different from that shown.

Style:

O = Opposite of as shown

R = In and Out on R.H. side only

L = In and Out on L.H. side only

A = In and Out on all sides

Send drawing if other than listed above.

Backlash

At Output Shaft

Ball Bearing - 15 Minutes Max.

Bronze Bearing - 30 Minutes Max.

ABEC 7 BALL BEARINGS UNITS	BRONZE BEARINGS UNITS			
STOCK NO.	STOCK NO.	NOMINAL RATIO	D HEIGHT	DIRECTION ROTATION
SX-B4-1	SX-P4-1	2:1	3-9/32	SAME
SX-B4-2	SX-P4-2	3:1		
SX-B4-3	SX-P4-3	4:1		
SX-B4-4	SX-P4-4	5:1		
SX-B4-5	SX-P4-5	6:1		
SX-B4-6	SX-P4-6	7:1		
SX-B4-7	SX-P4-7	8:1		
SX-B4-8	SX-P4-8	9:1		
SX-B4-9	SX-P4-9	10:1		
SX-B4-10	SX-P4-10	12:1		
SX-B4-11	SX-P4-11	15:1		
SX-B4-12	SX-P4-12	16:1		
SX-B4-13	SX-P4-13	20:1		
SX-B4-14	SX-P4-14	25:1		
SX-B4-15	SX-P4-15	30:1	3-13/16	OPPOSITE
SX-B4-16	SX-P4-16	32:1		
SX-B4-17	SX-P4-17	36:1		
SX-B4-18	SX-P4-18	40:1		
SX-B4-19	SX-P4-19	45:1		
SX-B4-20	SX-P4-20	48:1		
SX-B4-21	SX-P4-21	50:1		
SX-B4-22	SX-P4-22	60:1		
SX-B4-23	SX-P4-23	64:1		
SX-B4-24	SX-P4-24	75:1		
SX-B4-25	SX-P4-25	80:1		
SX-B4-26	SX-P4-26	100:1		
SX-B4-27	SX-P4-27	125:1		
SX-B4-28	SX-P4-28	72:1	4-13/16	SAME
SX-B4-29	SX-P4-29	90:1		
SX-B4-30	SX-P4-30	96:1		
SX-B4-31	SX-P4-31	128:1		
SX-B4-32	SX-P4-32	150:1		
SX-B4-33	SX-P4-33	180:1		
SX-B4-34	SX-P4-34	200:1		
SX-B4-35	SX-P4-35	250:1		
SX-B4-36	SX-P4-36	256:1		
SX-B4-37	SX-P4-37	300:1		
SX-B4-38	SX-P4-38	375:1		
SX-B4-39	SX-P4-39	400:1		
SX-B4-40	SX-P4-40	500:1		
SX-B4-41	SX-P4-41	625:1		

Materials

Housing and Cover

Aluminum Anodized

Gears

Stainless Steel and Aluminum

Shafts and Hardware

Stainless Steel

Bearings

Stainless Steel or Bronze

Lubrication

MIL. Spec. Oil and Grease

Maximum Speed

5000 RPM

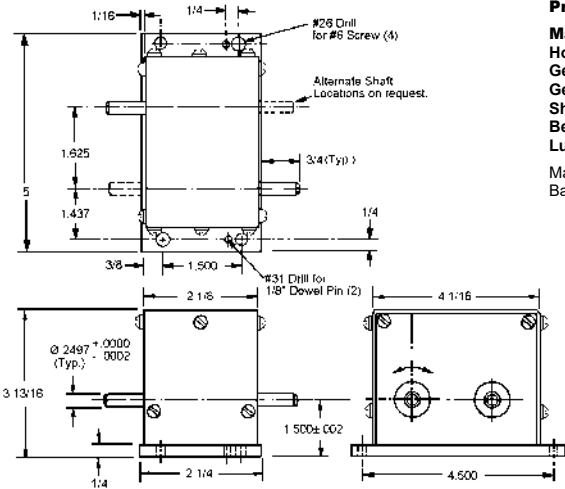
Maximum Output Torque

600 Oz. In.

INTERMITTENT MOTION ASSEMBLIES

SHAFT SIZE 1/4"

SHAFT	PITCH GEARS	TYPE
1/4"	48	BALL BEARING



Precision Geneva Mechanism

Materials:

Housing and Cover - Anodized Aluminum

Geneva - Stainless Steel

Gears - Stainless Steel and Aluminum

Shafts and Hardware - Stainless Steel

Bearings - Stainless Steel - ABEC 7

Lubrication - MIL Spec. Oil and Grease

Max. Input Speed - 300 RPM

Backlash at Output Shaft - 30 Minutes Max.

PRECISION BALL BEARING UNIT	ROTATION OF OUTPUT SHAFT PER EACH 360° REV. OF INPUT
STOCK NUMBER	
GX-1	90 DEGREES
GX-2	60 DEGREES
GX-3	45 DEGREES
GX-4	30 DEGREES
GX-5	22.5 DEGREES
GX-6	10 DEGREES

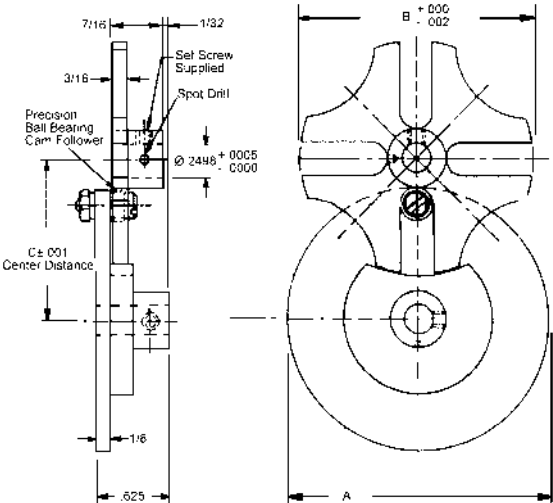
PRECISION BALL BEARING UNIT	ROTATION OF OUTPUT SHAFT PER EACH 360° REV. OF INPUT
STOCK NUMBER	
GX-7	90 DEGREES
GX-8	60 DEGREES
GX-9	45 DEGREES
GX-10	30 DEGREES
GX-11	22.5 DEGREES
GX-12	10 DEGREES



GENEVA MECHANISMS

SHAFT SIZE 1/4"

SHAFT	POINTS	MATERIAL
1/4"	4, 5, 6 AND 8	STAINLESS STEEL



4 POINT DRIVE ILLUSTRATED

STOCK NO.	NO. ROLLERS ON DRIVER	RELATIVE ROTATION DRIVER TO DRIVEN		POINTS ON DRIVEN	MAX. TORQUE (IN OZ.)	MAX OPER ORQUE (IN OZ.)	A	B	C
GM-1	ONE	360°	90°	4	71	35	2-1/4	1.971	1.3824
GM-1A	TWO	180°							
GM-2	ONE	360°	72°	5	110	55	2-1/4	2.470	1.5187
GM-2A	TWO	180°							
GM-3	ONE	360°	60°	6	175	87	2-1/2	3.468	1.9970
GM-3A	TWO	180°							
GM-4	ONE	360°	45°	8	240	120	2	4.083	2.2056
GM-4A	TWO	180°							

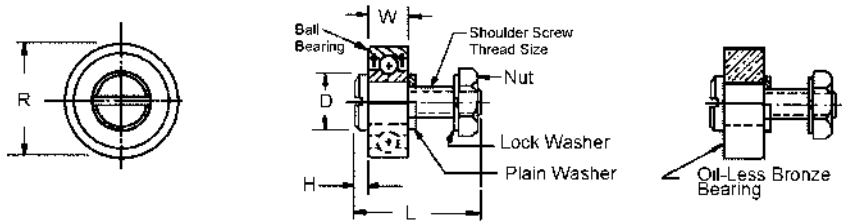
STOCK NO.	DESCRIPTION
JE-1-PH	REPLACEMENT CAM FOLLOWER

5/16" Bore available, call for price, to order, add an "L" to end of Stock Number.



CAM FOLLOWERS

TYPE	MATERIAL	ABEC
BALL BEARING OR BRONZE BEARING	303 STAINLESS STEEL	5



STOCK NO.	R	W	L	D	H	SCREW THREAD	BEARING
JE-1	.2500	.109	.484	3/16	1/8	#4-40	BALL BEARING
JE-2	.3125	.140	.578	7/32	1/8	#4-40	
JE-3	.3750	.156	.593	1/4	1/8	#4-40	
JE-4	.5000	.196	.727	5/16	5/32	#8-32	
JE-5	.6250	.196	.852	3/8	5/32	#10-32	
JE-6	.2500	.140	.484	5/32	3/32	#1-64	
JE-7	.3125	.140	.484	3/16	3/32	#2-56	
JE-1-PH*	.2500	.109	.484	3/16	1/8	#4-40	
JE-B-1	.2500	.093	.483	3/16	1/8	#4-40	BRONZE BEARING
JE-B-3	.3750	.140	.593	1/4	1/8	#4-40	
JE-B-4	.5000	.180	.727	5/16	5/32	#8-32	
JE-B-5	.6250	.180	.852	3/8	5/32	#10-32	

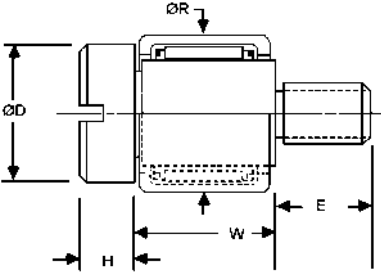


* Hardened shoulder screw, material is 416 Stainless Steel.

ROLLER BEARING CAM FOLLOWERS

TYPE

HEAVY DUTY



STOCK NO.	ØR	W	ØD	H	E	SCREW THREAD
JE-R-1	.2500	.250	7/32	1/8	5/32	#4-40
JE-R-2	.3438	.250	5/16	5/32	3/16	#8-32
JE-R-3	.3438	.375	5/16	5/32	3/16	#8-32
JE-R-4	.4375	.250	3/8	3/16	1/4	#10-32
JE-R-5	.5000	.312	7/16	7/32	7/16	#1/4-20
JE-R-6	.5625	.312	1/2	1/4	1/2	#5/16-18
JE-R-7	.5625	.625	1/2	1/4	1/2	#5/16-18
JE-R-8	.6875	.750	5/8	5/16	5/8	#3/8-16

Materials:

Screw - 416 Stainless Steel

Roller Cup - Case Hardened Steel

Needle Bearings - 52100 Hardened Steel

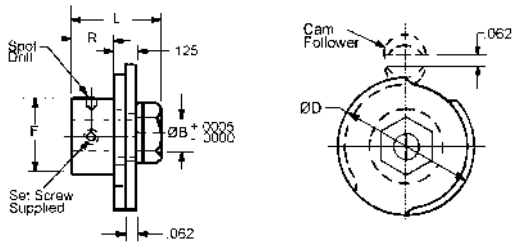
Bearing Cage - Low Carbon Steel

See the Bearings Section of this book for Bearings Specifications.

- High Load
- Low Profile
- Low Friction

ADJUSTABLE CAM ASSEMBLIES

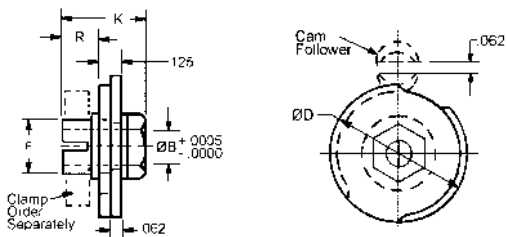
BORE SIZES	TYPE	MATERIAL
1/8" TO 1/2"	PIN HUB	303 STAINLESS STEEL



Cam plates are adjustable from 0° to 180°. Order Cam Follower Separately.

STOCK NO.	B	D	F	L	R
JD-1-P	.1248	11/16	5/16	.61	1/4
JD-2-P	.1873		3/8		
JD-3-P	.2498		1/2		
JD-4-P	.1248	1-1/4	5/16	.61	1/4
JD-5-P	.1873		3/8		
JD-6-P	.2498		1/2		
JD-7-P	.3123	2	1-1/4	1.50	1/2
JD-8-P	.3748		1-1/4		
JD-9-P	.4998		1-1/4		

BORE SIZES	TYPE	MATERIAL
1/8" TO 1/2"	CLAMP STYLE	303 STAINLESS STEEL

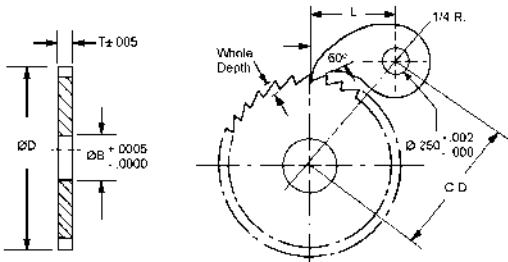


Cam plates are adjustable from 0° to 180°. Order Cam Follower Separately.

STOCK NO.	B	D	F	K	R
CA-1C	.1248	11/16	.188	.61	1/4
CA-2C	.1873		.250		
CA-3C	.2498		.312		
CA-4C	.1248	1-1/4	.188	.61	1/4
CA-5C	.1873		.250		
CA-6C	.2498		.312		
CA-7C	.3123	2	.375	1.25	1/2
CA-8C	.3748		.437		
CA-9C	.4998		.562		

RATCHETS & PAWLS

PITCH	STYLE	MATERIAL
16 to 48	RIGHT HAND OPERATION	STAINLESS STEEL



17-4 PH STAINLESS STEEL HARDENED RC 32-38			416 STAINLESS STEEL
STOCK PAWLS			MOUNTING SHOULDER SCREW (Order Separately)
STOCK NO.	T THICKNESS	L LENGTH	
RP-2 RP-375	.245 .370	3/4 1-5/16	

- For Shoulder Screw Dimensions - See Index
- Ratchets Material - 303 Stainless Steel
- Last number in Stock No. indicate the total number of teeth. Special ratchets and pawls made to order, contact us.

RATCHET STOCK NO.	DIAMETRAL PITCH	OUTSIDE DIA.	BORE	T	C.D. +.06 -.00	WHOLE DEPTH
R16S20-20 R16S20-24 R16S20-32 R16S20-48 R16S20-56 R16S20-64	16 (.1963 CIRC. PITCH)	1.250 1.500 2.000 3.000 3.500 4.000	.6871	.375	1.53 1.60 1.75 2.10 2.30 2.50	.120
R24S6-24 R24S6-30 R24S6-36 R24S6-48 R24S6-72	24 (.1309 CIRC. PITCH)	1.000 1.250 1.500 2.000 3.000	.3748	.250	1.11 1.18 1.26 1.45 1.86	.070
R32S3-24 R32S3-32 R32S3-40 R32S3-48 R32S3-64 R32S3-96	32 (.0932 CIRC. PITCH)	.750 1.000 1.250 1.500 2.000 3.000	.3748	.125	1.04 1.11 1.18 1.26 1.45 1.86	.060
R48S3-36 R48S3-48 R48S3-60 R48S3-72 R48S3-96 R48S3-144	48 (.0654 CIRC. PITCH)	.750 1.000 1.250 1.500 2.000 3.000	.3748	.125	1.05 1.12 1.20 1.28 1.47 1.88	.035



This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

BREADBOARD COMPONENTS

Table of Contents

DIALS

DIAL CLAMPS D 2

DRUM DIALS D 3 - D 4

FLAT DIALS D 5

ENGRAVED FLAT DISKS D 6

FLAT DIAL INDEX D 7

DRUM DIAL INDEX D 7

ENGRAVED INDEX D 8

KNURLED HANDWHEELS D 9 - D 10

KNURLED HAND CRANKS D 11

HAND CRANKS D 12

KNOBS D 13

SYNCRO MOUNT CLAMPS D 14 - D 18

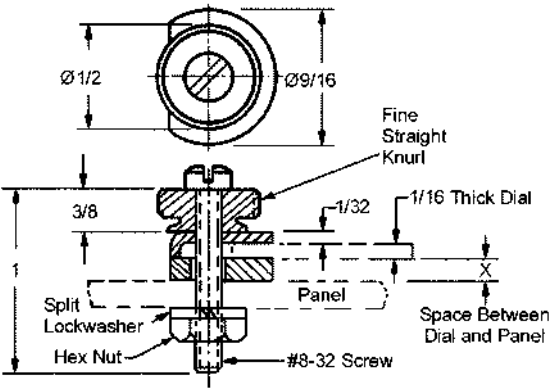
MINIATURE SYNCRO MOUNT CLAMPS D 19



DIAL CLAMPS

MATERIAL

STAINLESS STEEL

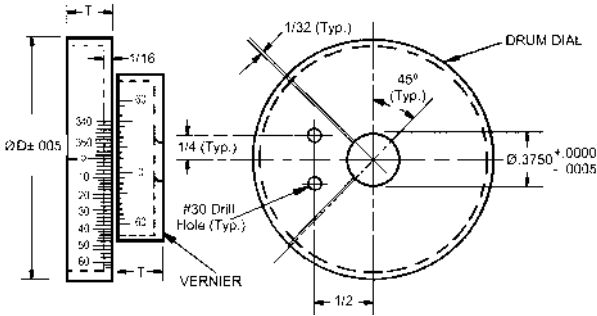


STOCK NO.	X
A16-1	1/16
A16-2	1/8

Supplied complete with all hardware.

DRUM DIALS

DIAMETER	TYPE	MATERIAL
1-1/2" TO 3"	SETS, DIALS OR VERNIERS	ALUMINUM BLACK ANODIZED



SET STOCK NO.	DIAL STOCK NO.	VERNIER STOCK NO.	D DIAL DIA.	T WIDTH	VERNIER READING	GRADUATIONS
A1-1*	A1-1-D	A1-1-V	1.490	3/8	12 MIN.	180 IN 2° STEPS
A1-2*	A1-2-D	A1-2-V	1.990	3/8	12 MIN.	180 IN 2° STEPS
A1-3	A1-3-D	A1-3-V	2.490	1/2	6 MIN.	360 IN 1° STEPS
A1-4	A1-4-D	A1-4-V	2.990	1/2	6 MIN.	360 IN 1° STEPS

* Dials and Verniers are numbered every 20°.

Engraving filled with white.

Range of Graduations - 0 to 360°

Available on request:

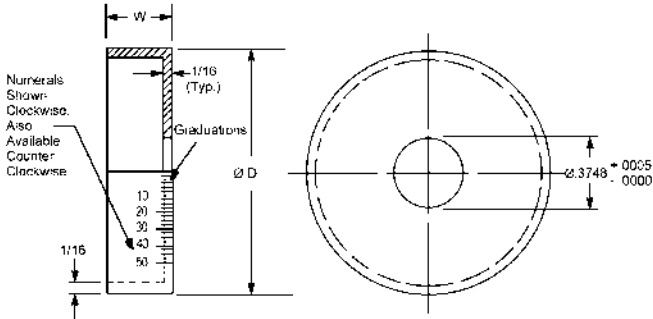
- Pin or Clamp Hubs assembled to drum
- Counter Clockwise numbering
- Special Engraving

For Pin and Clamp Hubs see index.



DRUM DIALS

DIAMETER	MATERIAL
1" TO 3"	ALUMINUM BLACK ANODIZED



STOCK NO.	W WIDTH	D DIAL DIA.	DIRECTION OF NUMBERING	GRADUATIONS RANGE	NO. OF GRAD.S	STEPS IN DEGREES
A3-1	3/8	1 (.990)	BLANK	-	-	-
A3-2*			CW	0 TO 360	180	2°
A3-3			CW	0 TO 100	100	3°-36'
A4-1	3/8	1-1/2 (1.490)	BLANK	-	-	-
A4-2*			CW	0 TO 360	180	2°
A4-3			CW	0 TO 100	100	3°-36'
A4-4			CW	0 TO 60	60	6°
A5-1	3/8	2 (1.990)	BLANK	-	-	-
A5-2*			CW	0 TO 360	180	2°
A5-3			CW	0 TO 50	50	7°-12'
A5-4			CW	0 TO 25	25	14°-24'
A6-1	1/2	2-1/2 (2.490)	BLANK	-	-	-
A6-2			CW	0 TO 360	360	1°
A6-3			CW	0 TO 100	100	3°-36'
A6-4			CCW	0 TO 360	360	1°
A7-1	1/2	3 (2.990)	BLANK	-	-	-
A7-2			CW	0 TO 360	360	1°
A7-3*			CW	0 TO 360	180	2°
A7-4			CW	0 TO 100	100	3°-36'
A7-5			CCW	0 TO 360	360	1°

* Dials are numbered every 20°.

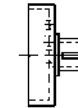
Engraving filled with white.

Range of Graduations - 0 to 360°

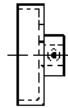
Available on request:

- Pin or Clamp Hubs assembled to drum
- Special Engraving

For Pin and Clamp Hubs see index.



CLAMP HUB

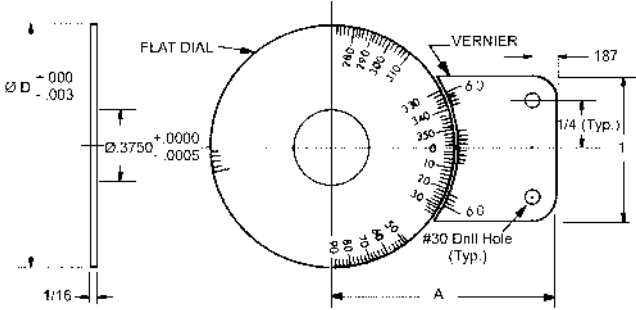


PIN HUB



FLAT DIALS

DIAMETER	TYPE	MATERIAL
1-1/2" TO 4"	SETS, DIALS OR VERNIERS	ALUMINUM BLACK ANODIZED



SET STOCK NO.	DIAL STOCK NO.	VERNIER STOCK NO.	A	D DIAL DIA.	VERNIER READING	GRADUATIONS
A2-1*	A2-1-D	A2-1-V	1.760	1-1/2	12 MIN.	180 IN 2° STEPS
A2-2*	A2-2-D	A2-2-V	2.010	2	12 MIN.	180 IN 2° STEPS
A2-3	A2-3-D	A2-3-V	2.510	3	6 MIN.	360 IN 1° STEPS
A2-4	A2-4-D	A2-4-V	3.010	4	6 MIN.	360 IN 1° STEPS

* Dials and Verniers are numbered every 20°.

Engraving filled with white.
Range of Graduations - 0 to 360°

Available on request:

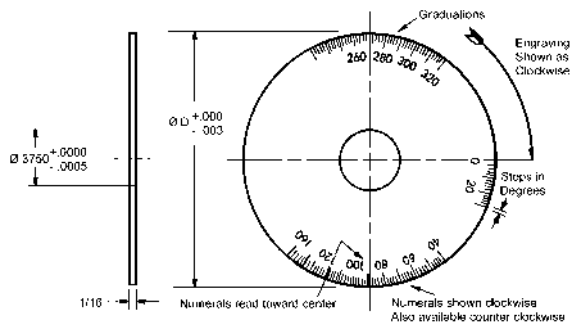
- Pin or Clamp Hubs assembled to drum
- Read at 12 o'clock
- Counter Clockwise numbering
- Special Engraving

For Pin and Clamp Hubs see index.

D

ENGRAVED FLAT DISKS

DIAMETER	MATERIAL
1-1/2" TO 4"	ALUMINUM BLACK ANODIZED



STOCK NO.	D DIAL DIA.	DIRECTION OF NUMBERING	GRADUATIONS RANGE	NO. OF GRAD.S	STEPS IN DEGREES
A8-1	1-1/2	BLANK	-	-	-
A8-2*		CW	0 TO 360	180	2°
A8-3		CW	0 TO 100	100	3°-36'
A8-4		CW	0 TO 50	50	7°-12'
A8-5		CW	0 TO 10	10	36°
A9-1	2	BLANK	-	-	-
A9-2*		CW	0 TO 360	180	2°
A9-3*		CCW	0 TO 360	180	2°
A9-4		CW	0 TO 100	100	3°-36'
A9-5		CCW	0 TO 100	100	3°-36'
A9-6		CW	0 TO 72	72	5°
A9-7		CW	0 TO 60	60	6°
A9-8		CW	0 TO 50	50	7°-12'
A10-1	3	BLANK	-	-	-
A10-2		CW	0 TO 360	360	1°
A10-3*		CW	0 TO 360	180	2°
A10-4		CW	0 TO 200	200	1°-48'
A10-5		CW	0 TO 120	120	3°
A10-6		CW	0 TO 100	100	3°-36'
A10-7		CW	0 TO 72	72	5°
A10-8		CCW	0 TO 360	360	1°
A10-9		CCW	0 TO 100	100	3°-36'
A11-1	4	BLANK	-	-	-
A11-2		CW	0 TO 360	360	1°
A11-3*		CW	0 TO 360	180	2°
A11-4		CW	0 TO 200	200	1°-48'
A11-5		CW	0 TO 100	100	3°-36'
A11-6		CW	0 TO 1000	500	43°-12'
A11-7		CCW	0 TO 360	360	1°
A11-8*		CCW	0 TO 360	180	2°

* Dials are numbered every 20°.

Engraving filled with white.
Range of Graduations - 0 to 360°

Available on request:

- Pin or Clamp Hubs assembled to drum
- Special Engraving

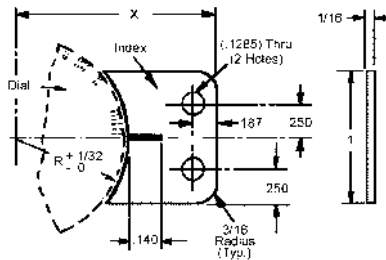
For Pin and Clamp Hubs see index.



FLAT DIAL INDEX

MATERIAL

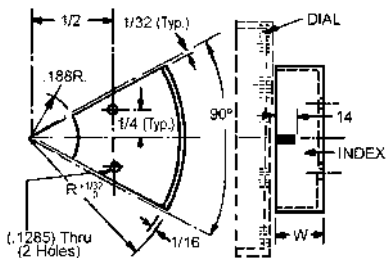
ALUMINUM BLACK ANODIZED



DRUM DIAL INDEX

MATERIAL

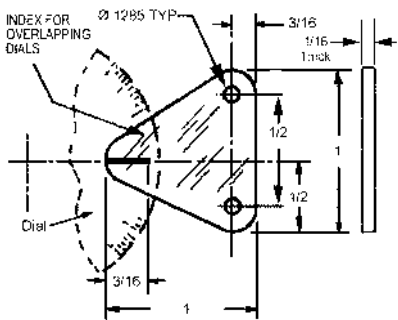
ALUMINUM BLACK ANODIZED



STOCK NO.	X	R
A14-1	.745	.375
A14-2	.995	.375
A14-3	1.245	.500
A14-4	1.495	.500

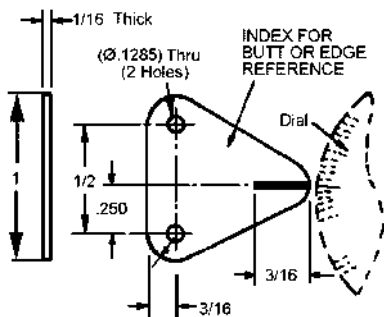
ENGRAVED INDEX

MATERIAL
PLEXIGLASS



STOCK NO.	MATERIAL & FINISH
A12-1	PLEXIGLASS (CLEAR) MIL-P-5425

MATERIAL
ALUMINUM BLACK ANODIZED

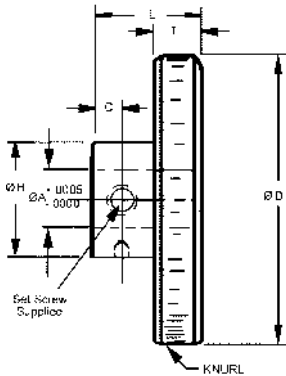


STOCK NO.	MATERIAL & FINISH
A12-2	24 ST. ALUMINUM, BLACK ANODIZED

KNURLED HANDWHEELS

MATERIAL

303 STAINLESS STEEL



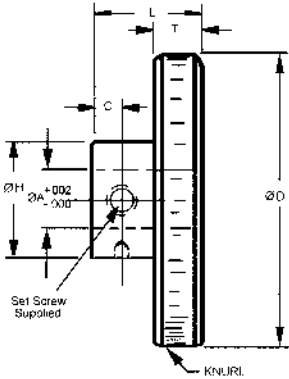
STOCK NO.	$\varnothing A$	$\varnothing D$	$\varnothing H$	T	L	C
CN1-1 CN1-2 CN1-3	.1248 (1/8)	1 1-1/2 2	5/16	3/16	.375	.09
CN1-4 CN1-5 CN1-6	.1873 (3/16)	1 1-1/2 2	3/8	3/16	.406	.11
CN1-7 CN1-8 CN1-9	.2498 (1/4)	1 1-1/2 2	1/2	3/16	.437	.12
CN1-10 CN1-11 CN1-12	.3123 (5/16)	1 1-1/2 2	1/2	3/16	.437	.12
CN1-13 CN1-14 CN1-15	.3748 (3/8)	2 2-1/2 3	3/4	3/8	.875	.25
CN1-16 CN1-17 CN1-18	.4998 (1/2)	2-1/2 3 4	1	3/8	.875	.25



KNURLED HANDWHEELS

MATERIAL

ALUMINUM BLACK ANODIZED

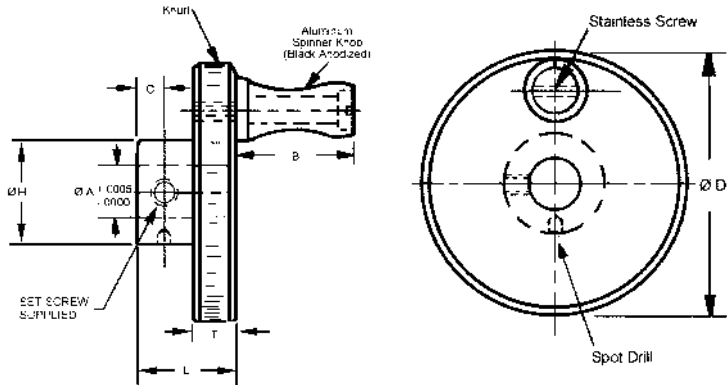


STOCK NO.	$\varnothing A$	$\varnothing D$	$\varnothing H$	T	L	C
CN11-1	.125	1-1/8	5/8	3/16	7/16	1/8
CN11-2	(1/8)	1-5/8				
CN11-3	.187	1-1/8	5/8	3/16	7/16	1/8
CN11-4	(3/16)	2-1/8				
CN11-5	.250	1-5/8	5/8	3/16	7/16	1/8
CN11-6	(1/4)	2-1/8				
CN11-7	.375	1-5/8	1	1/2	3/4	1/8
CN11-8	(3/8)	2-5/8				
CN11-9	.500	2-5/8	1	1/2	3/4	1/8
CN11-10	(1/2)	3-1/2				

KNURLED HAND CRANKS

MATERIAL

303 STAINLESS STEEL

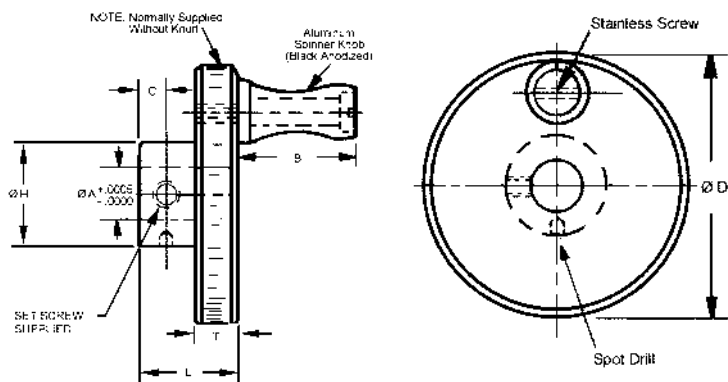


STOCK NO.	$\varnothing A$	$\varnothing D$	$\varnothing H$	T	L	C	B
CN2-1	.1248	1	5/16	3/16	.375	.09	3/4
CN2-2	(1/8)	1-1/2					
CN2-3		2					
CN2-4	.1873	1	3/8	3/16	.406	.11	3/4
CN2-5	(3/16)	1-1/2					
CN2-6		2					
CN2-7	.2498	1	1/2	3/16	.437	.12	3/4
CN2-8	(1/4)	1-1/2					
CN2-9		2					
CN2-10	.3123	1	1/2	3/16	.437	.12	3/4
CN2-11	(5/16)	1-1/2					
CN2-12		2					
CN2-13	.3748	2	3/4	3/8	.875	.25	31/32
CN2-14	(3/8)	2-1/2					
CN2-15		3					
CN2-16	.4998	2-1/2	1	3/8	.875	.25	31/32
CN2-17	(1/2)	3					
CN2-18		4					

HAND CRANKS

MATERIAL

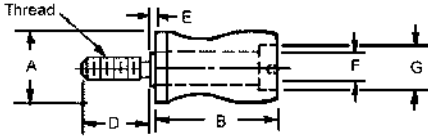
ALUMINUM BLACK ANODIZED



STOCK NO.	ØA	ØD	ØH	T	L	B	C
CN12-1	.125	1-1/8	5/8	3/16	7/16	3/4	1/8
CN12-2	(1/8)	1-5/8	5/8	3/16	7/16	3/4	1/8
CN12-3	.187	1-1/8	5/8	3/16	7/16	3/4	1/8
CN12-4	(3/16)	2-1/8	5/8	3/16	7/16	3/4	1/8
CN12-5	.250	1-5/8	5/8	3/16	7/16	3/4	1/8
CN12-6	(1/4)	2-1/8	5/8	3/16	7/16	3/4	1/8
CN12-7	.375	1-5/8	1	1/2	3/4	3/4	1/8
CN12-8	(3/8)	2-5/8	1	1/2	3/4	31/32	1/8
CN12-9	.500	2-5/8	1	1/2	3/4	31/32	1/8
CN12-10	(1/2)	3-1/2	1	1/2	3/4	31/32	1/8

KNOBS

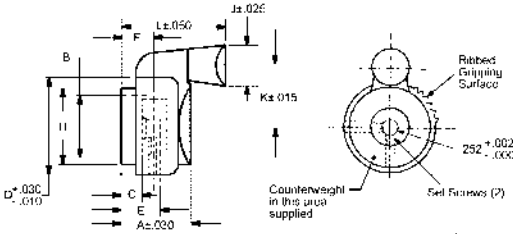
TYPE	MATERIAL
SPINNER KNOB AND SCREW	ALUMINUM BLACK ANODIZED WITH 303 STAINLESS STEEL SCREW



STOCK NO.	A	B	THREAD	D	E	F	G
CN8-1	1/2	3/4	#8-32	3/16	1/64	3/16	5/16
CN8-2	11/16	31/32	1/4-20	7/16	1/64	5/16	1/2
CN8-3	15/16	1-1/4	3/8-16	5/8	11/32	1/2	3/4



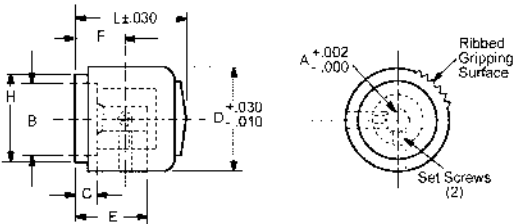
TYPE	MATERIAL
SPINNER KNOB WITH RIBBED GRIPPING SURFACE	THERMOPLASTIC BLACK MATTE FINISH WITH ALUMINUM INSERTS



Meets MIL-K-3926 B and MS91528J

STOCK NO.	MS PART NO. 91528J	D	NUT CLEARANCE B MIN.	C MIN.	F MAX.	SHAFT HOLE DEPTH E MIN.	A	H MAX.	L	J	K	SET SCREW
CN5-22	-3S2B	1.250	.685	.250	.427	.605	.850	1.185	1.350	.580	.800	#8-32
CN5-23	-4S2B	1.750	.685	.320	.489	.740	1.070	1.690	1.758	.780	1.094	#8-32

TYPE	MATERIAL
ROUND KNOB	ALUMINUM BLACK ANODIZED WITH 303 STAINLESS STEEL SCREW



Meets MIL-K-3926 B and MS91528J

STOCK NO.	MS PART NO. 91528J	A	D	NUT CLEARANCE B MIN.	C MIN.	F MAX.	E MIN.	L	H MAX.	SET SCREW
CN5-14	-0D1B	.127	.500	.300	.177	.325	.560	.655	.460	#4-40
CN5-15	-1D2B	.252	.700	.485	.188	.369	.568	.782	.680	#4-40
CN5-16	-2D2B	.252	.900	.640	.320	.484	.730	1.010	.845	#8-32
CN5-17	-3D2B	.252	1.250	.750	.250	.427	.605	.850	1.185	#8-32

SYNCRO MOUNT CLAMPS

SHAFTS	MATERIAL
1/8" TO 1/4"	416 STAINLESS STEEL HEAT TREATED - ROCKWELL C28-32 (CAST)

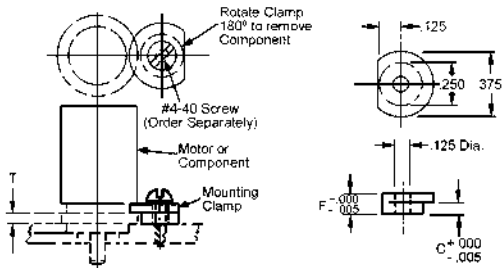
STOCK NO.	T	C	F
SM-11	.062	.052	.100
SM-12	.093	.081	.131
SM-13	.125	.109	.160
SM-14	.250	.238	.288
SM-15	.072	.063	.113
SM-16	.125	.112	.162
SM-17	.156	.143	.193
SM-18	.225	.213	.263

SHAFTS	MATERIAL
1/8" TO 1/4"	303 STAINLESS STEEL

STOCK NO.	T	C	F
SM-1	.062	.052	.100
SM-2	.093	.081	.131
SM-3	.125	.109	.160
SM-4	.250	.238	.288
SM-5	.072	.063	.113
SM-6	.125	.112	.162
SM-7	.156	.143	.193
SM-8	.225	.213	.263

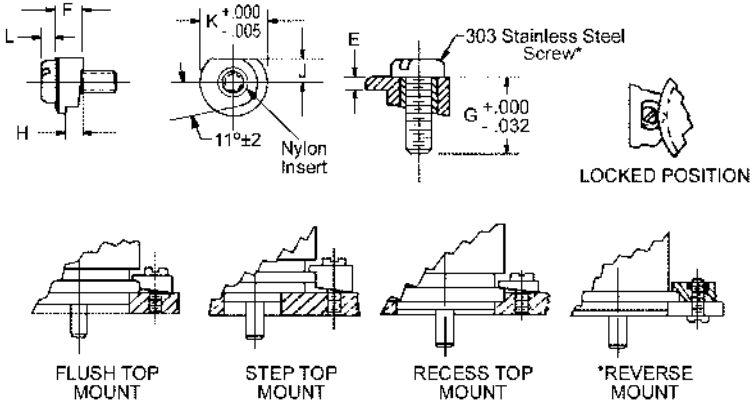
SHAFTS	MATERIAL
1/8" TO 1/4"	2024-T4 ALUMINUM

STOCK NO.	T	C	F
SM-1-A	.062	.052	.100
SM-2-A	.093	.081	.131
SM-3-A	.125	.109	.160
SM-4-A	.250	.238	.288



SYNCRO MOUNT CLAMPS

MOUNT STYLES	MATERIAL
TOP AND REVERSE	316 STAINLESS STEEL (SINTERED) WITH NYLON INSERTS



STOCK NO.	MOUNT STYLE	+.003 H	REF J	+.003 E	REF F	G	SCREW SIZE	+.000 -.005 K	L MAX	BOLT CIRCLE FOR CLEATS
										USE THE LARGER OF THE FOLLOWING TWO BOLT CIRCLES
SQ-1 SQ-2 SQ-3 SQ-4 SQ-5	TOP	.031 .047 .062 .093 .125	.091	.040 .040 .040 .040 .040	.071 .087 .102 .133 .165	1/4 1/4 1/4 5/16 5/16	#2-56	.265	.053	ADD .192" TO MAX FLANGE DIA., OR ADD .275" TO MAX GROOVE BASE DIA.
SQ-6 SQ-7 SQ-8 SQ-9 SQ-10 SQ-11 SQ-12 SQ-13 SQ-14 SQ-15 SQ-16	TOP	.031 .062 .062 .062 .078 .093 .093 .093 .125 .156 .225	.125	.040 .040 .050 .063 .063 .040 .050 .063 .050 .040 .063	.071 .087 .112 .125 .141 .133 .143 .156 .175 .196 .288	5/16 5/16 3/8 3/8 3/8 3/8 3/8 3/8 3/8 3/8 7/16	#4-40	.390	.068	ADD .270" TO MAX FLANGE DIA., OR ADD .400" TO MAX GROOVE BASE DIA.
SQ-18	TOP	.250 +.005	.187	.187 +.005	.437	7/8	#10-32	.625 +.000	.110	ADD .406" TO MAX FLANGE DIA., OR ADD .630" TO MAX GROOVE BASE DIA.
SQ-19 SQ-20 SQ-26	REVERSE	.062 .093 .125	.125	.063 .063 .063	.125 .156 .187	- - -	*#4-40	.390	- - -	ADD .270" TO MAX FLANGE DIA., OR ADD .400" TO GROOVE BASE DIA.

- Quick Releasing
- Faster Nulling of Clamped Component
- Self Locking

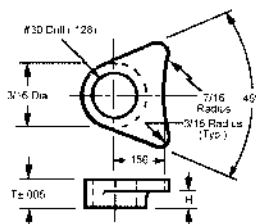
Meets ASTM B525 Clamp and ASTM B4066 Insert

* 303 Stainless Steel slotted pan head screw supplied (except reverse mount).

Phillips pan head screw (MIL Standard) available on request

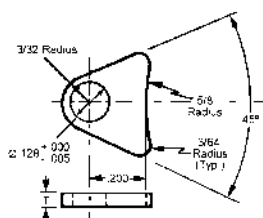
SYNCHRO MOUNT CLAMPS

SHAFTS	MATERIAL
1/8" TO 1/4"	303 STAINLESS STEEL AND ALUMINUM



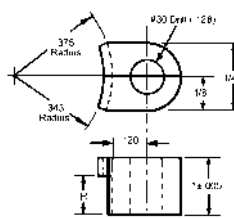
303 STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	H	T
SM-20	SM-20-A	.047	.093
SM-21	SM-21-A	.110	.156
SM-22	SM-22-A	.210	.272

SHAFTS	MATERIAL
1/8" TO 1/4"	302 STAINLESS STEEL AND ALUMINUM



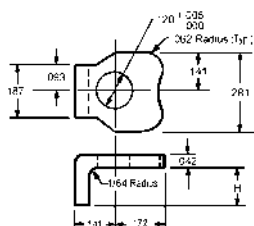
302 STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	T
SM-23	SM-23-A	.040

SHAFTS	MATERIAL
1/8" TO 1/4"	303 STAINLESS STEEL AND ALUMINUM



303 STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	H	T
SM-24	SM-24-A	.020	.065
SM-25	SM-25-A	.050	.095
SM-26	SM-26-A	.115	.160
SM-27	SM-27-A	.175	.220

SHAFTS	MATERIAL
1/8" TO 1/4"	302 STAINLESS STEEL

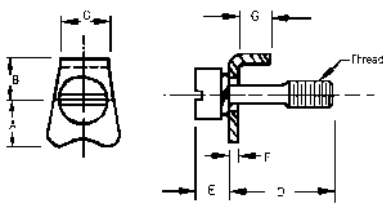


302 STAINLESS STEEL STOCK NO.	H.
SM-28	FLAT
SM-29	.047
SM-30	.078
SM-31	.110
SM-32	.142



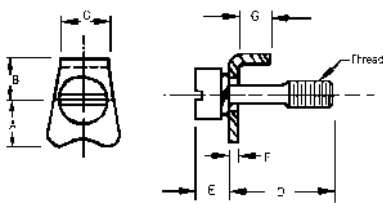
SYNCRO MOUNT CLAMPS

THREAD	MATERIAL
#2-56, #4-40 AND #6-32	303 STAINLESS STEEL SCREW 302 STAINLESS STEEL CLAMP & LOCKWASHER



STOCK NO.	THREAD	A	B	C	D	E	F	G
SQ-27	#2-56	.150	.080	.125	.192	.093	.028	.070
SQ-28	#4-40	.172	.110	.187	.289	.113	.032	.093
SQ-29	#6-32	.250	.156	.250	.475	.138	.062	.255

THREAD	MATERIAL
#2-64, #4-48 AND #6-40	303 STAINLESS STEEL SCREW 302 STAINLESS STEEL CLAMP & LOCKWASHER

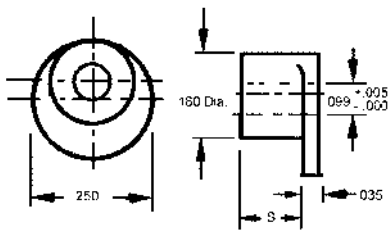


STOCK NO.	THREAD	A	B	C	D	E	F	G
SQ-30	#2-64	.150	.080	.125	.192	.093	.028	.070
SQ-31	#4-48	.172	.110	.187	.289	.113	.032	.093
SQ-32	#6-40	.250	.156	.250	.475	.138	.062	.255

SYNCHRO MOUNT CLAMPS

MATERIAL

303 STAINLESS STEEL

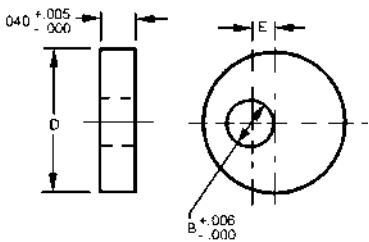


STOCK NO.	S
SM-47	.057
SM-48	.088
SM-48	.104
SM-50	.117



MATERIAL

303 STAINLESS STEEL AND ALUMINUM

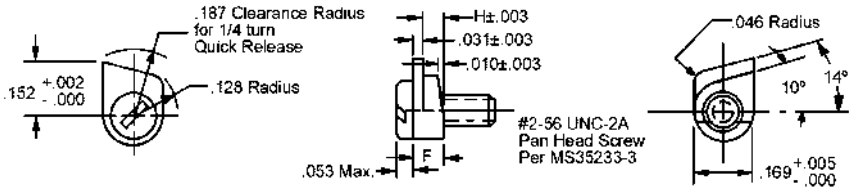


303 STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	E	D	B
SM-43	SM-43-A	.011	.187	.103
SM-44	SM-44-A	.031	.250	.127
SM-45	SM-45-A	.062	.310	.127
SM-46	SM-46-A	.062	.370	.127

MINIATURE SYNCRO MOUNT CLAMPS

MATERIAL

316 STAINLESS STEEL (SINTERED) WITH NYLON INSERT



STOCK NO.	COMP. SIZE	MOUNT STYLE	H	F
SQ-21	5, 8, 10	TOP	.031	.062
SQ-22	5	TOP	.047	.078
SQ-23	8, 10	TOP	.062	.093

- Quick Releasing
- Self Locking

D

This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

LINEAR COMPONENTS

Table of Contents

HIGH PRECISION & PRECISION LEAD SCREWS

LEAD SCREWS & COMPONENTS TECHNICAL DATA E 2
ANTI-BACKLASH LEAD SCREW ASSEMBLIES E 3
LEAD SCREWS E 4
LEAD SCREW ASSEMBLIES E 5 - E 6

LINEAR SLIDES

LINEAR SLIDES TECHNICAL DATA E 7
ULTRA-PRECISION LINEAR BALL SLIDES E 8
LINEAR BALL SLIDES E 9
LINEAR CROSSED ROLLER SLIDES E 10
RACK DRIVEN BALL SLIDES E 11
LINEAR TABLES E 12

LINEAR BEARINGS

FLANGED TYPE LINEAR BEARINGS E 13
LINEAR BALL BEARINGS E 14 - E 15, E 18 - E 19
LINEAR BALL BEARINGS WITH SHAFT WIPERS E 16
LINEAR BALL BEARINGS SELF-ALIGNING-BARREL STYLE E 17
LINEAR "NO LUBE" BEARINGS E 20 - E 21
LINEAR BEARING WIPERS - RETAINER E 22



HIGH PRECISION & PRECISION LEAD SCREWS

LEAD SCREWS & COMPONENTS TECHNICAL DATA

Berg is a pioneer in the development of lead screws. Providing cost effective solutions to linear actuation problems. The close tolerance, free running nuts are ideal for miniature applications requiring rotary to linear or linear to rotary actuation.

For applications requiring precision positioning, Berg also manufactures Anti-Backlash Nuts. This device, consisting of only three components, utilizes the constant force of a compression spring to push two nut halves apart. This action eliminates any play (backlash) which exists between the internal thread of the nut and the external screw thread. To ensure accuracy and repeatability the nut can be fine tuned through the use of the many available spring constants, to meet any pre-load design requirements.

Lead Screw Specification

Lead Error	+/- .006 in./ft.
Repeatability	.00005 in.
Straightness	.003 in./ft.
Backlash	.003 in. (zero when using Anti-Backlash nut)
Temperature Range	-50°F to +200°F
Breakaway Torque	0-3 oz-in. (standard nut)

High Precision

Lead Error	+/- .006 in./ft.
Repeatability	.00005 in.
Straightness	.003 in./ft.
Backlash	.003 in. (zero when using Anti-Backlash nut)
Temperature Range	-50°F to +200°F
Breakaway Torque	0-3 oz-in. (standard nut)



Figure 9.1

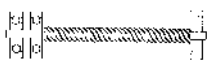


Figure 9.2



Figure 9.3



Figure 9.4

Load - In order to properly incorporate a lead screw into a design, load requirements must be taken into account. Maximum load values for the nuts are listed in the tables on the following pages. These numbers are based on the shear of the nuts and does not take shaft buckling into account (see Max. Column Load formula below). Wherever possible, nuts should be positioned so as to be put in tension, pulling the load. This eliminates the need for buckling considerations. Listed below are some helpful formulas to assist in proper lead screw selection.

$$\text{Maximum Column Load (F)} = K \times C \times 10^6 \times d^4 / D^2$$

Where:

K = End support factor

.025 one end fixed, other free (Figure 9.1)

1.00 simple supports both ends (Figure 9.2)

2.00 one end fixed, one simple (Figure 9.3)

4.00 both ends fixed (Figure 9.4)

C = Material factor

13.4 for Stainless Steel screws

4.8 for Aluminum screws

d = Root diameter of the screw

D = Length between the nut and the support bearing

$$\text{Torque to Move a Load (T)} = (F \times L) / (2 \times \xi \times E)$$

Where:

F = Load

L = Lead

ξ = Coefficient of friction of the thread interface

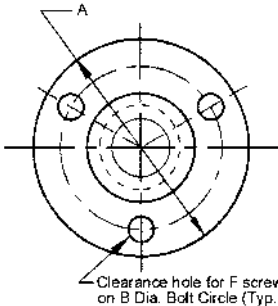
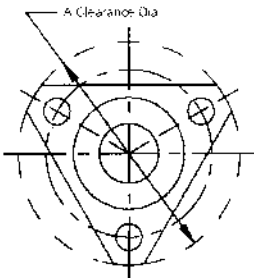
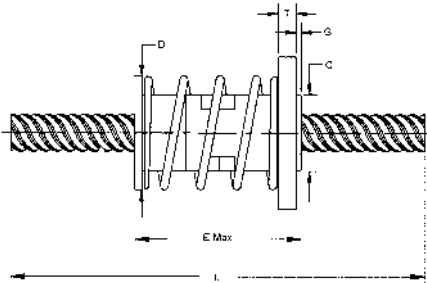
E = Efficiency (consult Berg Engineering Department for efficiency values)

$$\text{Horsepower (HP)} = \text{Torque (in. lbs.)} \times \text{RPM} / 63,025$$



ANTI-BACKLASH LEAD SCREW ASSEMBLIES

SERIES	MATERIAL
HIGH PRECISION	NUT - DELRIN, SPRING - STEEL PLATED ZINC, SCREW - STAINLESS STEEL



Special end configurations
available on request.

Lead Screw Specifications

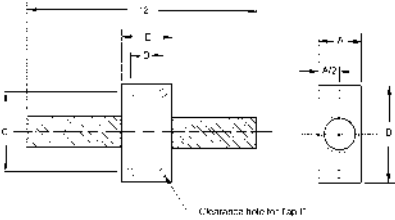
HIGH PRECISION LEAD SCREW SERIES	PITCH DIA.	LEAD	A	B ±.010	C ±.010	D	E	F	L	T	G
HTSP4ABS1-12 HTSP4ABS2-12 HTSP4ABS4-12	1/4	.0500 .0625 .2500	1.00	.750	.437	.582	1.13	#6-32	12	.19	.06
HTSP5ABS1-12 HTSP5ABS2-12	5/16	.0833 .2500	1.500	1.125	.625	.770	1.50	#10-24	24	.19	.06
HTSP6ABS1-24 HTSP6ABS2-24 HTSP6ABS8-24	3/8	.1000 .2500 1.0000									
HTSP7ABS1-24 HTSP8ABS4-24 HTSP8ABS8-24	7/16	.2500 .5000 1.0000									
HTSP10ABS4-36* HTSP12ABS4-36	5/8 3/4	.5000 .5000									
			1.750 2.180	1.375 1.800	.875 1.18	1.03 1.58	2.09 2.50	#10-24 #10	36 36	.25 .25	.08 .08

* Lead Screws can also be supplied in footage up to 5 ft.
Spare Nuts are also available on request
W. M. Berg rolling capabilities up to 2.00" dia. 16 d.p.

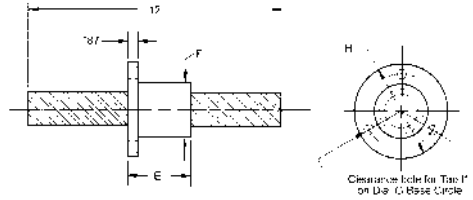
LEAD SCREWS

MATERIAL

**NUT - DELRIN
SHAFT - ALUMINUM**



LEAD SCREW WITH SQUARE NUT



LEAD SCREW WITH ROUND NUT

Lead Screw Specifications - With Rectangular Nut

LEAD SCREW PITCH DIA.	STOCK NUMBER	LEAD	STOCK NUMBER	LEAD	STOCK NUMBER	LEAD
	PRECISION		PRECISION		PRECISION	
3/16	HTP3KA2-12	.3750	HTP3KA3-12	.5625	HTP3KA4-12	.7500
1/4	HTP4KA2-12	.5000	HTP4KA3-12	.7500	HTP4KA4-12	1.0000
3/8	HTP6KA2-12	.7500	HTP6KA3-12	1.1250	HTP6KA4-12	1.5000
1/2	HTP8KA2-12	1.0000	HTP8KA3-12	1.5000	HTP8KA4-12	2.0000

Lead Screw Specifications - With Round Nut

LEAD SCREW PITCH DIA.	STOCK NUMBER	LEAD	STOCK NUMBER	LEAD	STOCK NUMBER	LEAD
	PRECISION		PRECISION		PRECISION	
3/16	HTP3LA2-12	.3750	HTP3LA3-12	.5625	HTP3LA4-12	.7500
1/4	HTP4LA2-12	.5000	HTP4LA3-12	.7500	HTP4LA4-12	1.0000
3/8	HTP6LA2-12	.7500	HTP6LA3-12	1.1250	HTP6LA4-12	1.5000
1/2	HTP8LA2-12	1.0000	HTP8LA3-12	1.5000	HTP8LA4-12	2.0000

Nut Specifications

LEAD SCREW PITCH DIA.	A	B	C	D	E	F	G	H	I*	LOAD
3/16	.500	1.250	1.000	#	.750	.437	.750	1.06	#6-32	16 Lbs.
1/4	.500	1.313	1.000	#	.750	.500	.812	1.12	#6-32	22 Lbs.
3/8	.625	1.750	1.313	#	.750	.625	1.000	1.37	#8-32	32 Lbs.
1/2	.750	1.813	1.437	.625	1.000	.750	1.125	1.50	#8-32	44 Lbs.

Note: Special lengths, ends, diameters, or material available on request. Load ratings based on shear of nut does not account for buckling.

These items are supplied with one mounting hole @ E/2 on each side.

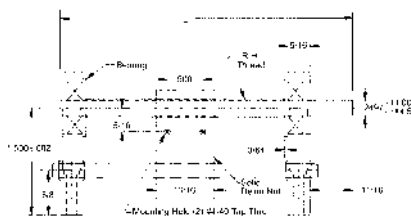
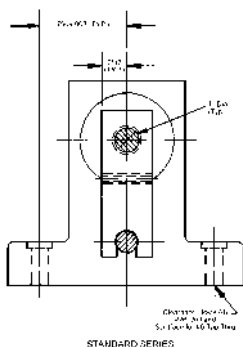
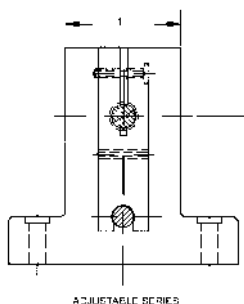
* Note: some clearance holes may be slotted to accept a range of sizes.

Spare nuts available on request.

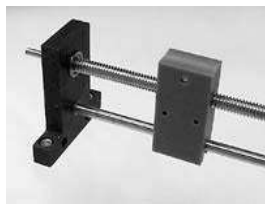
LEAD SCREW ASSEMBLIES

MATERIAL

SHAFT HANGERS - ALUMINUM ANODIZED • LEAD SCREWS - HIGH HELIX - ALUMINUM (UNCUNF - STAINLESS)
SUPPORT SHAFT - STAINLESS STEEL • BEARINGS - STD. SERIES - TEFLON (ADJUSTABLE SERIES - CHROME STEEL)
• FOLLOWER NUT - DELRIN



Non-Self-Locking HIGH HELIX FAST LEAD



STANDARD SERIES STOCK NO.	ADJUSTABLE SERIES STOCK NO.	LEAD PER REV	L (Inch)	TOTAL TRAVEL
LS6A2-6	LS7A2-6	.500	6-1/8	3.79
LS6A2-12	LS7A2-12		12-1/8	9.79
LS6A2-18	LS7A2-18		18-1/8	15.79
LS6A3-6	LS7A3-6	.750	6-1/8	3.79
LS6A3-12	LS7A3-12		12-1/8	9.79
LS6A3-18	LS7A3-18		18-1/8	15.79
LS6A4-6	LS7A4-6	1.000	6-1/8	3.79
LS6A4-12	LS7A4-12		12-1/8	9.79
LS6A4-18	LS7A4-18		18-1/8	15.79

Units can also be used as linear to rotary drive.

Self-Locking UNC/UNF THREAD



STANDARD SERIES STOCK NO.	ADJUSTABLE SERIES STOCK NO.	LEAD PER REV	L (Inch)	TOTAL TRAVEL
LS1-30	LS1-36	.0393	6-1/8	3.79
LS1-31	LS1-37		12-1/8	9.79
LS1-32	LS1-38		18-1/8	15.79
LS1-33	LS1-39	.0500	6-1/8	3.79
LS1-34	LS1-40		12-1/8	9.79
LS1-35	LS1-41		18-1/8	15.79

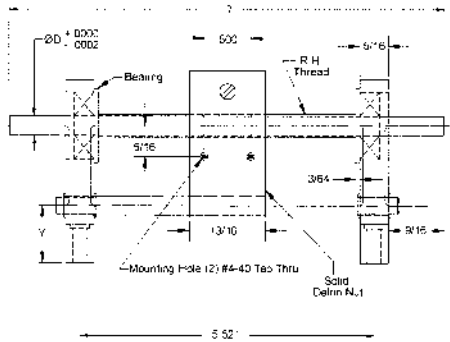
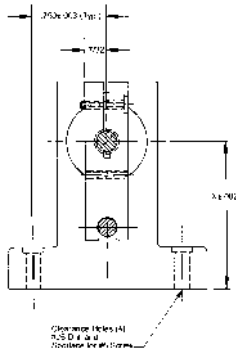
Parts can be reassembled with shaft on opposite end.

Left hand threads, other lengths, diameters, leads and shaft heights are available on request.

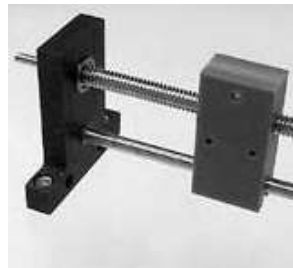
LEAD SCREW ASSEMBLIES

MATERIAL

**LEAD SCREW - 303 STAINLESS STEEL • SUPPORT SHAFT - 303 STAINLESS STEEL
SHAFT HANGER - ANODIZED ALUMINUM, FOLLOWER NUT-DELRIN**



STOCK NO.	LEAD PER REV.	DIA. D SHAFT	X	Y	TYPE BEARING
LS1-8	.0500	.1247	1.500	.625	PRECISION BALL
LS1-9	.0394	.1247	1.500	.625	
LS1-3	.0500	.1872	1.500	.625	
LS1-4	.0357	.1872	1.500	.625	
LS1-12	.0500	.2497	2.000	1.125	
LS1-13	.0357	.2497	2.000	1.125	
LS1-20	.0500	.1247	1.500	.625	OIL-LESS BRONZE
LS1-21	.0357	.1247	1.500	.625	
LS1-22	.0500	.1872	1.500	.625	
LS1-23	.0357	.1872	1.500	.625	
LS1-24	.0500	.2497	2.000	1.125	
LS1-25	.0357	.2497	2.000	1.125	



- Minimum Backlash

Precision Ball Bearing Units or Oil-Less Bronze Bearing Units

Longer Lead screws and quantity discounts are available on request.

LINEAR SLIDES TECHNICAL DATA

W. M. Berg, Inc. manufactures a complete line of off the shelf linear ball slides and linear crossed roller slide bearings. Made to the highest quality standards, components must pass strict inspection requirements at each stage of manufacturing. These Quality Control steps ensure precise, uniform, linear movement with low friction and minimum side-play.

Available in inch or metric sizes, and in travel lengths ranging from 1/2 inch to 24 inches, slides have flat, parallel, and smooth mounting surfaces. Equipped with mounting holes, they are shipped ready to install, with no need for modifications or adjustments.

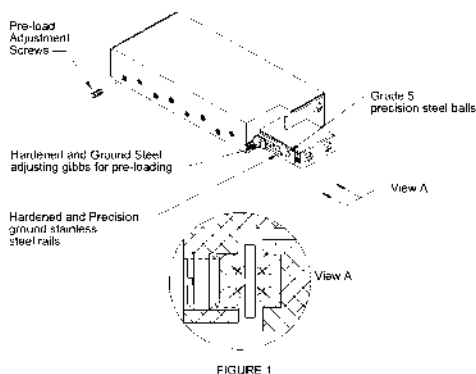


FIGURE 1

Linear Ball Slides

W. M. Berg Inc. Linear Ball Slides are designed to provide precise linear movement for light to medium loads. Their construction, as shown in Figure 1, consists of precision Grade 5 balls rolling along ground wire ways. Since the rolling contact surface is a point, the bearing ways are self cleaning, expelling matter which may deposit on their surfaces.

Linear Crossed Roller Slides

W. M. Berg Inc. Linear Crossed Roller Slides are designed to provide precise linear movement for medium to heavy loads. Their improved stiffness and rigidity mean long term reliability under the punishment of vibration and shock conditions. Their construction as shown in Figure 2 consists of precision rollers rolling along ground flat ways. Since the rolling contact surface is a line, they can support greater loads than the ball slides.

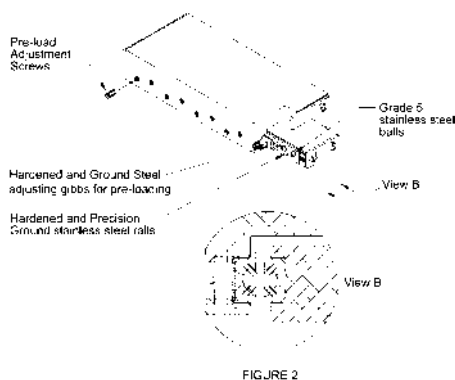


FIGURE 2

Straightness of Travel = Precision Series - .0005 in./in.

* Ultra-precision Series - .0004 in./in

Repeatability of Travel = Precision Series - .0001 in.

Ultra-precision Series - .00005 in.

Life = 10×10^6 in. of Travel at Safe Load Capacity

= 100×10^6 in. of Travel at 1/2 Safe Load Capacity

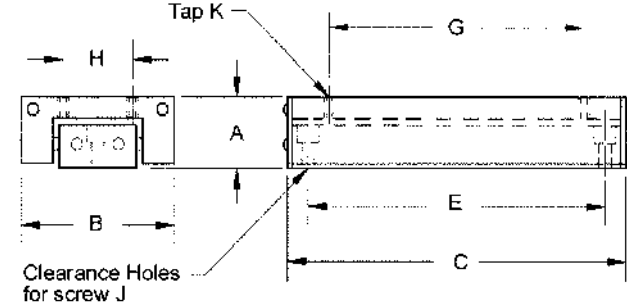
Coefficient of Friction - .003

$$\text{Safe Load Capacity} = \frac{\text{Rated Load Capacity}}{\text{Safety Factor (SF)}}$$

* Inspection Report Available for This Accuracy

ULTRA-PRECISION LINEAR BALL SLIDES

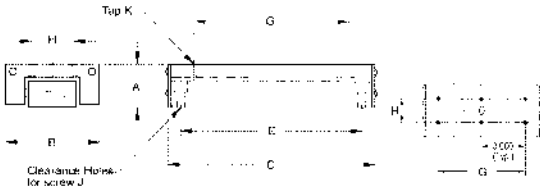
TRAVEL	MATERIAL
.50" TO 10.00"	ALUMINUM BLACK ANODIZED



STOCK NO.	TRAVEL	A	B	C	E	G	H	J	K	RATED LOAD (lbs.)
LPSB-5A	.5			1.56	1.250	1.250				10
LPSB-10A	1.0			2.56	2.250	2.250				15
LPSB-15A	1.5	.500	1.00	3.06	2.750	2.750	.437	#4	#6-32	20
LPSB-20A	2.0			3.56	3.250	3.250				30
LPSC-10A	1.0			2.00	1.625	1.375				25
LPSC-15A	1.5			2.75	2.250	2.126				30
LPSC-20A	2.0	.750	1.75	3.25	2.750	2.625	.875	#6	#6-32	35
LPSC-30A	3.0			4.00	3.500	3.375				40
LPSD-10A	1.0			2.62	2.125	2.125				70
LPSD-20A	2.0			4.00	3.375	3.000				90
LPSD-30A	3.0	1.000	2.62	5.00	4.375	4.000	1.250	#10	#10-32	110
LPSD-40A	4.0			6.00	5.375	5.000				130
LPSD-50A	5.0			8.00	7.375	7.000				180
LPSJ-20A	2.0			4.00	2.500	2.000				130
LPSJ-30A	3.0			5.75	4.250	3.750				180
LPSJ-50A	5.0	1.375	3.50	8.00	6.500	6.000	2.000	#10	#10-32	220
LPSJ-65A	6.5			10.25	8.750	8.250				280
LPSJ-90A	9.5			14.00	12.500	12.000				375
LPSK-50A	5.0			8.25	6.250	6.250				300
LPSK-70A	7.0	2.000	5.75	12.00	10.000	10.000	4.000	1/4	1/4-20	420
LPSK-100A	10.0			15.00	13.000	13.000				520

LINEAR BALL SLIDES

TRAVEL	MATERIAL
.50" TO 24.00"	ALUMINUM BLACK ANODIZED



STOCK NO	TRAVEL	A	B	C	E	G	H	J	K	RATED LOAD (lbs.)
LBSG-5	.5			.75	.375	.375				1.50
LBSG-10	1.0	.23	.38	1.25	.875	.875	.156	#2-56 TAP	#2-56*	1.50
LBSG-15	1.5			1.75	1.375	1.375				1.50
LBSA-5	.5			1.06	.750	.625				4
LBSA-10	1.0			2.06	1.375	1.625				8
LBSA-20	2.0			3.06	2.375	2.625				12
LBSA-30	3.0	.32	.56	4.06	3.375	3.625	.218	#2	#2-56	14
LBSA-40	4.0			5.06	3.500	4.625				16
LBSA-50	5.0			6.06	4.500	5.625				18
LBSE-5	.5			1.06	.750	.625				5
LBSE-10	1.0			2.06	1.375	1.625				9
LBSE-20	2.0			3.06	2.375	2.625				12
LBSE-30	3.0	.40	.75	4.06	3.375	3.625	.375	#4	#4-40	14
LBSE-40	4.0			5.06	3.500	4.625				16
LBSE-50	5.0			6.06	4.500	5.625				18
LBSB-5	.5			1.56	1.250	1.250				10
LBSB-10	1.0			2.56	2.250	2.250				15
LBSB-15	1.5			3.06	2.750	2.750				20
LBSB-20	2.0	.50	1.00	3.56	3.250	3.250	.437	4	#6-32	25
LBSB-30	3.0			4.56	4.250	4.250				30
LBSB-40	4.0			5.56	5.250	5.250				35
LBSB-50	5.0			6.56	6.250	3.250				40
LBSF-7	.8			1.56	1.125	1.250				10
LBSF-15	1.5			2.56	2.125	2.250				15
LBSF-20	2.0			3.56	3.125	3.250				20
LBSF-30	3.0	.53	1.06	4.56	3.250	4.000	.437	6	#6-32	25
LBSF-40	4.0			6.00	4.000	5.500				30
LBSF-60	6.0			8.00	5.000	7.500				35
LBSF-80	8.0			10.00	7.000	9.500				40
LBSH-10	1.0			2.00	1.500	1.375				15
LBSH-20	2.0			3.00	2.500	2.375				20
LBSH-30	3.0			4.00	3.500	3.375				25
LBSH-35	3.5	.62	1.50	5.00	3.500	4.375	.625	6	#6-32	30
LBSH-40	4.0			6.00	4.000	5.375				35
LBSH-60	6.0			8.00	5.000	7.375				45
LBSH-80	8.0			10.00	7.000	9.375				55
LBSC-10	1.0			2.00	1.625	1.375				25
LBSC-15	1.5			2.75	2.250	2.125				30
LBSC-20	2.0	.75	1.75	3.25	2.750	2.625	.875	6	#6-32	35
LBSC-30	3.0			4.00	3.500	3.375				40
LBSC-40	4.0			5.00	4.500	4.375				45
LBSC-60	6.0			7.00	6.500	6.375				55
LBSD-10	1.0			2.62	2.125	2.125				70
LBSD-20	2.0			4.00	3.000	3.000				90
LBSD-30	3.0			5.00	4.000	4.000				110
LBSD-40	4.0			6.00	5.000	5.000				130
LBSD-50	5.0			8.00	7.000	7.000				180
LBSD-60**	6.0	1.00	2.62	9.00	6.000	6.000	1.250	#10	#10-32	120
LBSD-90**	9.0			12.00	9.000	9.000				130
LBSD-120**	12.0			15.00	12.000	12.000				145
LBSD-150**	15.0			18.00	15.000	15.000				160
LBSD-180**	18.0			21.00	18.000	18.000				170
LBSD-210**	21.0			24.00	21.000	21.000				150
LBSD-240**	24.0			27.00	24.000	24.000				120

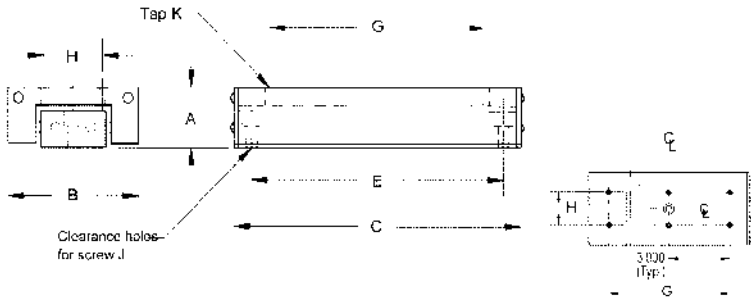
See Linear Slides Technical Data at beginning of this section for additional specifications.

* Tapped hole is supplied.

** Top Mounting hole configuration for slides LBSD-60 thru LBSD-240

LINEAR CROSSED ROLLER SLIDES

TRAVEL	MATERIAL
.50" TO 6.00"	ALUMINUM BLACK ANODIZED



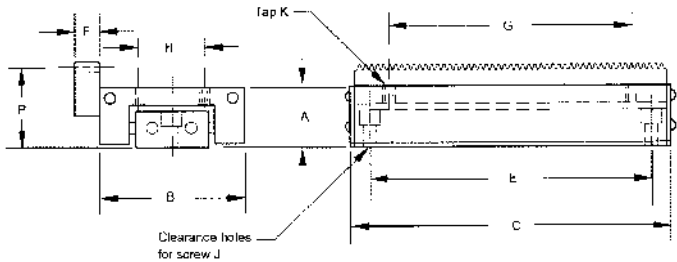
STOCK NO.	TRAVEL	A	B	C	E	G	H	K	RATED CAPACITY(Lbs.)
LRSA-5	.50			1.06	.750	.625			32
LRSA-10	1.00	.32	.56	2.06	1.375	1.625	.218	#2-56	56
LRSA-20	2.00			3.06	2.375	2.625			68
LRSB-5	.50			1.06	.750	.625			50
LRSB-10	1.00	.40	.75	2.06	1.375	1.625	.375	#4-40	80
LRSB-20	2.00			3.06	2.375	2.625			100
LRSC-15	1.50			2.56	2.125	2.250			135
LRSC-20	2.00	.53	1.06	3.56	3.125	3.250	.437	#6-32	225
LRSC-30	3.00			4.56	3.250	4.000			265
LRSD-10	1.00			2.00	1.500	1.375			135
LRSD-20	2.00	.62	1.50	3.00	2.500	2.375	.625	#6-32	180
LRSD-30	3.00			4.00	3.500	3.375			180
LRSD-40	4.00			6.00	4.000	5.375			310
LRSE-10	1.00			2.00	1.625	1.375			180
LRSE-20	2.00	.75	1.75	3.25	2.750	2.625	.875	#6-32	210
LRSE-30	3.00			4.00	3.500	3.375			240
LRSE-40	4.00			6.00	4.000	5.500			310
LRSF-15	1.50			2.62	1.875	1.625			330
LRSF-20	2.00	1.00	2.62	4.00	3.375	3.000	1.250	#10-32	420
LRSF-30	3.00			5.00	4.375	4.000			450
LRSF-40	4.00			6.00	5.375	5.000			500
LRSF-60	6.00			9.00	7.000	6.000			705

** Top mounting hole configuration for LRSF-60.
See Linear Slides Technical Data at beginning of this section for additional specifications.



RACK DRIVEN BALL SLIDES

TRAVEL	MATERIAL
.50" TO 18.00"	RACK - 416 STAINLESS STEEL



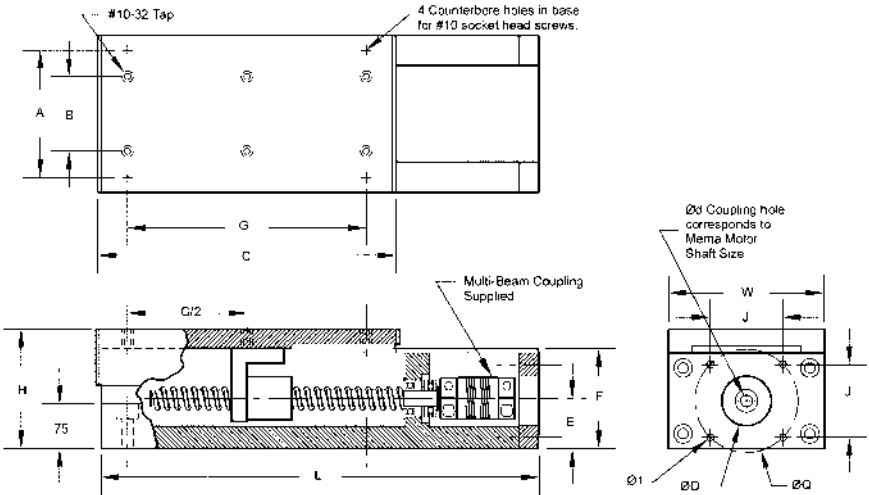
STOCK NO.	MAX TRAVEL (Inch)	A	B	C	E	G	H	J	K	P	F	RATED LOAD (lbs.)	DIAMETRAL PITCH
LRDB-5	0.5	.50	1.00	1.56	1.250	1.250	.437	#4	#6-32	.562		5	1/20 20°PA
LRDB-10	1.0			2.56	2.250	2.250						10	
LRDB-15	1.5			3.06	2.750	2.750						15	
LRDB-20	2.0			3.56	3.250	3.250						20	
LRDB-30	3.0			4.56	4.250	4.250						30	
LRDB-40	4.0	1.00	2.62	5.56	5.250	5.250	1.250	#10	#10-32	1.093	.230	35	1/10 20°PA
LRDB-50	5.0			6.56	6.250	6.250						40	
LRDD-10	1.0			2.62	2.125	2.125						40	
LRDD-20	2.0			4.00	3.375	3.000						60	
LRDD-30	3.0			5.00	4.375	4.000						90	
LRDD-40	4.0			6.00	5.375	5.000						116	
LRDD-50	5.0			8.00	7.375	7.000						120	
LRDD-60	6.0			9.00	7.000	6.000						120	
LRDD-90	9.0			12.00	10.000	9.000						130	
LRDD-120	12.0			15.00	13.000	12.000						145	
LRDD-150	15.0			18.00	16.000	15.000						160	
LRDD-180	18.0			21.00	19.000	18.000						170	

See Linear Slides Technical Data at beginning of this section for additional specifications.



LINEAR TABLES

TRAVEL	MATERIALS
3.00" TO 8.00"	CARRIAGE & BASE - BLACK ANODIZED ALUMINUM • NUT - DELRIN ROLLING ELEMENTS - HARDENED STAINLESS STEEL

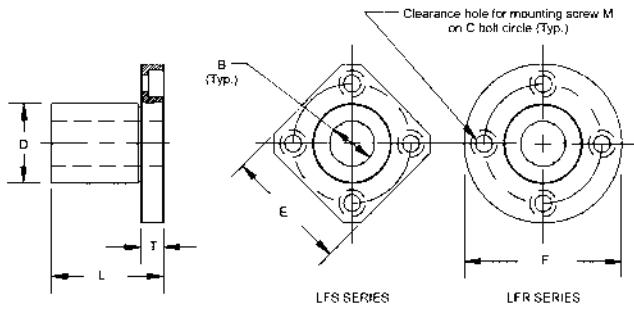


ROLLER SERIES	BALL SERIES	TRAVEL	LOAD RATING (lbs.)		A	B	C	G	H	W	L	MOUNTING REFERENCE DATA							
STOCK NO	STOCK NO		ROLLER SERIES	BALL SERIES								MOTOR SIZE	NEMA® Ød	E	F	ØD	I	ØQ	J
TRSD-30	TBSD-30	3.00	450	110			5.00	4.000			7.34	17	5 mm H7	.840	1.675	22 mm H7	Ø.120	(1.73)	1.220
TRSD-40	TBSD-40	4.00	500	130	2.125	1.250	6.00	5.000	2.00	2.62	8.34								
TRSD-60	TBSD-60	6.00	700	120			9.00	6.000			11.34								
TRSK-40	TBSK-40	4.00	400	130			6.00	5.000			8.56	23	.2498 + .0005	1.140	2.260	1.502 + .001	#10-32	2.625	(1.86)
TRSK-60	TBSK-60	6.00	500	120	3.000	3.000	8.00	7.000	2.75	4.00	10.56								
TRSK-80	TBSK-80	8.00	620	140			10.00	9.000			12.56								

Travel = .0833 Inch per revolution
Lead Accuracy = .003 in./ft.
Other sizes and materials available on request.

FLANGED TYPE LINEAR BEARINGS

STYLE	MATERIAL
SQUARE OR ROUND FLANGE	HOUSING & BALLS - 52100 CHROME STEEL RETAINER - DELRIN

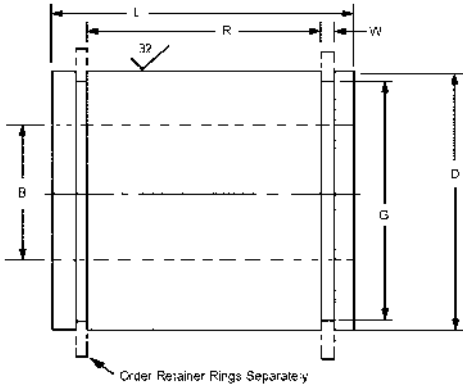


SQUARE FLANGE STOCK NO.	ROUND FLANGE STOCK NO.	WORKING BORE B	OUTSIDE DIA. D	L ±.012 MAX.	T	F	E	USE SHAFT SERIES	C	MOUNTING SCREW M	RADIAL LOAD RATING (lbs.)
LFS-1	LFR-1	.2500 - .0004	.5000 - .0005	.750	.22	1.250	1.00	LMS-4-36	.875	#6	6
LFS-2	LFR-2	.3750 - .0004	.6250 - .0005	.875	.25	1.500	1.25	LMS-6-36	1.062	#8	7
LFS-3	LFR-3	.5000 - .0004	.8750 - .0005	1.250	.25	1.750	1.37	LMS-8-36	1.312	#8	18
LFS-4	LFR-4	.7500 - .0004	1.2500 - .0007	1.625	.31	2.187	1.68	LMS-12-36	1.718	#10	31
LFS-5	LFR-5	1.0000 - .0004	1.5625 - .0007	2.250	.31	2.500	2.00	LMS-16-36	2.031	#10	36
LFS-6	LFR-6	1.2500 - .0005	2.0000 - .0008	2.625	.37	3.125	2.50	LMS-20-36	2.562	1/4	63
LFS-7	LFR-7	1.5000 - .0005	2.3750 - .0008	3.000	.50	3.750	3.00	LMS-24-36	3.062	5/16	92
LFS-8	LFR-8	2.0000 - .0005	3.0000 - .0009	4.000	.50	4.375	3.50	LMS-32-36	3.687	5/16	182

E

LINEAR BALL BEARINGS

SHAFT SIZE	MATERIAL
1/4" TO 2"	CHROME STEEL OUTER SLEEVE HARDENED & GROUND STEEL BALLS - HARDENED STEEL

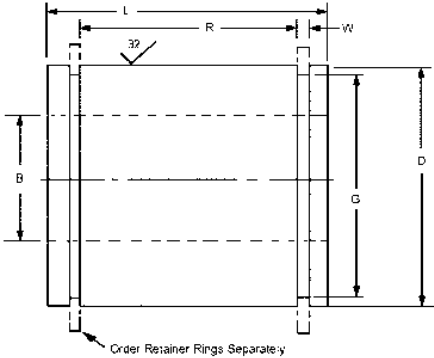


STOCK NO.	WORKING BORE B	OUTSIDE DIAMETER D	L	±.015 R	+.005 -.000 W	+.000 -.008 G	MAXIMUM SHAFT DIAMETER	USE SHAFT SERIES	REC. FITS		MAX ROLLING LOAD (lbs.)	RETAINER RING STOCK NO.
									NORM +.0005	PRESS +.0005		
LMB-1	.2500-.0005	.5000-.0004	3/4	.433	.039	.468	.2490	LMS-4-*	.5000	.4990	25	Q2-50-CP
LMB-2	.3750-.0005	.6250-.0004	7/8	.558	.039	.588	.3740	LMS-6-*	.6250	.6240	51	Q2-62-CP
LMB-3	.5000-.0005	.8750-.0004	1-1/4	.871	.046	.821	.4990	LMS-8-*	.8750	.8740	102	Q2-87-CP
LMB-4	.7500-.0005	1.2500-.0004	1-5/8	1.054	.056	1.176	.7490	LMS-12-*	1.2500	1.2490	205	Q2-125-CP
LMB-5	1.0000-.0005	1.5625-.0004	2-1/4	1.619	.068	1.468	.9990	LMS-16-*	1.5625	1.5615	385	Q2-156-CP
LMB-6	1.2500-.0006	2.0000-.0005	2-5/8	1.869	.068	1.886	1.2490	LMS-20-*	2.0000	1.9983	540	Q2-200-CP
LMB-7	1.5000-.0006	2.3750-.0005	3	2.240	.086	2.239	1.4989	LMS-24-*	2.3750	2.3733	750	Q2-237-CP
LMB-8	2.0000-.0008	3.0000-.0006	4	3.000	.103	2.838	1.9987	LMS-32-*	3.0000	2.99982	1080	Q2-300-CP

* Specify Length Required.

LINEAR BALL BEARINGS

SHAFT SIZE	MATERIAL
1/8" TO 1"	STAINLESS STEEL OUTER SLEEVE HARDENED & GROUND STEEL BALLS - HARDENED STEEL

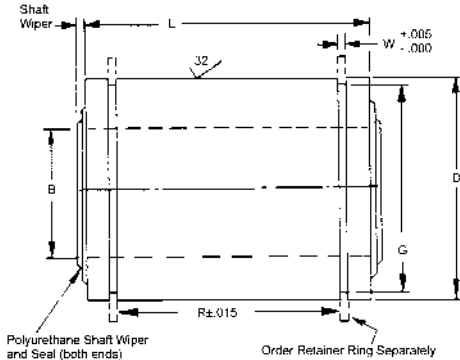


STOCK NO.	WORKING BORE B	OUTSIDE DIAMETER D	L	±.015 R	+.005 -.000 W	+.000 -.008 G	MAXIMUM SHAFT DIAMETER	USE SHAFT SERIES	REC. FITS		MAX ROLLING LOAD (lbs.)	RETAINER RING STOCK NO.
									NORM +.0005	PRESS +.0005		
LMB-125SS	.1250-.0003	.3125-.0004	1/2	.312	.029	.290	.1247	S1-8	.3125	.3115	7	Q2-31
LMB-187SS	.1875-.0003	.3750-.0004	9/16	.375	.029	.352	.1872	S1-11	.3750	.3740	9	Q2-37
LMB-1SS	.2500-.0005	.5000-.0004	3/4	.433	.039	.468	.2490	LMS-4-*	.5000	.4999	25	Q2-50
LMB-2SS	.3750-.0005	.6250-.0004	7/8	.558	.039	.588	.3740	LMS-6-*	.6250	.6240	51	Q2-62
LMB-3SS	.5000-.0005	.8750-.0004	1-1/4	.871	.046	.821	.4990	LMS-8-*	.8750	.8740	102	Q2-87
LMB-4SS	.7500-.0005	1.2500-.0004	1-5/8	1.054	.056	1.176	.7490	LMS-12-*	1.2500	1.2490	205	Q2-125
LMB-5SS	1.0000-.0005	1.5625-.0004	2-1/4	1.619	.068	1.468	.9990	LMS-16-*	1.5625	1.5615	385	Q2-156



LINEAR BALL BEARINGS WITH SHAFT WIPERS

SHAFT SIZE	MATERIAL
1/4" TO 1-1/2"	CHROME STEEL OUTER SLEEVE HARDENED & GROUND STEEL BALLS - HARDENED STEEL

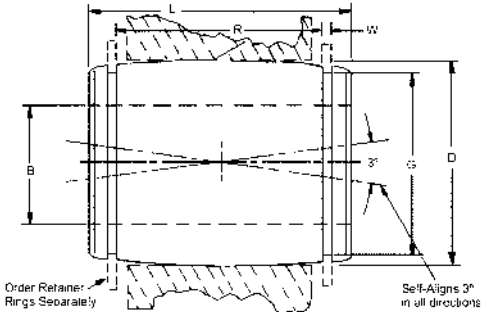


STOCK NO.	WORKING BORE B	HOUSING BORE D	L	±.015 R	+.005 -.000 W	+.000 -.008 G	MAX SHAFT SIZE	USE SHAFT SERIES	REC. FITS		RATED ROLLING LOAD (lbs.)	REPLACEMENT WHIPERS (2) REQ'D	RETAINER RING STOCK NO.
									NORM +.0005	PRESS +.0005			
LMB-1-W	.2500-.0005	.5000-.0004	3/4	.433	.039	.468	.2490	LMS-4-*	.5000	.4990	25	U-W1	Q2-50-CP
LMB-2-W	.3750-.0005	.6250-.0004	7/8	.558	.039	.588	.3740	LMS-6-*	.6250	.6240	51	U-W2	Q2-62-CP
LMB-3-W	.5000-.0005	.8750-.0004	1-1/4	.871	.046	.821	.4990	LMS-8-*	.8750	.8740	102	U-W3	Q2-87-CP
LMB-4-W	.7500-.0005	1.2500-.0004	1-5/8	1.054	.056	1.176	.7490	LMS-12-*	1.2500	1.2490	205	U-W4	Q2-125-CP
LMB-5-W	1.0000-.0005	1.5625-.0004	2-1/4	1.619	.068	1.468	.9990	LMS-16-*	1.5625	1.5615	385	U-W5	Q2-156-CP
LMB-6-W	1.2500-.0006	2.0000-.0005	2-5/8	1.869	.068	1.886	1.2490	LMS-20-*	2.0000	1.9983	540	U-W6	Q2-200-CP
LMB-7-W	1.5000-.0006	2.3750-.0005	3	2.240	.086	2.239	1.4989	LMS-24-*	2.3750	2.3733	750	U-W7	Q2-237-CP

* Specify Length Required.
• Low coefficient of friction

LINEAR BALL BEARINGS SELF-ALIGNING-BARREL STYLE

SHAFT SIZE	MATERIAL
1/4" TO 1-1/2"	CHROME STEEL OUTER SLEEVE HARDENED & GROUND STEEL BALLS - HARDENED STEEL



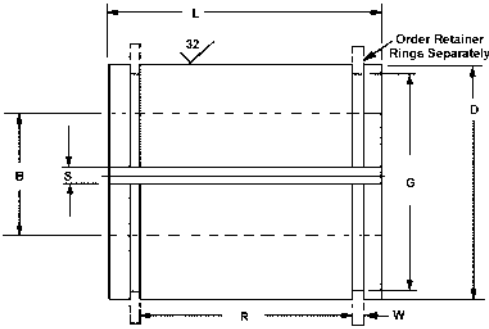
WORKING STOCK NO.	BORE B	HOUSING BORE D	L	$\pm .015$ R	$+ .005$ $- .000$ W	$+ .005$ $- .000$ G	MAX. SHAFT SIZE
LMB-1-B	.2500-.0005	.5000-.0004	3/4	.437	.039	.468	.2490
LMB-2-B	.3750-.0005	.6250-.0004	7/8	.562	.039	.588	.3740
LMB-3-B	.5000-.0005	.8750-.0004	1-1/4	.875	.046	.821	.4990
LMB-4-B	.7500-.0005	1.2500-.0004	1-5/8	1.062	.056	1.176	.7490
LMB-5-B	1.0000-.0005	1.5625-.0004	2-1/4	1.625	.068	1.468	.9990
LMB-6-B	1.2500-.0006	2.0000-.0005	2-5/8	1.875	.068	1.886	1.2490
LMB-7-B	1.5000-.0006	2.3750-.0005	3	2.250	.086	2.239	1.4989

Self-aligning barrel shape allows bearing to accommodate parallel misalignment of up to 3°.



LINEAR BALL BEARINGS

STYLE	SHAFT SIZE	MATERIAL
ADJUSTABLE DIAMETER SERIES	1/2" TO 2"	CHROME STEEL OUTER SLEEVE HARDENED & GROUND STEEL BALLS - HARDENED STEEL



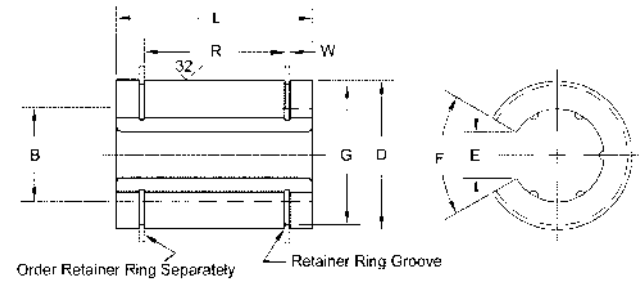
STOCK NO.	BORE B BEFORE ADJUSTMENT	HOUSING BORE BEFORE ADJUSTMENT D•	L	±.015 R	+.005-.000 W	+.005-.000 G	MAX. SHAFT DIA.	USE SHAFT SERIES	MINIMUM SLOT WIDTH S	MAXIMUM ROLLING LOAD (lbs.)	RETAINER RING STOCK NO.
LMC-3	.5000±.0005	.8750+.0010	1-1/4	.875	.046	.821	.4995	LMS-9-*	1/16	102	Q2-87-CP
LMC-4	.7500±.0005	1.2500+.0010	1-5/8	1.062	.056	1.176	.7495	LMS-13-*	3/32	205	Q2-125-CP
LMC-5	1.0000±.0005	1.5625+.0010	2-1/4	1.625	.068	1.468	.9995	LMS-17-*	3/32	385	Q2-156-CP
LMC-6	1.2500±.0006	2.0000+.0010	2-5/8	1.875	.068	1.886	1.2495	LMS-21-*	3/32	540	Q2-200-CP
LMC-7	1.5000±.0006	2.3750+.0010	3	2.250	.086	2.239	1.4994	LMS-25-*	1/8	750	Q2-237-CP
LMC-8	2.0000±.0008	3.0000+.0010	4	3.000	.103	2.838	1.4994	LMS-33-*	1/8	1080	Q2-300-CP

• Use adjustable type housing to obtain optimum operating fit.

* Specify Length Required.

LINEAR BALL BEARINGS

STYLE	SHAFT SIZE	MATERIAL
OPEN	1/2" TO 2"	CHROME STEEL OUTER SLEEVE HARDENED & GROUND, BALLS - HARDENED STEEL, PLASTIC BALL RETAINER



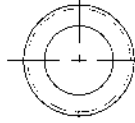
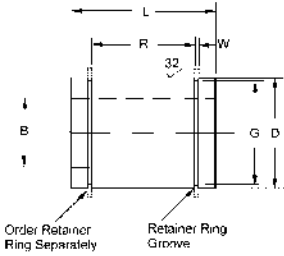
STOCK NO.	BORE B BEFORE ADJUSTMENT	HOUSING BORE BEFORE ADJUSTMENT D•	L	±.015 R	+.005 .000 W	+.005-.000 G	MAX. SHAFT DIA.	USE SHAFT SERIES	MINIMUM SLOT WIDTH S		RATED ROLLING LOAD (lbs.)	RETAINER RING STOCK NO.
									Width E	Angle F		
LMD-3	.5000±.0005	.8750+ .0010	1-1/4	.875	.046	.821	.4995	LMS-9-*	9/32	60°	102	Q2-87-CP
LMD-4	.7500±.0005	1.2500+ .0010	1-5/8	1.062	.056	1.176	.7495	LMS-13-*	13/32	60°	205	Q2-125-CP
LMD-5	1.0000±.0005	1.5625+ .0010	2-1/4	1.625	.068	1.468	.9995	LMS-17-*	9/16	60°	385	Q2-156-CP
LMD-6	1.2500±.0006	2.0000+ .0010	2-5/8	1.875	.068	1.886	1.2495	LMS-21-*	5/8	50°	540	Q2-200-CP
LMD-7	1.5000±.0006	2.3750+ .0010	3	2.250	.086	2.239	1.4994	LMS-25-*	3/4	50°	750	Q2-237-CP
LMD-8	2.0000±.0008	3.0000+ .0010	4	3.000	.103	2.838	1.4994	LMS-33-*	1	50°	1080	Q2-300-CP

• Use adjustable type housing to obtain optimum operating fit. * Specify Length Required.



LINEAR "NO LUBE" BEARINGS

STYLE	SHAFT SIZE	MATERIAL
CLOSED	1/4" TO 1-1/4"	MOLYBDENUM DISULFIDE FILLED NYLON



May be used with either
hard or soft ground shafting

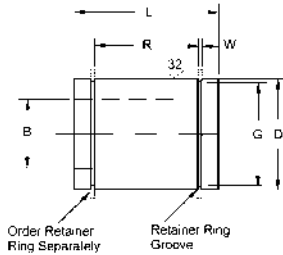


STOCK NO.	BORE B	HOUSING DIA. D	L	±.015 R	+0.010 -.000 W	+0.010 -.000 G	BEARING WEIGHT OZ.	USE WITH HARD SHAFTS	USE WITH SOFT S.S. SHAFTS	RETAINER RING
LMN-1	.250+.003	.500-.002	3/4	.437	.039	.468	0.10	LMS-4-*	S1-72	Q2-50-CP
LMN-2	.375+.003	.625-.002	7/8	.562	.039	.588	0.10	LMS-6-*	S1-74	Q2-62-CP
LMN-3	.500+.004	.875-.002	1-1/4	.875	.046	.821	0.40	LMS-8-*	S1-76	Q2-87-CP
LMN-4	.750+.004	1.250-.002	1-5/8	1.062	.056	1.176	0.80	LMS-12-*	S1-78	Q2-125-CP
LMN-5	1.000+.004	1.563-.003	2-1/4	1.625	.068	1.468	2.10	LMS-16-*	S1-80	Q2-156-CP
LMN-6	1.250+.006	2.000-.003	2-5/8	1.875	.068	1.886	3.30	LMS-20-*	S1-82	Q2-200-CP

- PV = 10,000 psi fpm
- Self-lubricating
- Interchangeable with all makes of linear ball bearings
- Good for linear and/or rotation motion

*Specify Lengths Required

STYLE	SHAFT SIZE	MATERIAL
ADJUSTABLE	1/4" TO 1-1/4"	MOLYBDENUM DISULFIDE FILLED NYLON



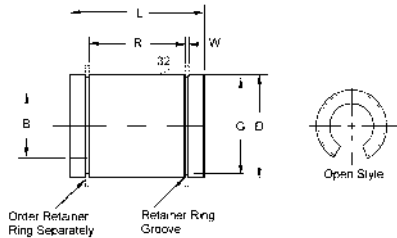
STOCK NO.	BORE B	HOUSING DIA. D	L	±.015 R	+0.010 -.000 W	+0.010 -.000 G	BEARING WEIGHT OZ.	USE WITH HARD SHAFTS	USE WITH SOFT S.S. SHAFTS	RETAINER RING
LMN-1-ADJ	.250+.003	.500-.002	3/4	.437	.039	.468	0.10	LMS-4-*	S1-72	Q2-50-CP
LMN-2-ADJ	.375+.003	.625-.002	7/8	.562	.039	.588	0.10	LMS-6-*	S1-74	Q2-62-CP
LMN-3-ADJ	.500+.004	.875-.002	1-1/4	.875	.046	.821	0.40	LMS-8-*	S1-76	Q2-87-CP
LMN-4-ADJ	.750+.004	1.250-.002	1-5/8	1.062	.056	1.176	0.80	LMS-12-*	S1-78	Q2-125-CP
LMN-5-ADJ	1.000+.004	1.563-.003	2-1/4	1.625	.068	1.468	2.10	LMS-16-*	S1-80	Q2-156-CP
LMN-6-ADJ	1.250+.006	2.000-.003	2-5/8	1.875	.068	1.886	3.30	LMS-20-*	S1-82	Q2-200-CP

- PV = 10,000 psi fpm
- Self-lubricating
- Interchangeable with all makes of linear ball bearings
- Good for linear and/or rotation motion

*Specify Lengths Required

LINEAR "NO LUBE" BEARINGS

STYLE	SHAFT SIZE	MATERIAL
OPEN	1/4" TO 1-1/4"	MOLYBDENUM DISULFIDE FILLED NYLON



STOCK NO.	BORE B	HOUSING DIA. D	L	±.015 R	+.010 -.000 W	+.010 -.000 G	BEARING WEIGHT OZ.	USE WITH HARD SHAFTS	USE WITH SOFT S.S. SHAFTS	RETAINER RING
LMN-1-OPN	.250+.003	.500-.002	3/4	.437	.039	.468	0.10	LMS-4-*	S1-72	Q2-50-CP
LMN-2-OPN	.375+.003	.625-.002	7/8	.562	.039	.588	0.10	LMS-6-*	S1-74	Q2-62-CP
LMN-3-OPN	.500+.004	.875-.002	1-1/4	.875	.046	.821	0.40	LMS-8-*	S1-76	Q2-87-CP
LMN-4-OPN	.750+.004	1.250-.002	1-5/8	1.062	.056	1.176	0.80	LMS-12-*	S1-78	Q2-125-CP
LMN-5-OPN	1.000+.004	1.563-.003	2-1/4	1.625	.068	1.468	2.10	LMS-16-*	S1-80	Q2-156-CP
LMN-6-OPN	1.250+.006	2.000-.003	2-5/8	1.875	.068	1.886	3.30	LMS-20-*	S1-82	Q2-200-CP

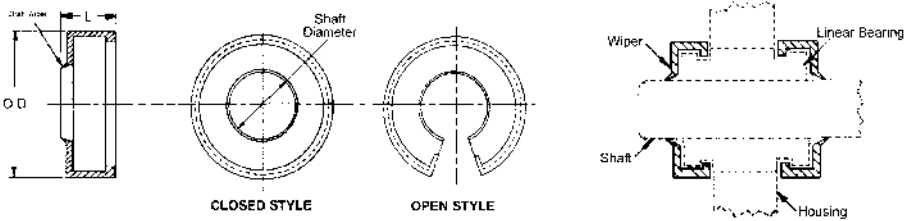
- PV = 10,000 psi fpm
- Self-lubricating
- Interchangeable with all makes of linear ball bearings
- Good for linear and/or rotation motion

*Specify Lengths Required



LINEAR BEARING WIPERS - RETAINER

TYPES	FOR SHAFT SIZES	MATERIAL
CLOSED AND OPEN	1/4" TO 1-1/4"	POLYURETHANE



STOCK NO.	SHAFT DIA.	STYLE	OUTSIDE DIA.	L	USE WITH LINEAR BEARING
LMZ-1	1/4	CLOSED	.63	.25	LMB-1
LMZ-2	3/8		.74	.24	LMB-2
LMZ-3	1/2		.99	.25	LMB-3 OR LMC-3
LMZ-4	3/4		1.37	.39	LMB-4 OR LMC-4
LMZ-5	1		1.68	.40	LMB-5 OR LMC-5
LMZ-6	1-1/4		2.12	.49	LMB-6 OR LMC-6
LMZ-13	1/2	OPEN	.99	.25	LMD-3
LMZ-14	3/4		1.37	.39	LMD-4
LMZ-15	1		1.68	.40	LMD-5
LMZ-16	1-1/4		2.12	.49	LMD-6



- Simple assembly
- Economical to use
- Quick and easy to replace, snap on design
- Eliminates the need for retainer ring and spacer
- Acts as a shaft wiper and bearing dust shield
- Fits all major brands of linear recirculating ball bearings

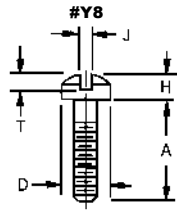
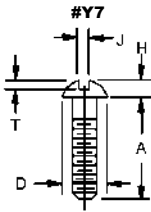
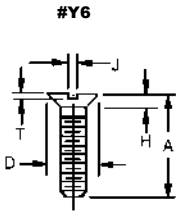
HARDWARE & FASTENERS

Table of Contents

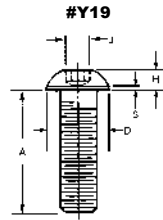
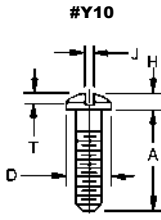
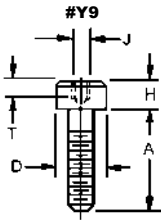
SCREW HEADS	
TECHNICAL DATA	F 2
MACHINE SCREWS	
STAINLESS STEEL MACHINE SCREWS	F 3 - F 5
LONG-LOK® & NYLOC® MACHINE SCREWS	F 6 - F 7
NYLON MACHINE SCREWS	F 8 - F 9
INTEGRAL SEAL SCREWS	F 10 - F 11
SET SCREWS	
SLOTTED HEAD & HEX SOCKET	F 12
BALL BUTTON	F 13
BRASS SOFT TIP HEX SOCKET	F 14
SILVER SOLDER TIP SLOTTED HEAD & HEX SOCKET	F 15
SOFT TIP SLOTTED HEAD	F 16, F 18
SOFT TIP HEX SOCKET HEAD	F 16 - F 17
SHOULDER SCREWS	
SLOTTED HEAD	F 19 - F 20
HEX SOCKET HEAD	F 21 - F 22
PRECISION CAPTIVE SCREWS	F 23
PRECISION JIG BUTTONS	F 24
THUMB SCREWS	
PLASTIC HEAD, KNURLED	F 25 - F 26
STAINLESS STEEL, KNURLED	F 27 - F 29
STAINLESS STEEL, KNURLED SOCKET HEAD	F 30 - F 31
THUMB NUTS	F 32 - F 33
THREADED STUDS	F 34 - F 35
HEX NUTS	F 36
WASHERS	
MOLDED NYLON	F 37
STAINLESS STEEL	F 37 - F 38
LOCK WASHERS	F 39
THRUST WASHERS & DISKS	F 40
SWIVEL WASHERS	F 41
SPRING WASHERS	
BELLEVILLE	F 42
CURVED	F 42
BEARING PRE-LOADED	F 43
PINS	
TAPER	F 44
GROOVED	F 45
ROLL OR SPRING	F 45
SPIRAL	F 46
CLEVIS	F 47
COTTER	F 47
DOWEL	F 48 - F 49
SOFT PINS	F 48
RETAINER RINGS	
EXTERNAL LUG DESIGN	F 50
EXTERNAL SNAP ON DESIGN	F 51
EXTERNAL POWER GRIP DESIGN	F 51
EXTERNAL BOWED SNAP ON DESIGN	F 52
STAINLESS STEEL INTERNAL	F 53
STAINLESS STEEL EXTERNAL	F 53
CARBON INTERNAL & EXTERNAL	F 54 - F 55
BEARING INTERNAL PUSH IN DESIGN	F 56
INTERNAL LUG DESIGN	F 56
SPACERS	
LAMINATED INNER RACE SHIM	F 57
LAMINATED OUTER RACE SHIM	F 57
SHAFT SPACERS	F 58 - F 59
BEARING SPACERS	F 60
BALLS	F 61
SPRINGS	
COMPRESSION	F 62
EXPERIMENTAL	F 63
EXTENSION	F 63
TORSION	F 64
ANTI-BACKLASH EXTENSION	F 64
ANTI-BACKLASH TORSION	F 65
SPRING POSTS	F 65
CHASSIS HANDLES	F 66

SCREW HEADS

TECHNICAL DATA



S SCREW SIZE	#Y6-FLAT HEAD 82°				#Y7-ROUND HEAD				#Y8- FILLISTER HEAD			
	D MAX	H MAX	J MAX	T MAX	D	H	J	T	D MAX	H MAX	J MAX	T MAX
#000	.064	.016	.011	.009	.062	.031	.012	.018	.059	.035	.012	.017
#00	.092	.028	.017	.014	.089	.045	.017	.026	.082	.047	.017	.022
#0	.119	.035	.023	.015	.113	.053	.023	.039	.096	.055	.023	.025
#2	.172	.051	.031	.023	.162	.069	.031	.048	.140	.083	.031	.037
#4	.225	.067	.039	.030	.211	.086	.039	.058	.183	.107	.039	.048
#6	.279	.083	.048	.038	.260	.103	.048	.068	.226	.132	.048	.060
#8	.332	.100	.054	.045	.309	.120	.054	.077	.270	.156	.054	.071
#10	.385	.116	.060	.053	.359	.137	.060	.087	.313	.180	.060	.083
1/4	.507	.153	.075	.070	.472	.175	.075	.109	.414	.237	.075	.109



S SCREW SIZE	#Y6-FLAT HEAD 82°				#Y7-ROUND HEAD				#Y8- FILLISTER HEAD			
	D MAX	H MAX	J MAX	T MIN	D MAX	H MAX	J MAX	T MAX	D MAX	H MAX	S MAX	J MAX
#000	-	-	-	-	.073	.021	.012	.013	-	-	-	-
#00	-	-	-	-	.098	.028	.017	.018	-	-	-	-
#0	.096	.060	.050	.025	.126	.032	.023	.018	.144	.032	.010	.035
#2	.140	.086	5/64	.038	.181	.050	.031	.030	.164	.046	.010	.050
#4	.183	.112	3/32	.051	.235	.068	.039	.042	.213	.059	.015	1/6
#6	.226	.138	7/64	.064	.290	.087	.048	.053	.262	.073	.015	5/64
#8	.270	.164	9/64	.077	.344	.105	.054	.065	.312	.087	.015	3/32
#10	.312	.190	5/32	.090	.390	.123	.060	.077	.361	.101	.020	1/8
1/4	.375	.250	3/16	.120	.525	.165	.075	.105	.437	.132	.031	5/32

STAINLESS STEEL MACHINE SCREWS

THREAD	STYLE	MATERIAL
#000-120	BINDING, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

HEAD STYLE				THREAD	A LENGTH
BINDING STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y10-S000-A2	Y6-S000-A2	Y7-S000-A2	Y8-S000-A2	#000-120	1/8
Y10-S000-A3	Y6-S000-A3	Y7-S000-A3	Y8-S000-A3		3/16
Y10-S000-A4	Y6-S000-A4	Y7-S000-A4	Y8-S000-A4		1/4
Y10-S000-A5	Y6-S000-A5	Y7-S000-A5	Y8-S000-A5		5/16

THREAD	STYLE	MATERIAL
#00-96	BINDING, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

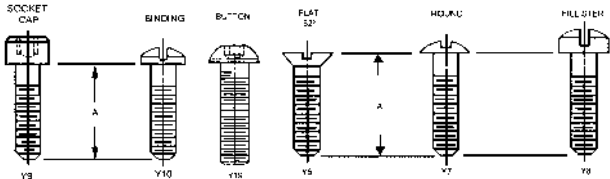
HEAD STYLE				THREAD	A LENGTH
BINDING STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y10-S00-A2	Y6-S00-A2	Y7-S00-A2	Y8-S00-A2	#00-96	1/8
Y10-S00-A3	Y6-S00-A3	Y7-S00-A3	Y8-S00-A3		3/16
Y10-S00-A4	Y6-S00-A4	Y7-S00-A4	Y8-S00-A4		1/4
Y10-S00-A5	Y6-S00-A5	Y7-S00-A5	Y8-S00-A5		5/16
Y10-S00-A6	Y6-S00-A6	Y7-S00-A6	Y8-S00-A6		3/8

THREAD	STYLE	MATERIAL
#0-80	SOCKET CAP, BINDING, BUTTON, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

HEAD STYLE						THREAD	A LENGTH
SOCKET CAP STOCK NO.	BINDING STOCK NO.	BUTTON STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y9-S0-A2	Y10S0-A2	Y19-S0-A2	Y6-S0-A2	Y7-S0-A2	Y8-S0-A2	#0-80	1/8
Y9-S0-A3	Y10S0-A3	Y19-S0-A3	Y6-S0-A3	Y7-S0-A3	Y8-S0-A3		3/16
Y9-S0-A4	Y10S0-A4	Y19-S0-A4	Y6-S0-A4	Y7-S0-A4	Y8-S0-A4		1/4
Y9-S0-A5	Y10S0-A5	Y19-S0-A5	Y6-S0-A5	Y7-S0-A5	Y8-S0-A5		5/16
Y9-S0-A6	Y10S0-A6	Y19-S0-A6	Y6-S0-A6	Y7-S0-A6	Y8-S0-A6		3/8
Y9-S0-A8	Y10S0-A8	Y19-S0-A8	Y6-S0-A8	Y7-S0-A8	Y8-S0-A8		1/2

THREAD	STYLE	MATERIAL
#2-56	SOCKET CAP, BINDING, BUTTON, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

HEAD STYLE						THREAD	A LENGTH
SOCKET CAP STOCK NO.	BINDING STOCK NO.	BUTTON STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y9-S2-A3	Y10-S2-A3	Y19-S2-A3	Y6-S2-A3	Y7-S2-A3	Y8-S2-A3	#2-56 UNC	3/16
Y9-S2-A4	Y10-S2-A4	Y19-S2-A4	Y6-S2-A4	Y7-S2-A4	Y8-S2-A4		1/4
Y9-S2-A5	Y10-S2-A5	Y19-S2-A5	Y6-S2-A5	Y7-S2-A5	Y8-S2-A5		5/16
Y9-S2-A6	Y10-S2-A6	Y19-S2-A6	Y6-S2-A6	Y7-S2-A6	Y8-S2-A6		3/8
Y9-S2-A8	Y10-S2-A8	Y19-S2-A8	Y6-S2-A8	Y7-S2-A8	Y8-S2-A8		1/2



STAINLESS STEEL MACHINE SCREWS

THREAD	STYLE	MATERIAL
#4-40	SOCKET CAP, BINDING, BUTTON, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

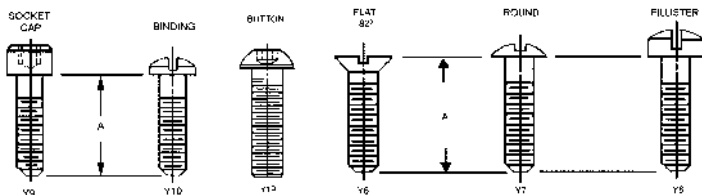
HEAD STYLE						THREAD	A LENGTH
SOCKET CAP STOCK NO.	BINDING STOCK NO.	BUTTON STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y9-S4-A3	Y10-S4-A3	Y19-S4-A3	Y6-S4-A3	Y7-S4-A3	Y8-S4-A3	#4-40 UNC	3/16
Y9-S4-A4	Y10-S4-A4	Y19-S4-A4	Y6-S4-A4	Y7-S4-A4	Y8-S4-A4		1/4
Y9-S4-A5	Y10-S4-A5	Y19-S4-A5	Y6-S4-A5	Y7-S4-A5	Y8-S4-A5		5/16
Y9-S4-A6	Y10-S4-A6	Y19-S4-A6	Y6-S4-A6	Y7-S4-A6	Y8-S4-A6		3/8
Y9-S4-A8	Y10-S4-A8	Y19-S4-A8	Y6-S4-A8	Y7-S4-A8	Y8-S4-A8		1/2
Y9-S4-A10	Y10-S4-A10	Y19-S4-A10	Y6-S4-A10	Y7-S4-A10	Y8-S4-A10		5/8

THREAD	STYLE	MATERIAL
#6-32	SOCKET CAP, BINDING, BUTTON, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

HEAD STYLE						THREAD	A LENGTH
SOCKET CAP STOCK NO.	BINDING STOCK NO.	BUTTON STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y9-S6-A4	Y10-S6-A4	Y19-S6-A4	Y6-S6-A4	Y7-S6-A4	Y8-S6-A4	#6-32 UNC	1/4
Y9-S6-A5	Y10-S6-A5	Y19-S6-A5	Y6-S6-A5	Y7-S6-A5	Y8-S6-A5		5/16
Y9-S6-A6	Y10-S6-A6	Y19-S6-A6	Y6-S6-A6	Y7-S6-A6	Y8-S6-A6		3/8
Y9-S6-A8	Y10-S6-A8	Y19-S6-A8	Y6-S6-A8	Y7-S6-A8	Y8-S6-A8		1/2
Y9-S6-A10	Y10-S6-A10	Y19-S6-A10	Y6-S6-A10	Y7-S6-A10	Y8-S6-A10		5/8
Y9-S6-A12	Y10-S6-A12	Y19-S6-A12	Y6-S6-A12	Y7-S6-A12	Y8-S6-A12		3/4

THREAD	STYLE	MATERIAL
#8-32	SOCKET CAP, BINDING, BUTTON, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

HEAD STYLE						THREAD	A LENGTH
SOCKET CAP STOCK NO.	BINDING STOCK NO.	BUTTON STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y9-S8-A4	Y10-S8-A4	Y19-S8-A4	Y6-S8-A4	Y7-S8-A4	Y8-S8-A4	#8-32 UNC	1/4
Y9-S8-A5	Y10-S8-A5	Y19-S8-A5	Y6-S8-A5	Y7-S8-A5	Y8-S8-A5		5/16
Y9-S8-A6	Y10-S8-A6	Y19-S8-A6	Y6-S8-A6	Y7-S8-A6	Y8-S8-A6		3/8
Y9-S8-A8	Y10-S8-A8	Y19-S8-A8	Y6-S8-A8	Y7-S8-A8	Y8-S8-A8		1/2
Y9-S8-A10	Y10-S8-A10	Y19-S8-A10	Y6-S8-A10	Y7-S8-A10	Y8-S8-A10		5/8
Y9-S8-A12	Y10-S8-A12	Y19-S8-A12	Y6-S8-A12	Y7-S8-A12	Y8-S8-A12		3/4
Y9-S8-A16	Y10-S8-A16	Y19-S8-A16	Y6-S8-A16	Y7-S8-A16	Y8-S8-A16		1



STAINLESS STEEL MACHINE SCREWS

THREAD	STYLE	MATERIAL
#10-24	SOCKET CAP, BINDING, BUTTON, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

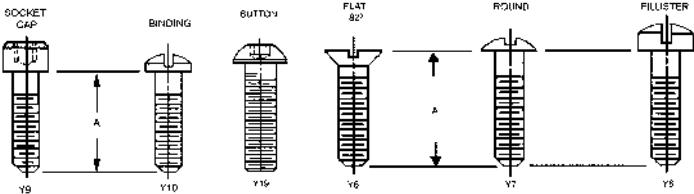
HEAD STYLE						THREAD	A LENGTH
SOCKET CAP STOCK NO.	BINDING STOCK NO.	BUTTON STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y9-S10-A4	Y10-S10-A4	Y19-S10-A4	Y6-S10-A4	Y7-S10-A4	Y8-S10-A4	#10-24 UNC	1/4
Y9-S10-A5	Y10-S10-A5	Y19-S10-A5	Y6-S10-A5	Y7-S10-A5	Y8-S10-A5		5/16
Y9-S10-A6	Y10-S10-A6	Y19-S10-A6	Y6-S10-A6	Y7-S10-A6	Y8-S10-A6		3/8
Y9-S10-A8	Y10-S10-A8	Y19-S10-A8	Y6-S10-A8	Y7-S10-A8	Y8-S10-A8		1/2
Y9-S10-A10	Y10-S10-A10	Y19-S10-A10	Y6-S10-A10	Y7-S10-A10	Y8-S10-A10		5/8
Y9-S10-A12	Y10-S10-A12	Y19-S10-A12	Y6-S10-A12	Y7-S10-A12	Y8-S10-A12		3/4
Y9-S10-A16	Y10-S10-A16	Y19-S10-A16	Y6-S10-A16	Y7-S10-A16	Y8-S10-A16		1

THREAD	STYLE	MATERIAL
#10-32	SOCKET CAP, BINDING, BUTTON, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

HEAD STYLE						THREAD	A LENGTH
SOCKET CAP STOCK NO.	BINDING STOCK NO.	BUTTON STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
Y9-S11-A4	Y10-S11-A4	Y19-S11-A4	Y6-S11-A4	Y7-S11-A4	Y8-S11-A4	#10-32 UNC	1/4
Y9-S11-A5	Y10-S11-A5	Y19-S11-A5	Y6-S11-A5	Y7-S11-A5	Y8-S11-A5		5/16
Y9-S11-A6	Y10-S11-A6	Y19-S11-A6	Y6-S11-A6	Y7-S11-A6	Y8-S11-A6		3/8
Y9-S11-A8	Y10-S11-A8	Y19-S11-A8	Y6-S11-A8	Y7-S11-A8	Y8-S11-A8		1/2
Y9-S11-A10	Y10-S11-A10	Y19-S11-A10	Y6-S11-A10	Y7-S11-A10	Y8-S11-A10		5/8
Y9-S11-A12	Y10-S11-A12	Y19-S11-A12	Y6-S11-A12	Y7-S11-A12	Y8-S11-A12		3/4
Y9-S11-A16	Y10-S11-A16	Y19-S11-A16	Y6-S11-A16	Y7-S11-A16	Y8-S11-A16		1

THREAD	STYLE	MATERIAL
1/4-20	SOCKET CAP, BINDING, BUTTON, FLAT, ROUND AND FILLISTER	STAINLESS STEEL TYPE 18-8

HEAD STYLE						THREAD	A LENGTH
SOCKET CAP STOCK NO.	BINDING STOCK NO.	BUTTON STOCK NO.	FLAT STOCK NO.	ROUND STOCK NO.	FILLISTER STOCK NO.		
-	Y10-S12-A4	-	-	Y7-S12-A4	-	1/4-20 UNC	1/4
-	Y10-S12-A5	-	-	Y7-S12-A5	-		5/16
Y9-S12-A6	Y10-S12-A6	Y19-S12-A6	Y6-S12-A6	Y7-S12-A6	Y8-S12-A6		3/8
Y9-S12-A8	Y10-S12-A8	Y19-S12-A8	Y6-S12-A8	Y7-S12-A8	Y8-S12-A8		1/2
Y9-S12-A10	Y10-S12-A10	Y19-S12-A10	Y6-S12-A10	Y7-S12-A10	Y8-S12-A10		5/8
Y9-S12-A12	Y10-S12-A12	Y19-S12-A12	Y6-S12-A12	Y7-S12-A12	Y8-S12-A12		3/4
Y9-S12-A16	Y10-S12-A16	Y19-S12-A16	Y6-S12-A16	Y7-S12-A16	Y8-S12-A16		1



LONG-LOK® & NYLOC® MACHINE SCREWS

THREAD	STYLE	MATERIAL
#0-80	SELF LOCKING - VIBRATION PROOF FLAT, ROUND, FILLISTER, BINDING AND SOCKET CAP	STAINLESS STEEL TYPE 18-8 WITH NYLON INSERT

LONG-LOCK®				NYLOC®	THREAD	A LENGTH
FLAT STYLE STOCK NO.	ROUND STYLE STOCK NO.	FILLISTER STYLE STOCK NO.	BINDING STYLE STOCK NO.	SOCKET CAP STYLE STOCK NO.		
Y6-S0-A2-L	Y7-S0-A2-L	Y8-S0-A2-L	Y10-S0-A2-L	Y9-S0-A2-N	#0-80	1/8
Y6-S0-A3-L	Y7-S0-A3-L	Y8-S0-A3-L	Y10-S0-A3-L	Y9-S0-A3-N		3/16
Y6-S0-A4-L	Y7-S0-A4-L	Y8-S0-A4-L	Y10-S0-A4-L	Y9-S0-A4-N		1/4
Y6-S0-A5-L	Y7-S0-A5-L	Y8-S0-A5-L	Y10-S0-A5-L	Y9-S0-A5-N		5/16
Y6-S0-A6-L	Y7-S0-A6-L	Y8-S0-A6-L	Y10-S0-A6-L	Y9-S0-A6-N		3/8
Y6-S0-A8-L	Y7-S0-A8-L	Y8-S0-A8-L	Y10-S0-A8-L	Y9-S0-A8-N		1/2

THREAD	STYLE	MATERIAL
#2-56	SELF LOCKING - VIBRATION PROOF FLAT, ROUND, FILLISTER, BINDING AND SOCKET CAP	STAINLESS STEEL TYPE 18-8 WITH NYLON INSERT

LONG-LOCK®				NYLOC®		
FLAT STYLE STOCK NO.	ROUND STYLE STOCK NO.	FILLISTER STYLE STOCK NO.	BINDING STYLE STOCK NO.	SOCKET CAP STYLE STOCK NO.	THREAD	A LENGTH
Y6-S2-A3-L	Y7-S2-A3-L	Y8-S2-A3-L	Y10-S2-A3-L	Y9-S2-A3-N	#2-56	3/16
Y6-S2-A4-L	Y7-S2-A4-L	Y8-S2-A4-L	Y10-S2-A4-L	Y9-S2-A4-N		1/4
Y6-S2-A5-L	Y7-S2-A5-L	Y8-S2-A5-L	Y10-S2-A5-L	Y9-S2-A5-N		5/16
Y6-S2-A6-L	Y7-S2-A6-L	Y8-S2-A6-L	Y10-S2-A6-L	Y9-S2-A6-N		3/8
Y6-S2-A8-L	Y7-S2-A8-L	Y8-S2-A8-L	Y10-S2-A8-L	Y9-S2-A8-N		1/2

THREAD	STYLE	MATERIAL
#4-40	SELF LOCKING - VIBRATION PROOF FLAT, ROUND, FILLISTER, BINDING AND SOCKET CAP	STAINLESS STEEL TYPE 18-8 WITH NYLON INSERT

LONG-LOCK®				NYLOC®	THREAD	A LENGTH
FLAT STYLE STOCK NO.	ROUND STYLE STOCK NO.	FILLISTER STYLE STOCK NO.	BINDING STYLE STOCK NO.	SOCKET CAP STYLE STOCK NO.		
Y6-S4-A3-L	Y7-S4-A3-L	Y8-S4-A3-L	Y10-S4-A3-L	Y9-S4-A3-N	#4-40	3/16
Y6-S4-A4-L	Y7-S4-A4-L	Y8-S4-A4-L	Y10-S4-A4-L	Y9-S4-A4-N		1/4
Y6-S4-A5-L	Y7-S4-A5-L	Y8-S4-A5-L	Y10-S4-A5-L	Y9-S4-A5-N		5/16
Y6-S4-A6-L	Y7-S4-A6-L	Y8-S4-A6-L	Y10-S4-A6-L	Y9-S4-A6-N		3/8
Y6-S4-A8-L	Y7-S4-A8-L	Y8-S4-A8-L	Y10-S4-A8-L	Y9-S4-A8-N		1/2
Y6-S4-A10-L	Y7-S4-A10-L	Y8-S4-A10-L	Y10-S4-A10-L	Y9-S4-A10-N		5/8

THREAD	STYLE	MATERIAL
#6-32	CLASS A SELF LOCKING - VIBRATION PROOF BINDING AND SOCKET CAP	STAINLESS STEEL TYPE 18-8 WITH NYLON INSERT

LONG-LOCK®		NYLOC®		THREAD	LENGTH
BINDING STYLE STOCK NO.	SOCKET CAP STYLE STOCK NO.	BINDING STYLE STOCK NO.			
Y10-S6-A4-L	Y9-S6-A4-N	Y10-S6-A4-N	#6-32	1/4	
Y10-S6-A5-L	Y9-S6-A5-N	Y10-S6-A5-N		5/16	
Y10-S6-A6-L	Y9-S6-A6-N	Y10-S6-A6-N		3/8	
Y10-S6-A8-L	Y9-S6-A8-N	Y10-S6-A8-N		1/2	
Y10-S6-A10-L	Y9-S6-A10-N	Y10-S6-A10-N		5/8	
Y10-S6-A12-L	Y9-S6-A12-N	Y10-S6-A12-N		3/4	

See drawings on page F4

LONG-LOK® & NYLOC® MACHINE SCREWS

THREAD	STYLE	MATERIAL
#8-32	SELF LOCKING - VIBRATION PROOF FLAT, ROUND, FILLISTER, BINDING AND SOCKET CAP	STAINLESS STEEL TYPE 18-8 WITH NYLON INSERT

LONG-LOCK®				NYLOC®	THREAD	A LENGTH
FLAT STYLE STOCK NO.	ROUND STYLE STOCK NO.	FILLISTER STYLE STOCK NO.	BINDING STYLE STOCK NO.	SOCKET CAP STYLE STOCK NO.		
Y6-S8-A4-L	Y7-S8-A4-L	Y8-S8-A4-L	Y10-S8-A4-L	Y9-S8-A4-N	#8-32	1/4
Y6-S8-A5-L	Y7-S8-A5-L	Y8-S8-A5-L	Y10-S8-A5-L	Y9-S8-A5-N		5/16
Y6-S8-A6-L	Y7-S8-A6-L	Y8-S8-A6-L	Y10-S8-A6-L	Y9-S8-A6-N		3/8
Y6-S8-A8-L	Y7-S8-A8-L	Y8-S8-A8-L	Y10-S8-A8-L	Y9-S8-A8-N		1/2
Y6-S8-A10-L	Y7-S8-A10-L	Y8-S8-A10-L	Y10-S8-A10-L	Y9-S8-A10-N		5/8
Y6-S8-A12-L	Y7-S8-A12-L	Y8-S8-A12-L	Y10-S8-A12-L	Y9-S8-A12-N		3/4
Y6-S8-A16-L	Y7-S8-A16-L	Y8-S8-A16-L	Y10-S8-A16-L	Y9-S8-A16-N		1

THREAD	STYLE	MATERIAL
#10-24	SELF LOCKING - VIBRATION PROOF FLAT, ROUND, FILLISTER, BINDING AND SOCKET CAP	STAINLESS STEEL TYPE 18-8 WITH NYLON INSERT

LONG-LOCK®				NYLOC®	THREAD	A LENGTH
FLAT STYLE STOCK NO.	ROUND STYLE STOCK NO.	FILLISTER STYLE STOCK NO.	BINDING STYLE STOCK NO.	SOCKET CAP STYLE STOCK NO.		
Y6-S10-A4-L	Y7-S10-A4-L	Y8-S10-A4-L	Y10-S10-A4-L	Y9-S10-A4-N	#10-24	1/4
Y6-S10-A5-L	Y7-S10-A5-L	Y8-S10-A5-L	Y10-S10-A5-L	Y9-S10-A5-N		5/16
Y6-S10-A6-L	Y7-S10-A6-L	Y8-S10-A6-L	Y10-S10-A6-L	Y9-S10-A6-N		3/8
Y6-S10-A8-L	Y7-S10-A8-L	Y8-S10-A8-L	Y10-S10-A8-L	Y9-S10-A8-N		1/2
Y6-S10-A10-L	Y7-S10-A10-L	Y8-S10-A10-L	Y10-S10-A10-L	Y9-S10-A10-N		5/8
Y6-S10-A12-L	Y7-S10-A12-L	Y8-S10-A12-L	Y10-S10-A12-L	Y9-S10-A12-N		3/4
Y6-S10-A16-L	Y7-S10-A16-L	Y8-S10-A16-L	Y10-S10-A16-L	Y9-S10-A16-N		1

THREAD	STYLE	MATERIAL
#10-32	SELF LOCKING - VIBRATION PROOF FLAT, ROUND, FILLISTER, BINDING AND SOCKET CAP	STAINLESS STEEL TYPE 18-8 WITH NYLON INSERT

LONG-LOCK®				NYLOC®	THREAD	A LENGTH
FLAT STYLE STOCK NO.	ROUND STYLE STOCK NO.	FILLISTER STYLE STOCK NO.	BINDING STYLE STOCK NO.	SOCKET CAP STYLE STOCK NO.		
Y6-S11-A4-L	Y7-S11-A4-L	Y8-S11-A4-L	Y10-S11-A4-L	Y9-S11-A4-N	#10-32	1/4
Y6-S11-A5-L	Y7-S11-A5-L	Y8-S11-A5-L	Y10-S11-A5-L	Y9-S11-A5-N		5/16
Y6-S11-A6-L	Y7-S11-A6-L	Y8-S11-A6-L	Y10-S11-A6-L	Y9-S11-A6-N		3/8
Y6-S11-A8-L	Y7-S11-A8-L	Y8-S11-A8-L	Y10-S11-A8-L	Y9-S11-A8-N		1/2
Y6-S11-A10-L	Y7-S11-A10-L	Y8-S11-A10-L	Y10-S11-A10-L	Y9-S11-A10-N		5/8
Y6-S11-A12-L	Y7-S11-A12-L	Y8-S11-A12-L	Y10-S11-A12-L	Y9-S11-A12-N		3/4
Y6-S11-A16-L	Y7-S11-A16-L	Y8-S11-A16-L	Y10-S11-A16-L	Y9-S11-A16-N		1

THREAD	STYLE	MATERIAL
#1/4-20	SELF LOCKING - VIBRATION PROOF FLAT, ROUND, FILLISTER, BINDING AND SOCKET CAP	STAINLESS STEEL TYPE 18-8 WITH NYLON INSERT

LONG-LOCK®				NYLOC®	THREAD	A LENGTH
FLAT STYLE STOCK NO.	ROUND STYLE STOCK NO.	FILLISTER STYLE STOCK NO.	BINDING STYLE STOCK NO.	SOCKET CAP STYLE STOCK NO.		
Y6-S12-A6-L	Y7-S12-A6-L	Y8-S12-A6-L	Y10-S12-A6-L	Y9-S12-A6-N	1/4-20	3/8
Y6-S12-A8-L	Y7-S12-A8-L	Y8-S12-A8-L	Y10-S12-A8-L	Y9-S12-A8-N		1/2
Y6-S12-A10-L	Y7-S12-A10-L	Y8-S12-A10-L	Y10-S12-A10-L	Y9-S12-A10-N		5/8
Y6-S12-A12-L	Y7-S12-A12-L	Y8-S12-A12-L	Y10-S12-A12-L	Y9-S12-A12-N		3/4
Y6-S12-A16-L	Y7-S12-A16-L	Y8-S12-A16-L	Y10-S12-A16-L	Y9-S12-A16-N		1

See drawings on page F4

F

NYLON MACHINE SCREWS

THREAD	STYLE	MATERIAL
#2-56	FLAT, ROUND, FILLISTER AND PAN	MOLDED NYLON, WHITE

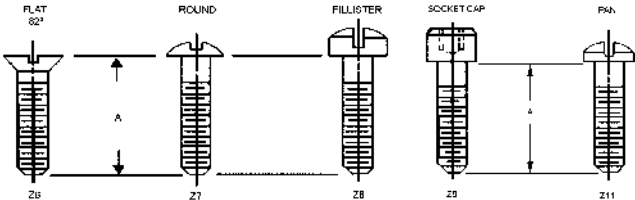
FLAT 82°	ROUND	FILLISTER	PAN	THREAD	LENGTH
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.		
Z6-N2-A2	Z7-N2-A2	Z8-N2-A2	Z11-N2-A2	#2-56	1/8
Z6-N2-A3	Z7-N2-A3	Z8-N2-A3	Z11-N2-A3		3/16
Z6-N2-A4	Z7-N2-A4	Z8-N2-A4	Z11-N2-A4		1/4
Z6-N2-A5	Z7-N2-A5	Z8-N2-A5	Z11-N2-A5		5/16
Z6-N2-A6	Z7-N2-A6	Z8-N2-A6	Z11-N2-A6		3/8
Z6-N2-A8	Z7-N2-A8	Z8-N2-A8	Z11-N2-A8		1/2
Z6-N2-A10	Z7-N2-A10	Z8-N2-A10	Z11-N2-A10		5/8
Z6-N2-A12	Z7-N2-A12	Z8-N2-A12	Z11-N2-A12		3/4

THREAD	STYLE	MATERIAL
#4-40	FLAT, ROUND, FILLISTER, PAN AND SOCKET CAP	MOLDED NYLON, WHITE

FLAT 82°	ROUND	FILLISTER	PAN	SOCKET CAP	THREAD	LENGTH
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.		
Z6-N4-A3	Z7-N4-A3	Z8-N4-A3	Z11-N4-A3	Z9-N4-A3	#4-40	3/16
Z6-N4-A4	Z7-N4-A4	Z8-N4-A4	Z11-N4-A4	Z9-N4-A4		1/4
Z6-N4-A5	Z7-N4-A5	Z8-N4-A5	Z11-N4-A5	Z9-N4-A5		5/16
Z6-N4-A6	Z7-N4-A6	Z8-N4-A6	Z11-N4-A6	Z9-N4-A6		3/8
Z6-N4-A8	Z7-N4-A8	Z8-N4-A8	Z11-N4-A8	Z9-N4-A8		1/2
Z6-N4-A10	Z7-N4-A10	Z8-N4-A10	Z11-N4-A10	Z9-N4-A10		5/8
Z6-N4-A12	Z7-N4-A12	Z8-N4-A12	Z11-N4-A12	Z9-N4-A12		3/4

THREAD	STYLE	MATERIAL
#6-32	FLAT, ROUND, FILLISTER, PAN AND SOCKET CAP	MOLDED NYLON, WHITE

FLAT 82°	ROUND	FILLISTER	PAN	SOCKET CAP	THREAD	LENGTH
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.		
Z6-N6-A4	Z7-N6-A4	Z8-N6-A4	Z11-N6-A4	Z9-N6-A4	#6-32	1/4
Z6-N6-A5	Z7-N6-A5	Z8-N6-A5	Z11-N6-A5	Z9-N6-A5		5/16
Z6-N6-A6	Z7-N6-A6	Z8-N6-A6	Z11-N6-A6	Z9-N6-A6		3/8
Z6-N6-A8	Z7-N6-A8	Z8-N6-A8	Z11-N6-A8	Z9-N6-A8		1/2
-	Z7-N6-A10	Z8-N6-A10	Z11-N6-A10	Z9-N6-A10		5/8
-	Z7-N6-A12	Z8-N6-A12	Z11-N6-A12	Z9-N6-A12		3/4



NYLON MACHINE SCREWS

THREAD	STYLE	MATERIAL
#8-32	FLAT, ROUND, FILLISTER, PAN AND SOCKET CAP	MOLDED NYLON, WHITE

FLAT 82°	ROUND	FILLISTER	PAN	SOCKET CAP	THREAD	A LENGTH
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	#8-32	
Z6-N8-A4	Z7-N8-A4	Z8-N8-A4	Z11-N8-A4	Z9-N8-A4		1/4
Z6-N8-A5	Z7-N8-A5	Z8-N8-A5	Z11-N8-A5	Z9-N8-A5		5/16
Z6-N8-A6	Z7-N8-A6	Z8-N8-A6	Z11-N8-A6	Z9-N8-A6		3/8
Z6-N8-A8	Z7-N8-A8	Z8-N8-A8	Z11-N8-A8	Z9-N8-A8		1/2
Z6-N8-A10	Z7-N8-A10	Z8-N8-A10	Z11-N8-A10	Z9-N8-A10		5/8
Z6-N8-A12	Z7-N8-A12	Z8-N8-A12	Z11-N8-A12	Z9-N8-A12		3/4
Z6-N8-A16	Z7-N8-A16	Z8-N8-A16	Z11-N8-A16	Z9-N8-A16		1

THREAD	STYLE	MATERIAL
#10-24	FLAT, ROUND, FILLISTER, PAN AND SOCKET CAP	MOLDED NYLON, WHITE

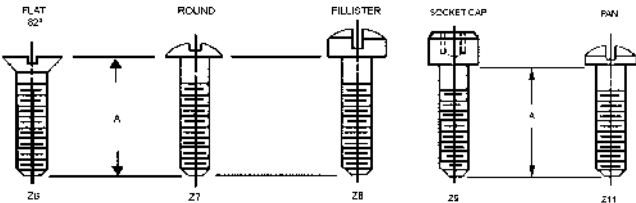
FLAT 82°	ROUND	FILLISTER	PAN	SOCKET CAP	THREAD	A LENGTH
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	#10-24	
Z6-N10-A4	Z7-N10-A4	Z8-N10-A4	Z11-N10-A4	Z9-N10-A4		1/4
Z6-N10-A6	Z7-N10-A6	Z8-N10-A6	Z11-N10-A6	Z9-N10-A6		3/8
Z6-N10-A8	Z7-N10-A8	Z8-N10-A8	Z11-N10-A8	Z9-N10-A8		1/2
Z6-N10-A12	Z7-N10-A12	Z8-N10-A12	Z11-N10-A12	Z9-N10-A12		3/4
Z6-N10-A16	Z7-N10-A16	Z8-N10-A16	Z11-N10-A16	Z9-N10-A16		1

THREAD	STYLE	MATERIAL
#10-32	FLAT, ROUND, FILLISTER, PAN AND SOCKET CAP	MOLDED NYLON, WHITE

FLAT 82°	ROUND	FILLISTER	PAN	SOCKET CAP	THREAD	A LENGTH
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	#10-32	
Z6-N11-A4	Z7-N11-A4	Z8-N11-A4	Z11-N11-A4	Z9-N11-A4		1/4
Z6-N11-A6	Z7-N11-A6	Z8-N11-A6	Z11-N11-A6	Z9-N11-A6		3/8
Z6-N11-A8	Z7-N11-A8	Z8-N11-A8	Z11-N11-A8	Z9-N11-A8		1/2
Z6-N11-A12	Z7-N11-A12	Z8-N11-A12	Z11-N11-A12	Z9-N11-A12		3/4
Z6-N11-A16	Z7-N11-A16	Z8-N11-A16	Z11-N11-A16	Z9-N11-A16		1

THREAD	STYLE	MATERIAL
1/4-20	FLAT, ROUND, FILLISTER, PAN AND SOCKET CAP	MOLDED NYLON, WHITE

FLAT 82°	ROUND	FILLISTER	PAN	SOCKET CAP	THREAD	A LENGTH
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.	1/4-20	
Z6-N12-A4	Z7-N12-A4	Z8-N12-A4	Z11-N12-A4	Z9-N12-A4		1/4
Z6-N12-A6	Z7-N12-A6	Z8-N12-A6	Z11-N12-A6	Z9-N12-A6		3/8
Z6-N12-A8	Z7-N12-A8	Z8-N12-A8	Z11-N12-A8	Z9-N12-A8		1/2
Z6-N12-A12	Z7-N12-A12	Z8-N12-A12	Z11-N12-A12	Z9-N12-A12		3/4
Z6-N12-A16	Z7-N12-A16	Z8-N12-A16	Z11-N12-A16	Z9-N12-A16		1



INTEGRAL SEAL SCREWS

THREAD	STYLE	MATERIAL
#2-56	SLOTTED PAN HEAD	300 SERIES STAINLESS STEEL SCREW WITH SILICONE O RING

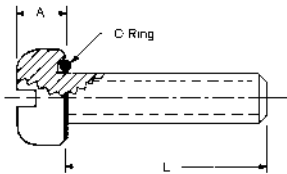
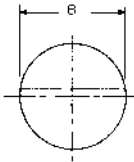
STOCK NO.	THREAD SIZE	LENGTH	A	B	CLEARANCE HOLE	
					MIN.	MAX.
Y18-S2-A4	#2-56	1/4	.055	.168	.091	.095
Y18-S2-A6		3/8				
Y18-S2-A8		1/2				
Y18-S2-A10		5/8				

THREAD	STYLE	MATERIAL
#4-40	SLOTTED PAN HEAD	300 SERIES STAINLESS STEEL SCREW WITH SILICONE O RING

STOCK NO.	THREAD SIZE	LENGTH	A	B	CLEARANCE HOLE	
					MIN.	MAX.
Y18-S4-A4	#4-40	1/4	.069	.220	.125	.129
Y18-S4-A8		1/2				
Y18-S4-A12		3/4				
Y18-S4-A16		1				

THREAD	STYLE	MATERIAL
#6-32	SLOTTED PAN HEAD	300 SERIES STAINLESS STEEL SCREW WITH SILICONE O RING

STOCK NO.	THREAD SIZE	LENGTH	A	B	CLEARANCE HOLE	
					MIN.	MAX.
Y18-S6-A4	#6-32	1/4	.083	.271	.147	.152
Y18-S6-A8		1/2				
Y18-S6-A12		3/4				
Y18-S6-A16		1				



- Reusable
- Clearance holes recommended for maximum sealing
- Maximum temperature range +500°F to -160°F
- Pressure range - up to 6000 psi

INTEGRAL SEAL SCREWS

THREAD	STYLE	MATERIAL
#8-32	SLOTTED PAN HEAD	300 SERIES STAINLESS STEEL SCREW WITH SILICONE O RING

STOCK NO.	THREAD SIZE	LENGTH	A	B	CLEARANCE HOLE	
					MIN.	MAX.
Y18-S8-A4	#8-32	1/4	.097	.323	.173	.179
Y18-S8-A8		1/2				
Y18-S8-A12		3/4				
Y18-S8-A16		1				

THREAD	STYLE	MATERIAL
#10-24	SLOTTED PAN HEAD	300 SERIES STAINLESS STEEL SCREW WITH SILICONE O RING

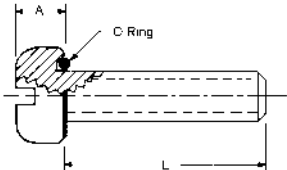
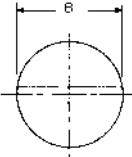
STOCK NO.	THREAD SIZE	LENGTH	A	B	CLEARANCE HOLE	
					MIN.	MAX.
Y18-S10-A6	#10-24	3/8	.113	.374	.199	.204
Y18-S10-A8		1/2				
Y18-S10-A12		3/4				
Y18-S10-A16		1				

THREAD	STYLE	MATERIAL
#10-32	SLOTTED PAN HEAD	300 SERIES STAINLESS STEEL SCREW WITH SILICONE O RING

STOCK NO.	THREAD SIZE	LENGTH	A	B	CLEARANCE HOLE	
					MIN.	MAX.
Y18-S11-A6	#10-32	3/8	.113	.374	.199	.204
Y18-S11-A8		1/2				
Y18-S11-A12		3/4				
Y18-S11-A16		1				

THREAD	STYLE	MATERIAL
1/4-20	SLOTTED PAN HEAD	300 SERIES STAINLESS STEEL SCREW WITH SILICONE O RING

STOCK NO.	THREAD SIZE	LENGTH	A	B	CLEARANCE HOLE	
					MIN.	MAX.
Y18-S12-A6	1/4-20	3/8	.148	.493	.265	.269
Y18-S12-A8		1/2				
Y18-S12-A12		3/4				
Y18-S12-A16		1				
Y18-S12-A20		1-1/4				

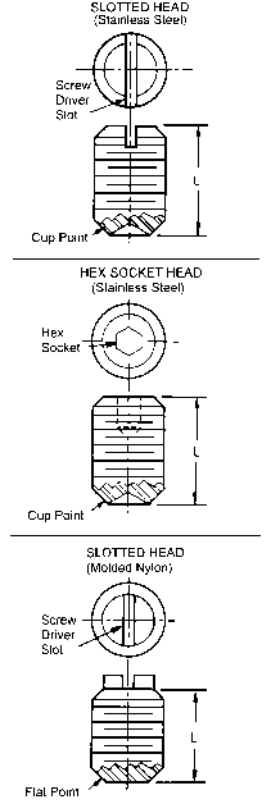


- Reusable
- Clearance holes recommended for maximum sealing
- Maximum temperature range +500°F to -160°F
- Pressure range - up to 6000 psi

SET SCREWS

THREAD	STYLE	MATERIAL
#0-80 TO 3/4-10	SLOTTED HEAD AND HEX SOCKET	STAINLESS STEEL 18-8 AND NYLON (SLOTTED HEAD ONLY)

SLOTTED HEAD	HEX SOCKET HEAD	SLOTTED HEAD	THREAD	L
STAINLESS STEEL	STAINLESS STEEL	NYLON		
STOCK NO.	STOCK NO.	STOCK NO.		
SC1-18	SC2-18	-	#0-80	1/8
SC1-19	SC2-19	-	#0-80	3/16
SC1-50	SC2-50	-	#2-56	3/32
SC1-1	SC2-1	-	#2-56	1/8
SC1-24	SC2-24	SC11-24	#2-56	3/16
-	SC2-25	SC11-25	#2-56	1/4
-	SC2-59	-	#2-64	1/16
SC1-14	SC2-14	-	#2-64	1/8
SC1-51	SC2-51	-	#4-40	3/32
SC1-2	SC2-2	-	#4-40	1/8
-	SC2-27	-	#4-40	3/16
-	SC2-28	SC11-28	#4-40	1/4
-	SC2-15	-	#5-40	3/16
-	SC2-52	-	#6-32	3/32
SC1-3	SC2-3	-	#6-32	1/8
-	SC2-30	SC11-30	#6-32	1/4
-	SC2-31	SC11-31	#6-32	3/8
-	SC2-32	SC11-32	#6-32	1/2
-	SC2-53	-	#8-32	1/8
SC1-4	SC2-4	-	#8-32	3/16
-	SC2-33	SC11-33	#8-32	1/4
SC1-54	-	SC11-54	#8-32	5/16
-	SC2-34	SC11-34	#8-32	3/8
-	SC2-35	SC11-35	#8-32	1/2
-	SC2-36	SC11-36	#8-32	5/8
-	SC2-16	-	#10-24	3/16
-	SC2-62	-	#10-24	1/4
SC1-60	SC2-60	SC11-60	#10-24	5/16
SC1-61	SC2-61	SC11-61	#10-24	3/8
SC1-5	SC2-5	-	#10-32	3/16
-	SC2-37	SC11-37	#10-32	1/4
SC1-55	SC2-55	SC11-55	#10-32	3/8
-	SC2-38	SC11-38	#10-32	1/2
-	SC2-39	-	#10-32	3/4
-	SC2-40	-	#10-32	1
-	SC2-41	SC 11-41	1/4-20	1/4
-	SC2-56	-	1/4-20	5/16
SC1-6	SC2-6	SC11-6	1/4-20	3/8
-	SC2-42	SC11-42	1/4-20	1/2
-	SC2-43	-	1/4-20	3/4
-	SC2-44	-	1/4-20	1
-	SC2-45	-	1/4-20	1-1/4
-	SC2-17	-	1/4-28	5/16
-	SC2-64	-	1/4-28	3/8
SC1-7	SC2-7	-	5/16-18	1/2
-	SC2-65	-	5/16-18	3/4
SC1-8	SC2-8	-	3/8-16	1/2
-	SC2-57	-	3/8-16	3/8
-	SC2-58	-	3/8-16	1/4
-	SC2-66	-	3/8-16	1
SC1-10	SC2-10	-	1/2-13	1/2
SC1-12	SC2-12	-	5/8-11	3/4
SC1-13	SC2-13	-	3/4-10	3/4



See Index for Allen Socket Head Keys.
These parts are sold in packages of 10.

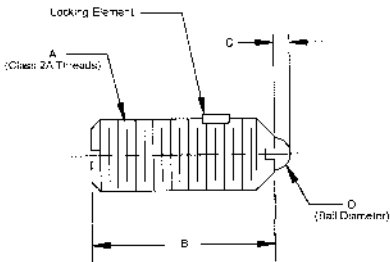


Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-SC2	STAINLESS HEX HEAD SET SCREWS #2 TO 1/4"
KIT-SCA	SET SCREWS - STAINLESS STEEL - CUP POINT AND SOFT TIP #0-80 TO 1/4"

SET SCREWS

THREAD	STYLE	MATERIAL
#4-48 TO 1/4-20	BALL BUTTON	440 STAINLESS STEEL

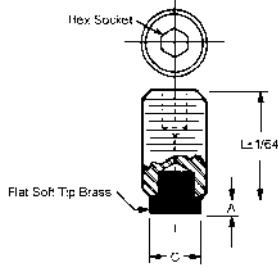
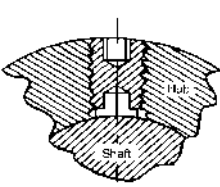


STOCK NO.	END FORCE (lbs.) INITIAL	FINAL	A	B	C	D
SC12-1	1/8	1/2	#4-48	.187	.020	.062
SC12-2	1/4	3/4	#5-40	.250	.020	.062
SC12-3	1/2	1	#6-40	.312	.023	.078
SC12-4	1/2	1-1/4	#8-36	.344	.025	.0937
SC12-5	1/2	1-1/2	#10-32	.513	.025	.0937
SC12-6	3	7	1/4-20	.531	.035	.125

Other materials available on request.

SET SCREWS

THREAD	STYLE	MATERIAL
#2-56 TO 3/8-16	BRASS SOFT TIP HEX SOCKET	STAINLESS STEEL AND HEAT TREATED ALLOY STEEL



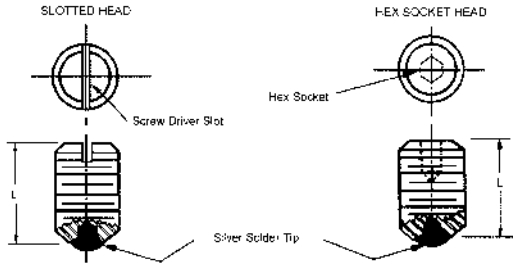
STOCK NO.	THREAD	L	C	A	MATERIAL
SC10-30 SC10-31	#2-56 UNC-2A	1/8 1/4	1/32	1/32	303 STAINLESS STEEL
SC10-32 SC10-33 SC10-34	#4-40 UNC-2A	1/8 1/4 3/8	1/16	1/32	
SC10-35 SC10-36 SC10-37	#6-32 UNC-2A	1/8 1/4 3/8	1/16	1/32	
SC10-38 SC10-39 SC10-40	#8-32 UNC-2A	3/16 1/4 3/8	3/32	3/64	
SC10-41	#10-24 / UNC-2A	1/4	1/8	3/64	
SC10-1 SC10-2 SC10-3	#10-32 UNF-2A	1/4 3/8 1/2	1/8	3/64	ALLOY STEEL BLACK OXIDE FINISH ROCKWELL C48-52
SC10-4 SC10-5 SC10-6 SC10-7 SC10-8 SC10-10	1/4-20 UNC-2A	3/16 1/4 5/16 3/8 1/2 3/4	1/8	3/64	
SC10-12 SC10-14 SC10-15 SC10-16	5/16-18 UNC-2A	1/4 3/8 1/2 5/8	3/16	3/64	
SC10-21 SC10-22 SC10-24	3/8-16 UNC-2A	3/8 1/2 3/4	3/16	3/64	

- Non marring
- Self locking
- Also used as position adjustment screw
- Screws may be used over and over
- Conforms to shaft surface for positive grip

Length is exclusive of brass tip.

SET SCREWS

THREAD	STYLE	MATERIAL
#2-56 TO 3/4-10	SILVER SOLDER TIP SLOTTED HEAD AND HEX SOCKET	STAINLESS STEEL TYPE 18-8



SLOTTED HEAD STOCK NO.	HEX SOCKET HEAD STOCK NO.	SCREW SIZE	L LENGTH
-	SC6-1	#2-56	1/8
-	SC6-2	#4-40	1/8
-	SC6-28	#4-40	1/4
SC5-3	SC6-3	#6-32	1/8
SC5-30	SC6-30	#6-32	1/4
SC5-4	SC6-4	#8-32	3/16
SC5-34	SC6-34	#8-32	3/8
SC5-61	SC6-61	#10-24	3/8
SC5-5	SC6-5	#10-32	3/16
SC5-55	SC6-55	#10-32	3/8
SC5-41	SC6-41	1/4-20	1/4
SC5-6	SC6-6	1/4-20	3/8
-	SC6-64	1/4-28	3/8
SC5-7	SC6-7	5/16-18	1/2
-	SC6-65	5/16-18	3/4
SC5-8	SC6-8	3/8-16	1/2
-	SC6-66	3/8-16	1
SC5-10	SC6-10	1/2-13	1/2
SC5-12	SC6-12	5/8-11	3/4
SC5-13	SC6-13	3/4-10	3/4

- Also used as position adjustment screw
- Conforms to shaft surface for positive grip
- Non marring
- Self locking

Special sizes are available on request.

Length is exclusive of silver tip.

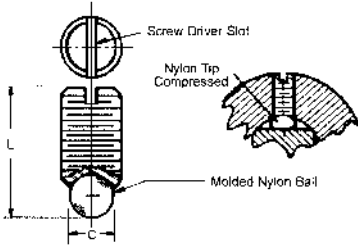
Also available

SLOTTED HEAD KIT ASSORTMENT (IN LUCITE BOX)		
STOCK NO.	SCREW RANGE	NO. OF PIECES
SC5-B	#6-32 TO 1/4-20	60
SC5-C	#10 TO 3/8-16	60

SLOTTED HEAD KIT ASSORTMENT (IN LUCITE BOX)		
STOCK NO.	SCREW RANGE	NO. OF PIECES
SC6-A	#4-40 TO #8-32	60
SC6-B	#8-32 TO 1/4-20	60
SC6-C	1/4-20 TO 3/8-16	60

SET SCREWS

THREAD	STYLE	MATERIAL
#2-56 TO 1/2-13	SOFT TIP SLOTTED HEAD	STAINLESS STEEL TYPE 18-8 WITH NYLON TIP

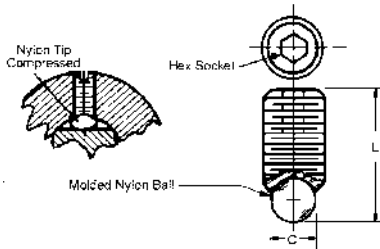


SLOTTED HEAD			
STOCK NO.	THREAD	L	C
SC3-1	#2-56	5/32	1/16
SC3-2	#4-40	11/64	1/16
SC3-3	#6-32	11/64	1/16
SC3-4	#8-32	17/64	3/32
SC3-5	#10-32	17/64	3/32
SC3-6	1/4-20	15/32	1/8
SC3-7	5/16-18	19/32	1/8
SC3-8	3/8-16	5/8	3/16
SC3-10	1/2-13	11/16	1/4



- Will not damage shafts
- Nylon compresses to make full face contact with surface

THREAD	STYLE	MATERIAL
#2-56 TO 1/2-13	SOFT TIP HEX SOCKET HEAD	STAINLESS STEEL TYPE 18-8 WITH NYLON TIP



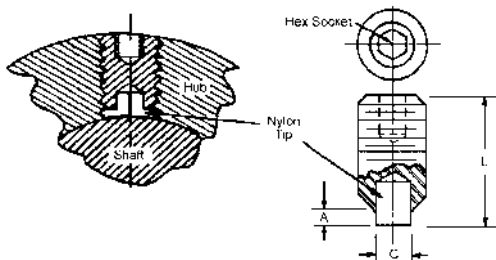
HEX SLOTTED HEAD			
STOCK NO.	THREAD	L	C
SC4-1	#2-56	5/32	1/16
SC4-2	#4-40	11/64	1/16
SC4-3	#6-32	11/64	1/16
SC4-4	#8-32	17/64	3/32
SC4-5	#10-32	17/64	3/32
SC4-6	1/4-20	15/32	1/8
SC4-7	5/16-18	19/32	1/8
SC4-8	3/8-16	5/8	3/16
SC4-10	1/2-13	11/16	1/4



- Will not damage shafts
- Nylon compresses to make full face contact with surface

SET SCREWS

THREAD	STYLE	MATERIAL
#2-56 TO 1/2-13	SOFT TIP HEX SOCKET HEAD	STAINLESS STEEL TYPE 18-8 WITH NYLON TIP



STOCK NO.	THREAD	L	C	A
SC8-1 SC8-2	#2-56	5/32 9/32	1/32	1/32
SC8-5 SC8-32	#4-40	5/32 9/32	1/32	1/32
SC8-6	#4-40	13/32 13/32	1/16	1/32
SC8-7 SC8-8	#5-40	5/32 3/8	1/16	1/32
SC8-17 SC8-9 SC8-29 SC8-10 SC8-34	#6-32	5/32 7/32 9/32 5/16 17/32	1/16	1/32
SC8-11 SC8-12 SC8-35	#8-32	15/64 27/64 43/64	3/32	3/64
SC8-30	#8-32	15/32	3/32	3/32
SC8-19 SC8-20	#10-24	15/64 27/64	3/32	3/64
SC8-13 SC8-14 SC8-21 SC8-36	#10-32	15/64 19/64 27/64 43/64	3/32	3/64
SC8-15 SC8-22 SC8-16 SC8-37 SC8-38	1/4-20	5/16 7/16 9/16 13/16 1-1/16	1/8	1/16
SC8-23	1/4-28	7/16	1/8	1/16
SC8-24 SC8-39 SC8-40	5/16-18	19/32 27/32 1-3/32	3/16	3/32
SC8-25 SC8-41 SC8-42	3/8-16	19/32 27/32 1-3/32	3/16	3/32
SC8-26 SC8-43	1/2-13	3/4 1-1/8	1/4	1/8

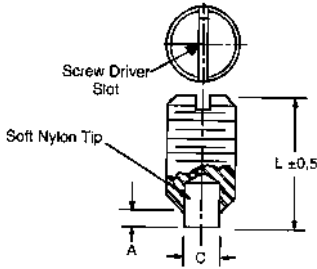
- Self locking
- Extra holding power from full face control
- Will not mar or damage shaft
- Nylon "soft tip" conforms to shape of shaft

Also available

STOCK NO.	DESCRIPTION OF KIT	NO. OF PARTS
KITSC8-A	SOFT TIP SET SCREW KIT #2-56 TO #10	90 PIECES
KIT-SC8-B	SOFT TIP SET SCREW #10-24 TO 1/2-13	60 PIECES

SET SCREWS

THREAD	STYLE	MATERIAL
#2-56 TO 1/4-20	SOFT TIP SLOTTED HEAD	STAINLESS STEEL TYPE 18-8 WITH NYLON TIP



STOCK NO.	THREAD	L	C	A
SC7-1	#2-56	5/32	1/32	1/32
SC7-5	#4-40	5/32	1/16	
SC7-17	#6-32	5/32	1/16	
SC7-11	#8-32	15/64	3/32	3/64
SC7-19	#10-24	15/64	3/32	3/64
SC7-13	#10-32	15/64	3/32	3/64
SC7-15	1/4-20	5/16	1/8	1/16

- Self locking
- Non marring
- Also used as position adjustment screw
- Screw may be used over and over
- Conforms to shaft surface for positive grip

SHOULDER SCREWS

THREAD	STYLE	MATERIAL
#4-40 UNC-2A	SLOTTED HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

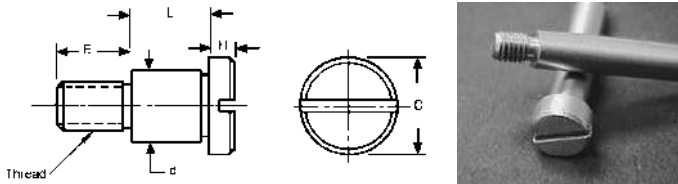
416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E
STOCK NO.	STOCK NO.						
PL-1 PL-2 PL-3 PL-4 PL-5	PL-1-3 PL-2-3 PL-3-3 PL-4-3 PL-5-3	#4-40 UNC-2A	.1245	.1255 .1880 .2505 .3130 .3755	1/4	1/8	5/32

THREAD	STYLE	MATERIAL
#8-32 UNC-2A	SLOTTED HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E
STOCK NO.	STOCK NO.						
PL-6 PL-7 PL-8 PL-9 PL-10 PL-11 PL-12 PL-13 PL-14 PL-15 PL-16	PL-6-3 PL-7-3 PL-8-3 PL-9-3 PL-10-3 PL-11-3 PL-12-3 PL-13-3 PL-14-3 PL-15-3 PL-16-3	#8-32 UNC-2A	.1870	.1255 .1880 .2505 .3130 .3755 .5005 .6255 .7505 1.0005 1.2605 1.5005	5/16	5/32	3/16

THREAD	STYLE	MATERIAL
#10-32 UNC-2A	SLOTTED HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E
STOCK NO.	STOCK NO.						
PL-17 PL-18 PL-19 PL-20 PL-21 PL-22 PL-23 PL-24 PL-25 PL-26 PL-27	PL-17-3 PL-18-3 PL-19-3 PL-20-3 PL-21-3 PL-22-3 PL-23-3 PL-24-3 PL-25-3 PL-26-3 PL-27-3	#10-32 UNF-2A	.2495	.1255 .1880 .2505 .3130 .3755 .5005 .6255 .7505 1.0005 1.2505 1.5005	3/8	3/16	1/4



SHOULDER SCREWS

THREAD	STYLE	MATERIAL
1/4-20 UNC-2A	SLOTTED HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d +.000 -.001	L +.002 -.000	D	H	E
STOCK NO.	STOCK NO.						
PL-28 PL-29 PL-30 PL-31 PL-32 PL-33	PL-28-3 PL-29-3 PL-30-3 PL-31-3 PL-32-3 PL-33-3	1/4-20 UNC-2A	.3120	.2505 .3130 .3755 .5005 .6255 .7505	1/2	7/32	7/16

THREAD	STYLE	MATERIAL
1/4-20 UNC-2A	SLOTTED HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d +.000 -.001	L +.002 -.000	D	H	E
STOCK NO.	STOCK NO.						
PL-34 PL-35 PL-36 PL-37	PL-34-3 PL-35-3 PL-36-3 PL-37-3	1/4-20 UNC-2A	.3745	.3130 .3755 .5005 .6255	1/2	7/32	7/16

THREAD	STYLE	MATERIAL
5/16-18 UNC-2A	SLOTTED HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d +.000 -.001	L +.002 -.000	D	H	E
STOCK NO.	STOCK NO.						
PL-38 PL-39 PL-40 PL-41	PL-38-3 PL-39-3 PL-40-3 PL-41-3	5/16-18 UNC-2A	.3745	.3130 .3755 .5005 .6255	9/16	1/4	1/2

THREAD	STYLE	MATERIAL
3/8-16 UNC-2A	SLOTTED HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d +.000 -.001	L +.002 -.000	D	H	E
STOCK NO.	STOCK NO.						
PL-42 PL-43 PL-44 PL-45	PL-42-3 PL-43-3 PL-44-3 PL-45-3	3/8-16 UNC-2A	.4995	.5005 .6255 .7505 1.0005	3/4	5/16	5/8

Drawing on previous page.

SHOULDER SCREWS

THREAD	STYLE	MATERIAL
#4-40 UNC-2A	HEX SOCKET HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

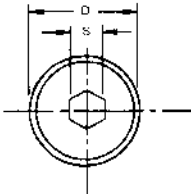
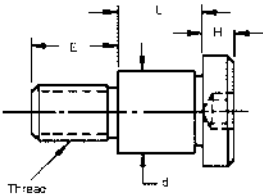
416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E	S
STOCK NO.	STOCK NO.							
PZ-1 PZ-2 PZ-3 PZ-4 PZ-5	PZ-1-3 PZ-2-3 PZ-3-3 PZ-4-3 PZ-5-3	#4-40 UNC-2A	.1245	.1255 .1880 .2505 .3130 .3755	1/4	1/8	5/32	5/64

THREAD	STYLE	MATERIAL
#8-32 UNC-2A	HEX SOCKET HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E	S
STOCK NO.	STOCK NO.							
PZ-6 PZ-7 PZ-8 PZ-9 PZ-10 PZ-11 PZ-12 PZ-13 PZ-14 PZ-15 PZ-16	PZ-6-3 PZ-7-3 PZ-8-3 PZ-9-3 PZ-10-3 PZ-11-3 PZ-12-3 PZ-13-3 PZ-14-3 PZ-15-3 PZ-16-3	#8-32 UNC-2A	.1870	.1255 .1880 .2505 .3130 .3755 .5005 .6255 .7505 1.0005 1.2505 1.5005	5/16	5/32	3/16	3/32

THREAD	STYLE	MATERIAL
#10-32 UNC-2A	HEX SOCKET HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E	S
STOCK NO.	STOCK NO.							
PZ-17 PZ-18 PZ-19 PZ-20 PZ-21 PZ-22 PZ-23 PZ-24 PZ-25 PZ-26 PZ-27	PZ-17-3 PZ-18-3 PZ-19-3 PZ-20-3 PZ-21-3 PZ-22-3 PZ-23-3 PZ-24-3 PZ-25-3 PZ-26-3 PZ-27-3	#10-32 UNF-2A	.2495	.1255 .1880 .2505 .3130 .3755 .5005 .6255 .7505 1.0005 1.2505 1.5005	3/8	3/16	1/4	1/8



SHOULDER SCREWS

THREAD	STYLE	MATERIAL							
1/4-20 UNC-2A	HEX SOCKET HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36							

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E	S
STOCK NO.	STOCK NO.							
PZ-28 PZ-29 PZ-30 PZ-31 PZ-32 PZ-33	PZ-28-3 PZ-29-3 PZ-30-3 PZ-31-3 PZ-32-3 PZ-33-3	1/4-20 UNC-2A	.3120	.2505 .3130 .3755 .5005 .6255 .7505	1/2	7/32	7/16	5/32

THREAD	STYLE	MATERIAL							
1/4-20 UNC-2A	HEX SOCKET HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36							

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E	S
STOCK NO.	STOCK NO.							
PZ-34 PZ-35 PZ-36 PZ-37	PZ-34-3 PZ-35-3 PZ-36-3 PZ-37-3	1/4-20 UNC-2A	.3745	.3130 .3755 .5005 .6255	1/2	7/32	7/16	5/32

THREAD	STYLE	MATERIAL							
5/16-18 UNC-2A	HEX SOCKET HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36							

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E	S
STOCK NO.	STOCK NO.							
PZ-38 PZ-39 PZ-40 PZ-41	PZ-38-3 PZ-39-3 PZ-40-3 PZ-41-3	5/16-18 UNC-2A	.3745	.3130 .3755 .5005 .6255	9/16	1/4	1/2	3/16

THREAD	STYLE	MATERIAL							
3/8-16 UNC-2A	HEX SOCKET HEAD	303 STAINLESS STEEL AND 416 STAINLESS STEEL HARDENED RC 26-36							

416 STAINLESS STEEL HARDENED RC 26-36	303 STAINLESS STEEL	THREAD	d + .000 - .001	L + .002 - .000	D	H	E	S
STOCK NO.	STOCK NO.							
PZ-42 PZ-43 PZ-44 PZ-45	PZ-42-3 PZ-43-3 PZ-44-3 PZ-45-3	3/8-16 UNC-2A	.4995	.5005 .6255 .7505 1.0005	3/4	5/16	5/8	1/4

Drawing on previous page. See index for hex wrenches.

PRECISION CAPTIVE SCREWS

THREAD	STYLE	MATERIAL
#4-40 TO 10-32 UNC-2A	SLOTTED HEAD	303 STAINLESS STEEL

SLOTTED HEAD STOCK NO.	L	M	H	E	D	THREAD UN-2A
Z12-1	.281	.187	1/8	.072	1/4	#4-40
Z12-2	.343	.187	1/8	.072	1/4	#4-40
Z12-3	.312	.218	1/8	.086	9/32	#6-32
Z12-4	.375	.218	1/8	.086	9/32	#6-32
Z12-5	.437	.218	1/8	.086	9/32	#6-32
Z12-6	.406	.250	5/32	.114	5/16	#8-32
Z12-7	.468	.250	5/32	.114	5/16	#8-32
Z12-8	.531	.250	5/32	.114	5/16	#8-32
Z12-9	.531	.312	3/16	.136	3/8	#10-32
Z12-10	.593	.312	3/16	.136	3/8	#10-32

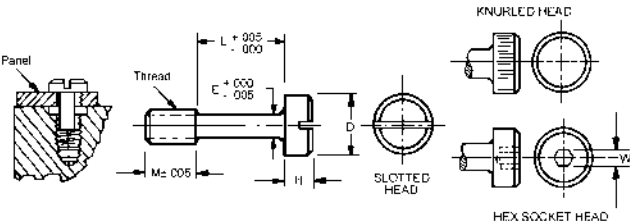
THREAD	STYLE	MATERIAL
#4-40 TO 10-32 UNC-2A	HEX SOCKET HEAD	303 STAINLESS STEEL

HEX SOCKET HEAD STOCK NO.	L	M	H	E	D	THREAD UN-2A	W
Z12-1-H	.281	.187	1/8	.072	1/4	#4-40	5/64
Z12-2-H	.343	.187	1/8	.072	1/4	#4-40	5/64
Z12-3-H	.312	.218	1/8	.086	9/32	#6-32	5/64
Z12-4-H	.375	.218	1/8	.086	9/32	#6-32	5/64
Z12-5-H	.437	.218	1/8	.086	9/32	#6-32	5/64
Z12-6-H	.406	.250	5/32	.114	5/16	#8-32	3/32
Z12-7-H	.468	.250	5/32	.114	5/16	#8-32	3/32
Z12-8-H	.531	.250	5/32	.114	5/16	#8-32	3/32
Z12-9-H	.531	.312	3/16	.136	3/8	#10-32	1/8
Z12-10-H	.593	.312	3/16	.136	3/8	#10-32	1/8

See index for hex wrenches.

THREAD	STYLE	MATERIAL
#4-40 TO 10-32 UNC-2A	KNURLED HEAD	303 STAINLESS STEEL

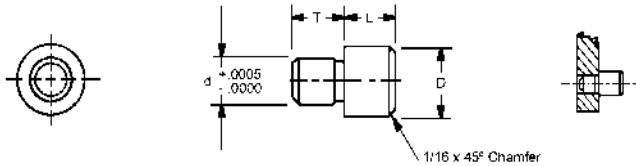
KNURLED HEAD STOCK NO.	L	M	H	E	D	THREAD UN-2A
Z12-1-K	.281	.187	1/8	.072	1/4	#4-40
Z12-2-K	.343	.187	1/8	.072	1/4	#4-40
Z12-3-K	.312	.218	1/8	.086	9/32	#6-32
Z12-4-K	.375	.218	1/8	.086	9/32	#6-32
Z12-5-K	.437	.218	1/8	.086	9/32	#6-32
Z12-6-K	.406	.250	5/32	.114	5/16	#8-32
Z12-7-K	.468	.250	5/32	.114	5/16	#8-32
Z12-8-K	.531	.250	5/32	.114	5/16	#8-32
Z12-9-K	.531	.312	3/16	.136	3/8	#10-32
Z12-10-K	.593	.312	3/16	.136	3/8	#10-32



PRECISION JIG BUTTONS

MATERIAL

**416 STAINLESS STEEL
HARDENED ROCKWELL C28-32**



STOCK NO.	L	T	D	d
PM-1	1/4	1/4	3/8	.1875
PM-2	3/8	1/4	3/8	.1875
PM-3	1/2	1/4	3/8	.1875
PM-4	1/4	5/16	1/2	.2500
PM-5	3/8	5/16	1/2	.2500
PM-6	1/2	5/16	1/2	.3125
PM-7	3/4	5/16	1/2	.3125
PM-8	1	5/16	1/2	.3125

THUMB SCREWS

THREAD	STYLE	MATERIAL
#4-40 UNC-2A	PLASTIC HEAD, KNURLED	303 STAINLESS STEEL WITH BLACK PLASTIC HEAD

STOCK NO.	THREAD	A	B	C	D	L
PQC-1 PQC-2 PQC-3 PQC-4 PQC-5	#4-40 UNC-2A	5/16	11/64	9/32	.112	1/4 5/16 3/8 1/2 5/8

THREAD	STYLE	MATERIAL
#6-32 UNC-2A	PLASTIC HEAD, KNURLED	303 STAINLESS STEEL WITH BLACK PLASTIC HEAD

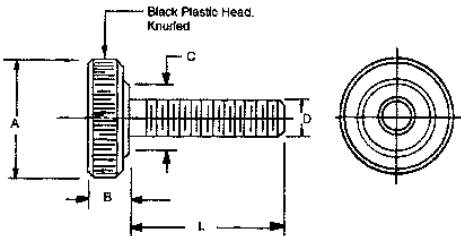
STOCK NO.	THREAD	A	B	C	D	L
PQC-6 PQC-7 PQC-8 PQC-9 PQC-10	#6-32 UNC-2A	3/8	3/16	21/64	.138	5/16 3/8 1/2 5/8 3/4

THREAD	STYLE	MATERIAL
#8-32 UNC-2A	PLASTIC HEAD, KNURLED	303 STAINLESS STEEL WITH BLACK PLASTIC HEAD

STOCK NO.	THREAD	A	B	C	D	L
PQC-11 PQC-12 PQC-13 PQC-14 PQC-15	#8-32 UNC-2A	1/2	7/32	3/8	.164	3/8 1/2 5/8 3/4 1

THREAD	STYLE	MATERIAL
#10-24 UNC-2A	PLASTIC HEAD, KNURLED	303 STAINLESS STEEL WITH BLACK PLASTIC HEAD

STOCK NO.	THREAD	A	B	C	D	L
PQC-16 PQC-17 PQC-18 PQC-19 PQC-20	#10-24 UNC-2A	5/8	1/4	27/64	.190	3/8 1/2 5/8 3/4 1



Other sizes, special lengths and non-stainless screws available on request.

THUMB SCREWS

THREAD	STYLE	MATERIAL
10-32 UNF-2A	PLASTIC HEAD, KNURLED	303 STAINLESS STEEL WITH BLACK PLASTIC HEAD

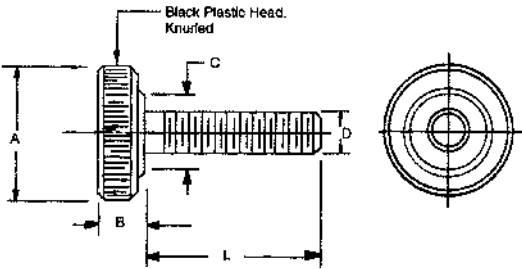
STOCK NO.	THREAD	A	B	C	D	L
PQC-21 PQC-22 PQC-23 PQC-24 PQC-25	#10-32 UNF-2A	5/8	1/4	27/64	.190	3/8 1/2 5/8 3/4 1

THREAD	STYLE	MATERIAL
1/4-20 UNC-2A	PLASTIC HEAD, KNURLED	303 STAINLESS STEEL WITH BLACK PLASTIC HEAD

STOCK NO.	THREAD	A	B	C	D	L
PQC-26 PQC-27 PQC-28 PQC-29 PQC-30	#1/4-20 UNC-2A	3/4	5/16	1/2	.250	3/8 1/2 5/8 3/4 1

THREAD	STYLE	MATERIAL
1/4-20 UNC-2A	PLASTIC HEAD, KNURLED	303 STAINLESS STEEL WITH BLACK PLASTIC HEAD

STOCK NO.	THREAD	A	B	C	D	L
PQC-31 PQC-32 PQC-33 PQC-34 PQC-35	#1/4-20 UNC-2A	1	5/16	1/2	.250	3/8 1/2 5/8 3/4 1



Other sizes, special lengths and non-stainless screws available on request.

THUMB SCREWS

THREAD	STYLE	MATERIAL
#4-40 UNC-2A	STAINLESS STEEL, KNURLED	303 STAINLESS STEEL OR 416 STAINLESS STEEL HARDENED RC 26-32

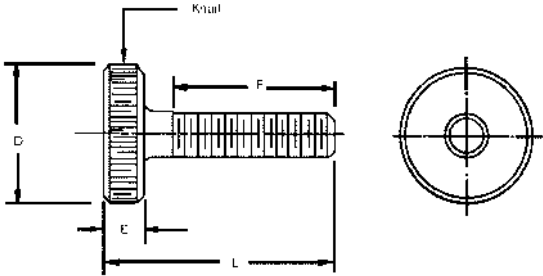
416 STAINLESS STEEL STOCK NO.	303 STAINLESS STEEL STOCK NO.	THREAD	D	L	F	E
PQ-1	PQ-1-3	#4-40 UNC-2A	1/4	1/2	5/16	1/8
PQ-2	PQ-2-3		1/4	1	7/16	1/2
PQ-3	PQ-3-3		1/4	1-1/4	5/8	1/2
PQ-4	-	#4-40 UNC-2A	3/8	1/2	5/16	1/8
-	PQ-4-3		3/8	1/2	5/16	1/8
PQ-5	PQ-5-3		3/8	5/8	7/16	1/8

THREAD	STYLE	MATERIAL
#6-32 UNC-2A	STAINLESS STEEL, KNURLED	303 STAINLESS STEEL OR 416 STAINLESS STEEL HARDENED RC 26-32

416 STAINLESS STEEL STOCK NO.	303 STAINLESS STEEL STOCK NO.	THREAD	D	L	F	E
PQ-6	PQ-6-3	#6-32 UNC-2A	1/4	1	7/16	1/2
PQ-7	PQ-7-3		1/4	1-1/4	5/8	1/2
PQ-8	PQ-8-3		1/4	1-1/2	13/16	1/2
PQ-9	PQ-9-3	#6-32 UNC-2A	3/8	1/2	5/16	1/8
PQ-10	PQ-10-3		3/8	5/8	3/8	1/8

THREAD	STYLE	MATERIAL
#8-32 UNC-2A	STAINLESS STEEL, KNURLED	303 STAINLESS STEEL OR 416 STAINLESS STEEL HARDENED RC 26-32

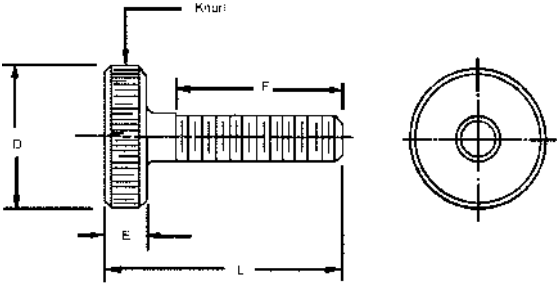
416 STAINLESS STEEL STOCK NO.	303 STAINLESS STEEL STOCK NO.	THREAD	D	L	F	E
PQ-11	PQ-11-3	#8-32 UNC-2A	1/4	1	7/16	1/2
PQ-12	PQ-12-3		1/4	1-1/4	5/8	1/2
PQ-13	PQ-13-3		1/4	1-1/2	13/16	1/2
PQ-14	PQ-14-3	#8-32 UNC-2A	3/8	1/2	5/16	1/8
PQ-15	PQ-15-3		3/8	5/8	3/8	1/8



THUMB SCREWS

THREAD	STYLE	MATERIAL
#10-24 UNC-2A	STAINLESS STEEL, KNURLED	303 STAINLESS STEEL OR 416 STAINLESS STEEL HARDENED RC 26-32

416 STAINLESS STEEL STOCK NO.	303 STAINLESS STEEL STOCK NO.	THREAD	D	L	F	E
PQ-16	PQ-16-3	#10-24 UNC-2A	3/8	11/16	7/16	3/16
PQ-17	PQ-17-3		3/8	15/16	5/8	3/16
PQ-18	PQ-18-3		3/8	1-3/16	13/16	3/16
PQ-19	PQ-19-3		3/8	1-7/16	1	3/16
PQ-20	PQ-20-3	#10-24 UNC-2A	1/2	15/16	5/8	3/16
PQ-21	PQ-21-3		1/2	1-3/16	13/16	3/16
PQ-22	PQ-22-3		1/2	1-7/16	1	3/16
PQ-23	PQ-23-3		1/2	1-11/16	1-1/4	3/16
PQ-24	PQ-24-3	#10-24 UNC-2A	3/4	15/16	5/8	3/16
PQ-25	PQ-25-3		3/4	1-3/16	13/16	3/16
PQ-26	PQ-26-3		3/4	1-7/16	1	3/16
PQ-27	PQ-27-3		3/4	1-11/16	1-1/4	3/16



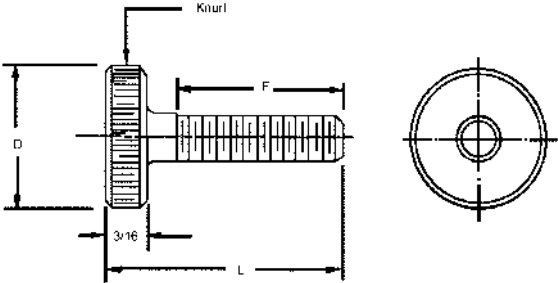
THUMB SCREWS

THREAD	STYLE	MATERIAL
#10-32 UNF-2A	STAINLESS STEEL, KNURLED	303 STAINLESS STEEL OR 416 STAINLESS STEEL HARDENED RC 26-32

416 STAINLESS STEEL STOCK NO.	303 STAINLESS STEEL STOCK NO.	THREAD	D	L	F
PQ-28 PQ-29 PQ-30 PQ-31	PQ-28-3 PQ-29-3 PQ-30-3 PQ-31-3	#10-32 UNF-2A	3/8	11/16 15/16 1-3/16 1-7/16	7/16 5/8 13/16 1
PQ-32 PQ-33 PQ-34 PQ-35	PQ-32-3 PQ-33-3 PQ-34-3 PQ-35-3	#10-32 UNF-2A	1/2	15/16 1-3/16 1-7/16 1-11/16	5/8 13/16 1 1-1/4
PQ-36 PQ-37 PQ-38 PQ-39	PQ-36-3 PQ-37-3 PQ-38-3 PQ-39-3	#10-32 UNF-2A	3/4	15/16 1-3/16 1-7/16 1-11/16	5/8 13/16 1 1-1/4

THREAD	STYLE	MATERIAL
#1/4-20 UNC-2A	STAINLESS STEEL, KNURLED	303 STAINLESS STEEL OR 416 STAINLESS STEEL HARDENED RC 26-32

416 STAINLESS STEEL STOCK NO.	303 STAINLESS STEEL STOCK NO.	THREAD	D	L	F
PQ-40 PQ-41 PQ-42 PQ-43 PQ-44	PQ-40-3 PQ-41-3 PQ-42-3 PQ-43-3 PQ-44-3	1/4-20 UNC-2A	3/4	15/16 1-3/16 1-7/16 1-11/16 2-3/16	5/8 13/16 1 1-1/4 1-5/8
PQ-45 PQ-46 PQ-47 PQ-48 PQ-49	PQ-45-3 PQ-46-3 PQ-47-3 PQ-48-3 PQ-49-3	1/4-20 UNC-2A	1	15/16 1-3/16 1-7/16 1-11/16 2-3/16	5/8 13/16 1 1-1/4 1-5/8



THUMB SCREWS

THREAD	STYLE	MATERIAL
#4-40 UNC-2A	STAINLESS STEEL, KNURLED SOCKET HEAD	303 STAINLESS STEEL

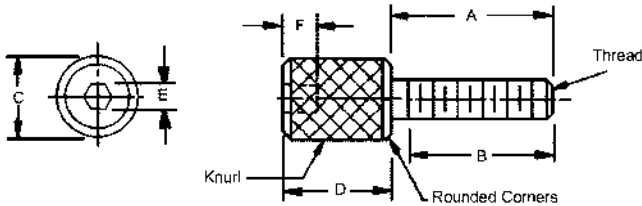
STOCK NO.	THREAD	A	C	D	B	E	F
PQH-1 PQH-2	#4-40 UNC-2A	1/2 3/4	1/4	1/2	7/16 5/8	5/64	1/16
PQH-3 PQH-4	#4-40 UNC-2A	1/2 3/4	5/16	1/2	7/16 5/8	3/32	5/64
PQH-5 PQH-6	#4-40 UNC-2A	3/8 1/2	3/8	1/2	5/16 7/16	1/8	3/32

THREAD	STYLE	MATERIAL
#6-32 UNC-2A	STAINLESS STEEL, KNURLED SOCKET HEAD	303 STAINLESS STEEL

STOCK NO.	THREAD	A	C	D	B	E	F
PQH-7 PQH-8 PQH-9	#6-32 UNC-2A	1/2 3/4 1	1/4	1/2	7/16 5/8 13/16	5/64	1/16
PQH-10 PQH-11 PQH-12	#6-32 UNC-2A	1/2 3/4 1	5/16	1/2	7/16 5/8 13/16	3/32	5/64
PQH-13 PQH-14	#6-32 UNC-2A	3/8 1/2	3/8	1/2	5/16 3/8	1/8	3/32

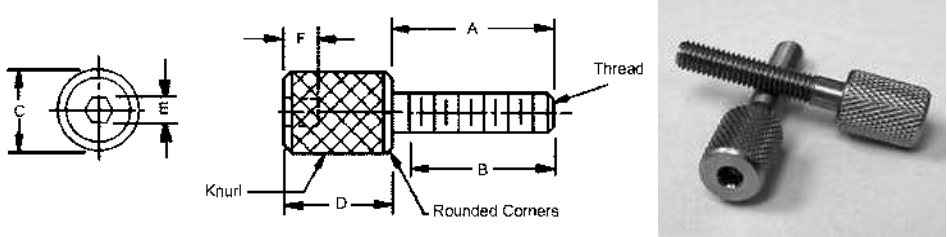
THREAD	STYLE	MATERIAL
#8-32 UNC-2A	STAINLESS STEEL, KNURLED SOCKET HEAD	303 STAINLESS STEEL

STOCK NO.	THREAD	A	C	D	B	E	F
PQH-15 PQH-16 PQH-17	#8-32 UNC-2A	1/2 3/4 1	1/4	1/2	7/16 5/8 13/16	5/64	1/16
PQH-18 PQH-19 PQH-20	#8-32 UNC-2A	1/2 3/4 1	5/16	1/2	7/16 5/8 13/16	3/32	5/64
PQH-21 PQH-22	#8-32 UNC-2A	3/8 1/2	3/8	1/2	5/16 3/8	1/8	3/32



THUMB SCREWS

THREAD	STYLE	MATERIAL
#10-24 UNC-2A #10-32 UNF-2A	STAINLESS STEEL, KNURLED SOCKET HEAD	303 STAINLESS STEEL OR 416 STAINLESS STEEL HARDENED RC 26-32



STOCK NO.	THREAD	A	C	D	B	E	F
PQH-23 PQH-24 PQH-25 PQH-26	#10-24 UNC-2A	1/2 3/4 1 1-1/4	5/16	3/16	7/16 5/8 13/16 1	3/32	5/64
PQH-27 PQH-28 PQH-29 PQH-30	#10-24 UNC-2A	1/2 3/4 1 1-1/4	3/8	1/2	7/16 5/8 13/16 1	1/8	3/32
PQH-31 PQH-32 PQH-33 PQH-34	#10-32 UNF-2A	1/2 3/4 1 1-1/4	5/16	3/16	7/16 5/8 13/16 1	3/32	5/64
PQH-35 PQH-36 PQH-37 PQH-38	#10-32 UNF-2A	1/2 3/4 1 1-1/4	3/8	1/2	7/16 5/8 13/16 1	1/8	3/32

F

THUMB NUTS

THREAD	STYLE	MATERIAL
#4-40 UNC-2B	KNURLED	303 STAINLESS STEEL

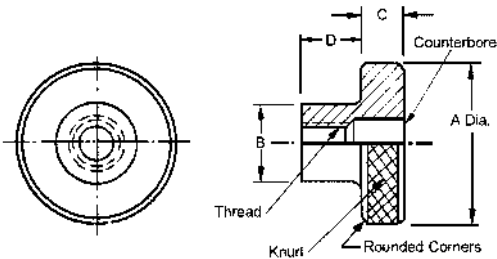
STOCK NO.	THREAD	A	B	C	D	COUNTERBORE	
						DIA.	DEEP
PD1-1	#4-40 UNC-2B	1/2	1/4	1/8	1/4	1/8	1/8
PD1-2		1/2			1/2	1/8	3/8
PD1-3		3/4			1/4	1/8	1/8
PD1-4		3/4			1/2	1/8	3/8

THREAD	STYLE	MATERIAL
#6-32 UNC-2B	KNURLED	303 STAINLESS STEEL

STOCK NO.	THREAD	A	B	C	D	COUNTERBORE	
						DIA.	DEEP
PD1-5	#6-32 UNC-2B	1/2	1/4	1/8	1/4	#26	3/32
PD1-6		1/2			1/2	#26	11/32
PD1-7		3/4			1/4	#26	3/32
PD1-8		3/4			1/2	#26	11/32

THREAD	STYLE	MATERIAL
#8-32 UNC-2B	KNURLED	303 STAINLESS STEEL

STOCK NO.	THREAD	A	B	C	D	COUNTERBORE	
						DIA.	DEEP
PD1-9	#8-32 UNC-2B	1/2	5/16	1/8	1/4	-	-
PD1-10		1/2			1/2	#15	1/4
PD1-11		3/4			1/4	-	-
PD1-12		3/4			1/2	#15	1/4



THUMB NUTS

THREAD	STYLE	MATERIAL
#10-24 UNC-2B	KNURLED	303 STAINLESS STEEL

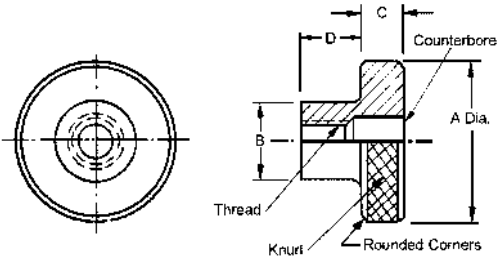
STOCK NO.	THREAD	A	B	C	D	COUNTERBORE	
						DIA.	DEEP
PD1-13	#10-24 UNC-2B	1/2	3/8	3/16	1/4	-	-
PD1-14		1/2			1/2	13/64	1/4
PD1-15		1			1/4	-	-
PD1-16		1			1/2	13/64	1/4

THREAD	STYLE	MATERIAL
#10-32 UNF-2B	KNURLED	303 STAINLESS STEEL

STOCK NO.	THREAD	A	B	C	D	COUNTERBORE	
						DIA.	DEEP
PD1-17	#10-32 UNF-2B	1/2	3/8	3/16	1/4	-	-
PD1-18		1/2			1/2	13/64	1/4
PD1-19		1			1/4	-	-
PD1-20		1			1/2	13/64	1/4

THREAD	STYLE	MATERIAL
#1/4-20 UNC-2B	KNURLED	303 STAINLESS STEEL

STOCK NO.	THREAD	A	B	C	D	COUNTERBORE	
						DIA.	DEEP
PD1-21	1/4-20 UNC-2B	3/4	1/2	1/4	1/4	-	-
PD1-22		3/4			1/2	17/64	1/4
PD1-23		1			1/4	-	-
PD1-24		1			1/2	17/64	1/4
PD1-25		1			3/4	17/64	1/2



F

THREADED STUDS

THREAD	STYLE	MATERIAL
#6-32	DOUBLE ENDED	303 STAINLESS STEEL

STOCK NO.	L	THREAD SIZE BOTH ENDS	D	d	B
PV-1	1	#6-32	7/32	1/2	.138 DIA.
PV-2	1-1/4			5/8	
PV-30	1-1/2			3/4	
PV-3	1-3/4			3/4	
PV-4	2			3/4	

THREAD	STYLE	MATERIAL
#8-32	DOUBLE ENDED	303 STAINLESS STEEL

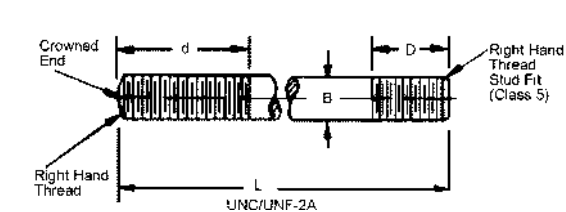
STOCK NO.	L	THREAD SIZE BOTH ENDS	D	d	B
PV-5	1	#8-32	7/32	1/2	.164 DIA.
PV-6	1-1/4			5/8	
PV-7	1-1/2			3/4	
PV-8	1-3/4			3/4	
PV-9	2			3/4	

THREAD	STYLE	MATERIAL
#10-24	DOUBLE ENDED	303 STAINLESS STEEL

STOCK NO.	L	THREAD SIZE BOTH ENDS	D	d	B
PV-10	1	#10-24	7/32	1/2	.190 DIA.
PV-11	1-1/4			5/8	
PV-12	1-1/2			3/4	
PV-13	1-3/4			3/4	
PV-31	2			3/4	

THREAD	STYLE	MATERIAL
#10-32	DOUBLE ENDED	303 STAINLESS STEEL

STOCK NO.	L	THREAD SIZE BOTH ENDS	D	d	B
PV-14	1	#10-32	7/32	1/2	.190 DIA.
PV-15	1-1/4			5/8	
PV-16	1-1/2			3/4	
PV-17	1-3/4			3/4	
PV-18	2			3/4	



THREADED STUDS

THREAD	STYLE	MATERIAL
1/4-20	DOUBLE ENDED	303 STAINLESS STEEL

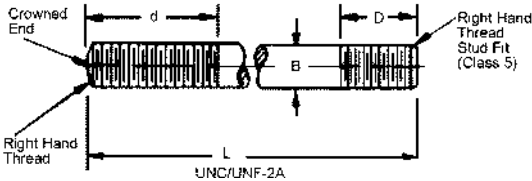
STOCK NO.	L	THREAD SIZE BOTH ENDS	D	d	B
PV-19	1-1/4	1/4-20	9/32	5/8	.250 DIA.
PV-20	1-1/2			5/8	
PV-21	1-3/4			3/4	
PV-22	2			3/4	
PV-23	2-1/2			3/4	
PV-24	1			1	

THREAD	STYLE	MATERIAL
5/16-18	DOUBLE ENDED	303 STAINLESS STEEL

STOCK NO.	L	THREAD SIZE BOTH ENDS	D	d	B
PV-25	1-1/2	5/16-18	11/32	5/8	.312 DIA.
PV-26	2			1	
PV-27	2-1/2			1-1/4	
PV-28	1			1-3/8	
PV-32	3-1/2			1-1/2	
PV-29	4			1-1/2	

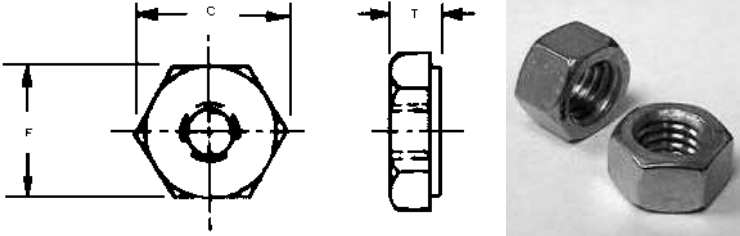
THREAD	STYLE	MATERIAL
3/8-16	DOUBLE ENDED	303 STAINLESS STEEL

STOCK NO.	L	THREAD SIZE BOTH ENDS	D	d	B
PV-33	1-5/8	3/8-16	11/32	3/4	.375 DIA.
PV-34	2			1	
PV-35	2-1/2			1-1/4	
PV-36	1			1-3/8	
PV-37	3-1/2			1-1/2	
PV-38	4			1-1/2	



HEX NUTS

SCREW SIZE	MATERIAL
#000 TO 1/4-20	STAINLESS STEEL TYPE 18-8



SCREW STOCK NO.	SIZE UN-2B	T	C (Ref.)	F
Y5-000	#000-120	3/64	7/64	3/32
Y5-00	#00-96	3/64	7/64	3/32
Y5-0	#0-80	3/64	3/16	5/32
Y5-164	#1-64	3/64	3/16	5/32
Y5-1	#1-72	3/64	3/16	5/32
Y5-2	#2-56	1/16	7/32	3/16
Y5-4	#4-40	3/32	9/32	1/4
Y5-6	#6-32	7/64	23/64	5/16
Y5-8	#8-32	1/8	25/64	11/32
Y5-11	#10-24	1/8	7/16	3/8
Y5-10	#10-32	1/8	7/16	3/8
Y5-12	1/4-20	3/16	1/2	7/16

SCREW STOCK NO.	SIZE UN-2B	T	C (Ref.)	F
Y5-23	1/4-28	3/16	1/2	7/16
Y5-13	5/16-18	17/64	37/64	1/2
Y5-14	5/16-24	17/64	37/64	1/2
Y5-15	3/8-16	21/64	41/64	9/16
Y5-16	3/8-24	21/64	41/64	9/16
Y5-24	3/8-32	3/32	41/64	9/16
Y5-17	1/2-13	7/16	7/8	55/64
Y5-18	1/2-20	7/16	55/64	3/4
Y5-19	5/8-11	35/64	1-5/64	15/16
Y5-20	5/8-18	35/64	1-5/64	15/16
Y5-21	3/4-10	41/64	1-17/64	1-1/8
Y5-22	3/4-16	41/64	1-17/64	1-1/8

SCREW SIZE	MATERIAL
#2-56 TO 5/16-24	MOLDED NYLON - WHITE

SCREW STOCK NO.	THREAD SIZE	T	C (Ref.)	F
Z5-N-2	#2-56	.066	.217	3/16
Z5-N-1	#4-40	.098	.289	1/4
Z5-N-3	#6-32	.114	.361	5/16
Z5-N-5	#8-32	.130	.397	11/32
Z5-N-7	#10-24	.130	.433	3/8
Z5-N-9	#10-32	.130	.433	3/8
Z5-N-11	1/4-20	.226	.505	7/16
Z5-N-12	5/16-18	.273	.577	1/2
Z5-N-13	5/16-24	.293	.577	1/2

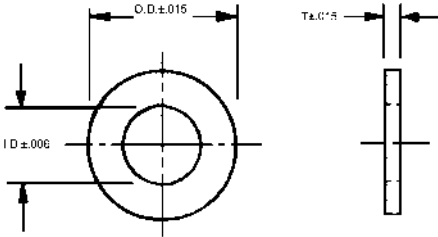
SOLD IN PACKAGES OF 10.

Also available

HEX NUT KITS		
STOCK NO.	DESCRIPTION OF KIT	NO. OF PIECES
KIT-Z5	HEX NUTS, WASHERS, LOCK WASHERS, STAINLESS STEEL #0 TO #10	1800
KIT-Z11N	NYLON PAN HEAD SCREW KIT	480
KIT-Z9N	NYLON SOCKET HEAD SCREW KIT	480
KIT-Z6N	NYLON FLAT HEAD SCREW KIT	480

WASHERS

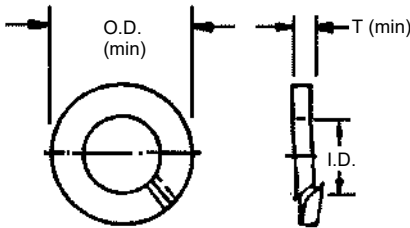
SCREW SIZE	MATERIAL	TYPE
#4 TO 1/4	MOLDED NYLON - WHITE	PLAIN



STOCK NO.	SCREW SIZE	OUTSIDE DIA.	I.D.	T
Z4-N-1	# 4	.281	.115	.047
Z4-N-3	# 6	.312	.140	.047
Z4-N-5	# 8	.375	.170	.062
Z4-N-7	# 10	.437	.200	.062
Z4-N-9	1/4	.562	.260	.062

SOLD IN PACKAGES OF 10.

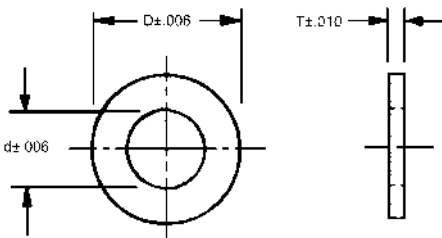
SCREW SIZE	MATERIAL	TYPE
#0 TO 1/2	STAINLESS STEEL TYPE 18-8	SPLIT LOCK



STOCK NO.	SCREW SIZE	I.D. (min)	I.D. (max)	O.D. (max)	T (min)
Z3-0	#0	.063	.069	.130	.015
Z3-1	#1	.069	.075	.150	.015
Z3-2	#2	.088	.094	.172	.020
Z3-4	#4	.114	.120	.209	.025
Z3-6	#6	.141	.148	.250	.031
Z3-8	#8	.167	.174	.293	.040
Z3-10	#10	.193	.200	.334	.047
Z3-12	1/4	.252	.260	.487	.062
Z3-13	5/16	.314	.322	.583	.078
Z3-14	3/8	.377	.385	.680	.094
Z3-15	1/2	.502	.512	.869	.125

SOLD IN PACKAGES OF 10.

SCREW SIZE	MATERIAL	TYPE
#000 TO 1/2	STAINLESS STEEL TYPE 18-8	PLAIN

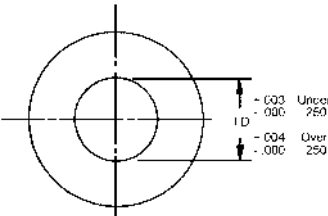
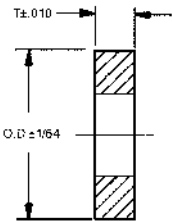


STOCK NO.	SCREW SIZE	D	d	T
Z4-000	#000	.090	.040	.012
Z4-00	#00	.108	.053	.015
Z4-0	#0	.156	.062	.020
Z4-1	#1	.187	.078	.020
Z4-2	#2	.187	.089	.031
Z4-4	#4	.312	.125	.031
Z4-6	#6	.375	.149	.031
Z4-8	#8	.375	.174	.031
Z4-10	#10	.438	.203	.063
Z4-12	1/4	.500	.265	.063
Z4-13	5/16	.562	.328	.063
Z4-14	3/8	.625	.390	.063
Z4-15	1/2	.750	.516	.093

SOLD IN PACKAGES OF 10.

WASHERS

SCREW SIZE	MATERIAL	TYPE
#4 TO 3/8	303 STAINLESS STEEL	PLAIN

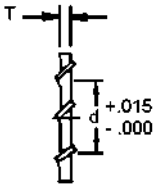
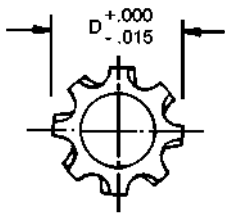


STOCK NO.	SCREW SIZE	I.D.	O.D.	T
PC5-1	#4	.116	1/4	1/16
PC5-2	#6	.144	5/16	1/16
PC5-3	#8	.169	3/8	1/16
PC5-4	#10	.196	7/16	5/64
PC5-5	1/4	.257	1/2	5/64
PC5-6	5/16	.323	5/8	3/32
PC5-7	3/8	.386	3/4	3/32

SOLD IN PACKAGES OF 10.

LOCK WASHERS

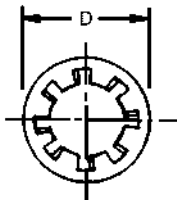
THREAD	STYLE	MATERIAL
#4 TO 1/2	EXTERNAL TOOTH	410 STAINLESS STEEL



STOCK NO.	THREAD	D	d	T
Z1-4	#4	.255	.120	.015
Z1-6	#6	.317	.146	.018
Z1-8	#8	.381	.173	.020
Z1-10	#10	.406	.200	.022
Z1-25	1/4	.506	.260	.025
Z1-31	5/16	.601	.326	.030
Z1-37	3/8	.695	.390	.035
Z1-50	1/2	.898	.530	.040

SOLD IN PACKAGES OF 10.

THREAD	STYLE	MATERIAL
#2 TO 1/2	INTERNAL TOOTH	410 STAINLESS STEEL



STOCK NO.	THREAD	D	d	T
Z2-2	#2	.185	.093	.013
Z2-4	#4	.265	.120	.015
Z2-6	#6	.288	.146	.018
Z2-8	#8	.336	.173	.020
Z2-10	#10	.381	.200	.022
Z2-25	1/4	.478	.260	.025
Z2-31	5/16	.607	.326	.030
Z2-37	3/8	.692	.390	.035
Z2-50	1/2	.883	.530	.090

SOLD IN PACKAGES OF 10.



Also available

LOCK WASHER KITS		
STOCK NO.	DESCRIPTION OF KIT	NO. OF PIECES
KIT-Z2	LOCK WASHER KIT, ASSORTED SIZES, STAINLESS STEEL, INTERNAL AND EXTERNAL TOOTH	480

THRUST WASHERS & DISKS

SHAFT SIZE	TYPE	MATERIAL
1/8 TO 1-1/4	PLAIN HARDENED GROUND	410 STAINLESS STEEL RC 38-42 OR 1080 CARBON STEEL RC 61-63

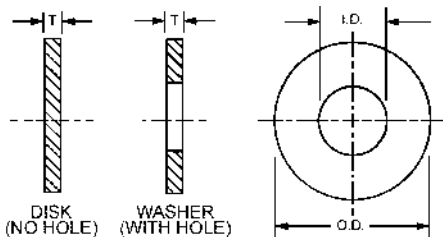
410 STAINLESS STEEL STOCK NO.	CARBON STEEL STOCK NO.	I.D.	O.D.	T	SHAFT SIZE
CD1-1-SS	CD1-1	0.128" - 0.133"	0.430"- 0.437"	.050	1/8
CD1-2-SS	CD1-2	0.191"- 0.195"	0.492"- 0.499"	.050	3/16
CD1-3-SS	CD1-3	0.253"- 0.258"	0.555"- 0.562"	.050 ±.002	1/4
CD1-4-SS	CD1-4	0.316"- 0.321"	0.617"- 0.624"	.050	5/16
CD1-5-SS	CD1-5	0.378"- 0.383"	0.805"- 0.812"	.062	3/8
CD1-6-SS	CD1-6	0.503"- 0.508"	0.930"- 0.937"	.062	1/2
CD1-7-SS	CD1-7	0.628"- 0.635"	1.115"- 1.124"	.093 ±.003	5/8
CD1-8-SS	CD1-8	0.753"- 0.760"	1.240"- 1.249"	.093	3/4
CD1-9-SS	CD1-9	1.003"- 1.012"	1.613"- 1.624"	.125 ±.005	1
CD1-10-SS	CD1-10	1.253"- 1.262"	1.863"- 1.874"	.125	1-1/4

SHAFT SIZE	TYPE	MATERIAL
3/16 TO 1-1/4	PLAIN PLASTIC THRUST	NYLON AND TEFLON

NYLON STOCK NO.	TEFLON® STOCK NO.	I.D. +.010 -.005	O.D. ±1/64	T ±.005	SHAFT SIZE
CD7-3	CD8-3	.188	3/4	.062	3/16
CD7-4	CD8-4	.250	5/8	.093	1/4
CD7-5	CD8-5	.500	13/16	.093	1/2
CD7-9	CD8-9	.562	1	.093	9/16
CD7-10	CD8-10	.625	1-1/16	.093	5/8
CD7-12	CD8-12	.750	1-1/8	.093	3/4
CD7-14	CD8-14	.875	2-1/8	.093	7/8
CD7-20	CD8-20	1.250	2-1/16	.093	1-1/4

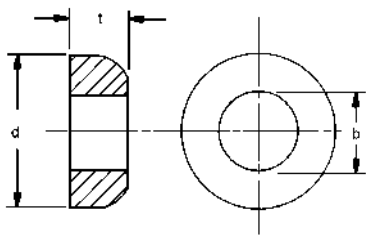
SHAFT SIZE	TYPE	MATERIAL
1/8 TO 1/2	PLAIN DISK AND WASHER	BRONZE (OIL-IMPREGNATED) OR TOOL STEEL

BRONZE OIL-IMPREGNATED		TOOL STEEL		WASHER I.D. +.004 -.000	O.D. BRONZE +0.000 -0.004	O.D. TOOL STEEL +0.008 -0.004	±.002 T	SHAFT SIZE
DISK	WASHER	DISK	WASHER					
STOCK NO.	STOCK NO.	STOCK NO.	STOCK NO.					
CD2-1	CD3-1	CD4-1	CD5-1	.128	.372	.252	.062	1/8
CD2-2	CD3-2	CD4-2	CD5-2	.190	.497	.377	.062	3/16
CD2-3	CD3-3	CD4-3	CD5-3	.253	.622	.502	.062	1/4
CD2-4	CD3-4	CD4-4	CD5-4	.316	.747	.627	.093	5/16
CD2-5	CD3-5	CD4-5	CD5-5	.378	.872	.752	.125	3/8
CD2-6	CD3-6	CD4-6	CD5-6	.503	1.127	1.002	.187	1/2



SWIVEL WASHERS

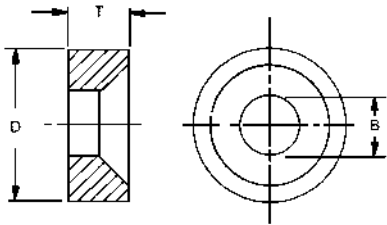
SCREW SIZE	TYPE	MATERIAL
#4 TO 3/8	MALE	303 STAINLESS STEEL MACHINED



STOCK NO.	SCREW SIZE	d	b	t	ASSEMBLED HEIGHT
PC6-1	#4	9/32	.116	1/8	13/64
PC6-2	#6	9/32	.144	1/8	13/64
PC6-3	#8	5/16	.169	1/8	13/64
PC6-4	#10	3/8	.196	5/32	15/64
PC6-5	1/4	7/16	.257	3/16	17/64
PC6-6	5/16	1/2	.323	3/16	21/64
PC6-7	3/8	5/8	.386	1/4	25/64

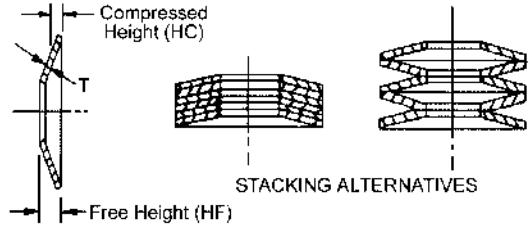
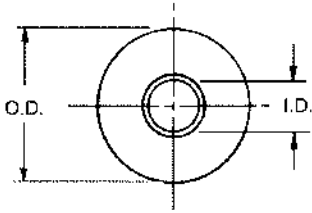
TYPE	MATERIAL
FEMALE	303 STAINLESS STEEL MACHINED

STOCK NO.	D	B	T	ASSEMBLED HEIGHT
PC7-1	3/8	5/32	1/8	13/64
PC7-2	3/8	11/64	1/8	13/64
PC7-3	3/8	3/16	1/8	13/64
PC7-4	7/16	7/32	1/8	15/64
PC7-5	1/2	9/32	5/32	17/64
PC7-6	9/16	11/32	3/16	21/64
PC7-7	11/16	13/32	1/4	25/64



SPRING WASHERS

STYLE	SHAFT SIZE	MATERIAL
BELLEVILLE	3/32 TO 3/4	301 OR 302 STAINLESS STEEL *1095 CARBON STEEL

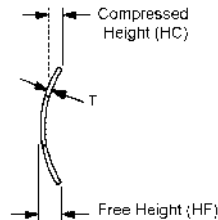
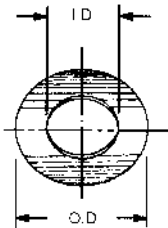


STOCK NO.	O.D. ±.010	I.D. +.001 -.000	T ±10%	HF (Ref.)	HC	FORCE TO COMPRESS TO HC ± 15%
ST-1	.187	.093	.010	.015	.012	15 LBS
ST-2	.250	.125	.013	.020	.017	26 LBS
ST-3	.312	.156	.016	.025	.021	41 LBS
ST-4	.375	.190	.020	.030	.025	60 LBS
ST-5	.500	.255	.025	.038	.031	95 LBS
ST-6	.625	.317	.032	.048	.040	145 LBS
ST-7	.750	.380	.040	.059	.049	235 LBS
ST-8	1.000	.505	.050	.075	.062	340 LBS
ST-9	1.250	.630	.062	.092	.077	475 LBS
ST-10*	1.500	.750	.072	.107	.089	660 LBS



Sold in packages of 10.

STYLE	SHAFT SIZE	MATERIAL
CURVED	3/32 TO 3/4	301 OR 302 STAINLESS STEEL *1095 CARBON STEEL



STOCK NO.	SCREW OR ROD SIZE	HOLE SIZE	O.D. ±.010	I.D. † +.010 -.000	HF (Ref.)	T ±10%	HC	FORCE TO COMPRESS TO HC ± 15%
SU-1	#5	1/4	.245	.135	.034	.006	.020	2 LBS
SU-2	#6	9/32	.270	.148	.035	.007	.022	2 LBS
SU-3	#8	11/32	.322	.174	.042	.007	.025	3 LBS
SU-4	#10	3/8	.370	.200	.047	.009	.028	4 LBS
SU-5	#12	7/16	.423	.231	.053	.010	.032	5 LBS
SU-6	1/4	1/2	.490	.265	.063	.011	.034	7 LBS
SU-7*	9/32	9/16	.551	.296	.070	.012	.038	8 LBS
SU-8	5/16	5/8	.612	.327	.077	.013	.042	9 LBS
SU-9*	11/32	11/16	.672	.363	.081	.015	.047	11 LBS
SU-10	3/8	3/4	.735	.395	.086	.016	.050	12 LBS
SU-11*	7/16	7/8	.857	.462	.100	.018	.057	15 LBS
SU-12	1/2	1	.980	.525	.110	.021	.063	20 LBS

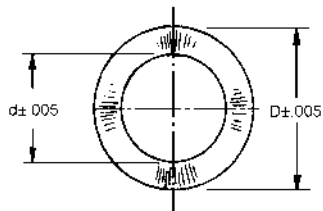
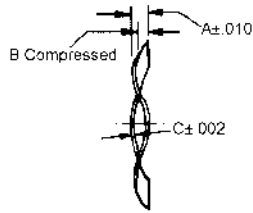


† I.D. Based in long axis providing free fit on normal screw.

Sold in packages of 10.

SPRING WASHERS

TYPE	MATERIALS
FOR OUTER RACE BALL BEARING PRE-LOAD	302 STAINLESS STEEL - SPRING TEMPERED

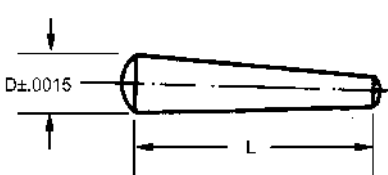


STOCK NO.	BEARING OUTSIDE DIA. (REF.)	D	d	A	B	C	LOAD IN (lbs.) TO DEFLECT TO B
SV-7	.375	.367	.265	.030	.015	.006	2-4
SV-8	.500	.492	.350	.035	.020	.007	3-5
SV-9	.625	.618	.440	.040	.025	.008	3-5
SV-4	.750	.734	.531	.050	.030	.009	4-7
SV-5	.875	.855	.650	.060	.030	.010	4-7
SV-6	1.125	1.102	.856	.075	.037	.012	9-13

Sold in packages of 10.
D & d dimensions before loading.

PINS

STYLE	MATERIALS
TAPER ANSI-B18.2-1978 (R1995)	303 STAINLESS STEEL



STOCK NO.	TAPER PIN NO.	D	L
CP3-20*	#9/0	.031	1/4
CP3-22*			3/8
CP3-21*	#8/0	.047	1/4
CP3-1*			3/8
CP3-2*			1/2
CP3-24	#7/0	.0625	3/8
CP3-3			7/16
CP3-4			1/2
CP3-25			9/16
CP3-26			5/8
CP3-27	#6/0	.078	7/16
CP3-5			1/2
CP3-6			9/16
CP3-28			5/8
CP3-29			3/4
CP3-7	#5/0	.094	9/16
CP3-8			5/8
CP3-32			3/4
CP3-33			7/8
CP3-34	#4/0	.109	5/8
CP3-35			3/4
CP3-36			7/8
CP3-37			1
CP3-9	#3/0	.125	5/8
CP3-10			3/4
CP3-38			7/8
CP3-39			1
CP3-11	#2/0	.141	3/4
CP3-40			7/8
CP3-12			1
CP3-41			1-1/4

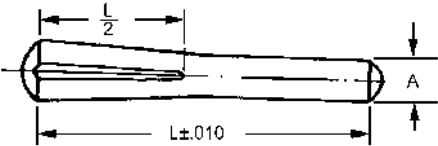
* ANSI B18.8.2-1978 (R1989) Does not apply.
Taper 1/4" per foot
Sold in packages of 10.

Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-CP3	ASSORTED TAPER PIN KIT 240 PIECES

PINS

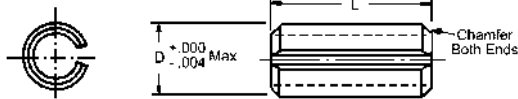
TYPE	MATERIALS
GROOVED HALF LENGTH TYPE B ANSI-B18.2-1978 (R1995)	303 STAINLESS STEEL



STOCK NO.	A	L	DRILL SIZE
CP4-1	.0469 +.0000 -.0010	3/8	3/64
CP4-17		5/8	
CP4-4	.0625 +.0000 -.0010	1/2	1/16
CP4-18		5/8	
CP4-5	.0781 +.0000 -.0010	3/8	5/64
CP4-22		5/8	
CP4-7	.0938 +0.000 -.0010	3/8	3/32
CP4-23	.0938 +0.000 -.0010	5/8	3/32
CP4-24		3/4	
CP4-9	.1250 +.0000 -.0020	5/8	1/8
CP4-10		3/4	
CP4-26		1	
CP4-27	.1563 +.0000 -.0020	1/2	5/32
CP4-28		5/8	
CP4-11		3/4	
CP4-12		1	

Other sizes available on request.
Sold in packages of 10.

TYPE	MATERIALS
ROLL OR SPRING	420 STAINLESS STEEL

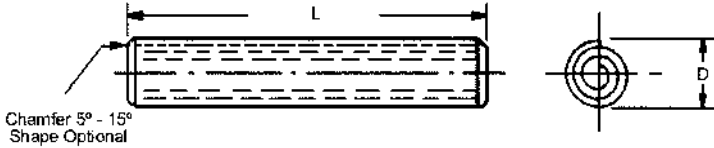


STOCK NO.	D	L (Inch)	DRILL SIZE	REF. SHAFT DIA.
CP5-2		1/4		
CP5-21		5/16		
CP5-3	.069	3/8	1/16	3/16
CP5-12		7/16		
CP5-10		1/2		
CP5-22		9/16		
CP5-23		5/8		
CP5-4	.086	9/16	5/64	1/4
CP5-24	.103	3/8	3/32	1/4
CP5-25		7/16		
CP5-26	.103	1/2	3/32	1/4
CP5-5		5/8		
CP5-13		3/8		
CP5-14		7/16		
CP5-15	.135	1/2	1/8	3/8
CP5-16		9/16		
CP5-17		5/8		
CP5-18		11/16		
CP5-6		3/4		
CP5-7	.167	1	5/32	1/2

Sold in packages of 10.

PINS

TYPE	MATERIALS
SPIRAL STANDARD DUTY	302 STAINLESS STEEL



STOCK NO.	D	L	DRILL SIZE	(REF.) SHAFT
CP6-17	.033 +.002 -.000	1/8	.031	3/32
CP6-18		3/16		
CP6-19		1/4		
CP6-20		5/16		
CP6-21		3/8		
CP6-23	.041 +.003 -.000	1/4	.039	1/8
CP6-24		5/16		
CP6-10		3/8		
CP6-25		7/16		
CP6-11		1/2		
CP6-26	.049 +.003 -.000	3/16	.047	1/8
CP6-27		1/4		
CP6-1		5/16		
CP6-29		3/8		
CP6-30		7/16		
CP6-31		1/2		
CP6-32	.054 +.003 -.000	3/16	.051	1/8
CP6-33		1/4		
CP6-34		5/16		
CP6-35		3/8		
CP6-36		7/16		
CP6-37		1/2		
CP6-38	.067 +.005 -.000	1/4	.061	3/16
CP6-39		5/16		
CP6-12		3/8		
CP6-2		7/16		
CP6-13		1/2		
CP6-41	.083 +.005 -.000	9/16	.077	1/4
CP6-42		5/8		
CP6-3		1/2		
CP6-43		3/8		
CP6-44		7/16		
CP6-4	.099 +.006 -.000	1/2	.093	1/4 & 5/16
CP6-15		9/16		
CP6-45		5/8		
CP6-46		11/16		
CP6-5		3/4		
CP6-47	.124 +.006 -.000	3/8	.124	3/8 7/16 & 1/2
CP6-48		7/16		
CP6-49		1/2		
CP6-50		9/16		
CP6-51		5/8		
CP6-52		11/16		
CP6-53		3/4		
CP6-6		1		



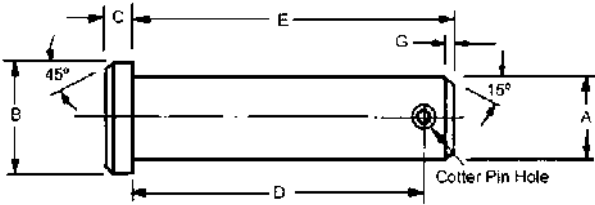
Sold in packages of 10.

Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-CP5	ASSORTED SIZES ROLL, TAPER, & DOWEL PINS - 530 PIECES

PINS

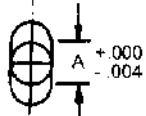
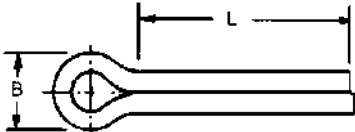
TYPE	MATERIALS
CLEVIS ANSI-B18-8.1-1972 (R 1983)	416 STAINLESS STEEL HARDENED ROCKWELL C28-32



STOCK NO.	A +.000 -.005	B	C	D +.000 -.020	E +.020 +.000	G	COTTER PIN HOLE H
CP2-1	.186	5/16	1/16	.504	19/32	3/64	5/64
CP2-2	.248	3/8	3/32	.692	51/64	3/64	5/64
CP2-3	.311	7/16	3/32	.832	31/32	1/16	7/64
CP2-4	.373	1/2	1/8	.958	1-1/16	1/16	7/64
CP2-5	.436	9/16	5/32	1.082	1-15/64	1/16	7/64
CP2-6	.496	5/8	5/32	1.223	1-27/64	5/64	9/64

TYPE	MATERIALS
COTTER ANSI-B18-8.1-1972 (R 1983)	STAINLESS STEEL

STOCK NO.	A	B MIN.	L (Inch)	HOLE SIZE
CP1-31 CP1-32 CP1-1 CP1-34	.032	1/16	3/8 1/2 3/4 1	3/64
CP1-2	.048	3/32	1	1/16
CP1-35 CP1-36 CP1-37 CP1-3 CP1-9	.060	1/8	3/8 1/2 3/4 1 1-1/2	5/64
CP1-4	.076	5/32	1-1/4	3/32
CP1-10 CP1-11 CP1-12 CP1-5	.090	3/16	1/2 3/4 1 1-1/2	7/64
CP1-14 CP1-15 CP1-16 CP1-17 CP1-7	.120	1/4	1/2 3/4 1 1-1/2 2	9/64
CP1-19 CP1-20 CP1-21 CP1-22	.150	5/16	3/4 1 1-1/2 2	11/64
CP1-23 CP1-24 CP1-25 CP1-26	.176	3/8	1 1-1/2 2 2-1/2	13/64
CP1-27 CP1-28 CP1-29	.225*	1/2	1-1/2 2 2-1/2	17/64



* Tolerance is +.000/-0.005
SOLD IN PACKAGES OF 10.

Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-CP1	COTTER PIN KIT, ASSORTED SIZES 3/8" TO 2" (280 PIECES)

PINS

TYPE	DIAMETER SIZE	MATERIALS
DOWEL SOFT PINS	1/32 TO 5/32	303 STAINLESS STEEL (NOT HARDENED)

DIAMETER = d						B
(1/32") .0312 STOCK NO.	(1/16") .0625 STOCK NO.	(5/64") .0780 STOCK NO.	(3/32") .0937 STOCK NO.	(1/8") .1250 STOCK NO.	(5/32") .1561 STOCK NO.	
D11-1	D12-1	D18-1	D13-1	D14-1	-	3/32
D11-2	D12-2	D18-2	D13-2	D14-2	-	1/8
D11-3	D12-3	D18-3	D13-3	D14-3	-	5/32
D11-4	D12-4	D18-4	D13-4	D14-4	D15-4	3/16
D11-5	D12-5	-	D13-5	D14-5	-	7/32
D11-6	D12-6	D18-6	D13-6	D14-6	D15-6	1/4
D11-7	D12-7	D18-7	D13-7	D14-7	D15-7	5/16
D11-8	D12-8	D18-8	D13-8	D14-8	D15-8	3/8
D11-9	D12-9	-	D13-9	D14-9	D15-9	7/16
D11-10	D12-10	-	D13-10	D14-10	D15-10	1/2
D11-11	D12-11	-	D13-11	D14-11	D15-11	5/8
D11-12	D12-12	-	D13-12	D14-12	-	3/4
D11-13	D12-13	-	D13-13	D14-13	-	7/8
D11-14	D12-14	-	D13-14	D14-14	-	1

Sold in packages of 10.

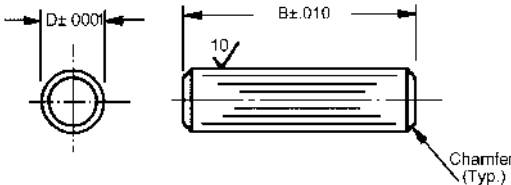
TYPE	DIAMETER SIZE	MATERIALS
DOWEL SOFT PINS	3/16 TO 1/2	303 STAINLESS STEEL (NOT HARDENED)

DIAMETER = d						B
(3/16") .1874 STOCK NO.	(7/32") .2186 STOCK NO.	(1/4") .2499 STOCK NO.	(5/16") .3124 STOCK NO.	(3/8") .3749 STOCK NO.	(1/2") .4999 STOCK NO.	
D16-6	-	-	-	-	-	1/4
D16-7	D19-7	-	-	-	-	5/16
D16-8	D19-8	D17-8	-	-	-	3/8
D16-9	D19-9	D17-9	D20-9	-	-	7/16
D16-10	D19-10	D17-10	D20-10	-	-	1/2
-	-	D17-20	D20-20	D21-20	-	9/16
D16-11	D19-11	D17-11	D20-11	D21-11	-	5/8
D16-12	D19-12	D17-12	D20-12	D21-12	D22-12	3/4
D16-13	D19-13	D17-13	D20-13	D21-13	D22-13	7/8
D16-14	D19-14	D17-14	D20-14	D21-14	D22-14	1
-	-	-	D20-15	D21-15	D22-15	1-1/4
-	-	-	-	D21-16	D22-16	1-1/2
-	-	-	-	-	D22-17	1-3/4
-	-	-	-	-	D22-18	2

Sold in packages of 10.

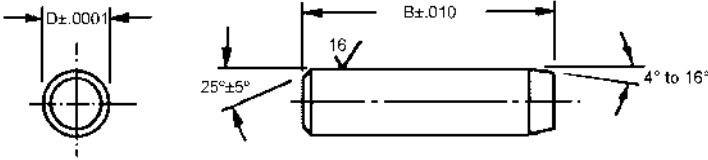
Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-D11	DOWEL PIN KIT, ASSORTED SIZES 1/32" TO 1/4" DIA. (135 PIECES)



PINS

TYPE	DIAMETER SIZE	MATERIALS
DOWEL	1/16" TO 3/8"	416 STAINLESS STEEL ROCKWELL C36-42



Conforms to Mil. Standard MS16555.

DIAMETER = d								B
(1/16") .0627 STOCK NO.	(3/32") .0940 STOCK NO.	(1/8") .1252 STOCK NO.	(5/32") .1564 STOCK NO.	(3/16") .1877 STOCK NO.	(1/4") .2502 STOCK NO.	(5/16") .3127 STOCK NO.	(3/8") .3752 STOCK NO.	
D23-1	D24-1	D25-2	-	-	-	-	-	3/16
D23-2	D24-2	D25-2	-	-	-	-	-	1/4
D23-15	D24-15	D25-15	-	-	-	-	-	5/16
D23-3	D24-3	D25-3	D26-3	D27-3	-	-	-	3/8
D23-17	D24-17	D25-17	D26-17	-	-	-	-	7/16
D23-4	D24-4	D25-4	D26-4	D27-4	D28-4	-	-	1/2
D23-5	D24-5	D25-5	D26-5	D27-5	D28-5	D29-5	-	5/8
D23-6	D24-6	D25-6	D26-6	D27-6	D28-6	D29-6	D30-6	3/4
D23-7	D24-7	D25-7	D26-7	-	-	-	-	7/8
D23-8	D24-8	D25-8	D26-8	D27-8	D28-8	D29-8	D30-8	1"
-	-	-	-	D27-9	D28-9	D29-9	D30-9	1-1/4
-	-	-	-	-	D28-10	D29-10	D30-10	1-1/2

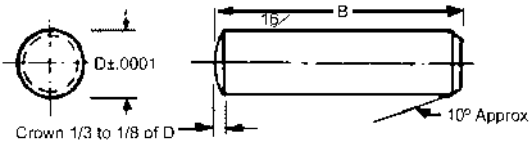


Sold in packages of 10.

Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-D23	DOWEL PIN KIT, ASSORTED SIZES 1/16" TO 3/8" DIA. (135 PIECES)

TYPE	DIAMETER SIZE	MATERIALS
DOWEL	1/16" TO 3/8"	CARBON STEEL CARBONIZED ROCKWELL C58-62 CASE DEPTH .010 TO .020



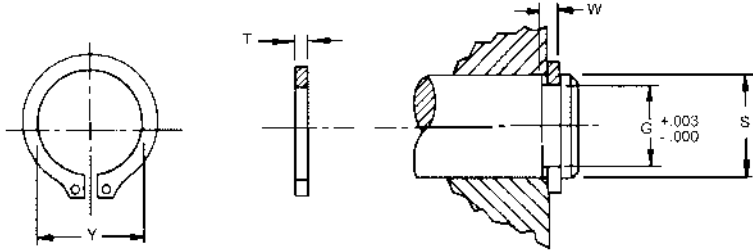
D=.0627 STOCK NO.	D=.0940 STOCK NO.	D=.1252 STOCK NO.	D=.1877 STOCK NO.	D=.2502 STOCK NO.	D=.3127 STOCK NO.	D=.3752 STOCK NO.	B (Inch)
D1-1	-	-	-	-	-	-	3/16
D1-2	D2-2	-	-	-	-	-	1/4
D1-3	D2-3	D3-3	-	-	-	-	3/8
D1-4	D2-4	D3-4	D4-4	D5-4	D6-4	D7-4	1/2
D1-5	D2-5	D3-5	D4-5	D5-5	D6-5	D7-5	5/8
D1-6	D2-6	D3-6	D4-6	D5-6	D6-6	D7-6	3/4
D1-7	D2-7	D3-7	D4-7	D5-7	D6-7	D7-7	7/8
D1-8	D2-8	D3-8	D4-8	D5-8	D6-8	D7-8	1
-	-	D3-9	D4-9	D5-9	D6-9	D7-9	1-1/4
-	D2-10	D3-10	D4-10	D5-10	D6-10	D7-10	1-1/2



Sold in packages of 10.

RETAINER RINGS

TYPE	MATERIALS
EXTERNAL LUG DESIGN	SPRING STEEL, CARBON STEEL PLATED (CP), BERYLLIUM COPPER (BC)



STOCK NO.	S SHAFT SIZE	G GROOVE DIA.	W GROOVE WIDTH	T	MATERIAL	Y RING I.D.	PLIERS
Q2-12	1/8	.117	.012	.010	BC	.112	S11-12P
Q2-15	5/32 & 4mm	.146	.012	.010	BC	.142	S11-12P
Q2-18	3/16	.175	.018	.015	BC	.168	S11-18P
Q2-23	6mm	.222	.018	.015	BC	.215	S11-18P
Q2-25	1/4	.230	.029	.025	SS	.225	S11-25P
Q2-31	5/16 & 8mm	.290	.029	.025	SS	.281	S11-25P
Q2-34	11/32	.321	.029	.025	SS	.309	S11-25P
Q2-37	3/8	.352	.029	.025	SS	.338	S11-25P
Q2-39	10mm	.369	.029	.025	SS	.354	S11-25P
Q2-50	1/2	.468	.039	.035	SS	.461	S11-25P
Q2-50-CP	1/2	.468	.039	.035	CP	.461	S11-25P
Q2-62-P	5/8 & 16mm	.588	.039	.035	SS	.579	S11-25P
Q2-62-CP	5/8 & 16mm	.588	.039	.035	CP	.579	S11-25P
Q2-75	3/4 & 19mm	.704	.046	.042	SS	.693	S11-25P
Q2-87	7/8	.821	.046	.042	SS	.810	S11-25P
Q2-87-CP	7/8	.821	.046	.042	CP	.810	S11-25P
Q2-100	1	.940	.046	.042	SS	.925	S11-100P
Q2-112	1-1/8	1.059	.056	.050	SS	1.041	S11-100P
Q2-112-CP	1-1/8	1.059	.056	.050	CP	1.041	S11-100P
Q2-125	1-1/4 & 32mm	1.176	.056	.050	SS	1.156	S11-100P
Q2-125-CP	1-1/4 & 32mm	1.176	.056	.050	CP	1.156	S11-100P
Q2-156	1-9/16	1.468	.068	.062	SS	1.446	-
Q2-156-CP	1-9/16	1.468	.068	.062	CP	1.446	-
Q2-200-CP	2	1.886	.068	.062	CP	1.850	-
Q2-237-CP	2-3/8	2.239	.086	.078	CP	2.197	-
Q2-300-CP	3	2.838	.103	.093	CP	2.775	-

Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-Q2	RETAINER RINGS, STAINLESS STEEL, INTERNAL AND EXTERNAL, 1/8", 3/16" AND 1/4" SHAFTS (450 PIECES)



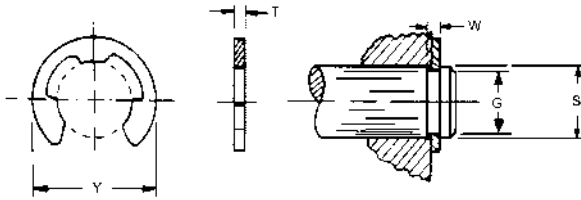
Sold in packages of 10.



Retainer Ring Pliers. Order separately.

RETAINER RINGS

TYPE	MATERIALS
EXTERNAL SNAP ON DESIGN	STAINLESS SPRING STEEL



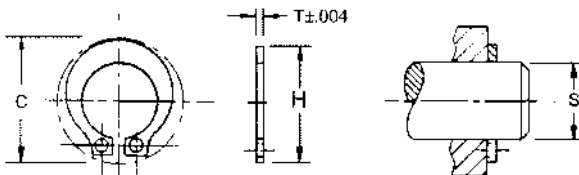
STOCK NO.	SHAFT SIZE S	GROOVE DIA. G	GROOVE WIDTH W	T RING THICKNESS	O.D. RING Y	APPLICATOR TOOL NO.
Q1-6	5/64 & 1/16	.052	.012	.010	.14	S10-6T
Q1-9	3/32	.074 +0.002	.018	.015	.19	S10-9T
Q1-12	1/8	.095 -.0000	.018	.015	.23	S10-12T
Q1-15	5/32 & 4mm	.116	.029	.025	.29	-
Q1-18	3/16	.147	.029	.025	.34	S10-18T
Q1-25	1/4	.210	.029	.025	.53	S10-25T
Q1-31	5/16 & 8mm	.250	.029	.025	.50	S10-31T
Q1-37	3/8	.303	.039	.035	.66	S10-37T
Q1-43	7/16 & 11mm	.343	.039	.035	.69	-
Q1-50	1/2	.396 +003	.046	.044	.80	S10-50T
Q1-62	5/8 & 16mm	.485 -.000	.046	.044	.94	S10-62T
Q1-75	3/4 & 19mm	.580	.056	.050	1.12	S10-75T
Q1-87	7/8	.675	.056	.050	1.30	S10-87T
Q1-98	1	.835	.056	.050	1.50	S10-98T



Retainer Ring Pliers. Order separately.

Sold in packages of 20.

TYPE	MATERIALS
EXTERNAL POWER GRIP DESIGN	STAINLESS SPRING STEEL



STOCK NO.	SHAFT SIZE S	T RING THICKNESS	H RING HEIGHT	CLEARANCE DIA. C	ASSEMBLY PLIER STOCK NO.
Q7-12	1/8	.025	.268	.33	S14-12P
Q7-15	5/32 & 4mm	.025	.307	.36	
Q7-18	3/16	.035	.364	.44	S14-25P
Q7-25	1/4	.035	.437	.49	
Q7-31	5/16 & 8mm	.042	.553	.68	S14-37P
Q7-37	3/8	.042	.620	.74	
Q7-43	7/16 & 11mm	.050	.701	.81	
Q7-50	1/2	.050	.768	.90	
Q7-62	5/8 & 16mm	.062	.948	1.06	
Q7-75	3/4 & 19mm	.062	1.115	1.32	

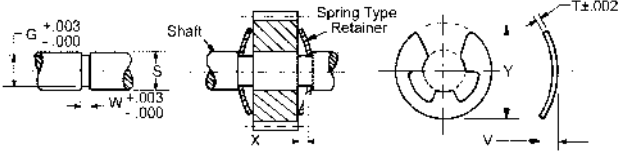


Retainer Ring Pliers. Order separately.

Sold in packages of 10.

RETAINER RINGS

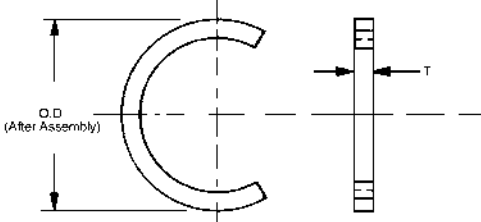
TYPE	MATERIALS
EXTERNAL BOWED SNAP ON DESIGN	STAINLESS SPRING STEEL




STOCK NO.	S SHAFT SIZE	Y	T	V	X MAX. TAKE UP	W	G
Q3-12	1/8	.230	.010	.025	.013	.022	.095
Q3-18	3/16	.335	.015	.033	.015	.030	.147
Q3-25	1/4	.527	.025	.052	.024	.049	.210
Q3-31	5/16 & 8mm	.500	.025	.050	.022	.047	.250
Q3-37	3/8	.660	.035	.060	.022	.060	.303
Q3-50	1/2	.800	.042	.075	.030	.073	.396
Q3-62	5/8 & 16mm	.940	.042	.080	.035	.077	.485
Q3-75	3/4 & 19mm	1.000	.050	.088	.035	.085	.625
Q3-98	1	1.500	.050	.088	.035	.085	.835

Sold in packages of 10.

TYPE	MATERIALS
EXTERNAL DESIGN	CARBON STEEL OR STAINLESS STEEL

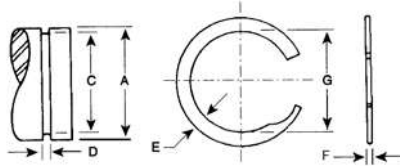



CARBON STEEL STOCK NO.	STAINLESS STEEL STOCK NO.	SHAFT SIZE	O.D.	T	GROOVE DIMENSIONS	
					WIDTH +.005 -.000	DIAMETER +.005 -.000
Q5-50-CP	Q5-50	1/2	.550	.035	.039	.468
Q5-62-CP	Q5-62	5/8	.673	.035	.039	.588
Q5-87-CP	Q5-87	7/8	.923	.042	.046	.821
Q5-112-CP	Q5-112	1-1/8	1.180	.050	.056	1.061
Q5-125-CP	Q5-125	1-1/4	1.301	.050	.056	1.176
Q5-156-CP	Q5-156	1-9/16	1.620	.062	.068	1.468
Q5-200-CP	-	2	2.040	.062	.068	1.886
Q5-237-CP	-	2-3/8	2.429	.078	.086	2.239

Sold in packages of 10.

RETAINER RINGS

TYPE	MATERIALS
STAINLESS STEEL INTERNAL	302 STAINLESS STEEL



STOCK NO.	A HOUSING DIA.		C GROOVE DIA.	D GROOVE WIDTH	F RING THICKNESS	G RING OUTER DIA.	E RADIAL WALL	THRUST LOAD BASED ON RING SHEAR	THRUST LOAD BASED ON GROOVE YIELD (45,000 P.S.I.)	MAX. CORNER RADIUS OR CHAMFER		WEIGHT lbs./M
	INCHES	MM.								*X	*CH	
Q9-50	.500	12.7	.526	.030 $\pm .003$ -.000	.025 $\pm .002$	.532	.045	2,000	405	.015	.012	.41
Q9-51	.512	13.0	.538			.544		2,050	420			.42
Q9-53	.531	13.5	.557			.564		2,130	455			.44
Q9-56	.562	14.3	.588			.594		2,250	495			.46
Q9-59	.594	15.1	.619			.626		2,380	535			.49
Q9-62	.625	15.9	.651			.658		2,500	610			.52
Q9-65	.656	16.7	.682			.689		2,630	670			.55
Q9-68	.687	17.5	.713			.720		2,750	725			.58
Q9-71	.718	18.3	.744			.751		2,870	790			.61
Q9-75	.750	19.0	.782			.790		3,360	800			1.14
Q9-77	.777	19.7	.808	.036 $\pm .003$ -.000	.031 $\pm .002$	.817	.065	3,480	835	.024	.019	1.19
Q9-78	.781	19.8	.812			.821		3,500	840			1.20
Q9-81	.812	20.6	.843			.853 $\pm .013$		3,640	915			1.25
Q9-84	.843	21.4	.880			.889 $\pm .000$		3,780	1,155			1.32
Q9-86	.866	22.0	.903			.913		3,880	1,250			1.35
Q9-87	.875	22.2	.912			.922		3,920	1,250			1.36
Q9-90	.906	22.9	.939			.949		4,060	1,335			1.41
Q9-93	.938	23.8	.975			.986		4,200	1,430			1.48
Q9-96	.968	24.4	1.015			1.025	.075	4,340	1,950	.025	.020	2.11
Q9-98	.987	25.0	1.030			1.041		4,420	1,865	.026	.021	2.15
Q9-100	1.000	25.4	1.043			1.054		4,480	1,910			2.19

* For calculation of Groove Yield.

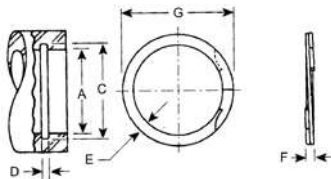
TYPE	MATERIALS
STAINLESS STEEL EXTERNAL	302 STAINLESS STEEL

STOCK NO.	A HOUSING DIA.		C GROOVE DIA.	D GROOVE WIDTH	F RING THICKNESS	G RING OUTER DIA.	E RADIAL WALL	THRUST LOAD BASED ON RING SHEAR	THRUST LOAD BASED ON GROOVE YIELD (45,000 P.S.I.)	MAX. CORNER RADIUS OR CHAMFER		WEIGHT lbs./M
	INCHES	MM.								*X	*CH	
Q11-50	.500	12.7	.474	.030 $\pm .003$ -.000	.025 $\pm .002$	.467	.045	2,000	550	.015	.012	.44
Q11-53	.531	13.5	.505			.498		2,130	640			.48
Q11-55	.551	14.0	.525 $\pm .002$			.518		2,210	700			.50
Q11-56	.532	14.3	.536			.529		2,250	730			.51
Q11-59	.594	15.1	.569			.561		2,380	740			.54
Q11-62	.625	15.9	.594			.585		2,500	970			.70
Q11-65	.656	16.7	.625			.617	.055	2,630	1,020	.019	.015	.74
Q11-66	.669	17.0	.638			.629		2,680	1,040			.75
Q11-68	.687	17.5	.656			.647		2,750	1,060			.77
Q11-71	.718	18.3	.687			.679		2,870	1,110			.81
Q11-75	.750	19.0	.719			.710 $\pm .000$	.065	3,360	1,100			1.27
Q11-78	.781	19.8	.750			.741 $\pm .013$		3,500	1,210	.024	.019	1.32
Q11-81	.812	20.6	.781 $\pm .003$			.771		3,640	1,260			1.38
Q11-84	.843	21.4	.812		.036 $\pm .003$ -.000	.803		3,780	1,310			1.43
Q11-87	.875	22.2	.838			.828		3,920	1,620			1.48
Q11-90	.906	23.0	.869			.860		4,060	1,680	.022	.018	1.53
Q11-93	.937	23.8	.900			.889		4,200	1,740			1.57
Q11-96	.968	24.4	.925			.916	.075	5,180	2,080			2.26
Q11-98	.984	25.0	.941		.042 $\pm .003$ -.000	.930		5,260	2,120			2.31
Q11-100	1.000	25.4	.957			.946		5,350	2,150			2.34

* For calculation of Groove Yield.

RETAINER RINGS

TYPE	MATERIALS
CARBON INTERNAL	CARBON SPRING STEEL WITH OIL-DIP FINISH



STOCK NO.	A HOUSING DIA.		C GROOVE DIA.	D GROOVE WIDTH	F RING THICKNESS	G RING OUTER DIA.	E RADIAL WALL	THRUST LOAD BASED ON RING SHEAR	THRUST LOAD BASED ON GROOVE YIELD (45,000 P.S.I.)	MAX. CORNER RADIUS OR CHAMFER		WEIGHT lbs./M		
	INCHES	MM.								*X	*CH			
Q9-50C	.500	12.7	.526	.030 +.003 -.000	.025 ±.002	.532	.045	2,000	405	.015	.012	.41		
Q9-51C	.512	13.0	.538			.544		2,050	420			.42		
Q9-53C	.531	13.5	.557			.564		2,130	455			.44		
Q9-56C	.562	14.3	.588			.594		2,250	495			.46		
Q9-59C	.594	15.1	.619			.626		2,380	535			.49		
Q9-62C	.625	15.9	.651			.658		2,500	610			.52		
Q9-65C	.656	16.7	.682			.689		2,630	670			.55		
Q9-68C	.687	17.5	.713			.720		2,750	725			.58		
Q9-71C	.718	18.3	.744			.751		2,870	790			.61		
Q9-75C	.750	19.0	.782			.790		3,360	800			1.14		
Q9-77C	.777	19.7	.808	.036 +.003 -.000	.031 ±.002	.817	.065	3,480	835	.024	.019	1.19		
Q9-78C	.781	19.8	.812			.821		3,500	840			1.20		
Q9-81C	.812	20.6	.843			.853 ±.013		3,640	915			1.25		
Q9-84C	.843	21.4	.880			.889 -.000		3,780	1,155			1.32		
Q9-86C	.866	22.0	.903			.913		3,880	1,250			1.35		
Q9-87C	.875	22.2	.912			.922		3,920	1,250	.022	.018	1.36		
Q9-90C	.906	22.9	.939			.949		4,060	1,335			1.41		
Q9-93C	.938	23.8	.975			.986		4,200	1,430			1.48		
Q9-96C	.968	24.4	1.015			1.025		4,340	1,950			.025	.021	2.11
Q9-98C	.987	25.0	1.030			1.041		4,420	1,865			.026	.021	2.15
Q9-100C	1.000	25.4	1.043	.042 +.003 -.000	.037 ±.002	1.054	4,480	1,910	2.19					

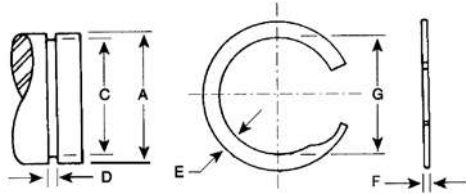
* For calculation of Groove Yield.

TYPE	MATERIALS
CARBON EXTERNAL	CARBON SPRING STEEL WITH OIL-DIP FINISH

STOCK NO.	A HOUSING DIA.		C GROOVE DIA.	D GROOVE WIDTH	F RING THICKNESS	G RING OUTER DIA.	E RADIAL WALL	THRUST LOAD BASED ON RING SHEAR	THRUST LOAD BASED ON GROOVE YIELD (45,000 P.S.I.)	MAX. CORNER RADIUS OR CHAMFER		WEIGHT lbs./M		
	INCHES	MM.								*X	*CH			
Q11-50C	.500	12.7	.474	.030	+.003 -.000	.025 ±.002	.045	2,000	550	.015	.012	.44		
Q11-53C	.531	13.5	.505					2,130	640			.48		
Q11-55C	.551	14.0	.525					2,210	700			.50		
Q11-56C	.532	14.3	.536					2,250	730			.51		
Q11-59C	.594	15.1	.569					2,380	740			.54		
Q11-62C	.625	15.9	.594				2,500	970	.055	.019	.015	.70		
Q11-65C	.656	16.7	.625				2,630	1,020				.74		
Q11-66C	.669	17.0	.638				2,680	1,040				.75		
Q11-68C	.687	17.5	.656				2,750	1,060				.77		
Q11-71C	.718	18.3	.687				2,870	1,110				.81		
Q11-75C	.750	19.0	.719				.710 +.000 .741 -.013	3,360	1,100	1.27				
Q11-78C	.781	19.8	.750				.036	+.003 -.000	.031 ±.002	3,500	1,210	.024	.019	1.32
Q11-81C	.812	20.6	.781							3,640	1,260			1.38
Q11-84C	.843	21.4	.812							3,780	1,310			1.43
Q11-87C	.875	22.2	.838							3,920	1,620			1.48
Q11-90C	.906	23.0	.869							4,060	1,680			1.53
Q11-93C	.937	23.8	.900				4,200	1,740	.075	.026	.021	1.57		
Q11-96C	.968	24.4	.925				5,180	2,080				2.26		
Q11-98C	.984	25.0	.941				5,260	2,120				2.31		
Q11-100C	1.000	25.4	.957	5,350	2,150	2.34								

RETAINER RINGS

TYPE	MATERIALS
CARBON EXTERNAL	CARBON SPRING STEEL WITH OIL-DIP FINISH

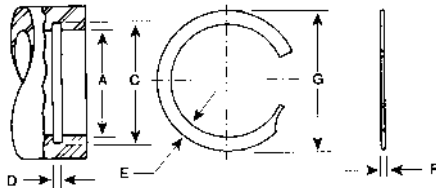


STOCK NO.	A HOUSING DIA.		C GROOVE DIA.	D GROOVE WIDTH	F RING THICKNESS	G RING OUTER DIA.	E RADIAL WALL	THRUST LOAD BASED ON RING SHEAR	THRUST LOAD BASED ON GROOVE YIELD (45,000 P.S.I.)	MAX. CORNER RADIUS OR CHAMFER		WEIGHT lbs./M
	INCHES	MM.								*X	*CH	
Q10-50	.500	12.7	.472	.022	.018 ±.0015	.467	.045	1,300	380	.007	.005	.32
Q10-56	.562	14.3	.534	.022		.529		1,460	500			.36
Q10-62	.625	15.9	.597 ±.002	.022 ±.002		.591 +.013		1,630	630			.40
Q10-68	.687	17.5	.659	.022 -0.000		.652 -0.000		1,790	770			.44
Q10-75	.750	19.0	.772	.022	.021 ±.0015	.715	.065	1,950	940	.011	.008	.48
Q10-81	.812	20.6	.770	.026		.762		2,460	1,330			.90
Q10-87	.875	22.2	.833	.026 ±.002		.825		2,660	1,590			.98
Q10-93	.937	23.8	.895 ±.003	.026 -0.000		.886		2,840	1,840			1.05
Q10-100	1.000	25.4	.958	.026	.025	.949	.088	3,030	2,100	.016	.012	1.12
Q10-106	1.062	27.0	1.018	.031		1.008 +.000 -.015		3,500	1,820			1.94

* For calculation of Groove Yield.

F

TYPE	MATERIALS
CARBON INTERNAL	CARBON SPRING STEEL WITH OIL-DIP FINISH

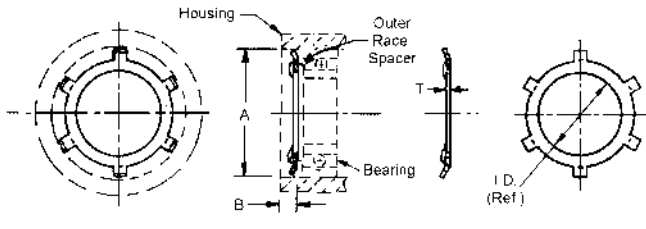


STOCK NO.	A HOUSING DIA.		C GROOVE DIA.	D GROOVE WIDTH	F RING THICKNESS	G RING OUTER DIA.	E RADIAL WALL	THRUST LOAD BASED ON RING SHEAR	THRUST LOAD BASED ON GROOVE YIELD (45,000 P.S.I.)	MAX. CORNER RADIUS OR CHAMFER		WEIGHT lbs./M
	INCHES	MM.								*X	*CH	
Q8-50	.500	12.7	.528	.022 ±.002	.018	.531	.045	1,300	530	.007	.005	.28
Q8-56	.562	14.3	.590			.593		1,460	660			.33
Q8-62	.625	15.9	.653 ±.002			.656 +.013		1,630	810			.37
Q8-68	.687	17.5	.715			.719 -0.000		1,790	960			.41
Q8-75	.750	19.0	.779	.026 ±.002	±.0015	.783	.065	1,950	1,090	.011	.008	.46
Q8-81	.812	20.6	.854			.862		2,460	1,705			.82
Q8-87	.875	22.2	.917			.926		2,660	1,840			.90
Q8-93	.937	23.8	.979			.989		2,840	1,970			.97
Q8-100	1.000	25.4	1.042 ±.003	.031	.025	1.052	.088	3,030	2,100	.016	.012	1.04
Q8-106	1.062	27.0	1.106 ±.004			1.117 +.015 -.000		3,500	2,340			1.74

* For calculation of Groove Yield.

RETAINER RINGS

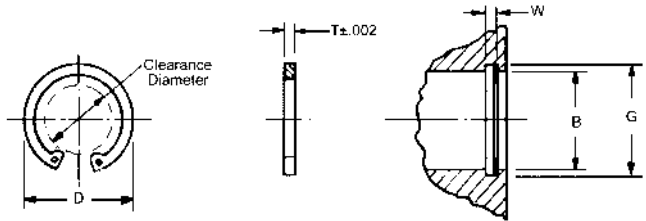
TYPE	HOUSING BORE SIZE	MATERIALS
BEARING INTERNAL PUSH IN DESIGN	3/8 TO 3	CARBON SPRING STEEL PLATED



STOCK NO.	A HOUSING	B MIN. END SPACE	T±.002	I.D. (REF. ONLY)
Q6-37-CP	3/8	.040	.010	3/16
Q6-50-CP	1/2	.060	.010	1/4
Q6-61-CP	5/8	.060	.010	3/8
Q6-82-CP	7/8	.080	.015	5/8
Q6-125-CP	1-1/4	.080	.015	15/16
Q6-156-CP	1-9/16	.080	.015	1-1/8
Q6-200-CP	2	.080	.015	1-9/16
Q6-237-CP	2-3/8	.100	.015	1-7/8
Q6-300-CP	3	.100	.015	2-1/4

Sold in packages of 10.

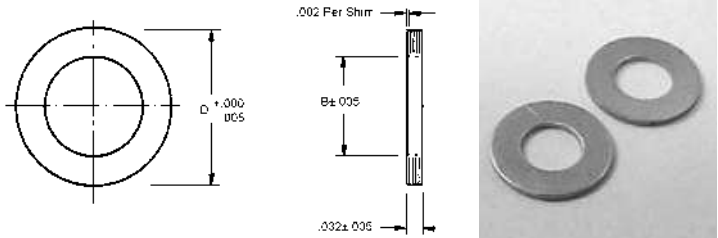
TYPE	HOUSING BORE SIZE	MATERIALS
INTERNAL LUG DESIGN	1/4 TO 1	SPRING STEEL



STOCK NO.	HOUSING BORE B	GROOVE DIA. G	GROOVE WIDTH W	RING THICKNESS T	FREE DIA. D	MAX. CLEAR. DIA.	PLIERS
Q4-25	1/4	.268	.020	.015	.280	.133	S13-25P
Q4-31	5/16	.330 ±.001	.020 ±.002	.015	.346	.191	S13-25P
Q4-37	3/8	.397	.029	.025	.415	.226	S13-37P
Q4-50	1/2	.530	.039	.035	.548	.290	S13-37P
Q4-62	5/8	.665 ±.002	.039	.035	.694	.380	S13-37P
Q4-75	3/4	.796	.039 ±.003	.035	.831	.490	S13-37P
Q4-87	7/8	.931	.046	.042	.971	.600	S13-37P
Q4-100	1	1.066 ±.003	.046	.042	1.111	.730	S13-37P
Q4-112	1-1/8	1.197 ±.004	.056 ±.004	.050	1.249	.815	S13-37P

SPACERS

TYPE	SHAFT SIZE	MATERIALS
LAMINATED INNER RACE SHIM	1/8" TO 3/8"	BRASS - MIL-S-22499C COMP. 2 TYPE 1 CL.-1

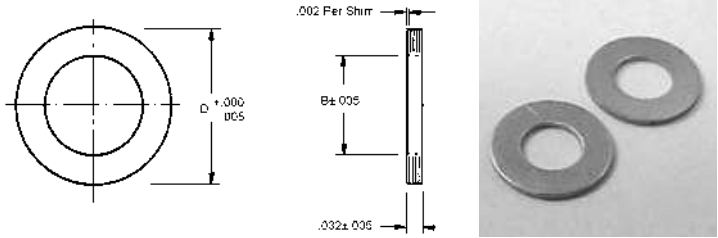


STOCK NO.	SHAFT SIZE	D	B
SS8-1	1/8	.234	.135
SS8-2	3/16	.375	.193
SS8-3	1/4	.500	.255
SS8-4	3/8	.625	.380

Sold in packages of 10.

The inner race spacer fits on shaft and pre-loads inner race of ball bearing.

TYPE	SHAFT SIZE	MATERIALS
LAMINATED OUTER RACE SHIM	1/8" TO 3/8"	BRASS - MIL-S-22499C COMP. 2 TYPE 1 CL.-1



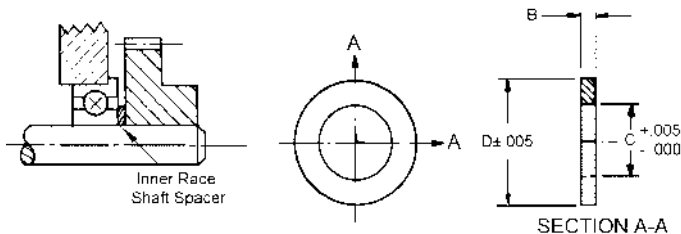
STOCK NO.	D	B
SS7-1	.370	.312
SS7-2	.498	.375
SS7-3	.623	.437
SS7-4	.873	.687

Sold in packages of 10.

The outer race spacer fits on shaft and pre-loads outer race of ball bearing.

SHAFT SPACERS

TYPE	SHAFT SIZE	MATERIALS
INNER RACE SHAFT	5/64 TO 3/16	18-8 STAINLESS STEEL OR ANODIZED ALUMINUM



Sold in packages of 10.

STOCK NO.	C	D	B	
SS1-49	.078	.164	.002	±.001
SS1-1			.004	
SS1-2			.006	
SS1-46			.008	±.002
SS1-3			.010	
SS1-47			.012	
SS1-48			.014	
SS1-4			.016	
SS1-50	.093	.203	.002	±.001
SS1-5			.004	
SS1-6			.006	
SS1-43			.008	±.002
SS1-7			.010	
SS1-44			.012	
SS1-45			.014	
SS1-8			.016	
SS1-51	.125	.187	.002	±.001
SS1-9			.004	
SS1-10			.006	
SS1-27			.008	±.002
SS1-11			.010	
SS1-28			.012	
SS1-29			.014	
SS1-12			.016	

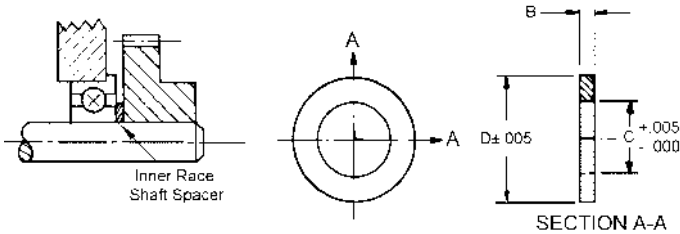
STAINLESS STOCK NO.	ALUMINUM STOCK NO.	C	D	B	
SS1-13	SS1-13-A	.125	.187	.031	±.003
SS1-14	SS1-14-A			.063	
SS1-30	SS1-30-A			.094	
SS1-15	SS1-15-A			.125	
SS1-31	SS1-31-A			.188	
SS1-16	SS1-16-A	.187	.250	.250	±.002
SS1-32	SS1-32-A			.375	
SS1-17	SS1-17-A			.500	
SS1-52	-			.002	±.001
SS1-18	-			.004	
SS1-19	-			.006	
SS1-36	-			.008	
SS1-20	-	.187	.250	.010	±.003
SS1-37	-			.012	
SS1-38	-			.014	
SS1-21	-			.016	
SS1-22	SS1-22-A			.031	
SS1-23	SS1-23-A	.187	.250	.063	±.003
SS1-40	SS1-40-A			.094	
SS1-24	SS1-24-A			.125	
SS1-41	SS1-41-A			.188	
SS1-25	SS1-25-A			.250	
SS1-42	SS1-42-A	.187	.250	.375	±.003
SS1-26	SS1-26-A			.500	

Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-SS1	STAINLESS STEEL SHAFT SPACERS, INNER RACE, 1/8, 3/16 AND 1/4" SHAFT SIZES (330 PIECES)

SHAFT SPACERS

TYPE	SHAFT SIZE	MATERIALS
INNER RACE SHAFT	1/4 TO 1/2	18-8 STAINLESS STEEL OR ANODIZED ALUMINUM



STAINLESS STOCK NO.	ALUMINUM STOCK NO.	C	D	B	
SS2-66				.002	
SS2-27	-			.004	±.001
SS2-28	-			.006	
SS2-60	-			.008	
SS2-29	-			.010	
SS2-61	-			.012	±.002
SS2-62	-			.014	
SS2-30	-	.250	.375	.016	
SS2-31	SS2-31-A			.031	
SS2-32	SS2-32-A			.063	
SS2-63	SS2-63-A			.094	
SS2-33	SS2-33-A			.125	
SS2-64	SS2-64-A			.188	
SS2-34	SS2-34-A			.250	±.003
SS2-65	SS2-65-A			.375	
SS2-35	SS2-35-A			.500	
SS2-80	-			.002	
SS2-81	-			.004	±.001
SS2-82	-			.006	
SS2-83	-			.008	
SS2-36	-			.010	
SS2-84	-	.313	.500	.012	±.002
SS2-85	-			.014	
SS2-37	-			.016	
SS2-38	-			.031	
SS2-39	-			.062	±.003
SS2-40	-			.125	

STAINLESS STOCK NO.	ALUMINUM STOCK NO.	C	D	B	
SS2-67	-			.002	
SS2-68	-			.004	±.001
SS2-69	-			.006	
SS2-70	-			.008	
SS2-41	-			.010	
SS2-71	-			.012	±.002
SS2-72	-			.014	
SS2-42	-	.375	.562	.016	
SS2-43	SS2-43-A			.031	
SS2-44	SS2-44-A			.063	
SS2-73	SS2-73-A			.094	
SS2-45	SS2-45-A			.125	
SS2-74	SS2-74-A			.188	±.003
SS2-75	SS2-75-A			.250	
SS2-76	SS2-76-A			.375	
SS2-77	SS2-77-A			.500	
SS2-90	-			.002	
SS2-91	-			.004	±.001
SS2-92	-			.006	
SS2-93	-			.008	
SS2-46	-			.010	
SS2-94	-	.500	.750	.012	±.002
SS2-95	-			.014	
SS2-47	-			.016	
SS2-48	-			.031	
SS2-49	-			.062	±.003
SS2-50	-			.125	

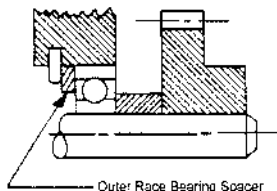
Sold in packages of 10.

Also available

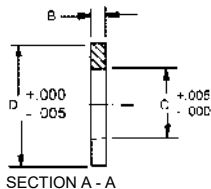
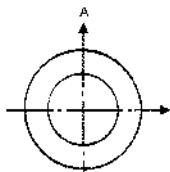
STOCK NO.	DESCRIPTION OF KIT
KIT-SS1	STAINLESS STEEL SHAFT SPACERS, INNER RACE, 1/8, 3/16 AND 1/4" SHAFT SIZES (330 PIECES)

BEARING SPACERS

TYPE	SHAFT SIZE	MATERIALS
OUTER RACE	5/32 TO 1-1/8	18-8 STAINLESS STEEL OR ANODIZED ALUMINUM



Outer Race Bearing Spacer



SECTION A - A

STAINLESS STOCK NO.	ALUMINUM STOCK NO.	D	C	B	
SS3-51	-	.153	.088	.003	±.001
SS3-52	-			.005	
SS3-53	-			.007	
SS3-54	-			.010	±.002
SS3-55	-			.020	
SS3-56	-	.178	.123	.003	±.001
SS3-57	-			.005	
SS3-58	-			.007	
SS3-59	-			.010	±.002
SS3-60	-			.020	
SS3-50	-	.248	.167	.003	±.003
SS3-1	-			.005	
SS3-32	-			.007	
SS3-2	-			.010	
SS3-71	-			.020	
SS3-33	-	.310	.206	.003	±.001
SS3-3	-			.005	
SS3-34	-			.007	
SS3-4	-			.010	±.002
SS3-72	-			.020	
SS3-35	-	.373	.253	.003	±.001
SS3-5	-			.005	
SS3-36	-			.007	
SS3-6	-			.010	±.002
SS3-7	-			.020	
SS3-8	SS3-8-A			.032	±.003
SS3-9	SS3-9-A			.062	
SS3-10	SS3-10-A			.125	
SS3-41	SS3-41-A			.250	
SS3-42	SS3-42-A			.375	
SS3-43	SS3-43-A			.500	
SS3-37	-			.003	±.001
SS3-11	-			.005	
SS3-38	-			.007	
SS3-12	-			.010	±.002
SS3-13	-			.020	

STAINLESS STOCK NO.	ALUMINUM STOCK NO.	D	C	B	
SS3-14	SS3-14-A	.498	.378	.032	±.003
SS3-15	SS3-15-A			.062	
SS3-16	SS3-16-A			.125	
SS3-44	SS3-44-A			.250	
SS3-45	SS3-45-A			.375	
SS3-46	SS3-46-A			.500	
SS3-39	-	.623	.503	.003	±.001
SS3-17	-			.005	
SS3-40	-			.007	
SS3-18	-			.010	±.002
SS3-19	-			.020	
SS3-20	SS3-20-A			.032	±.003
SS3-21	SS3-21-A			.062	
SS3-22	SS3-22-A			.125	
SS3-47	SS3-47-A			.250	
SS3-48	SS3-48-A			.375	
SS3-49	SS3-49-A			.500	
SS3-23	-	.685	.562	.016	±.02
SS3-24	-			.032	±.003
SS3-25	-			.062	
SS3-61	-	.873	.687	.003	±.001
SS3-62	-			.005	
SS3-63	-			.007	
SS3-64	-			.010	±.002
SS3-26	-			.016	
SS3-65	-			.020	±.003
SS3-27	SS3-27-A			.032	
SS3-28	SS3-28-A			.062	
SS3-67	SS3-67-A			.125	
SS3-68	SS3-68-A			.250	
SS3-69	SS3-69-A			.375	
SS3-70	SS3-70-A			.500	
SS3-29	-	1.120	.937	.016	±.002
SS3-30	-			.032	±.003
SS3-31	-			.062	

Sold in packages of 10.

Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-SS1	STAINLESS STEEL SHAFT SPACERS, INNER RACE, 1/8, 3/16 AND 1/4" SHAFT SIZES (330 PIECES)

BALLS

TYPE	DIAMETER	MATERIALS
HARDENED STEEL	1/16" TO 1/2"	ROCKWELL: C 58-65 440 STAINLESS STEEL C 60-67 52100 CHROME STEEL

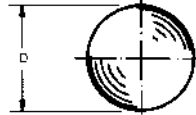


Sold in packages of 10.

STAINLESS STEEL STOCK NO.	CHROME STEEL STOCK NO.	D DIA.
PT4-2	PT5-2	1/16
PT4-3	PT5-3	3/32
PT4-4	PT5-4	1/8
PT4-5	PT5-5	5/32
PT4-6	PT5-6	3/16
-	PT5-7	7/32
PT4-8	PT5-8	1/4
PT4-10	PT5-10	5/16
PT4-12	PT5-12	3/8
PT4-16	PT5-16	1/2

DIAMETER TOLERANCE:
440 Stainless Steel, Grade #50±.0002
52100 Chrome Steel, Grade #25±.0001

SPHERICITY TOLERANCE:
440 Stainless Steel, Grade #50±.000050
52100 Chrome Steel, Grade #25±.00025



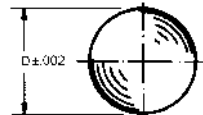
TYPE	DIAMETER	MATERIALS
PLASTIC	1/16" TO 1/2"	NYLON, POLYURETHANE, AND TEFLON



Sold in packages of 10.

NYLON STOCK NO.	POLYURETHANE STOCK NO.	TEFLON STOCK NO.	D DIA.
PT1-2	-	-	1/16
PT1-3	-	-	3/32
PT1-4	-	PT3-4	1/8
PT1-6	-	PT3-6	3/16
PT1-8	PT2-8	PT3-8	1/4
PT1-12	PT2-12	PT3-12	3/8
PT1-16	PT2-16	PT3-16	1/2

- Ideal for float, check, relief valves
- Non-corrosive, quiet running and self lubricating



TYPE	DIAMETER	MATERIALS
BRASS	1/8" TO 1/2"	BRASS HARDNESS 75-87 RB (TYP.)

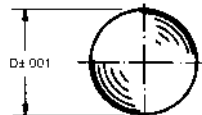


Sold in packages of 10.

STOCK NO.	SIZE	DIAMETER D
PT9-4	1/8	.125
PT9-5	5/32	.15625
PT9-6	3/16	.1875
PT9-7	7/32	.21875
PT9-8	1/4	.250
PT9-9	9/32	.28125
PT9-10	5/16	.3125
PT9-11	11/32	.3437
PT9-12	3/8	.375
PT9-14	7/16	.4375
PT9-16	1/2	.500

CHARACTERISTICS
Resistance to corrosion by water.
Electrical conductivity.

NOTE: Other sizes available upon request.
Brass surface finish 6-8 microfinish.



TYPE	DIAMETER	MATERIALS
TITANIUM	1/8" TO 3/8"	TITANIUM 6A4V ELI PER ASTM F136

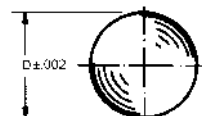


Sold in packages of 10.

STOCK NO.	SIZE	DIAMETER D
PT8-4	1/8	.125
PT8-5	5/32	.15625
PT8-6	3/16	.1875
PT8-7	7/32	.21875
PT8-8	1/4	.250
PT8-10	5/16	.3125
PT8-12	3/8	.375

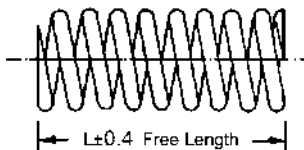
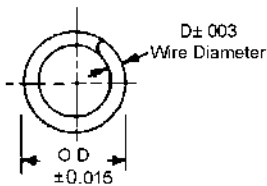
CHARACTERISTICS
Exceptional anti-corrosive properties.
Operates effectively under high temperatures.
High level of tension/compression strength.

NOTE: Other sizes available upon request.



SPRINGS

TYPE	STYLE	MATERIALS
COMPRESSION	RIGHT HAND - OPEN WOUND ENDS SQUARED	302 STAINLESS STEEL SPRING TEMPERED



STOCK NO.	OUTSIDE DIA.	D	L	COILS	K $\pm 10\%$
SPR1-1	.057	.007	3/8	18	1.58
SPR9-1		.008	1/4	13	4.41
SPR9-2		.008	1/2	24	2.08
SPR9-3	.088	.010	1/4	9	4.16
SPR1-2		.010	1/2	17	1.91
SPR9-5		.012	3/8	14	5.41
SPR9-6		.012	3/4	24	2.66
SPR9-7	.120	.016	1/4	7	14.57
SPR9-8		.016	1/2	13	6.91
SPR9-9		.018	3/8	10	14.91
SPR1-3		.018	5/8	16	8.82
SPR9-10		.018	3/4	19	7.08
SPR9-11		.020	3/8	11	23.07
SPR9-12		.020	3/4	20	10.99
SPR9-13		.022	1/2	14	25.90
SPR9-14		.022	1	27	12.24
SPR9-15	.180	.018	1/2	8	5.58
SPR9-16		.018	1	14	2.66
SPR9-17		.020	1/2	8	8.08
SPR9-18		.020	1	15	3.83
SPR1-4		.022	1/2	8	11.82
SPR9-20		.022	1	16	5.41
SPR9-21	.180	.024	1/2	9	15.74
SPR9-22		.024	1	17	7.49
SPR9-23		.026	1/2	9	22.32
SPR9-24		.026	1	17	10.16
SPR9-25		.029	3/4	14	21.49
SPR9-26		.029	1-1/2	26	10.32
SPR9-27		.032	3/4	14	34.40
SPR9-28		.032	1 1/2	27	15.66
SPR9-29	.240	.026	1/2	6	17.40
SPR1-5		.026	5/8	8	10.57
SPR9-30		.026	1	12	6.16
SPR9-31		.035	1/2	8	40.40
SPR9-32		.035	1	14	18.65
SPR9-33		.038	3/4	10	38.40
SPR9-34		.038	1-1/2	20	17.82
SPR9-35		.040	1	14	32.48
SPR9-36		.040	2	27	15.57
SPR1-6	.300	.032	5/8	6	5.16
SPR1-7	.360	.042	7/8	8	21.24
SPR1-8	.420	.045	1	7	16.66
SPR1-9	.480	.055	1-1/4	8	22.49
SPR1-10	.600	.063	1-1/2	8	19.99
SPR1-11	.720	.072	2	9	16.66

K = Average Spring Rate lbs./in.
Sold in packages of 10.

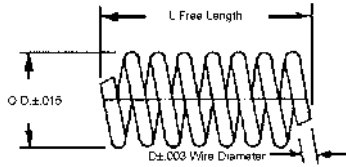
Also available

STOCK NO.	DESCRIPTION OF KIT
KIT-SPR9	COMPRESSION SPRING KIT - ASSORTED SIZES .057 TO .240 DIAMETER TO 2" LONG (141 PIECES)

SPRINGS

TYPE	LENGTHS	MATERIALS
EXPERIMENTAL	1-1/2 TO 2-1/2	302 STAINLESS STEEL SPRING TEMPERED

STOCK NO.	OUTSIDE DIA.	D	L	APPROX. NO. COILS	K $\pm 10\%$
SPR7-1	.093	.016	1-1/2	32	5.98
SPR7-2	.125	.018	2	37	3.06
SPR7-7	.140	.016	11	17	3.32
SPR7-8	.172	.018	1-1/4	19	2.15
SPR7-3	.187	.023	2-1/2	37	2.26
SPR7-4	.250	.025	3	29	1.67
SPR7-9	.250	.023	1-1/2	22	1.59
SPR7-10	.328	.025	1-3/4	19	1.06
SPR7-11	.390	.032	2	16	2.11
SPR7-12	.468	.040	2-1/4	12	4.11
SPR7-13	.609	.047	2-1/2	15	2.43



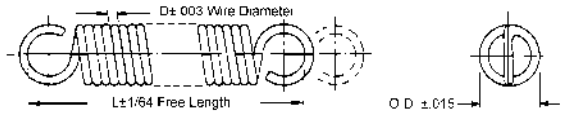
- Cut you own length
- Ends can be ground or looped

K = Average Spring Rate lbs./in.

Sold in packages of 10.

TYPE	LENGTHS	MATERIALS
EXTENSION - FULL TWIST LOOPS CLOSE WOUND	1/4" TO 5"	302 STAINLESS STEEL SPRING TEMPERED

STOCK NO.	OUTSIDE DIA.	D	L	K $\pm 10\%$
SPR10-1	.063	.008	1/4	1.7
SPR2-1	.063	.008	3/8	.9
SPR10-2	.063	.008	1/2	.6
SPR10-3	.093	.010	3/8	1.0
SPR2-2	.093	.012	1/2	1.7
SPR10-4	.093	.010	3/4	.3
SPR2-3	.120	.018	1	2.7
SPR10-5	.120	.016	3/4	2.5
SPR10-6	.120	.016	1-1/4	1.1
SPR10-7	.120	.020	3/4	6.9
SPR10-8	.120	.020	1-1/4	3.7
SPR2-4	.180	.026	1-1/4	4.2
SPR10-9	.180	.022	3/4	3.6
SPR10-10	.180	.022	1-1/4	1.7
SPR10-11	.180	.026	3/4	8.8
SPR10-13	.180	.031	3/4	22.5
SPR10-14	.180	.031	1-1/4	10.9
SPR2-5	.240	.031	1-1/2	3.5
SPR10-15	.240	.026	3/4	4.7
SPR10-16	.240	.026	1-1/4	1.7
SPR10-17	.240	.029	3/4	8.2
SPR10-18	.240	.029	1-1/4	3.2
SPR10-19	.240	.031	3/4	11.5
SPR10-20	.240	.031	1-1/4	4.4
SPR10-21	.240	.034	3/4	18.4
SPR10-22	.240	.034	1-1/4	7.4
SPR2-6	.360	.055	2	15.2
SPR10-27	.360	.031	1	2.7
SPR10-28	.360	.031	1-1/2	1.2
SPR10-29	.360	.037	1	6.6
SPR10-30	.360	.037	1-1/2	2.8
SPR10-31	.360	.045	1-1/4	11.3
SPR10-32	.360	.045	2	5.2
SPR10-33	.360	.055	1-1/4	32.2
SPR10-35	.500	.037	1-1/4	2.3
SPR10-36	.500	.037	2	.8
SPR2-7	.500	.055	2-1/2	4.2
SPR2-8	.650	.055	3	1.6
SPR2-9	.750	.063	4	1.4
SPR2-10	.580	.075	4-1/2	2.1
SPR2-11	1.000	.075	5	1.2

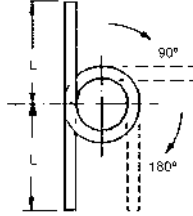
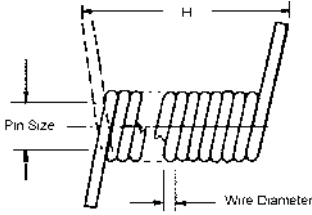


Sold in packages of 10.

F

SPRINGS

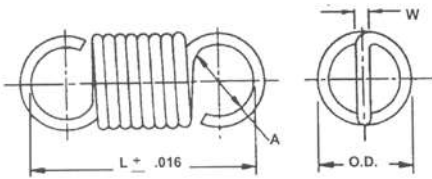
TYPE	LENGTHS	MATERIALS
TORSION LEFT HAND WOUND	1/2" TO 2"	STAINLESS STEEL



STOCK NO.	WIRE DIA.	OUTSIDE DIA.	L	PIN SIZE	H	TORQUE IN.LBS. @ 180
SPR3-1	.012	.166	.50	.109	.059	.047
SPR3-2	.015	.183	.75	.109	.075	.093
SPR3-3	.018	.216	.75	.140	.109	.140
SPR3-4	.021	.247	1.00	.156	.127	.218
SPR3-5	.025	.304	1.00	.203	.151	.375
SPR3-6	.030	.394	1.00	.250	.181	.625
SPR3-7	.035	.450	1.25	.281	.212	1.000
SPR3-8	.040	.518	2.00	.343	.242	1.375
SPR3-9	.048	.618	2.00	.406	.292	2.500

Special springs on request, send sketch.
Right hand wound on request.
Sold in packages of 10.

TYPE	LENGTHS	MATERIALS
ANTI-BACKLASH EXTENSION	3/8 TO 27/64	302 STAINLESS STEEL



Extension Spring

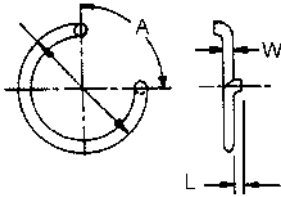


STOCK NO.	OUTSIDE DIA.	W	NO. OF COILS	L	A	K LBS./IN.
SPR5-1	.105	.008	19	.375	.11	0.3
SPR5-9	.120	.010	17	.375	.10	0.5
SPR5-2	.105	.012	13	.375	.10	2.5
SPR5-6	.120	.012	14	.375	.09	1.4
SPR5-5	.090	.012	20	.375	.07	2.6
SPR5-3	.105	.015	11	.375	.09	7.7
SPR5-10	.120	.015	11	.350	.09	5.0
SPR5-3-A	.120	.016	11	.426	.12	6.5
SPR5-11	.120	.018	9	.350	.09	14.0
SPR5-4	.105	.020	10	.375	.09	32.0

Sold in packages of 10.

SPRINGS

TYPE	MATERIALS
ANTI-BACKLASH TORSION	302 STAINLESS STEEL

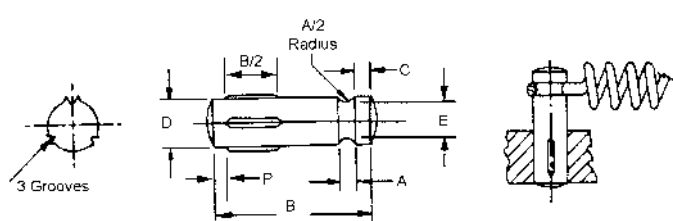


STOCK NO.	OUTSIDE DIA.	W	L	A	K LBS.-IN. 360°
SPR6-3	.37	.030	.045	90	7.6
SPR6-1	.51	.015	.045	90	0.3
SPR6-2	.51	.020	.045	90	1.0
SPR6-5	.53	.028	.045	90	4.0
SPR6-10	.55	.032	.045	90	6.3
SPR6-12	.62	.026	.031	135	2.5
SPR6-14	.65	.022	.045	135	1.3
SPR6-15	.65	.026	.045	135	2.4
SPR6-16	.72	.024	.031	135	1.5
SPR6-6	.81	.026	.062	135	2.0

Sold in packages of 10.

SPRING POSTS

DIAMETER	MATERIALS
1/8" TO 1/4"	CARBON STEEL - ZINC PLATED QQ-Z325 TYPE 1-C1.3

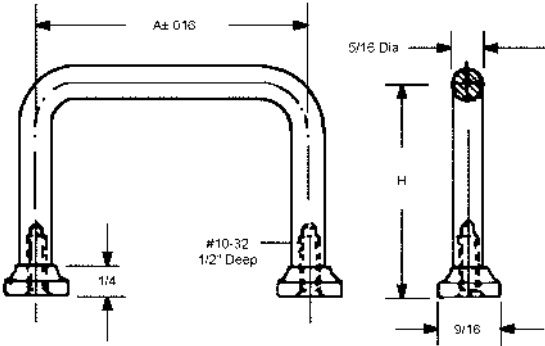


Sold in packages of 10.

STOCK NO.	D	A	B	E	C	CROWN RADIUS	CROWN HEIGHT	P
CL-1	1/8	1/16	1/2	.083	1/32	5/32	.013	1/32
CL-2	3/16	1/16	5/8	.125	3/64	1/4	.018	1/16
CL-3	1/4	3/32	3/4	.167	1/16	5/16	.026	1/16

CHASSIS HANDLES

TYPE	MATERIALS
TAP	303 STAINLESS STEEL



STOCK NO.	A	H
HA-1	3.000	1-1/2
HA-2	4.500	1-1/2
HA-3	5.500	1-5/8
HA-4	6.500	1-3/4

COUPLINGS & CLUTCHES

Table of Contents

COUPLINGS	
GUIDE FOR COUPLING SELECTION	G 2
TECHNICAL DATA	G 2
THIN WALL COUPLINGS	G 3 - G 6
POLYURETHANE COUPLINGS	G 7
SIX BEAM FLEXIBLE COUPLINGS	G 8 - G 13
THREE BEAM FLEXIBLE COUPLINGS	G 14 - G 17
SINGLE BEAM FLEXIBLE COUPLINGS	G 18 - G 19
ABSORBATHANE FLEXIBLE COUPLINGS	G 20
NEO-FLEX COUPLINGS	G 21 - G 22
SLEEVE COUPLINGS	G 23
SPIDER COUPLINGS	G 24
MULTI-JAW COUPLINGS	G 25
BELLOWS COUPLINGS	G 26 - G 28
OLDHAM COUPLINGS	G 29 - G 32
UNIVERSAL LATERAL COUPLINGS	G 33 - G 34
UNIVERSAL JOINTS	G 35 - G 38
TELESCOPIC UNIVERSAL JOINTS	G 39
OVERRUNNING COUPLINGS	G 40
SLIP COUPLINGS	G 41 - G 43
OLDHAM SLIP COUPLINGS	G 44
INLINE COUPLING SLIP CLUTCHES	G 45
SLIP CLUTCHES	G 46 - G 48
MINIATURE SLIP CLUTCHES	G 49
SLIP CLUTCHES & COUPLINGS	G 50
ROLLER CLUTCHES	G 51

GUIDE FOR COUPLING SELECTION

TECHNICAL DATA

Dimensional Parameters					Environmental Parameters				
COUPLING TYPE		TORQUE RANGE IN.-OZ.	RANGE OF MAXIMUM PARALLEL MISALIGN.	RANGE OF MAXIMUM ANGULAR MISALIGN.	HIGH TORSIONAL STIFFNESS	VIBRATION DAMPENING	VACUUM COMPATIBILITY	ELECTRICAL INSULATION	CLEAN ROOM ENVIRONMENT
INFORMATION TRANSMITTING COUPLINGS	MULTIBEAM: -ST/ST+AL -PLASTIC	64-7200 35-1273	.005-.038 .005-.038	5°-7° 5°-10°	E G	- -	E -	- E	E G
	BEAMED	56-1488	.004-.005	5°	E	-	E	-	E
	BELLOWS	40-175	.012-.027	4°-7°	E	-	E	-	E
	SLEEVE	5-5833	0	0°	E	-	E	-	E
SHOCK ABSORBING COUPLINGS	SPIDER	42-3520	.031-.078	1°	-	G	-	E	G
	NEO-FLEX	150	.005	1°	-	E	-	E	G
	ABSORBATHANE	48-640	.094-.125	10°-15°	-	E	-	E	G
MISALIGNMENT COUPLINGS	UNIVERSAL LATERAL	38-607	.050	5°-10°	G	-	-	E	-
	OLDHAM	16-3200	.030-.200	1/2°-1 1/4°	G	-	-	E	-
HIGH MISALIGNMENT COUPLINGS	UNIVERSAL JOINTS: - ST/ST	480-4240	0	30°	G	-	E	-	-
	- DELRIN®	16-239	0	45°	-	-	-	E	-
	SINGLE JOINT -DELRIN®	11-183	.220-.610	90°	-	-	-	E	-
	DOUBLE JOINT								
	TELESCOPIC UNIVERSAL JOINT	55-239	1.920-3.770	60°	-	-	-	E	-

E = Excellent G = Good - = Not Recommended

W.M. Berg Inc. manufactures a complete line of precision made, high quality couplings. Available in inch and metric sizes and many styles to accommodate any design requirement. Couplings can be placed into the following four categories:

- 1. Information Transmitting Couplings** - These zero backlash high torsional rigidity couplings are for precision positioning applications where constant velocity is required for accurate feedback control.
- 2. Shock Absorbing Couplings** - As a result of flexible plastic members connecting their hubs, these couplings dampen vibrations and shock loads and electrically insulate shafting.
- 3. Misalignment Couplings** - The sliding center elements of these couplings compensate for lateral and angular misalignment caused by tolerance buildup or as a result of mounting.
- 4. High Misalignment Couplings** - These couplings allow the designer to have shafts that are intentionally offset, laterally or angularly, by a large amount.

The above chart is a guide for the proper selection of the Berg coupling best suited for your particular application.

THIN WALL COUPLINGS

BORE	O.D	TORQUE	MATERIAL
1/8" TO 5/16"	.85	28 IN. LBS.	ALUMINUM HUBS

- Shaft to shaft couplings
- Pin to pin phase adjustment
- No lubrication required
- Positive drive
- 3° max. angular misalignment
- 1/32 max. lateral misalignment
- -65° to 180° F temperature range
- Quick Disconnect

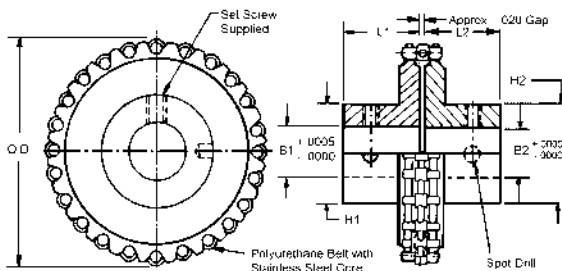
STOCK NO.	B1	H1	L1	B2	H2	L2
CC6-1	.1248	5/16	5/16	.1248	5/16	5/16
CC6-2	.1248			.1562	5/16	5/16
CC6-3	.1248			.1873	3/8	11/32
CC6-4	.1248			.2498	1/2	3/8
CC6-5	.1873	3/8	11/32	.1873	3/8	11/32
CC6-6	.1873			.2498	1/2	3/8
CC6-7	.2498	1/2	3/8	.2405	3/8	11/32
CC6-8	.2498			.2498	1/2	3/8
CC6-9	.3123	1/2	3/8	.1873	3/8	11/32
CC6-10	.3123			.2498	1/2	3/8
CC6-11	.3123			.3123	1/2	3/8

BORE	O.D	TORQUE	MATERIAL
1/8" TO 1/2"	1.09"	50 IN. LBS.	ALUMINUM HUBS

- Shaft to shaft couplings
- Pin to pin phase adjustment
- No lubrication required
- Positive drive
- 3° max. angular misalignment
- 1/32 max. lateral misalignment
- -65° to 180° F temperature range
- Quick Disconnect

STOCK NO.	B1	H1	L1	B2	H2	L2
CC6-20	.1248	5/16	5/16	.1248	5/16	5/16
CC6-21	.1248			.1562	5/16	5/16
CC6-22	.1248			.1873	3/8	11/32
CC6-23	.1248			.2498	1/2	3/8
CC6-24	.1873	3/8	11/32	.1873	3/8	11/32
CC6-25	.1873			.2498	1/2	3/8
CC6-26	.2498	1/2	3/8	.2405	3/8	11/32
CC6-27	.2498			.2498	1/2	3/8
CC6-28	.3123	1/2	3/8	.1873	3/8	11/32
CC6-29	.3123			.2498	1/2	3/8
CC6-30	.3123			.3123	1/2	3/8
CC6-31	.3748*	1	5/8	.2498	1/2	3/8
CC6-32	.3748*			.3123	1/2	3/8
CC6-33	.3748*			.3748*	1	5/8
CC6-34	.4998*			.2498	1/2	3/8
CC6-37	.4998*	1-1/4	5/8	.4998*	1-1/4	5/8

- * Two piece construction - Aluminum Sprocket with Stainless Steel Hubs



Available on request: Other bore sizes, larger torque ratings

THIN WALL COUPLINGS

BORE	O.D	TORQUE	MATERIAL
1/8" TO 1/2"	1.35"	80 IN. LBS.	ALUMINUM HUBS

- Shaft to shaft couplings
- Pin to pin phase adjustment
- No lubrication required
- Positive drive
- 3° max. angular misalignment
- 1/32 max. lateral misalignment
- -65° to 180° F temperature range
- Quick Disconnect

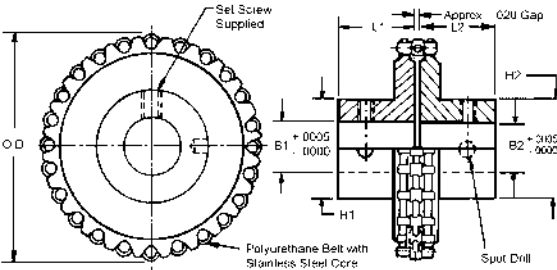
STOCK NO.	B1	H1	L1	B2	H2	L2
CC6-40	.1248	5/16	5/16	.1248	5/16	5/16
CC6-41	.1248			.1562	5/16	5/16
CC6-42	.1248			.1873	3/8	11/32
CC6-43	.1248			.2498	1/2	3/8
CC6-44	.1873	3/8	11/32	.1873	3/8	11/32
CC6-45	.1873			.2498	1/2	3/8
CC6-46	.2498	1/2	3/8	.2405	3/8	11/32
CC6-47	.2498			.2498	1/2	3/8
CC6-48	.3123	1/2	3/8	.1873	3/8	11/32
CC6-49	.3123			.2498	1/2	3/8
CC6-50	.3123			.3123	1/2	3/8
CC6-51	.3748	1	5/8	.2498	1/2	3/8
CC6-52	.3748			.3123	1/2	3/8
CC6-53	.3748			.3748	1	5/8
CC6-54	.4998	1-1/4	5/8	.2498	1/2	3/8
CC6-55	.4998			.3123	1-1/2	3/8
CC6-56	.4998			.3748	1	5/8
CC6-57	.4998			.4998	1-1/4	5/8

BORE	O.D	TORQUE	MATERIAL
1/4" TO 1/2"	1.60"	115 IN. LBS.	ALUMINUM HUBS

- Shaft to shaft couplings
- Pin to pin phase adjustment
- No lubrication required
- Positive drive
- 3° max. angular misalignment
- 1/32 max. lateral misalignment
- -65° to 180° F temperature range
- Quick Disconnect

STOCK NO.	B1	H1	L1	B2	H2	L2
CC6-67	.2498	1/2	3/8	.2498	1/2	3/8
CC6-68	.3123	1/2	3/8	.1873	3/8	11/32
CC6-69	.3123			.2498	1/2	3/8
CC6-70	.3123			.3123	1/2	3/8
CC6-71	.3748*	1	5/8	.2498	1/2	3/8
CC6-72	.3748*			.3123	1/2	3/8
CC6-73	.3748*			.3748*	1	5/8
CC6-74	.4998*	1-1/4	5/8	.2498	1/2	3/8
CC6-75	.4998*			.3123	1-1/2	3/8
CC6-76	.4998*			.3748*	1	5/8
CC6-77	.4998*			.4998*	1-1/4	5/8

* Two piece construction - Aluminum Sprocket with Stainless Steel Hubs



Available on request: Other bore sizes, larger torque ratings

THIN WALL COUPLINGS

BORE	O.D	TORQUE	MATERIAL
1/8" TO 5/16"	.85"	28 IN. LBS.	STAINLESS STEEL HUBS

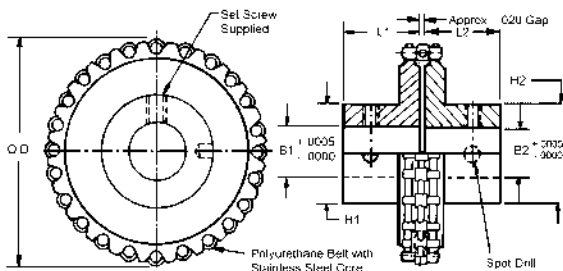
- Shaft to shaft couplings
- Pin to pin phase adjustment
- No lubrication required
- Positive drive
- 3° max. angular misalignment
- 1/32 max. lateral misalignment
- -65° to 180° F temperature range
- Quick Disconnect

STOCK NO.	B1	H1	L1	B2	H2	L2
CC7-1	.1248	5/16	5/16	.1248	5/16	5/16
CC7-2	.1248			.1562	5/16	5/16
CC7-3	.1248			.1873	3/8	11/32
CC7-4	.1248			.2498	1/2	3/8
CC7-5	.1873	3/8	11/32	.1873	3/8	11/32
CC7-6	.1873			.2498	1/2	3/8
CC7-7	.2498	1/2	3/8	.2405	3/8	11/32
CC7-8	.2498			.2498	1/2	3/8
CC7-9	.3123	1/2	3/8	.1873	3/8	11/32
CC7-10	.3123			.2498	1/2	3/8
CC7-11	.3123			.3123	1/2	3/8

BORE	O.D	TORQUE	MATERIAL
1/8" TO 1/2"	1.09"	50 IN. LBS.	STAINLESS STEEL

- Shaft to shaft couplings
- Pin to pin phase adjustment
- No lubrication required
- Positive drive
- 3° max. angular misalignment
- 1/32 max. lateral misalignment
- -65° to 180° F temperature range
- Quick Disconnect

STOCK NO.	B1	H1	L1	B2	H2	L2
CC7-20	.1248	5/16	5/16	.1248	5/16	5/16
CC7-21	.1248			.1562	5/16	5/16
CC7-22	.1248			.1873	3/8	11/32
CC7-23	.1248			.2498	1/2	3/8
CC7-24	.1873	3/8	11/32	.1873	3/8	11/32
CC7-25	.1873			.2498	1/2	3/8
CC7-26	.2498	1/2	3/8	.2405	3/8	11/32
CC7-27	.2498			.2498	1/2	3/8
CC7-28	.3123	1/2	3/8	.1873	3/8	11/32
CC7-29	.3123			.2498	1/2	3/8
CC7-30	.3123			.3123	1/2	3/8
CC7-31	.3748*	1	5/8	.2498	1/2	3/8
CC7-32	.3748*			.3123	1/2	3/8
CC7-33	.3748*			.3748*	1	5/8
CC7-34	.4998*	1-1/4	5/8	.2498	1/2	3/8
CC7-37	.4998*			.4998*	1-1/4	5/8



Available on request: Other bore sizes, larger torque ratings

THIN WALL COUPLINGS

BORE	O.D	TORQUE	MATERIAL
1/8" TO 1/2"	1.35"	80 IN. LBS.	STAINLESS STEEL HUBS

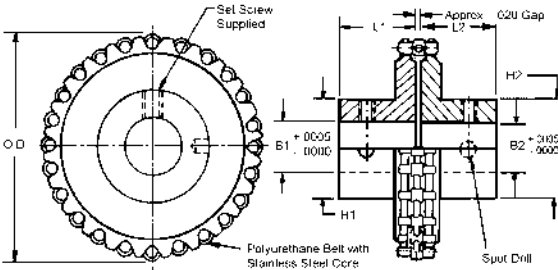
- Shaft to shaft couplings
- Pin to pin phase adjustment
- No lubrication required
- Positive drive
- 3° max. angular misalignment
- 1/32 max. lateral misalignment
- -65° to 180° F temperature range
- Quick Disconnect

STOCK NO.	B1	H1	L1	B2	H2	L2
CC7-40	.1248	5/16	5/16	.1248	5/16	5/16
CC7-41	.1248			.1562	5/16	5/16
CC7-42	.1248			.1873	3/8	11/32
CC7-43	.1248			.2498	1/2	3/8
CC7-44	.1873	3/8	11/32	.1873	3/8	11/32
CC7-45	.1873			.2498	1/2	3/8
CC7-46	.2498	1/2	3/8	.2405	3/8	11/32
CC7-47	.2498			.2498	1/2	3/8
CC7-48	.3123	1/2	3/8	.1873	3/8	11/32
CC7-49	.3123			.2498	1/2	3/8
CC7-50	.3123			.3123	1/2	3/8
CC7-51	.3748	1	5/8	.2498	1/2	3/8
CC7-52	.3748			.3123	1/2	3/8
CC7-53	.3748			.3748	1	5/8
CC7-54	.4998	1-1/4	5/8	.2498	1/2	3/8
CC7-55	.4998			.3123	1-1/2	3/8
CC7-56	.4998			.3748	1	5/8
CC7-57	.4998			.4998	1-1/4	5/8

BORE	O.D	TORQUE	MATERIAL
1/4" TO 1/2"	1.60"	115 IN. LBS.	STAINLESS STEEL

- Shaft to shaft couplings
- Pin to pin phase adjustment
- No lubrication required
- Positive drive
- 3° max. angular misalignment
- 1/32 max. lateral misalignment
- -65° to 180° F temperature range
- Quick Disconnect

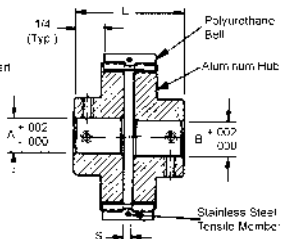
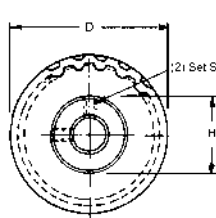
STOCK NO.	B1	H1	L1	B2	H2	L2
CC7-67	.2498	1/2	3/8	.2498	1/2	3/8
CC7-68	.3123	1/2	3/8	.1873	3/8	11/32
CC7-69	.3123			.2498	1/2	3/8
CC7-70	.3123			.3123	1/2	3/8
CC7-71	.3748*	1	5/8	.2498	1/2	3/8
CC7-72	.3748*			.3123	1/2	3/8
CC7-73	.3748*			.3748	1	5/8
CC7-74	.4998*	1-1/4	5/8	.2498	1/2	3/8
CC7-75	.4998*			.3123	1-1/2	3/8
CC7-76	.4998*			.3748*	1	5/8
CC7-77	.4998*			.4998*	1-1/4	5/8



Available on request: Other bore sizes, larger torque ratings

POLYURETHANE COUPLINGS

BORE	MATERIAL	BERG'S ® NAME
1/8" TO 1/2"	POLYURETHANE WITH ANODIZED ALUMINUM HUBS	FLEX-E-GRIP



STOCK NO.	BORES A & B	D	H	L	S	MAXIMUM ANGULAR MISALIGN.	MAXIMUM SHAFT MISALIGN	MAXIMUM TORQUE (IN LBS.)
CC9-20-2	.125							
CC9-20-3	.188	.56	1/2	5/8	3/64	3°	.005	25
CC9-20-4	.250							
CC9-40-2	.125							
CC9-40-3	.188	1.08	1/2	5/8	3/64	4°	.006	50
CC9-40-4	.250							
CC9-60-2	.125							
CC9-60-3	.188	1.60	1/2	5/8	3/64	5°	.008	100
CC9-60-4	.250							
CC9-120-2	.125							
CC9-120-3	.188	3.16	1/2	5/8	3/64	6°	.010	150
CC9-120-4	.250							
CC10-14-4	.250							
CC10-14-6	.375	.95	3/4	3/4	3/32	3°	.005	50
CC10-14-8	.500							
CC10-24-4	.250							
CC10-24-6	.375	1.58	3/4	3/4	3/32	4°	.006	100
CC10-24-8	.500							
CC10-36-4	.250							
CC10-36-6	.375	2.35	3/4	3/4	3/32	5°	.008	150
CC10-36-8	.500							
CC10-48-4	.250							
CC10-48-6	.375	3.12	3/4	3/4	3/32	6°	.010	200
CC10-48-8	.500							
CC8-10-4	.250							
CC8-10-6	.375	1.28	1	1	1/8	3°	.005	50
CC8-10-8	.500							
CC8-15-4	.250							
CC8-15-6	.375	1.88	1	1	1/8	4°	.006	100
CC8-15-8	.500							
CC8-20-4	.250							
CC8-20-6	.375	2.48	1	1	1/8	5°	.008	200
CC8-20-8	.500							
CC8-24-4	.250							
CC8-24-6	.375	2.96	1	1	1/8	6°	.010	300
CC8-24-8	.500							

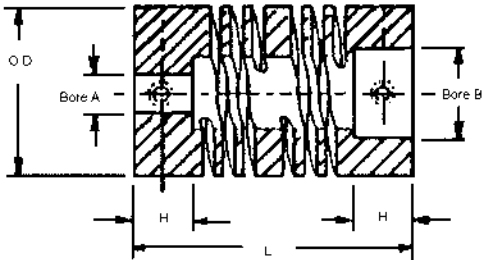
- Shaft to shaft couplings
- Pin to pin phase adjustment
- -65° to 180° F temperature range
- Positive drive
- Minimal backlash
- Silent operation
- Acid and chemical resistant

- Shaft to shaft synchronization
- Simple assembly and disassembly
- No lubrication required
- Quick disconnect
- Cushioned drive

Other bore combinations available on request.

SIX BEAM FLEXIBLE COUPLINGS

BORE	STYLE	MATERIAL
.120 TO 1.000	PIN HUB	2024 ANODIZED ALUMINUM



STOCK NO.	BORE A +.002	BORE B +.002	OD	L	H	ANGLE OFF SET	PARALLEL OFF SET	NON-REVERSING WORKING TORQUE* (LB-IN)
CO36A-1	.120	.125						
CO36A-2	.125	.125						
CO36A-3	.125	.187	.375	.770	.23	5°	.005	5
CO36A-4	.187	.187						
CO38A-1	.120	.125						
CO38A-2	.125	.125						
CO38A-3	.187	.187	.500	1.000	.27	5°	.007	10
CO38A-4	.250	.250						
CO40A-1	.187	.250						
CO40A-2	.250	.250						
CO40A-3	.250	.375	.750	1.100	.25	7°	.010	25
CO40A-4	.375	.375						
CO42A-1	.250	.250						
CO42A-2	.312	.312						
CO42A-3	.375	.375	1.000	1.500	.43	7°	.015	44
CO42A-4	.500	.500						
CO44A-1	.250	.375						
CO44A-2	.375	.375						
CO44A-3	.500	.500	1.250	2.250	.62	7°	.020	62
CO44A-4	.625	.625						
CO50A-1	.500	.500						
CO50A-2	.625	.625	1.500	2.625	.71	7°	.020	97
CO50A-3	.750	.750						
CO52A-1	.500	.500						
CO52A-2	.625	.625	1.750	3.000	.79	7°	.031	130
CO52A-3	.750	.750						
CO54A-1	.750	.750						
CO54A-2	.875	.875	2.250	5.125	1.26	7°	.038	230
CO54A-3	1.000	1.000						

* For reversing torque use factor 2.

Available on request - Key ways in bores 1/2" and larger

Special bores or bore combinations

Operating temperature -40° F to 248° F

Central internal chamber diameter may be smaller than bore in some cases.

Advantages

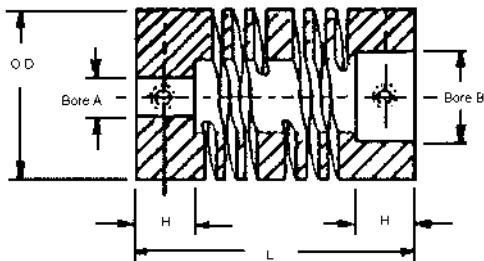
- One Piece construction. no mechanical joints
- No Backlash
- Constant velocity
- Torsionally rigid
- High Flexibility
- Small and lightweight
- High or low speeds
- Not temperature sensitive
- No lubrication
- Unaffected by climactic conditions
- Reversible

Applications

Encoders • Stepper Motors • Precision Ball Screws • Machine Tools • Robotics • Scientific Equipment
• Measuring Instruments • Computers • Servo Systems • Optical Telescopes • Defense Systems
• Medical Equipment • Appliances • Pumps • Valves • Fans

SIX BEAM FLEXIBLE COUPLINGS

BORE	STYLE	MATERIAL
.120 TO 1.000	PIN HUB	303 STAINLESS STEEL



STOCK NO.	BORE A +.002 -.000	BORE B +.002 -.000	OD	L	H	ANGLE OFF SET	PARALLEL OFF SET	NON-REVERSING WORKING TORQUE* (LB-IN)
CO36S-1	.120	.125	.375	.770	.230	5°	.005	8
CO36S-2	.125	.125						
CO36S-3	.125	.187						
CO36S-4	.187	.187						
CO38S-1	.120	.125	.500	1.000	.270	5°	.007	15
CO38S-2	.125	.125						
CO38S-3	.187	.187						
CO38S-4	.250	.250						
CO40S-1	.187	.250	.750	1.100	.250	7°	.010	40
CO40S-2	.250	.250						
CO40S-3	.250	.375						
CO40S-4	.375	.375						
CO42S-1	.250	.250	1.000	1.500	.430	7°	.015	85
CO42S-2	.312	.312						
CO42S-3	.375	.375						
CO42S-4	.500	.500						
CO44S-1	.250	.375	1.250	2.250	.620	7°	.020	115
CO44S-2	.375	.375						
CO44S-3	.500	.500						
CO44S-4	.625	.625						
CO50S-1	.500	.500	1.500	2.625	.710	7°	.020	170
CO50S-2	.625	.625						
CO50S-3	.750	.750						
CO52S-1	.500	.500	1.750	3.000	.790	7°	.031	200
CO52S-2	.625	.625						
CO52S-3	.750	.750						
CO54S-1	.750	.750	2.250	5.125	1.260	7°	.038	400
CO54S-2	.875	.875						
CO54S-3	1.000	1.000						

* For reversing torque use factor 2.

Available on request - Key ways in bores 1/2" and larger

Special bores or bore combinations

Operating temperature -40° F to 248° F

Central internal chamber diameter may be smaller than bore in some cases.

Advantages

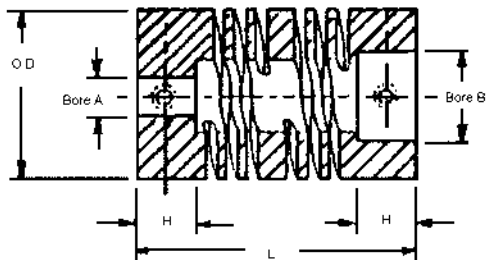
- One Piece construction. no mechanical joints
- No Backlash
- Constant velocity
- Torsionally rigid
- High Flexibility
- Small and lightweight
- High or low speeds
- Not temperature sensitive
- No lubrication
- Unaffected by climactic conditions
- Reversible

Applications

Encoders • Stepper Motors • Precision Ball Screws • Machine Tools • Robotics • Scientific Equipment
 • Measuring Instruments • Computers • Servo Systems • Optical Telescopes • Defense Systems
 • Medical Equipment • Appliances • Pumps • Valves • Fans

SIX BEAM FLEXIBLE COUPLINGS

BORE	STYLE	MATERIAL
.120 TO 1.000	PIN HUB	DELRIN



STOCK NO.	BORE A +.002	BORE B +.002	OD	L	H	ANGLE OFF SET	PARALLEL OFF SET	NON-REVERSING WORKING TORQUE* (LB-IN)
CO36D-1	.120	.125	.375	.770	.230	5°	.005	-
CO36D-2	.125	.125						
CO36D-3	.125	.187						
CO36D-4	.187	.187						
CO38D-1	.120	.125	.500	1.000	.270	5°	.007	2.5
CO38D-2	.125	.125						
CO38D-3	.187	.187						
CO38D-4	.250	.250						
CO40D-1	.187	.250	.750	1.100	.250	7°	.010	7.5
CO40D-2	.250	.250						
CO40D-3	.250	.375						
CO40D-4	.375	.375						
CO42D-1	.250	.250	1.000	1.500	.430	7°	.015	14.0
CO42D-2	.312	.312						
CO42D-3	.375	.375						
CO42D-4	.500	.500						
CO44D-1	.250	.375	1.250	2.250	.620	7°	.020	21.0
CO44D-2	.375	.375						
CO44D-3	.500	.500						
CO44D-4	.625	.625						
CO50D-1	.500	.500	1.500	2.625	.710	7°	.020	25.0
CO50D-2	.625	.625						
CO50D-3	.750	.750						
CO52D-1	.500	.500	1.750	3.000	.790	7°	.031	30.0
CO52D-2	.625	.625						
CO52D-3	.750	.750						
CO54D-1	.750	.750	2.250	5.125	1.260	7°	.038	35.0
CO54D-2	.875	.875						
CO54D-3	1.000	1.000						

* For reversing torque use factor 2.

Available on request - Key ways in bores 1/2" and larger

Special bores or bore combinations

Operating temperature -40° F to 248° F

Central internal chamber diameter may be smaller than bore in some cases.

Advantages

- One Piece construction. no mechanical joints
- No Backlash
- Constant velocity
- Torsionally rigid
- High Flexibility

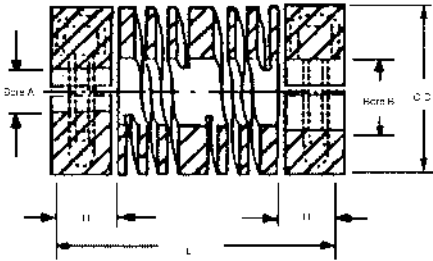
- Small and lightweight
- High or low speeds
- Not temperature sensitive
- No lubrication
- Unaffected by climactic conditions
- Reversible

Applications

Encoders • Stepper Motors • Precision Ball Screws • Machine Tools • Robotics • Scientific Equipment
 • Measuring Instruments • Computers • Servo Systems • Optical Telescopes • Defense Systems
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SIX BEAM FLEXIBLE COUPLINGS

BORE	STYLE	MATERIAL
.120 TO 1.000	CLAMP	2024 ANODIZED ALUMINUM



STOCK NO.	BORE A +.002 -.000	BORE B +.002 -.000	OD	L	H	ANGLE OFF SET	PARALLEL OFF SET	NON-REVERSING WORKING TORQUE* (LB-IN)
CO37A-1	.120	.125	.375	.770	.230	5°	.005	5
CO37A-2	.125	.125						
CO37A-3	.125	.187						
CO37A-4	.187	.187						
CO39A-1	.120	.125	.500	1.000	.270	5°	.007	10
CO39A-2	.125	.125						
CO39A-3	.187	.187						
CO39A-4	.250	.250						
CO41A-1	.187	.250	.750	1.100	.250	7°	.010	25
CO41A-2	.250	.250						
CO41A-3	.250	.375						
CO41A-4	.375	.375						
CO43A-1	.250	.250	1.000	1.500	.430	7°	.015	44
CO43A-2	.312	.312						
CO43A-3	.375	.375						
CO43A-4	.500	.500						
CO45A-1	.250	.375	1.250	2.250	.620	7°	.020	62
CO45A-2	.375	.375						
CO45A-3	.500	.500						
CO45A-4	.625	.625						
CO51A-1	.500	.500	1.500	2.625	.710	7°	.020	97
CO51A-2	.625	.625						
CO51A-3	.750	.750						
CO53A-1	.500	.500	1.750	3.000	.790	7°	.031	130
CO53A-2	.625	.625						
CO53A-3	.750	.750						
CO55A-1	.750	.750	2.250	5.125	1.260	7°	.038	230
CO55A-2	.875	.875						
CO55A-3	1.000	1.000						

* For reversing torque use factor 2.

Available on request - Key ways in bores 1/2" and larger

Special bores or bore combinations

Operating temperature -40° F to 248° F

Central internal chamber diameter may be smaller than bore in some cases.

Advantages

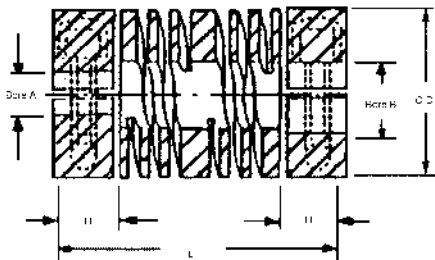
- One Piece construction. no mechanical joints
- No Backlash
- Constant velocity
- Torsionally rigid
- High Flexibility
- Small and lightweight
- High or low speeds
- Not temperature sensitive
- No lubrication
- Unaffected by climactic conditions
- Reversible

Applications

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SIX BEAM FLEXIBLE COUPLINGS

BORES	STYLE	MATERIAL
.120 TO 1.000	CLAMP	303 STAINLESS STEEL



STOCK NO.	BORE A +.002 -.000	BORE B +.002 -.000	OD	L	H	ANGLE OFF SET	PARALLEL OFF SET	NON-REVERSING WORKING TORQUE* (LB-IN)
CO37S-1	.120	.125	.375	.770	.230	5°	.005	8
CO37S-2	.125	.125						
CO37S-3	.125	.187						
CO37S-4	.187	.187						
CO39S-1	.120	.125	.500	1.000	.270	5°	.007	15
CO39S-2	.125	.125						
CO39S-3	.187	.187						
CO39S-4	.250	.250						
CO41S-1	.187	.250	.750	1.100	.250	7°	.010	40
CO41S-2	.250	.250						
CO41S-3	.250	.375						
CO41S-4	.375	.375						
CO43S-1	.250	.250	1.000	1.500	.430	7°	.015	85
CO43S-2	.312	.312						
CO43S-3	.375	.375						
CO43S-4	.500	.500						
CO45S-1	.250	.375	1.250	2.250	.620	7°	.020	115
CO45S-2	.375	.375						
CO45S-3	.500	.500						
CO45S-4	.625	.625						
CO51S-1	.500	.500	1.500	2.625	.710	7°	.020	170
CO51S-2	.625	.625						
CO51S-3	.750	.750						
CO53S-1	.500	.500	1.750	3.000	.790	7°	.031	200
CO53S-2	.625	.625						
CO53S-3	.750	.750						
CO55S-1	.750	.750	2.250	5.125	1.260	7°	.038	400
CO55S-2	.875	.875						
CO55S-3	1.000	1.000						

* For reversing torque use factor 2.

Available on request - Key ways in bores 1/2" and larger

Special bores or bore combinations

Operating temperature -40° F to 248° F

Central internal chamber diameter may be smaller than bore in some cases.

Advantages

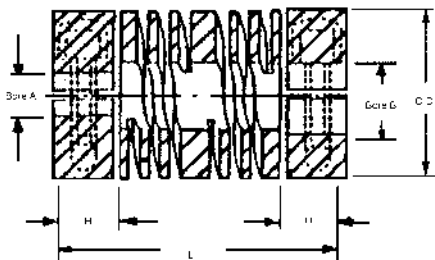
- One Piece construction. no mechanical joints
- No Backlash
- Constant velocity
- Torsionally rigid
- High Flexibility
- Small and lightweight
- High or low speeds
- Not temperature sensitive
- No lubrication
- Unaffected by climactic conditions
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SIX BEAM FLEXIBLE COUPLINGS

BORES	STYLE	MATERIAL
.120 TO 1.000	CLAMP	DELTRIN



STOCK NO.	BORE A +.002 -.000	BORE B +.002 -.000	OD	L	H	ANGLE OFF SET	PARALLEL OFF SET	NON-REVERSING WORKING TORQUE* (LB-IN)
CO37D-1	.120	.125	.375	.770	.230	5°	.005	-
CO37D-2	.125	.125						
CO37D-3	.125	.187						
CO37D-4	.187	.187						
CO39D-1	.120	.125	.500	1.000	.270	5°	.007	2.5
CO39D-2	.125	.125						
CO39D-3	.187	.187						
CO39D-4	.250	.250						
CO41D-1	.187	.250	.750	1.100	.250	7°	.010	7.5
CO41D-2	.250	.250						
CO41D-3	.250	.375						
CO41D-4	.375	.375						
CO43D-1	.250	.250	1.000	1.500	.430	7°	.015	14
CO43D-2	.312	.312						
CO43D-3	.375	.375						
CO43D-4	.500	.500						
CO45D-1	.250	.375	1.250	2.250	.620	7°	.020	21
CO45D-2	.375	.375						
CO45D-3	.500	.500						
CO45D-4	.625	.625						
CO51D-1	.500	.500	1.500	2.625	.710	7°	.020	25
CO51D-2	.625	.625						
CO51D-3	.750	.750						
CO53D-1	.500	.500	1.750	3.000	.790	7°	.031	30
CO53D-2	.625	.625						
CO53D-3	.750	.750						
CO55D-1	.750	.750	2.250	5.125	1.260	7°	.038	35
CO55D-2	.875	.875						
CO55D-3	1.000	1.000						

* For reversing torque use factor 2.

Available on request - Key ways in bores 1/2" and larger

Special bores or bore combinations

Operating temperature -40° F to 248° F

Central internal chamber diameter may be smaller than bore in some cases.

Advantages

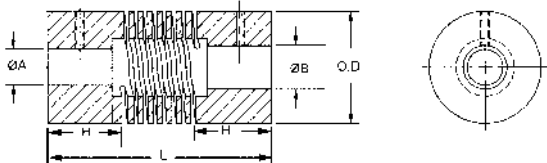
- One Piece construction. no mechanical joints
- No Backlash
- Constant velocity
- Torsionally rigid
- High Flexibility
- Small and lightweight
- High or low speeds
- Not temperature sensitive
- No lubrication
- Unaffected by climactic conditions
- Reversible

Applications

Encoders • Stepper Motors • Precision Ball Screws • Machine Tools • Robotics • Scientific Equipment
 • Measuring Instruments • Computers • Servo Systems • Optical Telescopes • Defense Systems
 • Medical Equipment • Appliances • Pumps • Valves • Fans

THREE BEAM FLEXIBLE COUPLINGS

BORES	STYLE	MATERIAL
3/32" TO 1"	PIN HUB	ALUMINUM 2024-T6 ANODIZED



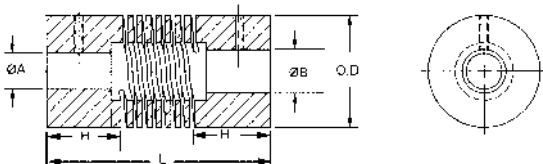
- Couplings can be supplied with a keyway
- Non-standard bore sizes available
- All couplings contain an integral relief chamber
- Operating temperature -40°F to 248°F

STOCK NO.	BORE A +.002 -.000	BORE B +.002 -.000	OD	L MAX.	H	MAXIMUM WORKING TORQUE (LB-IN)	ALLOWABLE MISALIGNMENT	
							ANGLE OFFSET	PARALLEL OFFSET
CO71A-1	.094	.094	.38	.56	.11	3.5	5°	.004
CO73A-1	.094	.125	.50	.75	.21	8	5°	.005
CO73A-2	.125	.125						
CO73A-3	.125	.125						
CO75A-1	.125	.125	.63	.80	.24	13	5°	.005
CO75A-2	.125	.157						
CO75A-3	.125	.188						
CO75A-4	.157	.157						
CO75A-5	.157	.188						
CO75A-6	.188	.188						
CO77A-1	.125	.125						
CO77A-2	.125	.157						
CO77A-3	.125	.188						
CO77A-4	.125	.250						
CO77A-5	.157	.157	.75	.90	.28	22	5°	.005
CO77A-6	.157	.188						
CO77A-7	.157	.250						
CO77A-8	.188	.188						
CO77A-9	.188	.188						
CO77A-10	.250	.250						
CO79A-1	.250	.250	1.00	1.25	.33	35	5°	.005
CO79A-2	.250	.313						
CO79A-3	.250	.375						
CO79A-4	.313	.313						
CO79A-5	.313	.375						
CO79A-6	.375	.375						
CO81A-1	.250	.250	1.25	1.75	.44	53	5°	.005
CO81A-2	.250	.375						
CO81A-3	.250	.500						
CO81A-4	.250	.625						
CO81A-5	.375	.375						
CO81A-6	.375	.500						
CO81A-7	.375	.625						
CO81A-8	.500	.500						
CO81A-9	.500	.625						
CO81A-10	.625	.625						
CO83A-1	.500	.500	1.50	2.63	.71	59	5°	.010
CO83A-2	.625	.625						
CO83A-3	.750	.750						
CO85A-1	.500	.500	1.75	3.00	.79	70	5°	.010
CO85A-2	.625	.625						
CO85A-3	.750	.750						
CO87A-1	.750	.750	2.25	5.13	1.26	80	5°	.010
CO87A-2	.875	.875						
CO87A-3	1.000	1.000						

Central internal chamber diameter may be smaller than bore in some cases.

THREE BEAM FLEXIBLE COUPLINGS

BORES	STYLE	MATERIAL
3/32" TO 1"	PIN HUB	303 STAINLESS STEEL



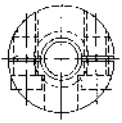
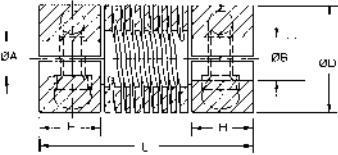
- Couplings can be supplied with a keyway
- Non-standard bore sizes available
- All couplings contain an integral relief chamber
- Operating temperature -40°F to 248°F

STOCK NO.	BORE A +.002 -.000	BORE B +.002 -.000	OD	L MAX.	H	MAXIMUM WORKING TORQUE (LB-IN)	ALLOWABLE MISALIGNMENT	
							ANGLE OFFSET	PARALLEL OFFSET
CO71S-1	.094	.094	.38	.56	.11	4	3°	.004
CO73S-1	.094	.094	.50	.75	.21	8	5°	.005
CO73S-2	.125	.125						
CO73S-3	.125	.125						
CO75S-1	.125	.125	.63	.80	.24	16	5°	.005
CO75S-2	.125	.157						
CO75S-3	.125	.188						
CO75S-4	.157	.157						
CO75S-5	.157	.188						
CO75S-6	.188	.188						
CO77S-1	.125	.125	.75	.90	.28	23	5°	.005
CO77S-2	.125	.157						
CO77S-3	.125	.188						
CO77S-4	.125	.250						
CO77S-5	.157	.157						
CO77S-6	.157	.188						
CO77S-7	.157	.250						
CO77S-8	.188	.188						
CO77S-9	.188	.188						
CO77S-10	.250	.250						
CO79S-1	.250	.250	1.00	1.25	.33	53	5°	.005
CO79S-2	.250	.313						
CO79S-3	.250	.375						
CO79S-4	.313	.313						
CO79S-5	.313	.375						
CO79S-6	.375	.375						
CO81S-1	.250	.250	1.25	1.75	.44	88	5°	.005
CO81S-2	.250	.375						
CO81S-3	.250	.500						
CO81S-4	.250	.625						
CO81S-5	.375	.375						
CO81S-6	.375	.500						
CO81S-7	.375	.625						
CO81S-8	.500	.500						
CO81S-9	.500	.625						
CO81S-10	.625	.625						
CO83S-1	.500	.500	1.50	2.63	.71	100	5°	.010
CO83S-2	.625	.625						
CO83S-3	.750	.750						
CO85S-1	.500	.500	1.75	3.00	.79	120	5°	.010
CO85S-2	.625	.625						
CO85S-3	.750	.750						
CO87S-1	.750	1.750	2.25	5.13	1.26	145	5°	.010
CO87S-2	.875	.875						
CO87S-3	1.000	1.000						

Central internal chamber diameter may be smaller than bore in some cases.

THREE BEAM FLEXIBLE COUPLINGS

BORES	STYLE	MATERIAL
3/32" TO 1"	CLAMP	ALUMINUM 2024-T6 ANODIZED



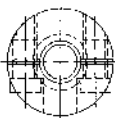
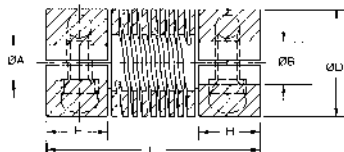
- Couplings can be supplied with a keyway
- Non-standard bore sizes available
- All couplings contain an integral relief chamber
- Operating temperature -40°F to 248°F

STOCK NO.	BORE A	BORE B	OD	L MAX.	H	MAXIMUM WORKING TORQUE (LB-IN)	ALLOWABLE MISALIGNMENT	
							ANGLE OFFSET	PARALLEL OFFSET
CO72A-1	.094	.094	.50	.75	.21	8	5°	.005
CO72A-2	.094	.125						
CO72A-3	.125	.125						
CO74A-1	.125	.125	.63	.80	.24	13	5°	.005
CO74A-2	.125	.157						
CO74A-3	.125	.188						
CO74A-4	.157	.157						
CO74A-5	.157	.188						
CO74A-6	.188	.188						
CO76A-1	.125	.125	.75	.90	.28	22	5°	.005
CO76A-2	.125	.157						
CO76A-3	.125	.188						
CO76A-4	.125	.250						
CO76A-5	.157	.157						
CO76A-6	.157	.188						
CO76A-7	.157	.250						
CO76A-8	.188	.188						
CO76A-9	.188	.188						
CO76A-10	.250	.250						
CO78A-1	.250	.250	1.00	1.25	.33	35	5°	.005
CO78A-2	.250	.313						
CO78A-3	.250	.375						
CO78A-4	.313	.313						
CO78A-5	.313	.375						
CO78A-6	.375	.375						
CO80A-1	.250	.250	1.25	1.75	.44	53	5°	.005
CO80A-2	.250	.375						
CO80A-3	.250	.500						
CO80A-4	.250	.625						
CO80A-5	.375	.375						
CO80A-6	.375	.500						
CO80A-7	.375	.625						
CO80A-8	.500	.500						
CO80A-9	.500	.625						
CO80A-10	.625	.625						
CO82A-1	.500	.500	1.50	2.63	.71	59	5°	.010
CO82A-2	.625	.625						
CO82A-3	.750	.750						
CO84A-1	.500	.500	1.75	3.00	.79	70	5°	.010
CO84A-2	.625	.625						
CO84A-3	.750	.750						
CO86A-1	.750	.750	2.25	5.13	1.26	80	5°	.010
CO86A-2	.875	.875						
CO86A-3	1.000	1.000						

Central internal chamber diameter may be smaller than bore in some cases.

THREE BEAM FLEXIBLE COUPLINGS

BORES	STYLE	MATERIAL
3/32" TO 1"	CLAMP	303 STAINLESS STEEL



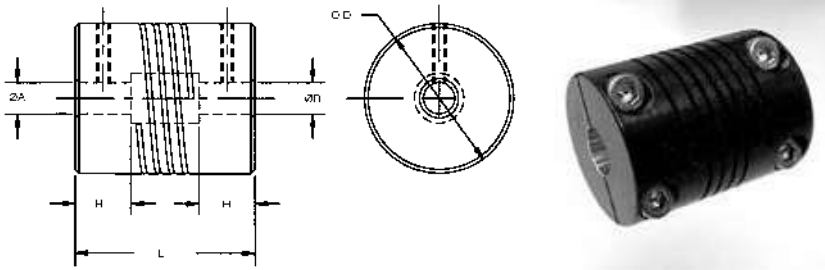
- Couplings can be supplied with a keyway
- Non-standard bore sizes available
- All couplings contain an integral relief chamber
- Operating temperature -40°F to 248°F

STOCK NO.	BORE A	BORE B	OD	L MAX.	H	MAXIMUM WORKING TORQUE (LB-IN)	ALLOWABLE MISALIGNMENT	
							ANGLE OFFSET	PARALLEL OFFSET
CO72S-1	.094	.094	.50	.75	.21	8	5°	.005
CO72S-2	.094	.125						
CO72S-3	.125	.125						
CO74S-1	.125	.125	.63	.80	.24	16	5°	.005
CO74S-2	.125	.157						
CO74S-3	.125	.188						
CO74S-4	.157	.157						
CO74S-5	.157	.188						
CO74S-6	.188	.188						
CO76S-1	.125	.125	.75	.90	.28	23	5°	.005
CO76S-2	.125	.157						
CO76S-3	.125	.188						
CO76S-4	.125	.250						
CO76S-5	.157	.157						
CO76S-6	.157	.188						
CO76S-7	.157	.250						
CO76S-8	.188	.188						
CO76S-9	.188	.188						
CO76S-10	.250	.250						
CO78S-1	.250	.250	1.00	1.25	.33	53	5°	.010
CO78S-2	.250	.313						
CO78S-3	.250	.375						
CO78S-4	.313	.313						
CO78S-5	.313	.375						
CO78S-6	.375	.375						
CO80S-1	.250	.250	1.25	1.75	.44	88	5°	.010
CO80S-2	.250	.375						
CO80S-3	.250	.500						
CO80S-4	.250	.625						
CO80S-5	.375	.375						
CO80S-6	.375	.500						
CO80S-7	.375	.625						
CO80S-8	.500	.500						
CO80S-9	.500	.625						
CO80S-10	.625	.625						
CO82S-1	.500	.500	1.50	2.63	.71	100	5°	.010
CO82S-2	.625	.625						
CO82S-3	.750	.750						
CO84S-1	.500	.500	1.75	3.00	.79	120	5°	.010
CO84S-2	.625	.625						
CO84S-3	.750	.750						
CO86S-1	.750	.750	2.25	5.13	1.26	145	5°	.010
CO86S-2	.875	.875						
CO86S-3	1.000	1.000						

Central internal chamber diameter may be smaller than bore in some cases.

SINGLE BEAM FLEXIBLE COUPLINGS

BORES	STYLE	MATERIAL
3/32" TO 1"	PIN HUB	ALUMINUM 7075 ANODIZED

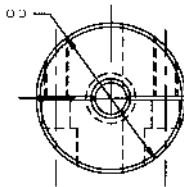
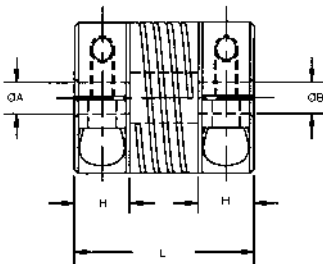


STOCK NO.	A +.002 -.000	B +.002 -.000	OD	L MAX.	H	MAXIMUM WORKING TORQUE (LB-IN)	ALLOWABLE MISALIGNMENT	
							ANGLE OFFSET	PARALLEL OFFSET
COS71A-1	.094	.094	.38	.56	.11	1.50	5	.005
COS73A-1	.094	.094	.50	.75	.21	4	5	.010
COS73A-2	.094	.125						
COS73A-3	.125	.125						
COS75A-1	.125	.125	.63	.80	.24	6	5	.010
COS75A-2	.125	.157						
COS75A-3	.125	.188						
COS75A-4	.157	.157						
COS75A-5	.157	.188						
COS75A-6	.188	.188						
COS77A-1	.125	.125	.75	.90	.25	10.5	5	.010
COS77A-2	.125	.157						
COS77A-3	.125	.188						
COS77A-4	.125	.250						
COS77A-5	.157	.157						
COS77A-6	.157	.188						
COS77A-7	.157	.250						
COS77A-8	.188	.188						
COS77A-9	.188	.250						
COS77A-10	.250	.250						
COS79A-1	.250	.250	1.00	1.25	.33	15	5	.010
COS79A-2	.250	.313						
COS79A-3	.250	.375						
COS79A-4	.313	.313						
COS79A-5	.313	.375						
COS79A-6	.375	.375						
COS81A-1	.250	.250	1.25	1.75	.44	31	5	.010
COS81A-2	.250	.375						
COS81A-3	.250	.500						
COS81A-4	.250	.625						
COS81A-5	.375	.375						
COS81A-6	.375	.500						
COS81A-7	.375	.625						
COS81A-8	.500	.500						
COS81A-9	.500	.625						
COS81A-10	.625	.625						
COS83A-1	.500	.500	1.50	2.63	.71	45	5	.010
COS83A-2	.625	.625						
COS83A-3	.750	.750						
COS85A-1	.500	.500	1.75	3.00	.79	60	5	.010
COS85A-2	.625	.625						
COS85A-3	.750	.750						
COS87A-1	.750	.750	2.25	5.13	1.26	100	5	.010
COS87A-2	.875	.875						
COS87A-3	1.000	1.000						

Central internal chamber diameter may be smaller than bore in some cases.

SINGLE BEAM FLEXIBLE COUPLINGS

BORES	STYLE	MATERIAL
3/32" TO 1"	CLAMP	ALUMINUM 7075 ANODIZED



STOCK NO.	A +.002 -.000	B +.002 -.000	OD	L MAX.	H	MAXIMUM WORKING TORQUE (LB-IN)	ALLOWABLE MISALIGNMENT	
							ANGLE OFFSET	PARALLEL OFFSET
COS72A-1	.094	.094	.50	.75	.21	4	5	.010
COS72A-2	.094	.125						
COS72A-3	.125	.125						
COS74A-1	.125	.125	.63	.80	.24	6	5	.010
COS74A-2	.125	.157						
COS74A-3	.125	.188						
COS74A-4	.157	.157						
COS74A-5	.157	.188						
COS74A-6	.188	.188						
COS76A-1	.125	.125	.75	.90	.25	10.5	5	.010
COS76A-2	.125	.157						
COS76A-3	.125	.188						
COS76A-4	.125	.250						
COS76A-5	.157	.157						
COS76A-6	.157	.157						
COS76A-7	.157	.157						
COS76A-8	.188	.188						
COS76A-9	.188	.250						
COS76A-10	.250	.250						
COS78A-1	.250	.250	1.00	1.25	.33	15	5	.010
COS78A-2	.250	.313						
COS78A-3	.250	.375						
COS78A-4	.313	.313						
COS78A-5	.313	.375						
COS78A-6	.375	.375						
COS80A-1	.250	.250	1.25	1.75	.44	31	5	.010
COS80A-2	.250	.375						
COS80A-3	.250	.500						
COS80A-4	.250	.625						
COS80A-5	.375	.375						
COS80A-6	.375	.500						
COS80A-7	.375	.625						
COS80A-8	.500	.500						
COS80A-9	.500	.625						
COS80A-10	.625	.625						
COS82A-1	.500	.500	1.50	2.63	.71	45	5	.010
COS82A-2	.625	.625						
COS82A-3	.750	.750						
COS84A-1	.500	.500	1.75	3.00	.79	60	5	.010
COS84A-2	.625	.625						
COS84A-3	.750	.750						
COS86A-1	.750	.750	2.25	5.13	1.26	100	5	.010
COS86A-2	.875	.875						
COS86A-3	1.000	1.000						

Central internal chamber diameter may be smaller than bore in some cases.

ABSORBATHANE FLEXIBLE COUPLINGS

BORE	STYLE	MATERIAL
3/16" TO 3/8"	EXTERNAL HUB	BLACK POLYURETHANE PLATED MILD STEEL HUB

STOCK NO.	BORES B1 AND B2	A	C	D	MAX. WORKING TORQUE lb-in	MAX. PARALLEL MISALIGN	MAX. ANGULAR MISALIGN
CC3-10 CC3-11 CC3-12 CC3-13	3/16 1/4 5/16 3/8	1-1/8	1-1/8	11/16	3	3/32	10°

BORE	STYLE	MATERIAL
1/4" TO 7/16"	INTERNAL HUB	BLACK POLYURETHANE PLATED MILD STEEL HUB

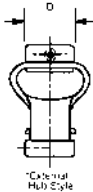
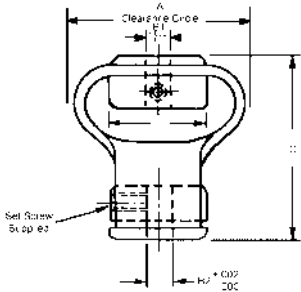
STOCK NO.	BORES 1 AND B2	A	C	D	MAX. WORKING TORQUE lb-in	MAX. PARALLEL MISALIGN	MAX. ANGULAR MISALIGN
CC3-1 CC3-2 CC3-3 CC3-14 CC3-5	1/4 5/16 3/8 7/16 1/2	1-7/8	1-3/4	1	12	1/8	15°

BORE	STYLE	MATERIAL
1/2" TO 5/8"	INTERNAL HUB	BLACK POLYURETHANE PLATED MILD STEEL HUB

STOCK NO.	BORES B1 AND B2	A	C	D	MAX. WORKING TORQUE lb-in	MAX. PARALLEL MISALIGN	MAX. ANGULAR MISALIGN
CC3-4 CC3-15 CC3-6 CC3-16 CC3-8	3/8 7/16 1/2 9/16 5/8	2-1/8	2-1/4	1-1/4	28	3/16	15°

BORE	STYLE	MATERIAL
1/2" TO 5/8"	INTERNAL HUB	BLACK POLYURETHANE PLATED MILD STEEL HUB

STOCK NO.	BORES 1 AND B2	A	C	D	MAX. WORKING TORQUE lb-in	MAX. PARALLEL MISALIGN	MAX. ANGULAR MISALIGN
CC3-7 CC3-17 CC3-9	1/2 9/16 5/8	2-1/8	2-3/8	1-1/4	40	1/8	15°

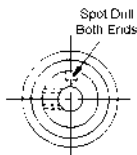
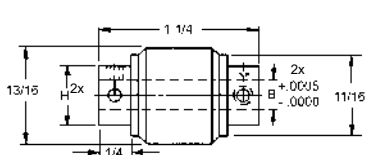


- Available on request:
Other bore sizes
or bore combinations.
- Absorbs end play
 - Quiet running
 - Maintenance free
(No moving parts)
 - 3600 R.P.M. Maximum



NEO-FLEX COUPLINGS

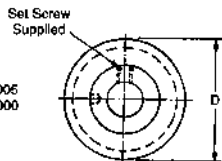
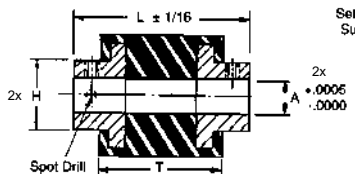
BORE	STYLE	MATERIAL
.1200 TO .3748	PIN HUB	303 STAINLESS STEEL HUB MOLDED NEOPRENE BODY



STOCK NO.	B	H	SET SCREW	SPOT DRILL
CO14-7	.1200 .1248	5/16 5/16	#2-56 #2-56	#69 #69
CO14-10	.1200 .1873	5/16 3/8	#2-56 #4-40	#69 #60
CO14-9	.1200 .2498	5/16 1/2	#2-56 #6-32	#69 #50
CO14-1	.1248 .1248	5/16 5/16	#2-56 #2-56	#69 #69
CO14-4	.1248 .1873	5/16 3/8	#2-56 #4-40	#69 #60
CO14-5	.1248 .2498	5/16 1/2	#2-56 #6-32	#69 #50
CO14-8	.1562 .1873	5/16 3/8	#2-56 #4-40	#69 #60
CO14-2	.1873 .1873	3/8 3/8	#4-40 #4-40	#60 #60
CO14-6	.1873 .2498	3/8 1/2	#4-40 #6-32	#60 #50
CO14-3	.2498 .2498	1/2 1/2	#6-32 #6-32	#50 #50
CO14-11	.3123 .3123	1/2 1/2	#6-32 #6-32	#50 #50
CO14-12	.3748 .3748	5/8 5/8	#8-32 #8-32	#31 #31

- Isolates torsional vibration
- Insulates between shafts
- 1° angular misalignment (Max.)
- .005 Shaft misalignment (Max.)
- Maximum working torque 9 in-lb

BORE	STYLE	MATERIAL
.1873 TO .4998	PIN HUB	303 STAINLESS STEEL HUB POLYURETHANE BODY

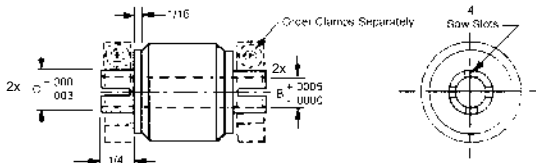


STOCK NO.	A	H	D	L	T
CC1-3	.1873	3/8	15/16	1-1/4	3/4
CC1-14	.2498	5/8	1-1/8	1-9/16	15/16
CC1-15	.3123	5/8	1-1/8	1-9/16	15/16
CC1-16	.3748	5/8	1-1/8	1-9/16	15/16

Combination bores are available on request.

NEO-FLEX COUPLINGS

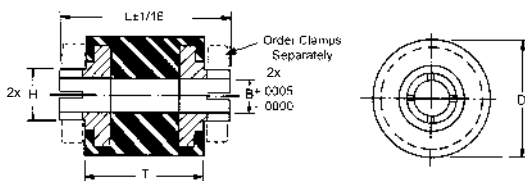
BORE	STYLE	MATERIAL
.1200 TO .3748	CLAMP	303 STAINLESS STEEL HUB MOLDED NEOPRENE BODY



STOCK NO.	B	C	CLAMP STOCK NO.
CO15-7	.1200 .1248	.187 .187	CG1-25 CG1-25
CO15-10	.1200 .1873	.187 .250	CG1-25 CG1-9
CO15-9	.1200 .2498	.187 .312	CG1-25 CG1-12
CO15-1	.1248 .1248	.187 .187	CG1-25 CG1-25
CO15-4	.1248 .1873	.187 .250	CG1-25 CG1-9
CO15-5	.1248 .2498	.187 .312	CG1-25 CG1-12
CO15-8	.1562 .1873	.250 .250	CG1-9 CG1-9
CO15-2	.1873 .1873	.250 .250	CG1-9 CG1-9
CO15-6	.1873 .2498	.250 .312	CG1-9 CG1-12
CO15-3	.2498 .2498	.312 .312	CG1-12 CG1-12
CO15-11	.3123 .3123	.375 .375	CG1-14 CG1-14
CO15-12	.3748 .3748	.437 .437	CG1-17 CG1-17

- Isolates torsional vibration
- Insulates between shafts
- 1° angular misalignment (Max.)
- .005 Shaft misalignment (Max.)
- Maximum working torque 9 in-lb

BORE	STYLE	MATERIAL
.1873 TO .4998	CLAMP	303 STAINLESS STEEL HUB POLYURETHANE BODY

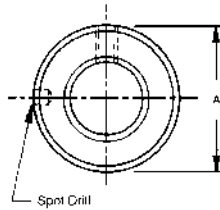
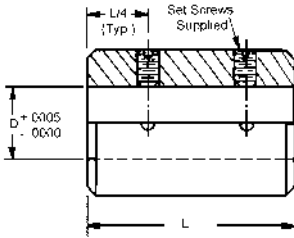


STOCK NO.	B	C	D	L	T
CC2-3	.1873	1/4	15/16	1-1/4	3/4
CC2-14	.2498	5/16	1-1/8	1-9/16	15/16
CC2-5*	.3123	3/8	1-1/8	1-1/4	7/8
CC2-15	.3123	3/8	1-1/8	1-9/16	15/16
CC2-16	.3748	7/16	1-1/8	1-9/16	15/16

* Limited supply available.
Combination bores are available on request.

SLEEVE COUPLINGS

BORE	STYLE	MATERIAL
.0779 TO .9998	SET SCREW	303 STAINLESS STEEL

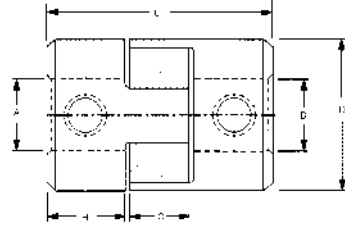


STOCK NO.	SHAFT SIZE	D	L	A	SPOT DRILL	SET SCREW
CT-14	5/64	.0779	3/8	7/32	#78	#0-80
CT-15	3/32	.0935	3/8	1/4	#78	#0-80
CT-1	1/8	.1248	7/16	5/16	#69	#2-56
CT-2	3/16	.1873	1/2	3/8	#60	#4-40
CT-3	1/4	.2498	9/16	1/2	#50	#6-32
CT-4	5/16	.3123	9/16	1/2	#50	#6-32
CT-22	3/8	.3748	3/4	3/4	#31	#10-32
CT-5	3/8	.3748	1	3/4	#31	#10-24
CT-23	1/2	.4998	1	1	#25	1/4-20
CT-6	1/2	.4998	1-1/2	1	#25	1/4-20
CT-7	5/8	.6248	2	1-1/4	#25	1/4-20
CT-8	3/4	.7498	2	1-1/2	#22	3/8-16
CT-9	1	.9998	3	2	#22	3/8-16
CT-10	1/8 to .1200	.1248 .1200	7/16	1/4	#69	#2-56
CT-16	1/8 to 5/32	.1248 .1562	7/16	1/4	#69	#2-56
CT-11	1/8 to 3/16	.1248 .1873	1/2	3/8	#69 #60	#2-56 #4-40
CT-12	1/8 to 1/4	.1248 .2498	9/16	1/2	#69 #50	#2-56 #6-32
CT-17	3/16 to .2405	.1873 .2405	1/2	3/8	#60 #50	#4-40 #6-32
CT-13	3/16 to 1/4	.1873 .2498	9/16	1/2	#60 #50	#4-40 #6-32
CT-18	1/4 to 5/16	.2498 .3123	9/16	9/16	#50	#6-32
CT-19	1/4 to 3/8	.2498 .3748	3/4	3/4	#50 #31	#6-32 #10-32
CT-20	5/16 to 3/8	.3123 .3748	3/4	3/4	#50 #31	#6-32 #10-32
CT-21	3/8 to 1/2	.3748 .4998	1	1	#31 #25	#10-32 1/4-20

Modified or specials are available on request.

SPIDER COUPLINGS

BORE	DESCRIPTION	MATERIAL
1/8" TO 1/2"	SOFT 80 DURO SPIDER	ALUMINUM HUBS POLYURETHANE SPIDER

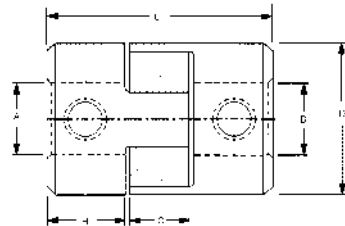


- Torsional rigidity
- Contoured and machined components for quick assembly and minimum wear over extended use. Components assembled with pre-load.
- Bearing protection from parallel and angular misalignment
- Allowance for axial shaft float
- Small size, low WR, electrical isolation and light weight aluminum hubs.

Other bore sizes and combinations are available on request.
Clamp style couplings are available on request.

STOCK NO.	A +.002 -.000	B +.002 -.000	D	H	L	C	MISALIGNMENT		MAXIMUM TORQUE in-lb.	SET SCREW
							PARALLEL IN.	ANGULAR DEG.		
CO46-1A CO46-2A	.125 .187	.125 .187	.394	.20	.59	.16	.031	1°	2.6	#2-56 #4-40
CO47-1A CO47-2A CO47-3A	.125 .187 .250	.125 .187 .250	.551	.28	.87	.24	.047	1°	12	#2-56 #4-40 #6-32
CO48-1A CO48-2A CO48-3A	.250 .312 .375	.250 .312 .375	.787	.39	1.18	.32	.062	1°	32	#6-32 #8-32 #10-32
CO49-1A CO49-2A CO49-3A	.312 .375 .500	.312 .375 .500	1.18	.43	1.36	.39	.078	1°	70	#8-32 #10-32 1/4-20

BORE	DESCRIPTION	MATERIAL
1/8" TO 1/2"	RIGID 98 DURO SPIDER	ALUMINUM HUBS POLYURETHANE SPIDER



- Torsional rigidity
- Contoured and machined components for quick assembly and minimum wear over extended use. Components assembled with pre-load.
- Bearing protection from parallel and angular misalignment
- Allowance for axial shaft float
- Small size, low WR, electrical isolation and light weight aluminum hubs.

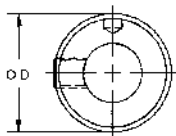
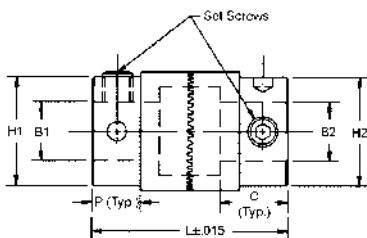
Other bore sizes and combinations are available on request.
Clamp style couplings are available on request.

STOCK NO.	A +.002 -.000	B +.002 -.000	D	H	L	C	MISALIGNMENT		MAXIMUM TORQUE in-lb.	SET SCREW
							PARALLEL IN.	ANGULAR DEG.		
CO46-1B CO46-2B	.125 .187	.125 .187	.394	.20	.59	.16	.031	1°	8.6	#2-56 #4-40
CO47-1B CO47-2B CO47-3B	.125 .187 .250	.125 .187 .250	.551	.28	.87	.24	.047	1°	34	#2-56 #4-40 #6-32
CO48-1B CO48-2B CO48-3B	.250 .312 .375	.250 .312 .375	.787	.39	1.18	.32	.062	1°	86	#6-32 #8-32 #10-32
CO49-1B CO49-2B CO49-3B	.312 .375 .500	.312 .375 .500	1.18	.43	1.36	.39	.078	1°	220	#8-32 #10-32 1/4-20

MULTI-JAW COUPLINGS

BORE	MATERIAL
.1200 TO .4998	303 STAINLESS STEEL

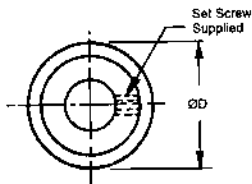
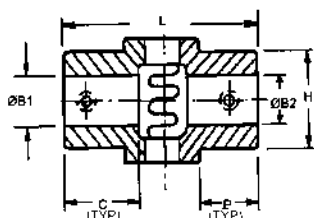
STOCK NO.	B1 +.0005 -.0000	B2 +.0005 -.0000	H1	H2	L	C	P	OUTSIDE DIA.	NO. OF TEETH	MAX. TORQUE
CM3-4	.1200	.1200	.31	.31						
CM3-5	.1200	.1248	.31	.31						
CM3-1	.1248	.1248	.31	.31						
CM3-6	.1248	.1873	.31	.37	.79	.21	.22	17/32	32	300 OZ. IN.
CM3-7	.1248	.2498	.37	.50						
CM3-2	.1873	.1873	.37	.37						
CM3-8	.1873	.2498	.50	.50						
CM3-3	.2498	.2498	.50	.50						
CM1-15	.1200	.1248	.31	.31						
CM1-2	.1248	.1248	.31	.31						
CM1-16	.1248	.1873	.31	.37						
CM1-17	.1248	.2498	.31	.50	.87	.21	.25	3/4	48	500 OZ. IN.
CM1-3	.1873	.1873	.37	.37						
CM1-18	.1873	.2498	.37	.50						
CM1-4	.2498	.2498	.50	.50						
CM1-5	.3123	.3123	.50	.50						
CM1-6	.3748	.3748	.68	.68	1.25	.43	.31			
CM1-8	.4998	.4998	.93	.93	1.50	.56	.43	1	64	900



G

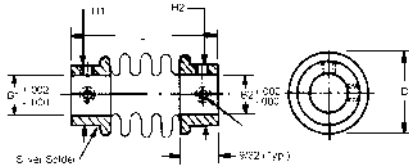
BORE	MATERIAL
3/16" TO 1/2"	COLD ROLLED STEEL

STOCK NO.	B1 +.0005 -.0000	B2 +.0005 -.0000	O.D.	L	C	H	P	NO. OF TEETH	MAX. TORQUE
CM2-3	3/16	3/16	1/2	1-1/8	1/2	.43	7/16	10	400 OZ. IN.
CM2-4	1/4	1/4	1/2	1-1/8	1/2	.43	7/16	10	400 OZ. IN.
CM2-5	5/16	5/16	3/4	1-1/2	5/8	.68	33/34	10	650 OZ. IN.
CM2-6	3/8	3/8	3/4	1-1/2	5/8	.68	33/64	10	650 OZ. IN.
CM2-8	1/2	1/2	1	2	7/8	.93	3/4	12	1100 OZ. IN.



BELLOWS COUPLINGS

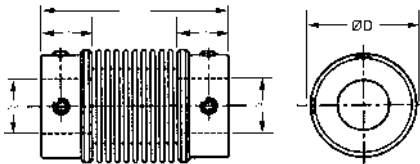
BORE	STYLE	MATERIAL
.128 TO .503	PIN HUB	303 STAINLESS STEEL HUB 321 STAINLESS STEEL BELLOWS



STOCK NO.	SHAFT SIZE	BORES B1 & B2	D	L	H1 & H2	MAXIMUM RATED TORQUE Oz. In.	MAXIMUM ANGULAR MISALIGNMENT	MAXIMUM PARALLEL MISALIGNMENT
CO4-2	1/8	.128	1/2	63/64	.46	40	4°	.027
CO4-3	3/16	.190			.46	55	6°	.012
CO4-4	1/4	.253			.46	105	7°	.017
CO4-5	5/16	.315	3/4	1-5/64	.55	115	7°	.017
CO4-6	3/8	.378			.61	150	5°	.015
CO4-8	1/2	.503			.80	175	5°	.025

- Eliminates end play
- Zero backlash
- Provides uniform angular velocity
- Absorbs vibration, noise and shock

BORE	STYLE	MATERIAL
.128 TO .503	PIN HUB	HUBS AND SPACER - ALUMINUM 2011T3 ANODIZED BELLOWS - SPRING STAINLESS STEEL JOINT ASSEMBLY - COPPER C 106, ZINC PLATE, BLACK CHROMATE TEMPERATURE RANGE -40°C TO +120°C



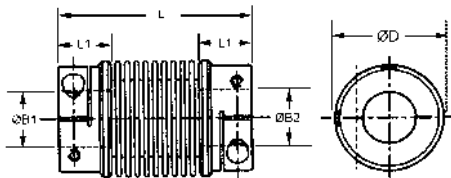
Peak Torque: Select a size where peak torque exceeds the application torque x service factor.

STOCK NO.	L	ØB1,ØB2 +.002 -.000	ØD	L1	PEAK TORQUE (± in/lb)	MAXIMUM MISALIGNMENT				
						ANGULAR (± degree)	RADIAL (± in)	AXIAL (± in)		
CO5H-1	1.70	.187	1.02		28.3	2	.002	.014		
CO5H-2	2.14				14.2	6	.020	.040		
CO5H-3	1.70				28.3	2	.002	.014		
CO5H-4	2.14				14.2	6	.020	.040		
CO5H-5	170	.375	.55		28.3	2	.002	.014		
CO5H-6	2.14				14.2	6	.020	.040		
CO5H-7	1.57				66.4	2.5	.004	.024		
CO5H-8	2.24				33.6	8	.040	.075		
CO5H-9	1.57	.375			66.4	2.5	.004	.024		
CO5H-10	2.24				33.6	8	.040	.075		
CO5H-11	1.57				.500	66.4	2.5	.004	.024	
CO5H-12	2.24					33.6	8	.040	.075	
CO5H-13	1.57	.625				66.4	2.5	.004	.031	
CO5H-14	2.24					33.6	8	.040	.098	
CO5H-15	1.96	.250			1.61	.71	88.5	2.5	.006	.031
CO5H-16	2.81						44.3	8	.047	.098
CO5H-17	1.96	.375	88.5	2.5			.006	.031		
CO5H-18	2.81		44.3	8			.047	.098		
CO5H-19	1.96	.500	88.5	2.5			.006	.031		
CO5H-20	2.81		44.3	8			.047	.098		
CO5H-21	1.96	.625	88.5	2.5			.006	.031		
CO5H-22	2.81		44.3	8			.047	.098		
CO5H-23	1.96	.750	88.5	2.5			.006	.031		
CO5H-24	2.81		44.3	8			.047	.098		

Service Factor	
Nature of Load	Factor
Uniform load	1.5
Non-uniform load	2
Shock load	3
Reversing shock load	4

BELLOWS COUPLINGS

BORE	STYLE	MATERIAL
.187 TO .750	CLAMP HUB	HUBS AND SPACER - ALUMINUM 2011T3 ANODIZED BELLOWS - SPRING STAINLESS STEEL JOINT ASSEMBLY - COPPER C 106, ZINC PLATE, BLACK CHROMATE TEMPERATURE RANGE -40°C TO +120°C



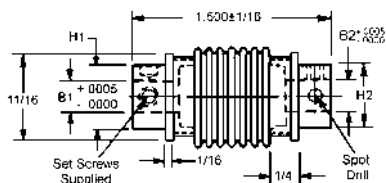
Peak Torque: Select a size where peak torque exceeds the application torque x service factor.

STOCK NO.	L	ØB1,ØB2 +.002 -.000	ØD	L1	PEAK TORQUE (± in/lb)	MAXIMUM MISALIGNMENT		
						ANGULAR (± degree)	RADIAL (± in)	AXIAL (± in)
CO5H-1C	1.70	.187	1.02	.55	28.3	2	.002	.014
CO5H-2C	2.14				14.2	6	.020	.040
CO5H-3C	1.70	28.3			2	.002	.014	
CO5H-4C	2.14	14.2			6	.020	.040	
CO5H-5C	1.70	.375	1.34		28.3	2	.002	.014
CO5H-6C	2.14				14.2	6	.020	.040
CO5H-7C	1.57	.250			66.4	2.5	.004	.024
CO5H-8C	2.24				33.6	8	.040	.075
CO5H-9C	1.57	.375		66.4	2.5	.004	.024	
CO5H-10C	2.24			33.6	8	.040	.075	
CO5H-11C	1.57	.500		66.4	2.5	.004	.024	
CO5H-12C	2.24			33.6	8	.040	.075	
CO5H-13C	1.57	.625		1.61	66.4	2.5	.004	.031
CO5H-14C	2.24				33.6	8	.040	.098
CO5H-15C	1.96	.250			88.5	2.5	.006	.031
CO5H-16C	2.81				44.3	8	.047	.098
CO5H-17C	1.96	.375			88.5	2.5	.006	.031
CO5H-18C	2.81				44.3	8	.047	.098
CO5H-19C	1.96	.500			88.5	2.5	.006	.031
CO5H-20C	2.81				44.3	8	.047	.098
CO5H-21C	1.96	.625	88.5		2.5	.006	.031	
CO5H-22C	2.81		44.3		8	.047	.098	
CO5H-23C	1.96	.750			88.5	2.5	.006	.031
CO5H-24C	2.81				44.3	8	.047	.098

Service Factor	
Nature of Load	Factor
Uniform load	1.5
Non-uniform load	2
Shock load	3
Reversing shock load	4

BELLOWS COUPLINGS

BORE	STYLE	MATERIAL
.1200 TO .3748	PIN HUB	STAINLESS STEEL

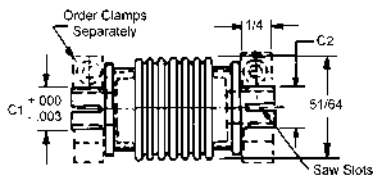


STOCK NO.	B1	B2	H1	H2
CO5-7	.1200	.1200	5/16	5/16
CO5-8	.1200	.1248	5/16	5/16
CO5-11	.1200	.1873	5/16	3/8
CO5-12	.1200	.2498	5/16	1/2
CO5-1	.1248	.1248	5/16	5/16
CO5-4	.1248	.1873	5/16	3/8
CO5-5	.1248	.2498	5/16	1/2
CO5-2	.1873	.1873	3/8	3/8
CO5-6	.1873	.2498	3/8	1/2
CO5-9	.2405	.2498	3/8	1/2
CO5-3	.2498	.2498	1/2	1/2
CO5-10	.3123	.3123	1/2	1/2
CO5-13	.3748	.3748	5/8	5/8

Maximum Rated Torque 75 oz./in.

Metric bore sizes and other bore combinations available on request.

BORE	STYLE	MATERIAL
.1200 TO .3748	CLAMP HUB	STAINLESS STEEL

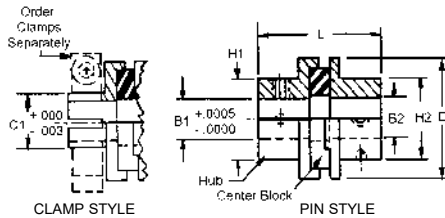


STOCK NO.	B1 +.0005 -.0000	B2 +.0005 -.0000	C1	C2
CO5-7C	.1200	.1200	3/16	3/16
CO5-8C	.1200	.1248	3/16	3/16
CO5-11C	.1200	.1873	3/16	1/4
CO5-12C	.1200	.2498	3/16	5/16
CO5-1C	.1248	.1248	3/16	3/16
CO5-4C	.1248	.1873	3/16	1/4
CO5-5C	.1248	.2498	3/16	5/16
CO5-2C	.1873	.1873	1/4	1/4
CO5-6C	.1873	.2498	1/4	5/16
CO5-9C	.2405	.2498	5/16	5/16
CO5-3C	.2498	.2498	5/16	5/16
CO5-10C	.3123	.3123	3/8	3/8
CO5-13C	.3748	.3748	7/16	7/16

Metric bore sizes and other bore combinations available on request.

OLDHAM COUPLINGS

BORES	STYLE	MATERIALS
.1200 TO .4998	PIN HUB	303 STAINLESS STEEL HUBS CENTER BLOCK: U = POLYURETHANE B = BRONZE OR N = NYLON



STOCK NO.	B1	B2	D	H1	H2	L	TORQUE Oz. In.
CO3-13-B CO3-13-N	.1200	.1248	5/8	5/16	5/16	21/32	90 28
CO3-2-U CO3-2-B CO3-2-N	.1248	.1248	5/8	5/16	5/16	21/32	20 90 28
CO3-10-U CO3-10-B CO3-10-N	.1248	.1873	5/8	5/16	3/8	11/16	20 90 28
CO3-11-U CO3-11-B CO3-11-N	.1248	.2498	5/8	5/16	1/2	23/32	20 90 28
CO3-3-U CO3-3-B CO3-3-N	.1873	.1873	5/8	3/8	3/8	23/32	80 360 112
CO3-12-U CO3-12-B CO3-12-N	.1873	.2498	5/8	3/8	1/2	3/4	80 360 112
CO3-4-U CO3-4-B CO3-4-N	.2498	.2498	5/8	1/2	1/2	25/32	80 360 112
CO3-5-U CO3-5-B CO3-5-N	.3123	.3123	5/8	1/2	1/2	25/32	80 360 112
CO3-6-U CO3-6-B CO3-6-N	.3748	.3748	1-3/8	3/4	3/4	1-9/16	300 1350 420
CO3-8-U CO3-8-B CO3-8-N	.4998	.4998	1-1/2	1	1	1-13/16	400 1800 560

* Limiting factor is strength of hub-to-shaft connection.

- Shaft to shaft misalignment .010 maximum
- Angular misalignment 1° maximum
- Maximum backlash 10 minutes

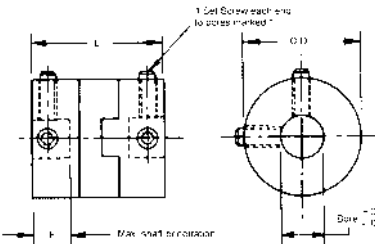
OLDHAM COUPLINGS

BORE	STYLE	MATERIAL
.1200 TO .2500	PIN HUB	BRASS HUB ACETAL CENTER BLOCK

STOCK NO.	BORE TO BORE		E	O.D.	L	RATED WORKING TORQUE Oz. In.	ANGULAR	PARALLEL
CO31-B	SOLID	SOLID	-	.37	1/2	64	1/2°	.05
CO31-1	.1200	.1250	.15					
CO31-2	.1250	.1250						
CO31-3	.1562	.1562						
CO31-4	.1875	.1875						
CO32-B	SOLID	SOLID	-	.50	5/8	120	3/4°	.06
CO32-1	.1250	.1250	.17					
CO32-2	.1562	.1562						
CO32-3	.1875	.1875						
CO32-4	.2500	.2500						

BORE	STYLE	MATERIAL
.1875 TO .6250	PIN HUB	ALUMINUM HUB ACETAL CENTER BLOCK

STOCK NO.	BORE TO BORE		E	O.D.	L	RATED WORKING TORQUE Oz. In.	ANGULAR	PARALLEL
CO33-B	SOLID	SOLID	-	.75	7/8	334	3/4°	.09
CO33-1	.1875	.1875	.25					
CO33-2	.2500	.2500						
CO33-3	.3125	.3125						
CO34-B	SOLID	SOLID	-	1	1-1/8	640	1°	.12
CO34-1	.2500	.2500	.34					
CO34-2	.3125	.3125						
CO34-3	.3750	.3750						
CO34-4	.4375	.4375						
CO60-B	SOLID	SOLID	-	1.31	1.91	2200	1-1/4°	.16
CO60-1	.3125	.3125	.51					
CO60-2	.3750	.3750						
CO60-3	.5000	.5000						
CO35-B	SOLID	SOLID	-	1.62	2.00	3200	1-1/4°	.20
CO35-1	.3750	.3750	.66					
CO35-2	.4375	.4375						
CO35-3	.5000	.5000						
CO35-4	.6250	.6250						

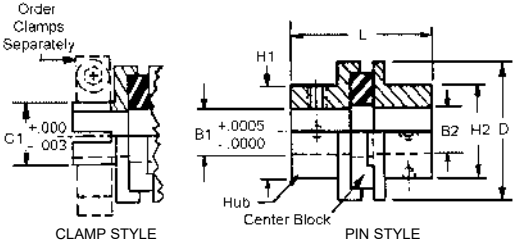


- Simple construction
- No backlash
- Corrosion resistant
- Reduces vibration
- Electrical Isolation
- No lubrication required

Blank hubs, set screw hubs, and clamp hubs are interchangeable within the same series, special combinations will be assembled to order.

OLDHAM COUPLINGS

BORE	STYLE	MATERIALS
1200 TO .2498	CLAMP	303 STAINLESS STEEL HUBS CENTER BLOCK: U = POLYURETHANE B = BRONZE OR N = NYLON



See previous pages for Stock Nos. and descriptions for Pin Hub Oldham Couplings.

STOCK NO.	B1	B2	D	C1	C2	L	TORQUE Oz. In.
CO6-8-B CO6-8-N	.1200	.1248	5/8	3/16	3/16	27/32	90 28
CO6-1-U CO6-1-B CO6-1-N	.1248	.1248	5/8	3/16	3/16	27/32	20 90 28
CO6-5-U CO6-5-B CO6-5-N	.1248	.1873	5/8	3/16	1/4	27/32	20 90 28
CO6-6-U CO6-6-B CO6-6-N	.1248	.2498	5/8	3/16	5/16	27/32	20 90 28
CO6-2-U CO6-2-B CO6-2-N	.1873	.1873	5/8	1/4	1/4	27/32	80 360 112
CO6-7-U CO6-7-B CO6-7-N	.1873	.2498	5/8	1/4	5/16	27/32	80 360 112
CO6-3-U CO6-3-B CO6-3-N	.2498	.2498	5/8	5/16	5/16	27/32	80 360 112

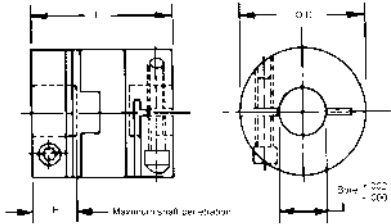
* Limiting factor is strength of hub-to-shaft connection.

- Shaft to shaft misalignment .010 maximum
- Angular misalignment 1° maximum
- Maximum backlash 10 minutes

OLDHAM COUPLINGS

BORE	STYLE	MATERIALS
.1875 TO .6250	CLAMP HUB	ALUMINUM HUB ACETAL CENTER BLOCK

STOCK NO.	BORE TO BORE	B2	E	O.D.	L	RATED WORKING TORQUE Oz. In.	ANGULAR	PARALLEL
CO33-1C CO33-2C	.1875 .2500	.1875 .2500	.25	.75	7/8	334	3/4°	.09
CO34-1C CO34-2C CO34-3C	.2500 .3125 .3750	.2500 .3125 .3750	.34	1	1-1/8	640	1°	.12
CO60-1C CO60-2C CO60-3C	.3125 .3750 .5000	.3125 .3750 .5000	.51	1.31	1.91	2200	1-1/4°	.16
CO35-1C CO35-2C CO35-3C CO35-4C	.3750 .4375 .5000 .6250	.3750 .4375 .5000 .6250	.66	1.62	2.00	3200	1-1/4°	.20



- Simple construction
- No backlash
- Corrosion resistant
- Reduces vibration
- Electrical Isolation
- No lubrication required.

Blank hubs, set screw hubs, and clamp hubs are interchangeable within the same series, special combinations will be assembled to order

UNIVERSAL LATERAL COUPLINGS

BORE			STYLE							MATERIAL	
.1200 TO .3750			PIN HUB							DELTRIN OUTER RING BRASS HUBS	

STOCK NO.	B1 +.002 +.000	B2 +.002 +.000	D1	D2	E1	E2	L	WORKING TORQUE Oz. In.	A
CO26-1	.1200	.1250	.35	.35	.16	.16	.56	38	23/32
CO26-2	.1250	.1250	.35	.35	.16	.16	.56		
CO26-3	.1250	.1575	.35	.35	.16	.16	.56		
CO26-4	.1250	.1875	.35	.35	.16	.16	.56		
CO26-7	.1250	.2500	.35	.44	.16	.26	.66		
CO26-5	.1575	.1575	.35	.35	.16	.16	.56		
CO26-8	.1575	.2500	.35	.44	.16	.26	.66		
CO26-6	.1875	.1875	.35	.35	.16	.16	.56		
CO26-9	.1875	.2500	.35	.44	.16	.26	.66		
CO26-10	.2500	.2500	.44	.44	.26	.26	.75		
CO23-1	.1250	.1250	.50	.50	.19	.19	.75	222	1-1/16
CO23-2	.1250	.1875	.50	.50	.19	.19	.75	222	
CO23-3	.1250	.2500	.50	.50	.19	.19	.75	222	
CO23-8	.1575	.1575	.50	.50	.19	.19	.75	222	
CO23-4	.1875	.1875	.50	.50	.19	.19	.75	222	
CO23-5	.1875	.2500	.50	.50	.19	.19	.75	222	
CO23-10	.1875	.3750	.50	.59	.19	.31	.88	122	
CO23-6	.2500	.2500	.50	.50	.19	.19	.75	222	
CO23-9**	.2500	.3125	.50	.50	.19	.19	.75	222	
CO23-11**	.2500	.3750	.50	.59	.19	.31	.88	122	
CO23-7**	.3125	.3125	.50	.50	.19	.19	.75	222	
CO23-12**	.3125	.3750	.50	.59	.19	.31	.88	122	
CO23-13**	.3750	.3750	.59	.59	.31	.31	1.00	122	

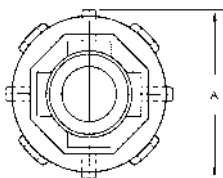
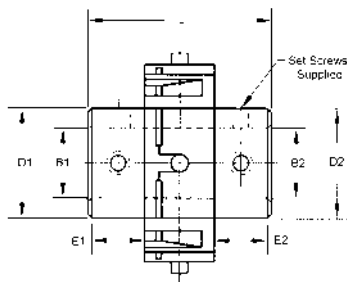
- Zero backlash
- Offers simultaneous lateral & angular misalignment
- Corrosion resistant
- No lubrication required
- Resonance damping
- Low inertia
- Shafts can pass through for easy installation
- Maximum operating temperature 185°F
- Misalignment (**)
Angular 10° maximum
Lateral .050 maximum

** Misalignment: Angular 5° maximum, Lateral .025 maximum.

BORE			STYLE							MATERIAL	
.2500 TO .6250			PIN HUB							DELTRIN OUTER RING ALUMINUM HUBS	

STOCK NO.	B1 +.002 +.000	B2 +.002 +.000	D1	D2	E1	E2	L	WORKING TORQUE Oz. In.	A
CO25X-1	.2500	.2500	.69	.69	.30	.30	.99	444	1-21/64
CO25X-2	.2500	.3750	.69	.69	.30	.30	.99		
CO25X-3	.3750	.3750	.69	.69	.30	.30	.99		
CO25X-4	.3750	.5000	.69	.79	.30	.40	1.10		
CO25X-5	.5000	.5000	.79	.79	.40	.40	1.21		
CO25-1	.2500	.2500	.87	.87	.30	.30	1.12	607	1-5/8
CO25-2	.2500	.3125	.87	.87	.30	.30	1.12		
CO25-3	.2500	.3750	.87	.87	.30	.30	1.12		
CO25-8	.2500	.5000	.87	.87	.30	.30	1.12		
CO25-4	.3125	.3125	.87	.87	.30	.30	1.12		
CO25-9	.3125	.5000	.87	.87	.30	.30	1.12		
CO25-5	.3750	.3750	.87	.87	.30	.30	1.12		
CO25-6	.3750	.5000	.87	.87	.30	.30	1.12		
CO25-7	.5000	.5000	.87	.87	.30	.30	1.12		
CO25-10	.6250	.6250	.95	.95	.49	.49	1.50		

- Zero backlash
- Offers simultaneous lateral & angular misalignment
- Corrosion resistant
- No lubrication required
- Resonance damping
- Low inertia
- Shafts can pass through for easy installation
- Maximum operating temperature 185°F
- Misalignment
Angular 10° maximum
Lateral .050 maximum.



UNIVERSAL LATERAL COUPLINGS

BORE	STYLE	MATERIAL
.1200 TO .3750	CLAMP	DELTRIN OUTER RING BRASS HUBS

STOCK NO.	B1 +.002 +.000	B2 +.002 +.000	D	E	L	WORKING TORQUE Oz. In.	OUTSIDE DIA.
CO27-1	.1200	.1250					
CO27-2	.1250	.1250					
CO27-3	.1250	.2500					
CO27-4	.1575	.1575	.75	.26	.75	38	3/4
CO27-5	.1875	.1875					
CO27-6	.2500	.2500					
CO28-1	.1575	.1575				222	
CO28-2	.1875	.1875				222	
CO28-3	.2500	.2500				222	
CO28-4**	.2500	.3750	1.00	.31	1.00	122	1-1/16
CO28-5**	.3125	.3125				222	
CO28-6**	.3750	.3750				122	

- Low inertia
- Resonance damping
- Electrically insulated
- Zero backlash
- Offers simultaneous lateral & angular misalignment
- Corrosion resistant
- No lubrication required
- Shafts can pass through for easy installation
- Maximum operating temperature 185°F
- Misalignment (**)
Angular 10° maximum
Lateral .050 maximum

** Misalignment: Angular 5° maximum, Lateral .025 maximum.

Additional sizes and bore combinations available on request.

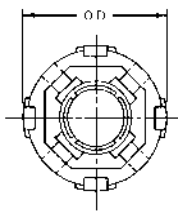
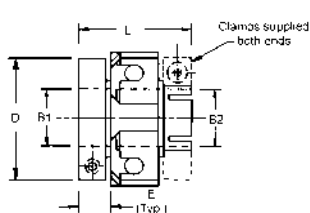
BORE	STYLE	MATERIAL
.2500 TO .5000	CLAMP	DELTRIN OUTER RING ALUMINUM HUBS

STOCK NO.	B1 +.002 +.000	B2 +.002 +.000	D	E	L	WORKING TORQUE Oz. In.	OUTSIDE DIA.
CO29X-1	.2500	.2500					
CO29X-2	.2500	.3750	.79	.40	1.21	444	1-21/64
CO29X-3	.3750	.3750					
CO29-1*	.2500	.2500					
CO29-2*	.2500	.5000					
CO29-3*	.3125	.3125					
CO29-4*	.3125	.5000	.95	.49	1.50	607	1-5/8
CO29-5*	.3750	.3750					
CO29-6*	.3750	.5000					
CO29-7*	.5000	.5000					

- Low inertia
- Resonance damping
- Electrically insulated
- Zero backlash
- Offers simultaneous lateral & angular misalignment
- Corrosion resistant
- No lubrication required
- Shafts can pass through for easy installation
- Maximum operating temperature 185°F
- Misalignment
Angular 10° maximum
Lateral .050 maximum

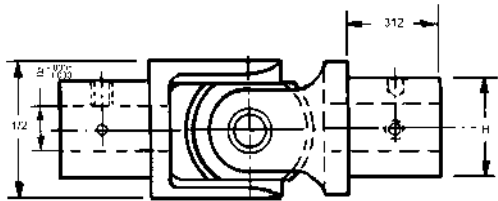
* Clamp hub is integral to hub on CO29 series.

Additional sizes and bore combinations available on request.



UNIVERSAL JOINTS

BORE	STYLE	MATERIAL
1/8" TO 3/16"	PIN HUB	303 STAINLESS STEEL

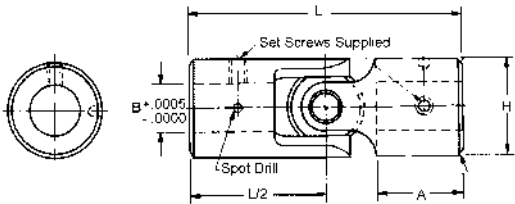


STOCK NO.	SHAFT SIZE	B BORE	H HUB DIA.	L	A BORE LENGTH
UJ-1	1/8	.1248	5/16	1-1/2	.44
UJ-2	3/16	.1873	3/8	1-1/2	.44

- Maximum operating angle 30° at 500 RPM
- Ideal operating angle 10° at 1000 RPM
- Lubrication required at all times

Special bore and bore-to-bore connections available on request.

BORES	STYLE	MATERIAL
1/4" TO 1/2"	PIN HUB	303 STAINLESS STEEL



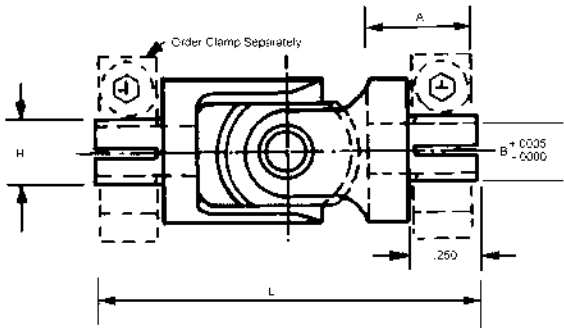
STOCK NO.	SHAFT SIZE	B BORE	H HUB DIA.	L	A BORE LENGTH
UJ-3	1/4	.2498	1/2	1-1/2	.44
UJ-4	5/16	.3123	1/2	1-1/2	.44
UJ-5	3/8	.3748	3/4	2-5/8	.92
UJ-6	1/2	.4998	1	3-3/8	1.17

- Maximum operating angle 30° at 500 RPM
- Ideal operating angle 10° at 1000 RPM
- Lubrication required at all times

Special bore and bore-to-bore connections available on request.

UNIVERSAL JOINTS

BORES	STYLE	MATERIAL
1/8" TO 1/4"	CLAMP	303 STAINLESS STEEL



STOCK NO.	SHAFT SIZE	B BORE	H HUB DIA.	L OVERALL	A BORE LG.	CLAMP (2) ORDER SEPARATELY STOCK NO.
UJ-10	1/8	.1248	3/16	1-3/8	.37	CG1-25
UJ-11	3/16	.1873	1/4	1-3/8	.37	CG1-9
UJ-12	1/4	.2498	5/16	1-3/8	.37	CG1-12

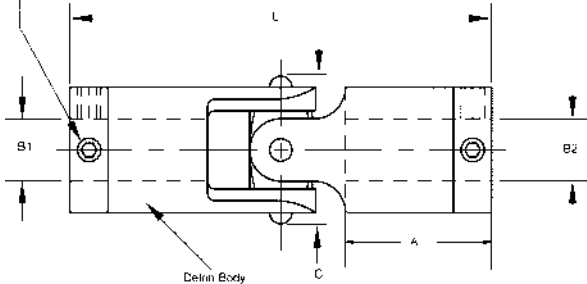
- Maximum operating angle 30° at 500 RPM
- Ideal operating angle 10° at 1000 RPM
- Lubrication required at all times

Special bore and bore-to-bore connections available on request.

UNIVERSAL JOINTS

BORES	STYLE	MATERIAL
1/8" TO 3/8"	SINGLE JOINT	DELRIN BODY BRASS HUB AND SPIDER

(2) Set Screws each end @ 120°



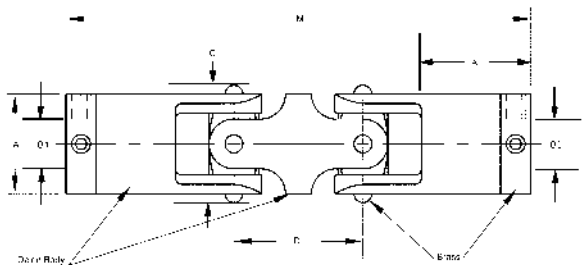
SINGLE JOINT

STOCK NO.	+001 +000 B1	+001 +000 B2	L	A	C	RATED TORQUE (OZ. IN.)
UJS-9	.1250*	.1250*	1-1/16	1/4	9/32	16
UJS-1	.1250*	.1250*	1-31/64	3/8	7/16	55
UJS-2	.1250*	.1875				
UJS-3	.1875	.1875				
UJS-4	.1875	.1875	1-13/16	1/2	9/16	151
UJS-5	.1875	.2500				
UJS-6	.2500	.2500				
UJS-10	.2500	.2500	2-21/32	5/8	11/16	239
UJS-11	.2500	.3125				
UJS-12	.2500	.3750				
UJS-13	.3125	.3125				
UJS-14	.3125	.3750				
UJS-15	.3750	.3750				

- Needs no lubrication
 - Can be submersed in water
 - Resists corrosion and chemical attack
 - Electrically isolates input from output
 - Zero backlash
 - Lightweight
 - Shock absorbent
 - Non-contaminant
 - Temperature Range -40° F to +185° F
- * 1 Set screw each end on these bore sizes.

UNIVERSAL JOINTS

BORES	STYLE	MATERIAL
1/8" TO 3/8"	DOUBLE JOINT	DELRIN BODY BRASS HUB ENDS AND SPIDER

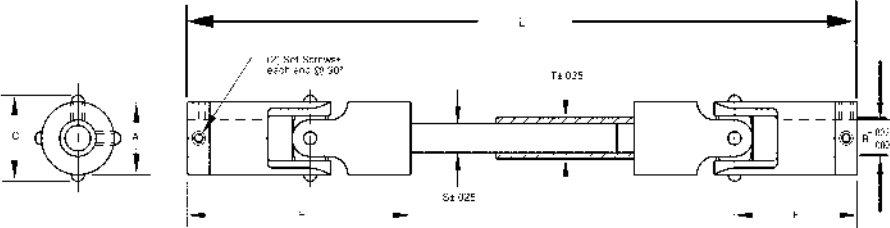


STOCK NO.	+0.001 +0.000 B1	+0.001 +0.000 B2	A	C	D	M	RATED TORQUE (OZ. IN.)
UJD-9	.1250*	.1250*	1/4	9/32	5/16	1-25/64	11
UJD-1	.1250*	.1250*					
UJD-2	.1250*	.1875	3/8	7/16	33/64	2	23
UJD-3	.1875	.1875					
UJD-4	.1875	.1875					
UJD-5	.1875	.2500	1/2	9/16	5/8	2-7/16	83
UJD-6	.2500	.2500					
UJD-10	.2500	.2500					
UJD-11	.2500	.3125					
UJD-12	.2500	.3750					
UJD-13	.3125	.3125	5/8	11/16	7/8	3-17/32	183
UJD-14	.3125	.3750					
UJD-15	.3750	.3750					

- Needs no lubrication
 - Can be submersed in water
 - Resists corrosion and chemical attack
 - Electrically isolates input from output
 - Zero backlash
 - Lightweight
 - Shock absorbent
 - Non-contaminant
 - Temperature Range -40° F to +185° F
- * 1 Set screw each end on these bore sizes.

TELESCOPIC UNIVERSAL JOINTS

BORES	MATERIAL
1/8" TO 3/8"	DELRIN BODY BRASS ENDS, SPIDER AND TELESCOPIC SECTIONS



STOCK NO.	BORES		A	C	L		E	F	RATED TORQUE OZ.IN.	S SQ.	T SQ.
	1	2			MAX.	MIN.					
UJT-1	.1250*	.1250*	3/8	7/16	5-19/64	4-5/64	1-19/64	47/64	55	.118	.165
UJT-2	.1250*	.1875									
UJT-3	.1875	.1875									
UJT-4	.1875	.1875	1/2	9/16	7-11/32	5-31/64	1-39/64	29/32	151	.165	.236
UJT-5	.1875	.2500									
UJT-6	.2500	.2500									
UJT-10	.2500	.2500	5/8	11/16	10-7/32	7-25/32	2-3/8	1-21/64	239	.236	.315
UJT-11	.2500	.3125									
UJT-12	.2500	.3750									
UJT-13	.3125	.3125									
UJT-14	.3125	.3750									
UJT-15	.3750	.3750									

- Temperature Range -40° F to +185° F
 - Needs no lubrication
 - Can be submersed in water
 - Resists corrosion
 - Electrically isolates input from output
 - Minimum Backlash
 - Lightweight
 - Non-contaminant (e.g. food, textiles and paper handling)
 - Non-magnetic
 - Resists chemical attack
 - Shock absorbent
- Note: 1/8" bore coupling ends are supplied with (1) set screw each end.
Maximum length can be reduced by cutting equal lengths off both telescoping halves.



OVERRUNNING COUPLINGS

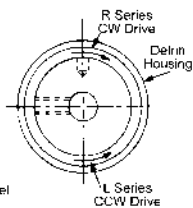
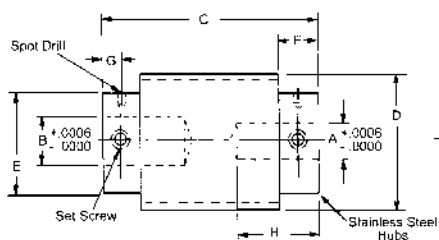
BORE SIZES	STYLE	MATERIAL
1/8" TO 1/2"	CLOCKWISE	416 STAINLESS STEEL HUB RC26-32 DELRIN CENTER

STOCK NO.	A	B	MAX DRIVE TORQUE	MAX DRAG TORQUE	C	D	E	F	G	H	SET SCREW
JB-R-4	.1248	.1248	10.0 IN. LBS	.10 IN. LBS	1.00	.75	.56	.21	.11	.47	#4-40
JB-R-5	.1248	.1873									
JB-R-6	.1248	.2498									
JB-R-17	.1873	.1873									
JB-R-8	.1873	.2498									
JB-R-9	.2498	.2498	80.0 IN. LBS	.25 IN.LBS	1.48	1.38	1.00	.33	.20	.73	#10-32
JB-R-10	.3123	.3123									
JB-R-11	.3123	.3748									
JB-R-12	.3123	.4998									
JB-R-13	.3748	.3748									
JB-R-14	.3748	.4998									
JB-R-15	.4998	.4998									

Locking R.H. Hub, L.H. drives clockwise

BORE SIZES	STYLE	MATERIAL
1/8" TO 1/2"	COUNTER-CLOCKWISE	416 STAINLESS STEEL HUB RC26-32 DELRIN CENTER

STOCK NO.	A	B	MAX DRIVE TORQUE	MAX DRAG TORQUE	C	D	E	F	G	H	SET SCREW
JB-L-4	.1248	.1248	10.0 IN. LBS	.10 IN. LBS	1.00	.75	.56	.21	.11	.47	#4-40
JB-L-5	.1248	.1873									
JB-L-6	.1248	.2498									
JB-L-17	.1873	.1873									
JB-L-8	.1873	.2498									
JB-L-9	.2498	.2498	80.0 IN. LBS	.25 IN. LBS	1.48	1.38	1.00	.33	.20	.73	#10-32
JB-L-10	.3123	.3123									
JB-L-11	.3123	.3748									
JB-L-12	.3123	.4998									
JB-L-13	.3748	.3748									
JB-L-14	.3748	.4998									
JB-L-15	.4998	.4998									



Locking R.H. Hub, L.H. drives counter-clockwise

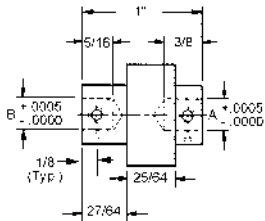
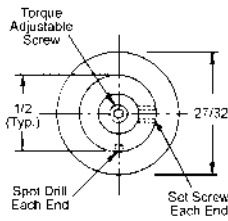
Drive load in one direction.

Clutch rotates freely in opposite direction

Note: Backlash is less than 1° (degree) in driving direction.

SLIP COUPLINGS

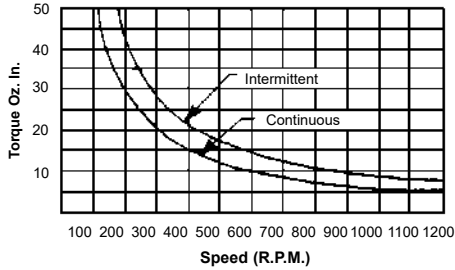
BORE SIZES	TORQUE	MATERIAL
1/8" TO 1/4"	ADJUSTABLE SEE GRAPH BELOW	STAINLESS STEEL HOUSING



PIN HUB STOCK NUMBER	A BORE	B BORE
JK-1	.1250	.1250
JK-2	.1250	.1875
JK-3	.1250	.2500
JK-4	.1875	.1875
JK-5	.1875	.2500
JK-7	.2500	.2500

CLAMP HUB STOCK NUMBER	A BORE	B BORE	CLAMP
JK-2C	.1250	.1875	CG1-5/8
JK-3C	.1250	.2500	CG1-5/12
JK-4C	.1875	.1875	CG1-8/8
JK-5C	.1875	.2500	CG1-8/12
JK-7C	.2500	.2500	CG1-12/12

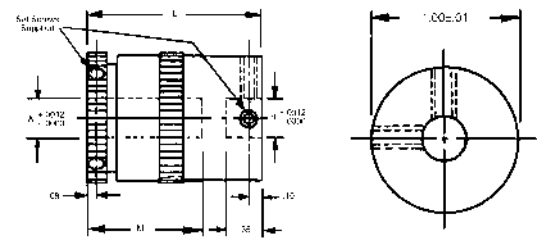
- Bi-Directional
- No Lubrication required
- Rulon clutch faces for smooth operation and long life at high speeds
- Consistent breakaway torques and performance at slip speeds up to 1200 R.P.M
- Slip torque is set and may be adjusted



Note:
Clutch capacity can be determined by use of the chart. The curves are based on a predetermined maximum temperature rise in the clutch when operated in an ambient temperature of 70°F. The intermittent curve applies to applications where the slipping period is 10 minutes or less and the cooling period is equal or greater.
Torque settings are maintained within plus or minus 20% over the full speed range.
Stability is improved for constant speed applications.

SLIP COUPLINGS

BORE SIZES	TORQUE	MATERIAL
1/4" AND 5/16"	ADJUSTABLE FROM 3.402 OZ.IN. TO 187.4 OZ.IN.	HOUSING ADJUSTER PINS: ALUMINUM ALLOY WITH ALOCROM; FINISH ADAPTERS, HUBS AND PLATES: HEAT TREATED STEEL, BRONZE BEARING

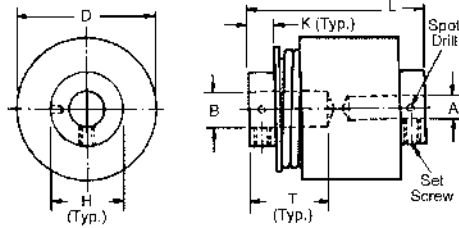


STOCK NO.	A BORE	B BORE	L	M	ADJUSTABLE TORQUE RANGE		WEIGHT
					MIN.	MAX.	
JJ-25	.2500	.2500	1.42	.98	3.4	76.0	50g
JJ-26	.3125	.3125			IN. OZ.	IN. OZ.	
JJ-27	.2500	.2500	1.65	1.22	11.0	187.4	61g
JJ-28	.3125	.3125			IN. OZ.	IN. OZ.	



SLIP COUPLINGS

BORE SIZES	TORQUE	MATERIAL
1/8" AND 3/4"	ADJUSTABLE 5 OZ.IN. TO 320 OZ.IN.	STAINLESS STEEL



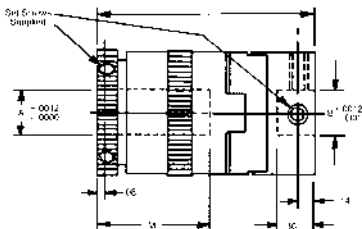
STOCK NO.	BORE $+0.0006$ -0.0000		L $\pm .02$	D $\pm .02$	H $\pm .02$	K $\pm .02$	T	TORQUE Bi DIRECTION (OZ. IN.)
	A	B						
JJ-1	.1250	.1250						
JJ-2	.1250	.1875	.89	.50	.37	.17	.43	5 $\pm$.7
JJ-3	.1875	.1875						
JJ-4	.1875	.1875						
JJ-5	.1875	.2500	1.11	.75	.50	.19	.50	12 $\pm$ 1.2
JJ-6	.2500	.2500						
JJ-7	.1875	.1875						
JJ-8	.1875	.2500	1.26	1.00	.50	.19	.55	20 $\pm$ 2
JJ-9	.2500	.2500						
JJ-10	.2500	.2500						
JJ-11	.2500	.3750	1.43	1.25	.62	.25	.62	48 $\pm$ 5
JJ-12	.3750	.3750						
JJ-13	.3125	.3125	1.59	1.50	.75	.25	.73	88 $\pm$ 9
JJ-14	.3750	.3750						
JJ-15	.3750	.3750						
JJ-16	.3750	.5000	1.84	1.87	.87	.28	.85	120 $\pm$ 12
JJ-17	.5000	.5000						
JJ-18	.3750	.3750						
JJ-19	.3750	.5000						
JJ-20	.5000	.5000						
JJ-21	.5000	.6250	2.25	2.25	1.25	.38	1.00	240 $\pm$ 24
JJ-22	.6250	.6250						
JJ-23	.6250	.7500						
JJ-24	.7500	.7500						
JJ-18-X	.3750	.3750						
JJ-19-X	.3750	.5000						
JJ-20-X	.5000	.5000						
JJ-21-X	.5000	.6250	2.25	2.25	1.25	.38	1.00	320 $\pm$ 10
JJ-22-X	.6250	.6250						
JJ-23-X	.6250	.7500						
JJ-24-X	.7500	.7500						

- Shaft to Shaft misalignment to .010 max.
- Angular misalignment 3° max.
- Can run under continuous slip operation

Torque limits calibrated to 5% torques from 1/2 oz./in. to 480 oz./in. available on request.

OLDHAM SLIP COUPLINGS

BORE SIZES	TORQUE	MATERIAL
1/4" AND 5/16"	ADJUSTABLE 3.4 OZ.IN. TO 187.4 OZ.IN.	HOUSING ADJUSTER PINS: ALUMINUM ALLOY WITH ALOCROM; FINISH ADAPTERS, HUBS AND PLATES: HEAT TREATED STEEL, BRONZE BEARING



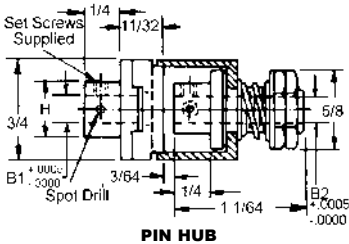
STOCK NO.	A BORE	B BORE	L	M	ADJUSTABLE TORQUE RANGE		WEIGHT
					MIN.	MAX.	
JJ-20	.2500	.2500			3.4	76.0	57g
JJ-30	.3125	.3125	1.83	.98	IN. OZ.	IN. OZ.	
JJ-31	.2500	.2500			11.0	187.4	68g
JJ-32	.3125	.3125	2.07	1.22	IN. OZ.	IN. OZ.	

- Bi-Directional
- Maximum operating temperature 175°F
- Maximum backlash 2°

INLINE COUPLING SLIP CLUTCHES

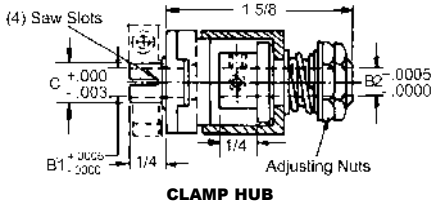
BORE	STYLE	TORQUE	MATERIAL
1/8" TO 1/4"	PIN HUB	ADJUSTABLE 0-25 OZ.IN	303 STAINLESS STEEL

STOCK NO.	B1	B2	H	ADJUSTABLE SLIP TORQUE
CO16-1	.1248	.1248	5/16	0-25 OZ. IN.
CO16-2	.1873	.1873	3/8	
CO16-3	.2498	.2498	1/2	
CO16-4	.1248	.1873	3/8	
CO16-5	.1248	.2498	1/2	
CO16-6	.1873	.2498	1/2	



BORE	STYLE	TORQUE	MATERIAL
1/8" TO 1/4"	CLAMP HUB	ADJUSTABLE 0-25 OZ.IN	303 STAINLESS STEEL

STOCK NO.	B1	B2	H	ADJUSTABLE SLIP TORQUE
CO17-1	.1248	.1248	3/16	0-25 OZ. IN.
CO17-2	.1873	.1873	1/4	
CO17-3	.2498	.2498	5/16	
CO17-4	.1248	.1873	1/4	
CO17-5	.1248	.2498	5/16	
CO17-6	.1873	.2498	5/16	



SLIP CLUTCHES

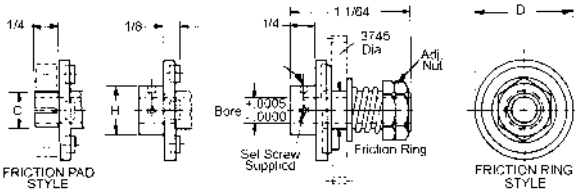
BORE	STYLE	TORQUE	MATERIAL
1/8" TO 1/4"	PIN HUB	ADJUSTABLE 0 OZ.IN. TO 50 OZ.IN	303 STAINLESS STEEL

STOCK NO.	BORE SIZE	H	D	FRICTION FACE	ADJUSTABLE SLIP TORQUE
JC-10 JC-11 JC-12	.1248 .1873 .2498	5/16 3/8 1/2	5/8	FRICTION RING	0 TO 10 OZ. IN.
JC-10-50 JC-11-50 JC-12-50	.1248 .1873 .2498	5/16 3/8 1/2	5/8	FRICTION RING	10 TO 50 OZ. IN.
JA-1 JA-2 JA-3	.1248 .1873 .2498	5/16 3/8 1/2	1	FRICTION RING	10 TO 50 OZ. IN.
JC-1 JC-2 JC-3	.1248 .1873 .2498	5/16 3/8 1/2	1	FRICTION PADS	0 TO 10 OZ. IN.
JC-1-50 JC-2-50 JC-3-50	.1248 .1873 .2498	5/16 3/8 1/2	1	FRICTION PADS	10 TO 50 OZ. IN.

BORE	STYLE	TORQUE	MATERIAL
1/8" TO 1/4"	CLAMP HUB	ADJUSTABLE 10 OZ.IN. TO 50 OZ.IN	303 STAINLESS STEEL

STOCK NO.	BORE SIZE	H	D	FRICTION FACE	ADJUSTABLE SLIP TORQUE
JA-1C JA-2C JA-3C	.1248 .1873 .2498	3/16 1/4 5/16	1	FRICTION RING	10 TO 50 OZ. IN.
JC-1C JC-2C JC-3C	.1248 .1873 .2498	3/16 1/4 5/16	1	FRICTION PADS	0 TO 10 OZ. IN.
JC-1-50C JC-2-50C JC-3-50C	.1248 .1873 .2498	3/16 1/4 5/16	1	FRICTION PADS	10 TO 50 OZ. IN.

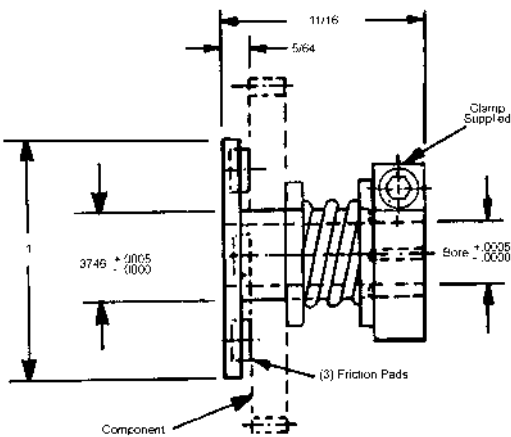
CLAMP HUB PIN HUB



Order gears and clamps separately.

SLIP CLUTCHES

BORE	STYLE	TORQUE	MATERIAL
1/8" TO 1/4"	CLAMP HUB	ADJUSTABLE 0 OZ.IN. TO 100 OZ.IN.*	303 STAINLESS STEEL



- Use with gears, sprockets, pulleys, ratchets, cams, or other components with 3/8" bores.

STOCK NO.	BORE	COMPONENT THICKNESS (IN.)	ADJUSTABLE SLIP TORQUE (IN.)
JC-7	.1248	1/16 THROUGH 1/8	1/16 - 0 TO 15 OZ. IN. 1/8 - 5 TO 30 OZ. IN.
JC-8	.1873		
JC-9	.2498		
JC-7-50	.1248	1/16 THROUGH 1/8	1/16 - 15 TO 50 OZ. IN. 1/8 - 25 TO 100 OZ.IN.
JC-8-50	.1873		
JC-9-50	.2498		

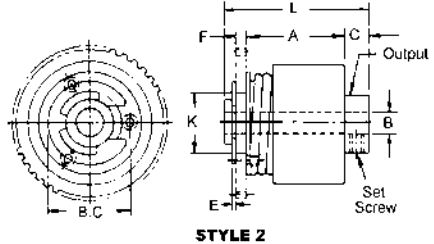
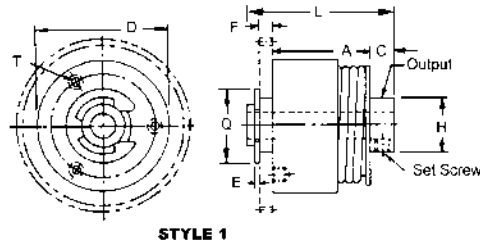
* Adjustable by varying spring force.

SLIP CLUTCHES

BORE	STYLE	TORQUE	MATERIAL
1/8" TO 1/2"	1 AND 2	BI-DIRECTIONAL 9 OZ. IN. TO 320 OZ. IN.	STAINLESS STEEL BRONZE BEARINGS

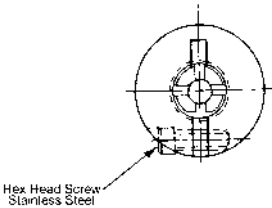
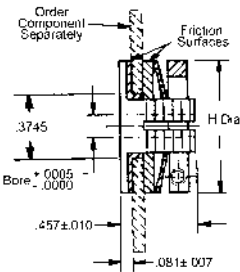
STOCK NO.	B BORE +.0007 -.0000	TORQUE BI-DIRECTIONAL	K DIA. -.0008	L	A	C	STYLE	D	T (DEPTH)	B.C.	F	Q (MAX.)	E	H
JH-1	.1248	9 OZ. IN. ± 1	.3740	1.05	.72	.18	1	.63	#0-80 x .08	.500	.080	.45	.03	.38
JH-1A	.1873	9 OZ. IN. ± 1	.3740	1.05	.72	.18	1	.63	#0-80 x .08	.500	.080	.33	.03	.38
JH-2	.1873	20 OZ. IN. ± 2	.4990	1.24	.85	.21	1	1.00	#1-72 x .10	.650	.095	.68	.04	.50
JH-3	.2498	20 OZ. IN. ± 2	.4990	1.24	.85	.21	1	1.00	#1-72 x .10	.650	.095	.68	.04	.50
JH-3A	.3123	20 OZ. IN. ± 2	.4990	1.24	.85	.21	1	1.00	#1-72 x .10	.650	.095	.68	.04	.50
JH-4	.2498	48 OZ. IN. ± 5	.4990	1.39	.94	.23	1	1.25	#2-56 x .11	.925	.130	.68	.04	.50
JH-4A	.3123	48 OZ. IN. ± 5	.4990	1.39	.94	.23	1	1.25	#2-56 x .11	.925	.130	.68	.04	.50
JH-5	.2498	80 OZ. IN. ± 8	.4990	1.39	.94	.23	1	1.50	#2-56 x .11	.925	.130	.68	.04	.63
JH-5A	.3123	80 OZ. IN. ± 8	.4990	1.39	.94	.23	1	1.50	#2-56 x .11	.925	.130	.68	.04	.63
JH-6	.2498	120 OZ. IN. ± 12	.4990	1.67	1.20	.25	1	1.87	#4-40 x .15	.750	.130	.68	.04	.63
JH-6A	.3123	120 OZ. IN. ± 12	.4990	1.67	1.20	.25	1	1.87	#4-40 x .15	.750	.130	.68	.04	.63
JH-7	.2498	240 OZ. IN. ± 24	.7490	1.88	1.34	.29	2	2.25	#4-40 x .17	1.170	.130	.74	.04	1.00
JH-8	.3123													
JH-9	.3748													
JH-10	.4998	320 OZ. IN. ± 24	.7490	1.88	1.34	.29	2	2.25	#4-40 x .17	1.170	.130	.74	.04	1.00
JH-7-X	.2498													
JH-8-X	.3123													
JH-9-X	.3748													
JH-10-X	.4998													

- Torques from 1/2 oz. in. to 480 oz. in. are available on request.
- Torque limits calibrated to 5% on request.



MINIATURE SLIP CLUTCHES

BORE	STYLE	TORQUE	MATERIAL
1/8" TO 1/4"	CLAMP HUB	ADJUSTABLE 0 OZ.IN. TO 50 OZ.IN.*	ANODIZED ALUMINUM



STOCK NO.	H	BORE	COMPONENT THICKNESS (IN.)
JA-4	.625	.1248	1/16 THROUGH 1/8
JA-5	.625	.1873	
JA-6	.750	.2498	

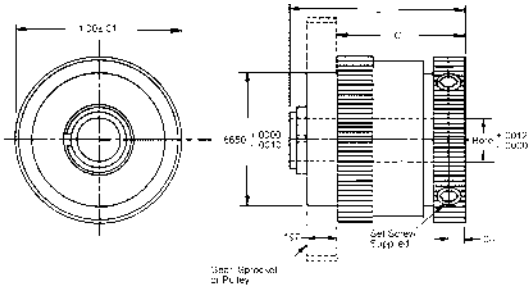
- Use with gears, sprockets, pulleys, ratchets, cams, or other components with 3/8" bores.

Special bore sizes available on request.

- * Adjusted by varying spring force.

SLIP CLUTCHES & COUPLINGS

BORE	TORQUE	MATERIAL
1/4" TO 5/16"	ADJUSTABLE 3.4 OZ.IN. TO 187.4 OZ.IN.	STAINLESS STEEL BRONZE BEARING



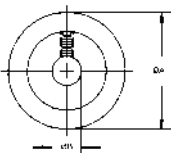
- Maximum operating temperature 175°F
- Maximum backlash 2°
- Bi-directional
- Fine-knurled torque adjustment rings

STOCK NO.	BORE	L	C	ADJUSTABLE TORQUE RANGE		WEIGHT
				MIN.	MAX.	
JH-11	.2500	1.04	.79	3.4	76.0	37g
JH-12	.3125			IN. OZ.	IN. OZ.	
JH-13	.2500	1.28	1.03	11.0	187.4	48g
JH-14	.3125			IN. OZ.	N. OZ.	

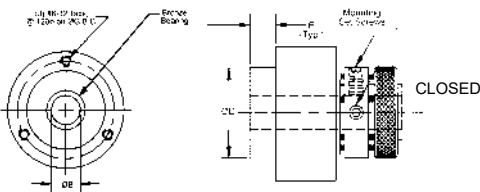
BORE	STYLE	TORQUE	MATERIAL
1/8" TO 1/2"	OPEN OR CLOSED	ADJUSTABLE 4.80 OZ.IN. TO 400 OZ.IN.	STAINLESS STEEL BRONZE BEARING

SHAFT TO COMPONENT	SHAFT TO SHAFT	ØB +.002 -.000	ØA	C	ØD	E	ØG	ADJUSTABLE TORQUE RANGE	STYLE
JCL-1 JCL-2 JCL-3	JCO-1 JCO-2 JCO-3	.125 .187 .250	1.00	1.31	.50	.25	.750	4.8 TO 160 IN. OZ.	CLOSED
JCL-4 JCL-5 JCL-6	JCO-4 JCO-5 JCO-6	.250 .375 .500	1.50	2.50	1.00	.37	1.250	8 TO 400 IN. OZ.	OPEN

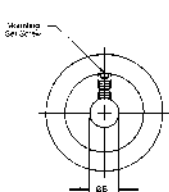
SLIP COUPLING JCO SERIES - CLOSED



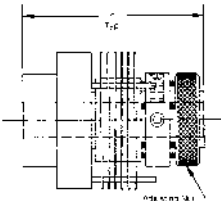
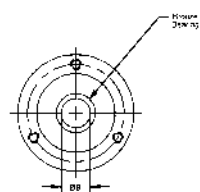
SLIP CLUTCH JCL SERIES - CLOSED



SLIP COUPLING JCO SERIES - OPEN

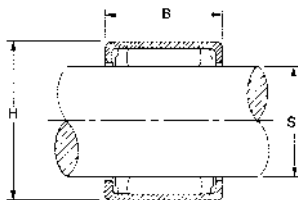


SLIP CLUTCH JCL SERIES - OPEN



ROLLER CLUTCHES

BORE	STYLE	MATERIAL
1/8" TO 3/4"	DRAWN CUP DESIGN ONE DIRECTIONAL DRIVE	ROLLER CUP - CASE HARDENED STEEL; NEEDLE BEARINGS - 52100 HARDENED CHROME STEEL; SPRINGS - STAINLESS STEEL; CAGE - NYLON 66 (or Equiv.)

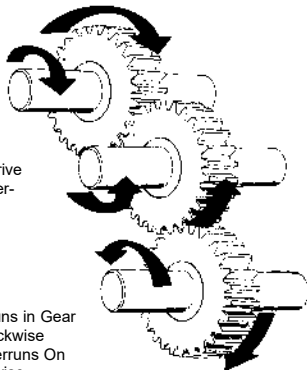


- Ideal For Indexing, Backstopping Or Overrunning Operations
- Free Rolling One Way, Drives In Opposite Direction
- Light Weight, Low Profile
- High Indexing, Frequency
- Temp. Range, Grease - 50p To + 160pF
- Minimum Backlash

Shaft
Drives Gear
Clockwise

Gear Can Drive
Shaft Counter-
Clockwise

Shaft Overruns in Gear
Counter-Clockwise
Or Gear Overruns On
Shaft Clockwise



* HARDENED SHAFTING STOCK LENGTH 12 INCHES OTHER LENGTHS ON REQUEST	
SHAFTING STOCK NO.	SHAFT DIAMETER S
---	+ .0000 - .0005
---	.1250
---	.2500
LMS-46-12	.3750
LMS-48-12	.5000
LMS-50-12	.6250
LMS-52-12	.7500

STOCK NO.	BORE	H CLUTCH (O.D.)	B +.000 -.010	MAX TORQ LB. IN.	HOUSING DIAMETER +.0010 -.0000	OVERRUN SPEED (MAX) (RPM)
NRC-2**	1/8	9/32	.250	2.86	.2812	50,000
NRC-4	1/4	7/16	.500	18.6	.4370	21,000
NRC-6	3/8	5/8	.500	50.4	.6245	14,000
NRC-8	1/2	3/4	.500	85.9	.7495	11,000
NRC-10	5/8	7/8	.625	175.2	.8745	8,500
NRC-12	3/4	1"	.625	247.8	.9995	7,000

* Order shaft separately.

** Utilizes a one-piece cage of acetal resin plastic with integral leaf style spring.

This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

VIBRATION DAMPING COMPONENTS

Table of Contents

STUD MOUNTS

MALE - MALE H 2
MALE - FEMALE H 2
MALE - BUMPER H 2

BUSHINGS..... H 3



STUD MOUNTS

TYPE	MATERIAL
MALE - MALE	SORBOTHANE AND LOW CARBON ZINC PLATED STEEL

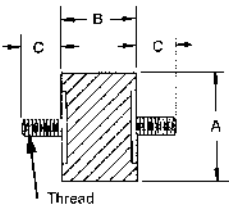
STOCK NO.	THREAD	A	B	C +.03 -.09	LOAD PER MOUNT (lbs.) 70 DUROMETER
SSMM-1	#8-32	.75	.50	.5	5-12
SSMM-2	1/4-20	1.5	1.0	.5	20-45
SSMM-3	1/4-20	1.75	.85	.5	35-75

TYPE	MATERIAL
MALE - FEMALE	SORBOTHANE AND LOW CARBON ZINC PLATED STEEL

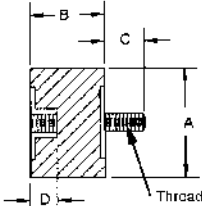
STOCK NO.	THREAD	A	B	C +.03 -.09	D	LOAD PER MOUNT (lbs.) 70 DUROMETER
SSMF-1	#8-32	.75	.50	.5	.35	5-12
SSMF-2	1/4-20	1.5	1.0	.5	.35	20-45
SSMF-3	1/4-20	1.75	.85	.5	.35	35-75

TYPE	MATERIAL
MALE - BUMPER	SORBOTHANE AND LOW CARBON ZINC PLATED STEEL

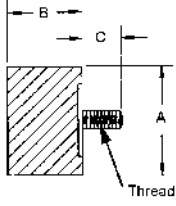
STOCK NO.	THREAD	A	B	C +.03 -.09	LOAD PER MOUNT (lbs.) 70 DUROMETER
SSMB-1	#8-32	.75	.50	.5	5-12
SSMB-2	1/4-20	1.5	1.0	.5	20-45
SSMB-3	1/4-20	1.75	.85	.5	35-75



MALE-MALE



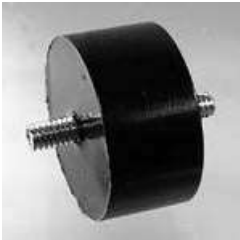
MALE-FEMALE



MALE-BUMPER

Metal bonded stud mounts made from highly damped Sorbothane are available in several common sizes. The mounts have inserts formed with either male or female standard UNC threads. Typical applications generally require a lower shear-to-compression stiffness ratio. They provide both vibration and shock isolation while maintaining consistent properties over a wide range of temperatures and frequencies. Sorbothane stud mounts are designed to primarily be used in compression.

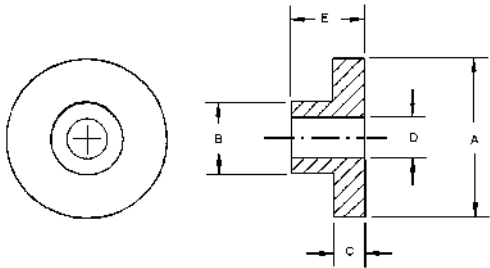
For the loads shown, the lower value will produce a 10% change in height and the higher value will produce a 20% change in height.



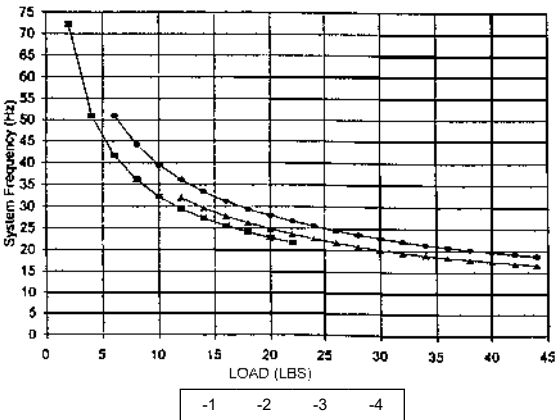
BUSHINGS

MATERIAL

SORBOTHANE



STOCK NO.	A	B	C	D	E	LOAD PER MOUNT (lbs.) 70 DUROMETER
SB-1	.75	.50	.15	.25	.22	8-21
SB-2	1.00	.462	.1875	.282	.3125	20-42
SB-3	1.00	--	.1875	.45	.1875	8-11
SB-4	1.00	.45	.1875	.25	.60	28-44



Sorbothane bushings isolate vibration and absorb shock for delicate electronics and other light weight applications. Using two bushings together, you can create a floating bolt which isolates your unit from any metal to metal contact. To achieve this floating bolt, use two pieces of stock numbers SB-1 or SB-2 respectively and one piece each of part numbers SB-3 and SB-4 together. Different durometers allow for different spring rates. Load ratings assume a 10% torsional deflection of the bushing material.

NOTES

This image shows a full page of blank, lined paper. It features approximately 20 evenly spaced horizontal grey lines running across the width of the page, providing a guide for handwriting or typing. The background is a clean, solid white color.

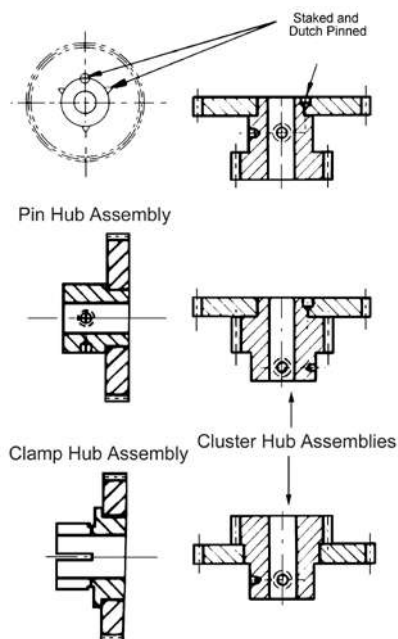
BEARINGS, SHAFTS, CLAMPS, COLLARS, HUBS & KEYS

Table of Contents

HUBS		
GEAR, SPROCKET & DIAL ASSEMBLIES	I 2	
TECHNICAL DATA	I 2	
GEAR, SPROCKET & DIAL HUBS	I 3 - I 5	
DUAL GEAR HUBS	I 6	
CLAMPS		
SPLIT HUB CLAMPS	I 7 - I 11	
SHAFT CLAMPS	I 12	
THREADED SHAFT CLAMPS	I 13	
COLLARS		
SET SCREW COLLARS	I 14 - I 15	
PLASTIC ROD STOCKS	I 16	
SHAFTS		
CASE HARDENED & GROUND SHAFTS	I 17	
STAINLESS GROUND SHAFTS	I 18 - I 21	
GROUND SHAFTING	I 22	
ULTRA GROUND SHAFTING	I 23	
SHAFT SEALS	I 24	
SHAFT WIPERS	I 25 - I 26	
SHAFT ADAPTERS	I 27	
WOODRUFF KEYS	I 28	
BEARINGS		
DYNA-SPEED NEEDLE ROLLER BEARINGS	I 29	
BALL BEARINGS	I 30 - I 36	
ANGULAR CONTACT BALL BEARINGS	I 37	
OIL-LESS BEARINGS	I 38 - I 41	
LONG-LIFE® BEARINGS	I 42	
PRECISION BEARINGS	I 43 - I 44	
DIMENSIONAL INFORMATION	I 44	
THERMOPLASTIC BEARINGS	I 45 - I 47	
REFERENCE CHART	I 45	
SPHERICAL BEARINGS	I 48	
THERMOPLASTIC SPHERICAL BEARINGS	I 49	
THRUST BEARINGS	I 50	
ROLLER THRUST BEARINGS	I 51	

GEAR, SPROCKET & DIAL ASSEMBLIES

TECHNICAL DATA



W.M. Berg has a wide selection of hub sizes and styles to select from. Our all stainless steel hubs are available in bore diameters ranging from 5/64" to 1-1/4".

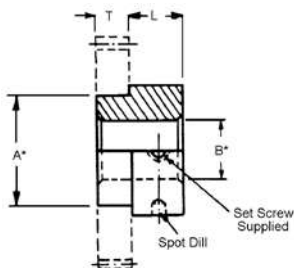
See the following pages for pin hub, clamp hubs and dual hubs, see index for cluster gears. W.M. Berg assembles hubless gears, sprockets or dials to hubs for a nominal assembly charge. Contact our Customer Service Department for more information.

GEAR, SPROCKET & DIAL HUBS

BORE				TYPE				MATERIAL			
5/64" TO 1-1/4"				PIN HUB				303 STAINLESS STEEL			

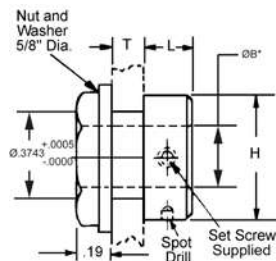
STOCK NO.	B +.0005 +.0000	A +.0005 +.0000	T	L	H	SPOT DRILL	SET SCREW	STOCK NO.	B +.0005 +.0000	A +.0005 +.0000	T	L	H	SPOT DRILL	SET SCREW
PH4-27 PH4-28	.0781	.3750	.062 .125	.22	7/16	#69	#2-56	PH1-20 PH1-62 PH4-62 PH4-63	.3748	.6875	.062 .093 .125 .187	.50	1	#42	#8-32
PH4-29 PH4-30	.0900		.062 .125					PH2-7 PH2-5 PH2-23			.250 .375 .575				
PH4-31 PH4-32	.0937		.062 .125					PH1-24 PH1-64 PH4-64 PH4-65			.062 .093 .125 .187				
PH4-7 PH4-8	.1200		.062 .125					PH1-27 PH1-28 PH1-36 PH2-29			.250 .375 .500 .575				
PH4-1 PH1-3 PH4-2 PH2-12 PH2-1 PH2-10	.1248	.3750	.062 .093 .125 .187 .250 .575	.22	7/16	#69 #60 #69 #69 #69 #60	#2-56 #4-40 #2-56 #2-56 #2-56 #4-40	PH1-30 PH1-31 PH1-32 PH1-33 PH1-34 PH2-35	.4998	.6875	.062 .093 .125 .187 .250 .375 .500 .575	.50	1-1/4	#42 #42 #31 #31 #42 #42 #42 #42	#8-32 #8-32 #10-32 #10-32 #8-32 #8-32 #8-32 #8-32
PH4-33 PH4-34			.062 .125			#69	#2-56				.187 3/16 1/4 3/8 1/2 .575				
PH4-3 PH1-8 PH4-4 PH2-13 PH2-2 PH2-11			.062 .093 .125 .187 .250 .575			#60 #60 #60 #50 #60 #50	#4-40 #4-40 #4-40 #4-40 #4-40 #6-32				.75 .70				
PH4-35 PH4-36	.2405		.062 .125			.25 1/2	#50 #50				.187 3/16 1/4 3/8 1/2 .575				
PH4-5 PH1-13 PH4-6 PH2-14 PH2-3 PH2-15	.2498	.3750	.062 .093 .125 .187 .250 .575	.22	7/16	1/2	#50	PH1-46 PH1-47 PH1-48 PH1-49 PH1-50 PH2-51	.7500	1.374	.187 3/16 1/4 3/8 1/2 .575	.75	1-1/2	#31	1/4-20
PH4-35 PH4-36			.062 .125								.187 3/16 1/4 3/8 1/2 .575				
PH4-5 PH1-13 PH4-6 PH2-14 PH2-3 PH2-15			.062 .093 .125 .187 .250 .575								.187 3/16 1/4 3/8 1/2 .575				
PH2-4	.3123		.250			1/2	#50				.75				
PH1-16 PH1-60 PH4-60 PH4-61 PH2-8 PH2-9 PH2-19	.3123	.6875	.062 .093 .125 .187 .250 .375 .575	.50	7/8	#42 #42 #50 #50 #42 #42 #42	#8-32 #8-32 #6-32 #6-32 #8-32 #8-32 #8-32	PH1-54 PH1-55 PH1-56 PH1-57 PH1-58 PH2-59	1.0000	1.374	.187 3/16 1/4 3/8 1/2 .575	.96	1-3/4	#22	3/8-16
PH1-16 PH1-60 PH4-60 PH4-61 PH2-8 PH2-9 PH2-19			.062 .093 .125 .187 .250 .375 .575								.187 3/16 1/4 3/8 1/2 .575				
PH1-16 PH1-60 PH4-60 PH4-61 PH2-8 PH2-9 PH2-19			.062 .093 .125 .187 .250 .375 .575								.187 3/16 1/4 3/8 1/2 .575				
PH1-16 PH1-60 PH4-60 PH4-61 PH2-8 PH2-9 PH2-19			.062 .093 .125 .187 .250 .375 .575								.187 3/16 1/4 3/8 1/2 .575				
PH1-16 PH1-60 PH4-60 PH4-61 PH2-8 PH2-9 PH2-19	.3123	.6875	.062 .093 .125 .187 .250 .375 .575	.50	7/8	#42 #42 #50 #50 #42 #42 #42	#8-32 #8-32 #6-32 #6-32 #8-32 #8-32 #8-32	PH1-54 PH1-55 PH1-56 PH1-57 PH1-58 PH2-59	1.2500	1.374	.187 3/16 1/4 3/8 1/2 .575	.96	1-3/4	#22	3/8-16
PH1-16 PH1-60 PH4-60 PH4-61 PH2-8 PH2-9 PH2-19			.062 .093 .125 .187 .250 .375 .575								.187 3/16 1/4 3/8 1/2 .575				
PH1-16 PH1-60 PH4-60 PH4-61 PH2-8 PH2-9 PH2-19			.062 .093 .125 .187 .250 .375 .575								.187 3/16 1/4 3/8 1/2 .575				
PH1-16 PH1-60 PH4-60 PH4-61 PH2-8 PH2-9 PH2-19			.062 .093 .125 .187 .250 .375 .575								.187 3/16 1/4 3/8 1/2 .575				

- * Diameters A & B are concentric within .0005.
- Fasten component to hub with epoxy cement or stake and dutch pin.
- Assembly by Berg available.



GEAR, SPROCKET & DIAL HUBS

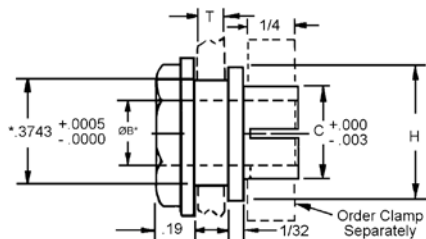
BORE	TYPE	MATERIAL
.0900 TO .2498	PIN HUB	303 STAINLESS STEEL



* Concentric within .0005

STOCK NO.	ØB +.0005 -.0000	T	H	L
PH4-19 PH4-20	.0900	.062 .125	7/16	.22
PH4-21 PH4-22	.0937	.062 .125		
PH4-15 PH4-16	.1200	.062 .125		
PH4-9 PH4-10	.1248	.062 .125		
PH4-23 PH4-24	.1562	.062 .125		
PH4-11 PH4-12	.1873	.062 .125	7/16	.22
PH4-25 PH4-26	.2405	.062 .125	1/2	.25
PH4-13 PH4-14	.2498	.062 .125		

BORE	TYPE	MATERIAL
.0900 TO .2498	CLAMP HUB	303 STAINLESS STEEL

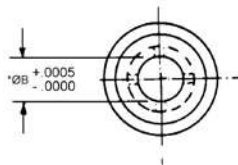


* Concentric within .0005

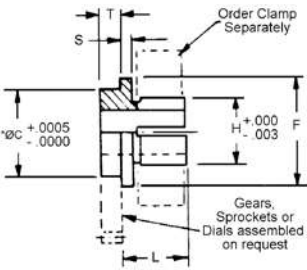
STOCK NO.	ØB +.0005 -.0000	T	C	H	CLAMP STOCK NO.
CH2-19 CH2-20	.0900	.062 .125	7/16	.188	CG1-5
CH2-21 CH2-22	.0937	.062 .125			
CH2-15 CH2-16	.1200	.062 .125			
CH2-9 CH2-10	.1248	.062 .125			
CH2-23 CH2-24	.1562	.062 .125			
CH2-11 CH2-12	.1873	.062 .125	7/16	.250	CG1-9
CH2-25 CH2-26	.2405	.062 .125	1/2	.312	CG1-12
CH2-13 CH2-14	.2498	.062 .125			

GEAR, SPROCKET & DIAL HUBS

BORE	TYPE	MATERIAL
5/64" TO 1/2"	CLAMP HUB	303 STAINLESS STEEL



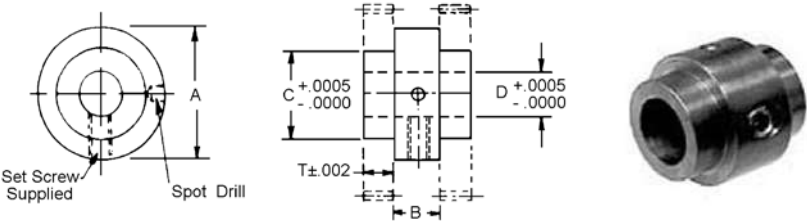
* Concentric within .0005



STOCK NO.	B	C	T	L	H	F	S	CLAMP STOCK NO.
CH2-27 CH2-28	.0781	.3750	.062 .125	.281	3/16	7/16	.031	CG1-5
CH2-29 CH2-30	.0900	.3750	.062 .125	.281	3/16	7/16	.031	CG1-5
CH2-31 CH2-32	.0937	.3750	.062 .125	.281	3/16	7/16	.031	CG1-5
CH2-7 CH2-8	.1200	.3750	.062 .125	.281	3/16	7/16	.031	CG1-5
CH2-1 CH1-3 CH2-2 CH1-35	.1248	.3750	.062 .093 .125 .187	.281 .250 .281 .281	3/16	7/16	.031 .046 .031 .046	CG1-5
CH2-33 CH2-34	.1562	.3750	.062 .125	.281	1/4	7/16	.031	CG1-9
CH2-3 CH1-7 CH2-4 CH1-40	.1873	.3750	.062 .093 .125 .187	.281 .313 .281 .281	1/4	7/16	.031 .046 .031 .046	CG1-9
CH2-35 CH2-36	.2405	.3750	.062 .125	.281	5/16	1/2	.031	CG1-12
CH2-5 CH1-11 CH2-6 CH1-43	.2498	.3750	.062 .093 .125 .187	.281 .313 .281 .344	5/16	1/2 7/16 1/2 7/16	.031 .046 .031 .046	CG1-12
CH1-13 CH1-52 CH2-60 CH2-61	.3123	.6875	.062 .093 .125 .187	.375	3/8	7/8	.062	CG1-15
CH1-16 CH1-54 CH2-62 CH2-63	.3748	.6875	.062 .093 .125 .187	.375	7/16	1	.062	CG1-18
CH1-19 CH1-56 CH2-64 CH2-65 CH1-22 CH1-23	.4998	.6875	.062 .093 .125 .187 .250 .375	.375	9/16	1-1/4	.062	CG1-19

DUAL GEAR HUBS

BORE	TYPE	MATERIAL
1/8" TO 1/2"	PIN HUB	303 STAINLESS STEEL

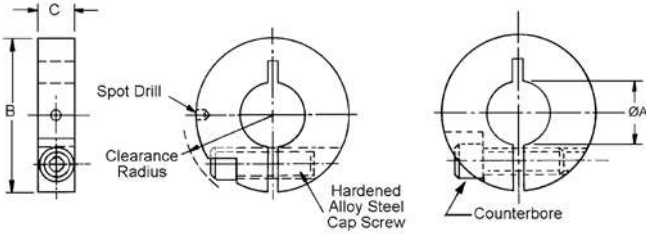


STOCK NO.	D	C	T	A	B
PH3-1	.1248	.3750	1/8	7/16	1/4
PH3-2	.1873	.3750	1/8	7/16	1/4
PH3-3	.2498	.3750	1/8	1/2	1/4
PH3-4	.3123	.3750	1/8	1/2	1/4
PH3-5	.3748	.6872	3/8	1	1/2
PH3-6	.4998	.6872	1/4	1-1/4	1/2

- Assembly available
- Gears are triple staked and dutch pinned at assembly
- Components may also be assembled to hubs with epoxy cement
- Order gears separately

SPLIT HUB CLAMPS

BORE	TYPE	MATERIAL
.103" TO .562"	COMPACT CLAMP DESIGN	303 STAINLESS STEEL OR ALUMINUM ANODIZED



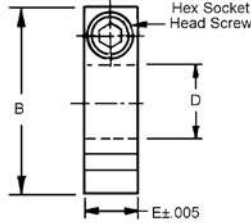
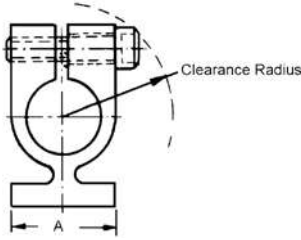
Note: Some sizes may be full or semi-counterbored or step cut at manufacturer's option.

STAINLESS STEEL STOCK NO.	ANODIZED ALUMINUM STOCK NO.	ØA DIA.	B DIA.	C	CLEAR. RADIUS	CAP SCREW THREAD	SPOT DRILL DIA.	SPLIT HUB INSIDE DIA. (Ref.)
CG1-1	CG1-1-A	.103	1/2	5/32	5/16	#3-48	1/16	-
CG1-2	CG1-2-A	.125	1/2	5/32	5/16	#3-48	1/16	-
CG1-20	CG1-20-A	.125	9/16	5/32	3/8	#2-56	-	-
CG1-21	CG1-21-A	.125	5/8	5/32	3/8	#2-56	-	-
CG1-3	CG1-3-A	.141	1/2	5/32	5/16	#3-48	1/16	-
CG1-22	CG1-22-A	.188	9/16	1/8	3/8	#1-72	-	-
CG1-23	CG1-23-A	.188	9/16	5/32	3/8	#2-56	-	5/64
CG1-4	CG1-24-A	.188	5/8	5/32	11/32	#2-56	-	TO
CG1-5	-	.188	5/8	3/16	3/8	#4-40	1/16	1/8
CG1-25	CG1-25-A	.188	7/8	1/4	33/64	#6-32	-	-
CG1-6	-	.219	5/8	5/32	11/32	#2-56	1/16	-
CG1-26	CG1-26-A	.250	9/16	1/8	3/8	#1-72	-	-
CG1-27	CG1-27-A	.250	9/16	5/32	3/8	#2-56	-	-
CG1-28	CG1-28-A	.250	5/8	5/32	3/8	#2-56	-	5/32
CG1-8	CG1-8-A	.250	7/8	3/16	31/64	#4-40	1/8	& 3/16
CG1-9	CG1-9-A	.250	7/8	1/4	33/64	#6-32	-	-
CG1-10	-	.281	7/8	1/4	33/64	#6-32	1/8	-
CG1-11	-	.312	7/8	3/16	31/64	#4-40	1/8	.2405
CG1-12	CG1-12-A	.312	7/8	1/4	33/64	#6-32	-	& 1/4
CG1-14	CG1-14-A	.375	1-1/8	1/4	21/32	#8-32	3/16	-
CG1-15	CG1-15-A	.375	1-1/4	5/16	11/16	#8-32	-	5/16
CG1-31	-	.375	1-1/4	5/16	5/8	#8-32	-	-
CG1-17	CG1-17-A	.437	1-1/8	1/4	21/32	#8-32	3/16	-
CG1-18	CG1-18-A	.437	1-1/4	5/16	11/16	#8-32	-	3/8
CG1-32	-	.437	1-1/4	5/16	5/8	#8-32	-	-
CG1-19	CG1-19-A	.562	1-1/4	5/16	11/16	#8-32	-	-
CG1-33	-	.562	1-1/4	5/16	5/8	#8-32	-	1/2

Special clamps are available on request.

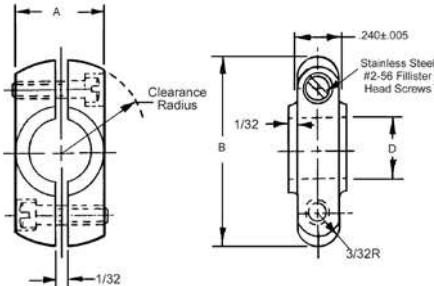
SPLIT HUB CLAMPS

SHAFT SIZE	MATERIAL
1/8" TO 3/8"	STAINLESS STEEL AND MILD STEEL



STOCK NO.	MATERIAL	D	A	B	CLEAR. RADIUS	E	SCREW	FINISH	SHAFT SIZE
CG3-1	416 STAINLESS STEEL	.188	.312	.687	7/16	.240	# 6-32	CLEAR PASS.	1/8
CG3-2	416 STAINLESS STEEL					.240	# 6-32	BLACK PASS.	
CG3-7	303 STAINLESS STEEL					.250	# 6-32	CLEAR PASS.	
CG3-28	MILD STEEL					.140	# 2-56	CAD. PLATE	
CG3-3	416 STAINLESS STEEL	.251	.378	.812	33/64	.240	# 6-32	CLEAR PASS.	3/16
CG3-4	416 STAINLESS STEEL					.240	# 6-32	BLACK PASS.	
CG3-9	303 STAINLESS STEEL					.250	# 6-32	CLEAR PASS.	
CG3-30	MILD STEEL					.140	# 2-56	CAD. PLATE	
CG3-5	416 STAINLESS STEEL	.313	.437	.812	9/16	.240	# 6-32	CLEAR PASS.	1/4
CG3-6	416 STAINLESS STEEL					.240	# 6-32	BLACK PASS.	
CG3-11	303 STAINLESS STEEL					.250	# 6-32	CLEAR PASS.	
CG3-32	MILD STEEL					.140	# 2-56	CAD. PLATE	
CG3-13	303 STAINLESS STEEL	.376	.500	.875	9/16	.250	# 6-32	CLEAR PASS.	5/16
CG3-14	MILD STEEL					.250	# 6-32	CAD. PLATE	
CG3-34	MILD STEEL					.140	# 2-56	CAD. PLATE	
CG3-15	303 STAINLESS STEEL	.438	.625	1.032	43/64	.250	# 6-32	CLEAR PASS.	3/8
CG3-16	MILD STEEL					.250	# 6-32	CAD. PLATE	
CG3-36	MILD STEEL					.140	# 2-56	CAD. PLATE	

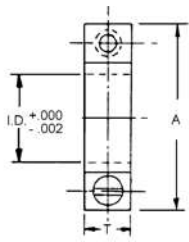
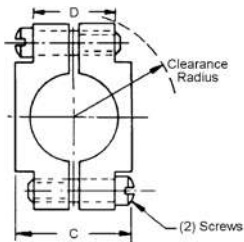
SHAFT SIZE	TYPE	MATERIAL
1/8" TO 3/8"	BALANCED CLAMP	STAINLESS STEEL AND MILD STEEL



STOCK NO.	D	A	B	TYPE CLEAR. RADIUS	SPLIT HUB OF BALANCE	INSIDE DIA. (REF.)
CG2-1	.188	.312	.718	3/8	DYNAMICALLY BALANCED	1/8
CG2-3	.251	.374	.750	13/32		3/16
CG2-5	.313	.436	.875	15/32		1/4
CG2-2	.188	.312	.718	3/8	AS CAST	1/8
CG2-4	.251	.374	.750	13/32		3/16
CG2-6	.313	.436	.875	15/32		1/4

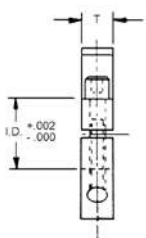
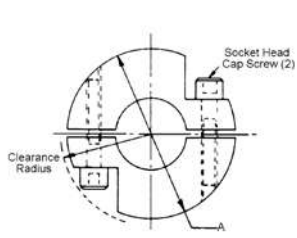
SPLIT HUB CLAMPS

SHAFT SIZE	TYPE	MATERIAL
1/8" TO 3/8"	BALANCED CLAMP	416 STAINLESS STEEL AND 303 STAINLESS STEEL



STOCK NO.	MATERIAL	INSIDE DIA.	T	A	C	D	SCREW	SPLIT HUB CLEARANCE RADIUS	INSIDE DIA. (Ref.)
CG2-7	416 STAINLESS STEEL	.187	.156	.500	.286	.176	#2-56	9/32	1/8
CG2-8		.250	.187	.590	.350	.235	#3-48	11/32	3/16
CG2-9		.312	.187	.687	.420	.286	#4-40	13/32	1/4
CG2-10		.375	.187	.781	.510	.336	#4-40	15/32	5/16
CG2-11		.437	.250	.890	.636	.365	#6-32	35/64	3/8
CG2-27	303 STAINLESS STEEL	.187	.156	.500	.286	.176	#2-56	9/32	1/8
CG2-28		.250	.187	.590	.350	.235	#3-48	11/32	3/16
CG2-29		.312	.187	.687	.420	.286	#4-40	13/32	1/4
CG2-30		.375	.187	.781	.510	.336	#4-40	15/32	5/16
CG2-31		.437	.250	.890	.636	.365	#6-32	35/64	3/8

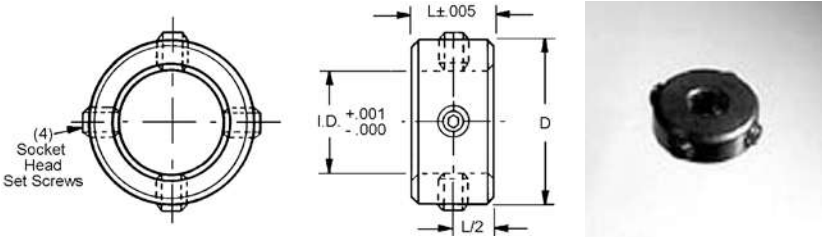
SHAFT SIZE	TYPE	MATERIAL
1/8" TO 1/4"	BALANCED CLAMP	303 STAINLESS STEEL OR 2024 ALUMINUM ANODIZED



STOCK NO.	MATERIAL	INSIDE DIA.	T	A	SCREW	SPLIT HUB CLEARANCE RADIUS	SPLIT HUB INSIDE DIA. (Ref.)
CG2-12-S	STAINLESS STEEL	.125	.156	.562	#2-56	25/64	-
CG2-12-A	ALUMINUM	.125					-
CG2-13-S	STAINLESS STEEL	.188					1/8
CG2-13-A	ALUMINUM	.188					1/8
CG2-15-S	STAINLESS STEEL	.250					3/16
CG2-15-A	ALUMINUM	.250					3/16
CG2-14-S	STAINLESS STEEL	.188	.250	.875	#6-32	33/64	1/8
CG2-14-A	ALUMINUM	.188					1/8
CG2-16-S	STAINLESS STEEL	.250					3/16
CG2-16-A	ALUMINUM	.250					3/16
CG2-17-S	STAINLESS STEEL	.313					1/4
CG2-17-A	ALUMINUM	.313					1/4

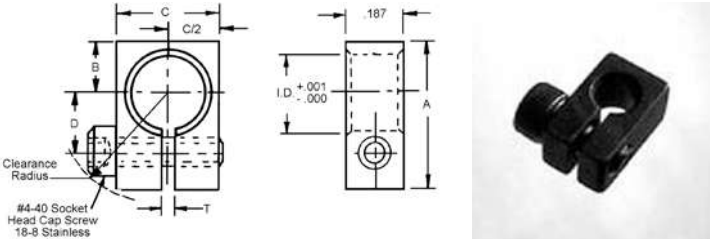
SPLIT HUB CLAMPS

SHAFT SIZE	TYPE	MATERIAL
1/8" TO 1/2"	SCREW TYPE CLAMP	303 STAINLESS STEEL OR 2024 ALUMINUM ANODIZED



STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	INSIDE DIA.	D	L	SET SCREW	SPLIT HUB INSIDE DIA. (Ref.)
CS-36	-	.0995	.312	.125	#2-56	-
CS-28	CS-32	.1255	.375	.250	#4-40	-
CS-29	CS-33	.1880	.375	.250	#4-40	1/8
CS-30	CS-34	.2505	.500	.250	#6-32	3/16
CS-31	CS-35	.3130	.500	.250	#6-32	1/4
CS-40	CS-43	.3750	.750	.312	#10-32	5/16
CS-41	CS-44	.4370	.750	.312	#10-32	3/8
CS-42	CS-45	.5620	.875	.312	#10-32	1/2

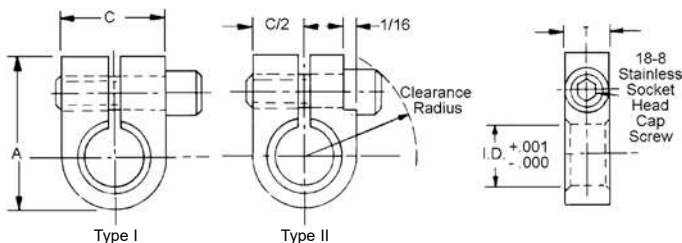
SHAFT SIZE	TYPE	MATERIAL
1/8" TO 3/16"	SCREW TYPE CLAMP	416 STAINLESS STEEL



STOCK NO.	I.D.	A	C	D	B	T	CLEAR. RADIUS	SPLIT HUB INSIDE DIA. (Ref.)
CG4-1	.125	23/64	.218	.133	.109	.031	21/64	-
CG4-2	.187	27/64	.281	.165	.141	.040	25/64	1/8
CG4-3	.250	31/64	.344	.196	.172	.040	7/16	3/16

SPLIT HUB CLAMPS

SHAFT SIZE	TYPE	MATERIAL
1/8" TO 3/8"	TYPE I AND TYPE II	303 STAINLESS STEEL, MILD STEEL CADMIUM PLATED OR 416 STAINLESS STEEL RC 38-45

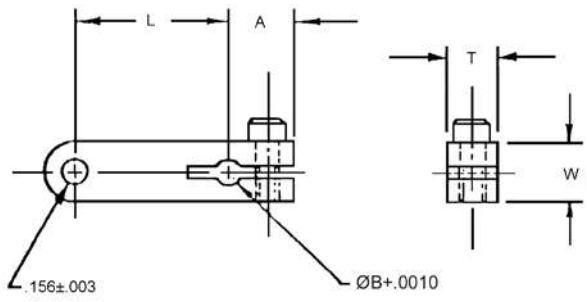


TYPE I								
STOCK NO.	MATERIAL.	INSIDE DIA.	C	A	T	SCREW THREAD	SPLIT HUB CLEARANCE RADIUS	INSIDE DIA. (Ref.)
CG5-24	MILD STEEL	.188	.312	.468	.140	#2-56	11/32	1/8
CG5-25	MILD STEEL	.251	.375	.500	.140	#2-56	25/64	3/16
CG5-26	MILD STEEL	.313	.437	.593	.140	#2-56	7/16	1/4
CG5-27	MILD STEEL	.376	.500	.656	.140	#2-56	15/32	5/16
CG5-28	MILD STEEL	.438	.625	.781	.140	#2-56	9/16	3/8
CG5-14	MILD STEEL	.188	.312	.468	.250	#6-32	27/64	1/8
CG5-15	MILD STEEL	.251	.375	.562	.250	#6-32	1/2	3/16
CG5-16	MILD STEEL	.313	.437	.593	.250	#6-32	33/64	1/4
CG5-17	MILD STEEL	.376	.500	.656	.250	#6-32	9/16	5/16
CG5-18	MILD STEEL	.438	.625	.781	.250	#6-32	41/64	3/8
CG5-29	303	.188	.312	.468	.250	#6-32	27/64	1/8
CG5-30	303	.251	.375	.562	.250	#6-32	1/2	3/16
CG5-31	303	.313	.437	.593	.250	#6-32	33/64	1/4
CG5-32	303	.376	.500	.656	.250	#6-32	9/16	5/16
CG5-33	303	.438	.625	.781	.250	#6-32	41/64	3/8
CG5-34	416	.188	.312	.468	.250	#6-32	27/64	1/8
CG5-35	416	.251	.375	.562	.250	#6-32	1/2	3/16
CG5-36	416	.313	.437	.593	.250	#6-32	33/64	1/4
CG5-37	416	.376	.500	.656	.250	#6-32	9/16	5/16
CG5-38	416	.438	.625	.781	.250	#6-32	41/64	3/8

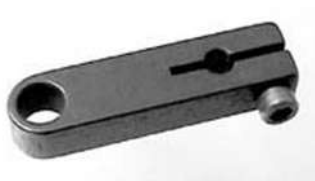
TYPE II								
STOCK NO.	MATERIAL.	INSIDE DIA.	C	A	T	SCREW THREAD	SPLIT HUB CLEARANCE RADIUS	INSIDE DIA. (Ref.)
CG5-19	MILD STEEL	.188	.312	.468	.140	#2-56	5/16	1/8
CG5-20	MILD STEEL	.251	.375	.500	.140	#2-56	23/64	3/16
CG5-21	MILD STEEL	.313	.437	.593	.140	#2-56	25/64	1/4
CG5-22	MILD STEEL	.376	.500	.656	.140	#2-56	7/16	5/16
CG5-23	MILD STEEL	.438	.625	.781	.140	#2-56	33/64	3/8
CG5-9	MILD STEEL	.188	.312	.468	.250	#6-32	3/8	1/8
CG5-10	MILD STEEL	.251	.375	.562	.250	#6-32	29/64	3/16
CG5-11	MILD STEEL	.313	.437	.593	.250	#6-32	15/32	1/4
CG5-12	MILD STEEL	.376	.500	.656	.250	#6-32	33/64	5/16
CG5-13	MILD STEEL	.438	.625	.781	.250	#6-32	19/32	3/8
CG5-39	303	.188	.312	.468	.250	#6-32	3/8	1/8
CG5-40	303	.251	.375	.562	.250	#6-32	29/64	3/16
CG5-41	303	.313	.437	.593	.250	#6-32	15/32	1/4
CG5-42	303	.376	.500	.656	.250	#6-32	33/64	5/16
CG5-43	303	.438	.625	.781	.250	#6-32	19/32	3/8
CG5-44	416	.188	.312	.468	.250	#6-32	3/8	1/8
CG5-45	416	.251	.375	.562	.250	#6-32	29/64	3/16
CG5-46	416	.313	.437	.593	.250	#6-32	15/32	1/4
CG5-47	416	.376	.500	.656	.250	#6-32	33/64	5/16
CG5-48	416	.438	.625	.781	.250	#6-32	19/32	3/8

SHAFT CLAMPS

SHAFT SIZE	MATERIAL
3/32" TO 3/16"	416 STAINLESS STEEL

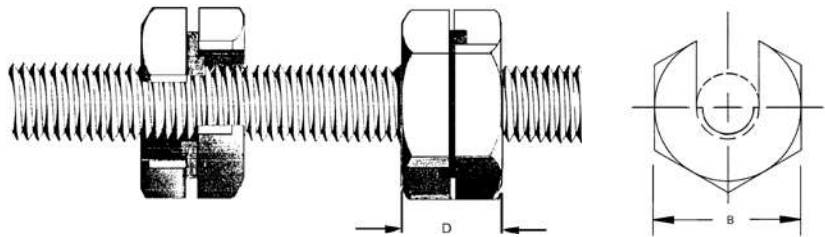


STOCK NO.	A	$\varnothing B$	L	T	W
CG7-1	.250	.0938	.625	.190	.250
CG7-2	.250	.1250	.625	.190	.250
CG7-3	.250	.1875	.625	.190	.312



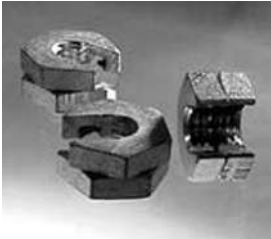
THREADED SHAFT CLAMPS

THREAD SIZE	MATERIAL
1/4 X 20 TO 3/4 X 10	12L14 STEEL



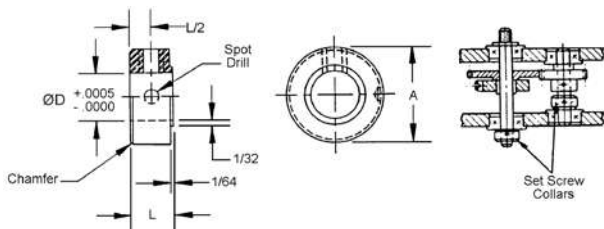
STOCK NO.	THREAD	B	D (APPROX)	MAX.* LOAD (lbs.)
TSC-25	1/4 x 20	.63	.38	650
TSC-37	3/8 x 16	.88	.47	2,000
TSC-50	1/2 x 13	1.06	.63	4,000
TSC-62	5/8 x 11	1.31	.66	5,000
TSC-75	3/4 x 10	1.63	.83	8,000

* Or as limited by rod.



SET SCREW COLLARS

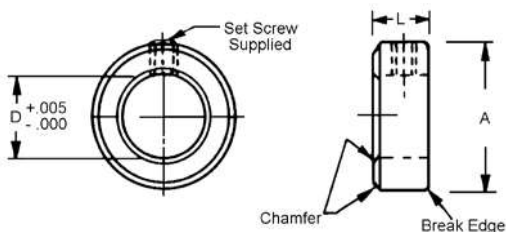
BORE SIZE	MATERIAL
5/64" TO 1-1/4" PRECISION BORE	303 STAINLESS STEEL



STOCK NO.	SHAFT SIZE	ØD	L	A	SPOT DRILL	SET SCREW
CS-1	5/64	.0779	.120	7/32	#78 (.016)	#0-80
CS-2	3/32	.0935	.120	1/4	#78 (.016)	#0-80
CS-3	1/8	.1248	.180	5/16	#69 (.028)	#2-56
CS-4	5/32	.1560	.180	5/16	#69 (.028)	#2-56
CS-5	3/16	.1873	.220	3/8	#60 (.040)	#4-40
CS-6	.2405	.2405	.250	1/2	#50 (.070)	#6-32
CS-7	1/4	.2498	.250	1/2	#50 (.070)	#6-32
CS-8	5/16	.3123	.250	1/2	#50 (.070)	#6-32
CS-9	3/8	.3748	.375	3/4	#31 (.120)	#10-24
CS-10	1/2	.4998	.437	1	#25 (.149)	1/4-20
CS-11	5/8	.6248	.500	1-1/4	#25 (.149)	1/4-20
CS-12	3/4	.7498	.562	1-1/2	#22 (.157)	3/8-16
CS-13	1	.9998	.625	2	#22 (.157)	3/8-16
CS-14	1-1/4	1.2498	.750	2-1/4	#22 (.157)	3/8-16

- No shim spacers required
- Used to pre-load bearing

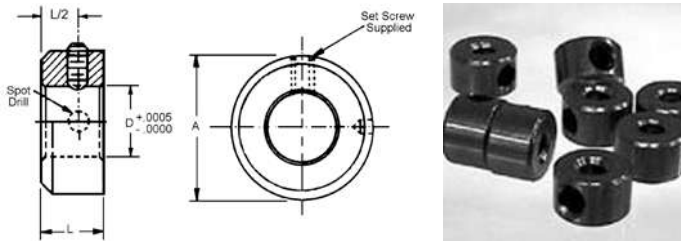
BORE SIZE	MATERIAL
1/8" TO 1-1/4" COMMERCIAL BORE	COLD ROLLED STEEL ZINC PLATED



STOCK NO.	D	A	L	SET SCREW
CS-50	.125	3/8	1/4	#6
CS-51	.188	7/16	1/4	#8
CS-52	.250	1/2	9/32	#10
CS-53	.313	5/8	5/16	#10
CS-54	.375	3/4	3/8	1/4
CS-55	.500	1	7/16	1/4
CS-56	.625	1-1/8	1/2	5/16
CS-57	.750	1-1/4	9/16	5/16
CS-58	1.000	1-5/8	5/8	5/16
CS-59	1.250	2	11/16	3/8

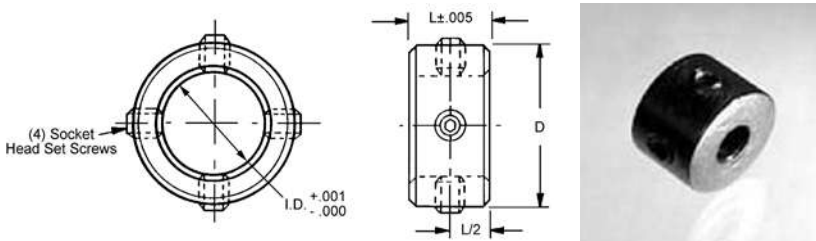
SET SCREW COLLARS

BORE SIZE	MATERIAL
5/64" TO 1/2" PRECISION BORE	303 STAINLESS STEEL



STOCK NO.	SHAFT SIZE	D	L	A	SPOT DRILL	SET SCREW
CS-26	5/64	.0779	.120	7/32	#78 (.016)	#0-80
CS-27	3/32	.0935	.120	1/4	#78 (.016)	#0-80
CS-23	.1200	.1200	.180	5/16	#69 (.028)	#2-56
CS-20	1/8	.1248	.180	5/16	#69 (.028)	#2-56
CS-24	5/32	.1560	.180	5/16	#69 (.028)	#2-56
CS-21	3/16	.1873	.220	3/8	#60 (.040)	#4-40
CS-25	.2405	.2405	.250	1/2	#50 (.070)	#6-32
CS-22	1/4	.2498	.250	1/2	#50 (.070)	#6-32
CS-37	5/16	.3123	.280	9/16	#50 (.070)	#6-32
CS-38	3/8	.3748	.375	3/4	#31 (.120)	#10-32
CS-39	1/2	.4998	.500	1	#25 (.149)	1/4-20

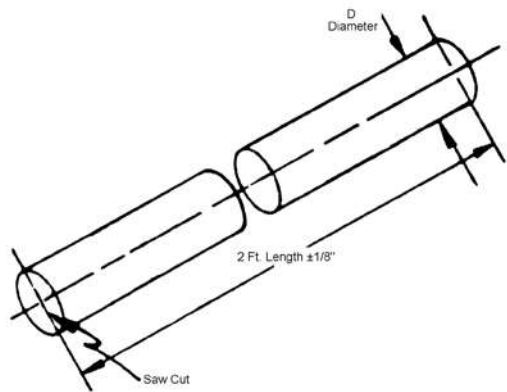
BORE SIZE	MATERIAL
1/8" TO 1/2" COMMERCIAL BORE	303 STAINLESS STEEL OR 2024T-4 ALUMINUM ANODIZED



STAINLESS STEEL STOCK NO.	ALUMINUM STOCK NO.	SHAFT SIZE	I.D.	D	L	SET SCREW
CS-28	CS-32	1/8	.1255	.375	.250	#4-40
CS-29	CS-33	3/16	.1880	.375	.250	#4-40
CS-30	CS-34	1/4	.2505	.500	.250	#6-32
CS-31	CS-35	5/16	.3130	.500	.250	#6-32
CS-40	CS-43	3/8	.3750	.750	.312	#10-32
CS-41	CS-44	7/16	.4370	.750	.312	#10-32
CS-46	CS-47	1/2	.5000	.875	.312	#10-32

PLASTIC ROD STOCKS

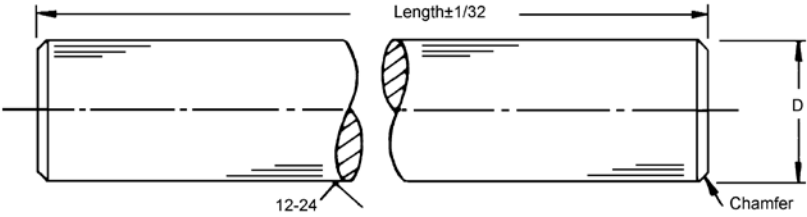
DIAMETER	MATERIAL
1/16" TO 3"	NYLON 101 OR DELRIN



NYLON 101 STOCK NO.	DELIN 500 STOCK NO.	D
PR-N-1	-	1/16
PR-N-51	-	3/32
PR-N-2	-	1/8
PR-N-3	PR-D-3	3/16
PR-N-4	PR-D-4	1/4
PR-N-6	PR-D-6	3/8
PR-N-8	PR-D-8	1/2
PR-N-10	PR-D-10	5/8
PR-N-12	PR-D-12	3/4
PR-N-16	PR-D-16	1
PR-N-20	PR-D-20	1-1/4
PR-N-24	PR-D-24	1-1/2
PR-N-28	PR-D-28	1-3/4
PR-N-32	PR-D-32	2
PR-N-40	PR-D-40	2-1/2
PR-N-48	PR-D-48	3

CASE HARDENED & GROUND SHAFTS

DIAMETER	MATERIAL
1/4" TO 2"	C1060 STEEL HARDENED C60-65 OR 440 STAINLESS STEEL HARDENED C50-55



C1060 STEEL STOCK NO. (36" long)	C1060 STEEL STOCK NO. (12" long)	440 STAINLESS STEEL STOCK NO. (36" long)	NOM. DIA.	D DIAMETER	MAX. LENGTH AVAILABLE TO ORDER
LMS-4-36	-	-	1/4	.2490-.0005	8 ft.
LMS-5-36	-	-		.2495-.0005	
LMS-6-36	-	-	3/8	.3740-.0005	11 ft.
LMS-7-36	-	-		.3745-.0005	
LMS-46-36	LMS-46-12	-		.3750-.0005	
LMS-8-36	-	LMT-8-36	1/2	.4990-.0005	11 ft.
LMS-9-36	-	LMT-9-36		.4995-.0005	
LMS-48-36	LMS-48-12	-		.5000-.0005	
LMS-50-36	LMS-50-12	-	5/8	.6250-.0005	11 ft.
LMS-12-36	-	LMT-12-36	3/4	.7490-.0005	11 ft.
LMS-13-36	-	LMT-13-36		.7495-.0005	
LMS-52-36	LMS-52-12	-		.7500-.0005	
LMS-16-36	-	LMT-16-36	1	.9990-.0005	12 ft.
LMS-17-36	-	LMT-17-36		.9995-.0005	
LMS-56-36	LMS-56-12	-		1.0000-.0005	
LMS-20-36	-	-	1-1/4	1.2490-.0005	11 ft.
LMS-21-36	-	-		1.2495-.0005	
LMS-60-36	LMS-60-12	-		1.2500-.0005	
LMS-24-36	-	-	1-1/2	1.4989-.0005	11 ft.
LMS-25-36	-	-		1.4994-.0005	
LMS-64-36	LMS-64-12	-		1.5000-.0005	
LMS-32-36	-	-	2	1.9987-.0005	11 ft.
LMS-33-36	-	-		1.9994-.0007	
LMS-72-36	LMS-72-12	-		2.0000-.0005	

Straightness

LMS-4, LMS-5 best efforts basis

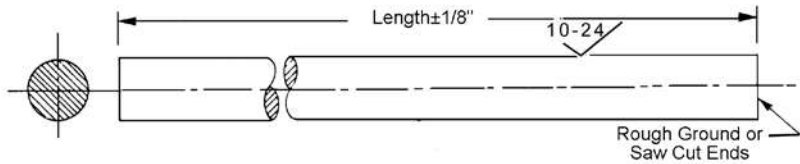
LMS-6 to LMS-72 within .001"-.002"/FT.

Note: Shafting available in other lengths. Specify by similar stock number and length required.

Example: LMS-21-56" (1.2495 Diameter 56" Long)

STAINLESS GROUND SHAFTS

DIAMETER	MATERIAL
1/32" TO 1-1/4"	303 STAINLESS STEEL



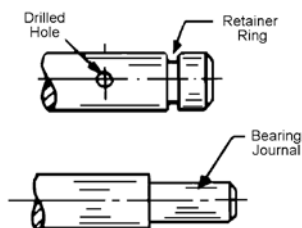
STOCK NO.	FRACT. DIA. (Ref.)*	ACTUAL DIA.	DIA. TOL. +.0000	L
S1-1	1/32	.0313	-.0002	12
S1-39		.0317	-.0002	12
S1-84		.0467	-.0002	12
S1-85	1/16	.0548	-.0002	12
S1-40		.0622	-.0002	12
S1-2		.0626	-.0002	12
S1-41		.0630	-.0002	12
S1-36	5/64	.0778	-.0002	12
S1-3		.0778	-.0002	14
S1-38		.0781	-.0002	12
S1-4		.0781	-.0002	14
S1-42		.0786	-.0002	12
S1-37	3/32	.0934	-.0002	12
S1-5		.0934	-.0002	18
S1-30		.0938	-.0002	12
S1-6		.0938	-.0002	18
S1-43		.0942	-.0002	12
S1-8	1/8	.1247	-.0002	24
S1-9		.1250	-.0002	24
S1-31		.1251	-.0002	12
S1-7		.1251	-.0002	24
S1-44		.1255	-.0002	24
S1-45	5/32	.1559	-.0002	24
S1-10		.1562	-.0002	24
S1-46		.1567	-.0002	24
S1-11	3/16	.1872	-.0002	24
S1-12		.1875	-.0002	24
S1-47		.1880	-.0002	24
S1-48	7/32	.2184	-.0002	24
S1-13		.2187	-.0002	24
S1-49		.2192	-.0002	24
S1-72	1/4	.2490	-.0003	36
S1-73		.2495	-.0003	36
S1-14		.2497	-.0002	24
S1-50		.2497	-.0002	36
S1-15		.2500	-.0002	24
S1-51		.2500	-.0002	36
S1-52		.2505	-.0002	36

STOCK NO.	FRACT. DIA. (Ref.)*	ACTUAL DIA.	DIA. TOL. +.0000	L
S1-16	5/16	.3122	-.0002	24
S1-17		.3125	-.0002	24
S1-53		.3130	-.0002	24
S1-74	3/8	.3740	-.0003	36
S1-75		.3745	-.0003	36
S1-33		.3747	-.0002	16
S1-18		.3747	-.0002	36
S1-32		.3750	-.0002	16
S1-19		.3750	-.0002	36
S1-54	1/2	.3755	-.0002	36
S1-76		.4990	-.0005	36
S1-77		.4995	-.0005	36
S1-35		.4997	-.0002	16
S1-20		.4997	-.0002	36
S1-34		.5000	-.0002	16
S1-21		.5000	-.0002	36
S1-55		.5005	-.0002	36
S1-22	5/8	.6247	-.0004	36
S1-56		.6250	-.0004	36
S1-57		.6255	-.0004	36
S1-78	3/4	.7490	-.0005	36
S1-79		.7495	-.0005	36
S1-23		.7497	-.0004	36
S1-58		.7500	-.0004	36
S1-59		.7505	-.0004	36
S1-80	1	.9990	-.0005	36
S1-81		.9995	-.0005	36
S1-24		.9997	-.0004	36
S1-60		1.0000	-.0004	36
S1-61		1.0005	-.0004	36
S1-82	1-1/4	1.2490	-.0005	36
S1-83		1.2495	-.0005	36
S1-25		1.2497	-.0004	36

* Straightness: Best efforts basis up to 3/16" diameter, straightness .0004 in/in for 7/32" diameter and up.

STAINLESS GROUND SHAFTS

DIAMETER	MATERIAL
1/8"	303 STAINLESS STEEL

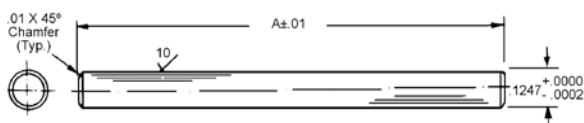


TYPICAL MODIFICATIONS

- Precision ground finish
- Straight within .0003 in./in.
- Send sketch for quotation on modifications

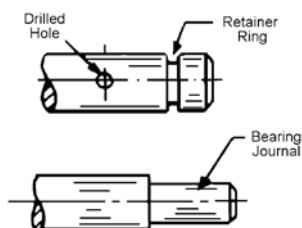
Available on request:

- Retainer ring grooves
- Special shaft lengths
- Journals
- Drilled holes
- Milled flats



STOCK NO.	A	STOCK NO.	A	STOCK NO.	A
S2-10	1.000	S2-37	3.750	S2-67	6.750
S2-11	1.125	S2-38	3.875	S2-70	7.000
S2-12	1.250	S2-40	4.000	S2-72	7.250
S2-13	1.375	S2-41	4.125	S2-75	7.500
S2-15	1.500	S2-42	4.250	S2-77	7.750
S2-16	1.625	S2-43	4.375	S2-80	8.000
S2-17	1.750	S2-45	4.500	S2-82	8.250
S2-18	1.875	S2-46	4.625	S2-83	8.375
S2-20	2.000	S2-47	4.750	S2-85	8.500
S2-21	2.125	S2-48	4.875	S2-90	9.000
S2-22	2.250	S2-50	5.000	S2-95	9.500
S2-23	2.375	S2-51	5.125	S2-100	10.000
S2-25	2.500	S2-52	5.250	S2-110	11.000
S2-26	2.625	S2-53	5.375	S2-120	12.000
S2-27	2.750	S2-55	5.500	S2-130	13.000
S2-28	2.875	S2-56	5.625	S2-140	14.000
S2-30	3.000	S2-57	5.750	S2-150	15.000
S2-31	3.125	S2-60	6.000	S2-160	16.000
S2-32	3.250	S2-62	6.250	S2-180	18.000
S2-33	3.375	S2-63	6.375	S2-200	20.000
S2-35	3.500	S2-65	6.500	S2-220	22.000
S2-36	3.625	S2-66	6.625	S2-240	24.000

DIAMETER	MATERIAL
3/16"	303 STAINLESS STEEL

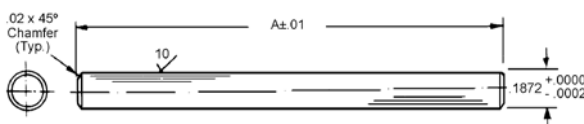


TYPICAL MODIFICATIONS

- Precision ground finish
- Straight within .0003 in./in.
- Send sketch for quotation on modifications

Available on request:

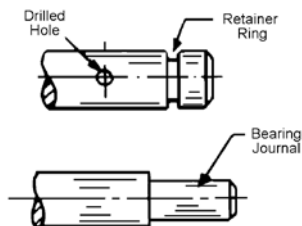
- Retainer ring grooves
- Special shaft lengths
- Journals
- Drilled holes
- Milled flats



STOCK NO.	A	STOCK NO.	A	STOCK NO.	A
S3-10	1.000	S3-38	3.875	S3-71	7.125
S3-11	1.125	S3-40	4.000	S3-72	7.250
S3-12	1.250	S3-41	4.125	S3-75	7.500
S3-13	1.375	S3-42	4.250	S3-77	7.750
S3-15	1.500	S3-43	4.375	S3-80	8.000
S3-16	1.625	S3-45	4.500	S3-81	8.125
S3-17	1.750	S3-46	4.625	S3-85	8.500
S3-18	1.875	S3-47	4.750	S3-90	9.000
S3-20	2.000	S3-48	4.875	S3-95	9.500
S3-21	2.125	S3-50	5.000	S3-100	10.000
S3-22	2.250	S3-51	5.125	S3-108	10.875
S3-23	2.375	S3-52	5.250	S3-110	11.000
S3-25	2.500	S3-53	5.375	S3-113	11.375
S3-26	2.625	S3-55	5.500	S3-120	12.000
S3-27	2.750	S3-57	5.750	S3-126	12.625
S3-28	2.875	S3-60	6.000	S3-130	13.000
S3-30	3.000	S3-62	6.250	S3-140	14.000
S3-31	3.125	S3-63	6.375	S3-150	15.000
S3-32	3.250	S3-65	6.500	S3-160	16.000
S3-33	3.375	S3-66	6.625	S3-180	18.000
S3-35	3.500	S3-67	6.750	S3-200	20.000
S3-36	3.625	S3-68	6.875	S3-220	22.000
S3-37	3.750	S3-70	7.000	S3-240	24.000

STAINLESS GROUND SHAFTS

DIAMETER	MATERIAL
1/4"	303 STAINLESS STEEL

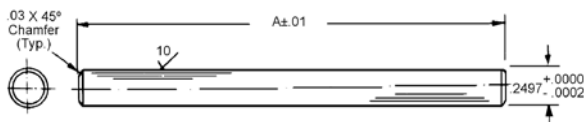


TYPICAL MODIFICATIONS

- Precision ground finish
- Straight within .0003 in./in.
- Send sketch for quotation on modifications

Available on request:

- Retainer ring grooves
- Special shaft lengths
- Journals
- Drilled holes
- Milled flats

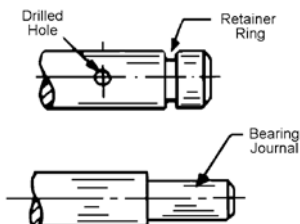


STOCK NO.	A
S4-10	1.000
S4-11	1.125
S4-12	1.250
S4-13	1.375
S4-15	1.500
S4-16	1.625
S4-17	1.750
S4-18	1.875
S4-20	2.000
S4-21	2.125
S4-22	2.250
S4-23	2.375
S4-25	2.500
S4-26	2.625
S4-27	2.750
S4-28	2.875
S4-30	3.000
S4-31	3.125
S4-32	3.250
S4-33	3.375
S4-35	3.500
S4-36	3.625

STOCK NO.	A
S4-37	3.750
S4-38	3.875
S4-40	4.000
S4-41	4.125
S4-42	4.250
S4-43	4.375
S4-45	4.500
S4-46	4.625
S4-47	4.750
S4-48	4.875
S4-50	5.000
S4-51	5.125
S4-52	5.250
S4-53	5.375
S4-55	5.500
S4-56	5.625
S4-57	5.750
S4-58	5.875
S4-60	6.000
S4-62	6.250
S4-65	6.500
S4-67	6.750

STOCK NO.	A
S4-70	7.000
S4-72	7.250
S4-75	7.500
S4-77	7.750
S4-80	8.000
S4-82	8.250
S4-85	8.500
S4-90	9.000
S4-95	9.500
S4-100	10.000
S4-105	10.500
S4-110	11.000
S4-117	11.750
S4-120	12.000
S4-130	13.000
S4-140	14.000
S4-150	15.000
S4-160	16.000
S4-180	18.000
S4-200	20.000
S4-220	22.000
S4-240	24.000

DIAMETER	MATERIAL
5/16"	303 STAINLESS STEEL

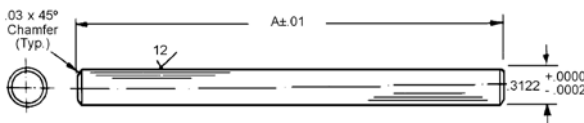


TYPICAL MODIFICATIONS

- Precision ground finish
- Straight within .0003 in./in.
- Send sketch for quotation on modifications

Available on request:

- Retainer ring grooves
- Special shaft lengths
- Journals
- Drilled holes
- Milled flats



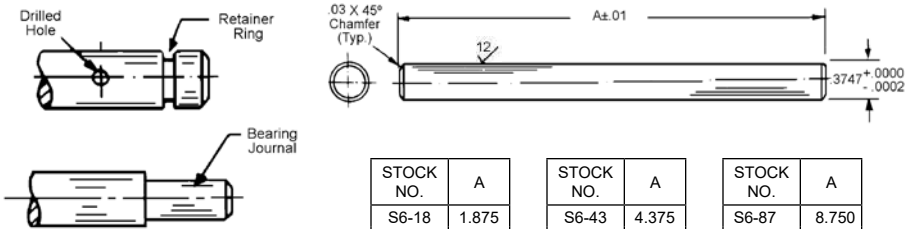
STOCK NO.	A
S5-13	1.375
S5-15	1.500
S5-16	1.625
S5-17	1.750
S5-18	1.875
S5-20	2.000
S5-21	2.125
S5-22	2.250
S5-23	2.375
S5-25	2.500
S5-26	2.625
S5-27	2.750
S5-28	2.875
S5-30	3.000
S5-31	3.125
S5-32	3.250
S5-33	3.375
S5-35	3.500
S5-37	3.750

STOCK NO.	A
S5-38	3.875
S5-40	4.000
S5-41	4.125
S5-42	4.250
S5-43	4.375
S5-45	4.500
S5-47	4.750
S5-48	4.875
S5-50	5.000
S5-51	5.125
S5-53	5.375
S5-55	5.500
S5-56	5.625
S5-57	5.750
S5-58	5.875
S5-60	6.000
S5-62	6.250
S5-65	6.500
S5-67	6.750

STOCK NO.	A
S5-70	7.000
S5-72	7.250
S5-75	7.500
S5-77	7.750
S5-80	8.000
S5-85	8.500
S5-90	9.000
S5-95	9.500
S5-100	10.000
S5-110	11.000
S5-120	12.000
S5-130	13.000
S5-140	14.000
S5-150	15.000
S5-160	16.000
S5-180	18.000
S5-200	20.000
S5-220	22.000
S5-240	24.000

STAINLESS GROUND SHAFTS

DIAMETER	MATERIAL
3/8"	303 STAINLESS STEEL



TYPICAL MODIFICATIONS

- Precision ground finish
- Straight within .0004 in./in.
- Send sketch for quotation on modifications

Available on request:

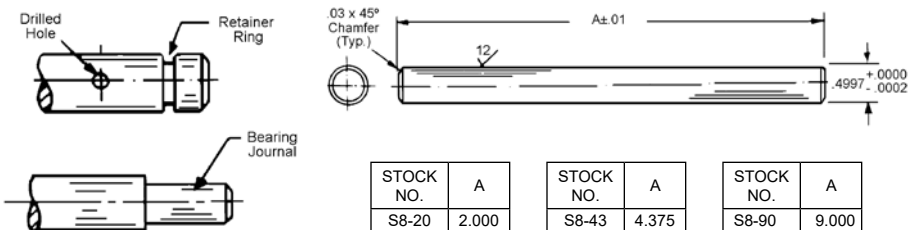
- Retainer ring grooves
- Special shaft lengths
- Journals
- Drilled holes
- Milled flats

STOCK NO.	A
S6-18	1.875
S6-20	2.000
S6-21	2.125
S6-22	2.250
S6-23	2.375
S6-25	2.500
S6-26	2.625
S6-27	2.750
S6-28	2.875
S6-30	3.000
S6-31	3.125
S6-32	3.250
S6-33	3.375
S6-35	3.500
S6-36	3.625
S6-37	3.750
S6-38	3.875
S6-40	4.000
S6-41	4.125
S6-42	4.250

STOCK NO.	A
S6-43	4.375
S6-45	4.500
S6-46	4.625
S6-47	4.750
S6-48	4.875
S6-50	5.000
S6-52	5.250
S6-55	5.500
S6-57	5.750
S6-60	6.000
S6-62	6.250
S6-65	6.500
S6-67	6.750
S6-70	7.000
S6-72	7.250
S6-75	7.500
S6-77	7.750
S6-80	8.000
S6-82	8.250
S6-85	8.500

STOCK NO.	A
S6-87	8.750
S6-90	9.000
S6-95	9.500
S6-100	10.000
S6-110	11.000
S6-120	12.000
S6-130	13.000
S6-140	14.000
S6-150	15.000
S6-160	16.000
S6-180	18.000
S6-200	20.000
S6-220	22.000
S6-240	24.000
S6-260	26.000
S6-280	28.000
S6-300	30.000
S6-320	32.000
S6-340	34.000
S6-360	36.000

DIAMETER	MATERIAL
1/2"	303 STAINLESS STEEL



TYPICAL MODIFICATIONS

- Precision ground finish
- Straight within .0004 in./in.
- Send sketch for quotation on modifications

Available on request:

- Retainer ring grooves
- Special shaft lengths
- Journals
- Drilled holes
- Milled flats

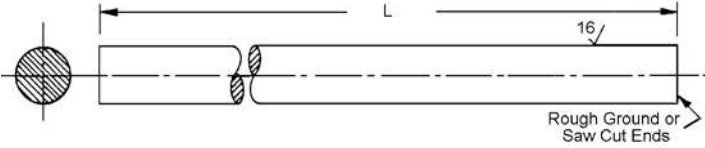
STOCK NO.	A
S8-20	2.000
S8-21	2.125
S8-22	2.250
S8-23	2.375
S8-25	2.500
S8-26	2.625
S8-27	2.750
S8-28	2.875
S8-30	3.000
S8-31	3.125
S8-32	3.250
S8-33	3.375
S8-35	3.500
S8-36	3.625
S8-37	3.750
S8-38	3.875
S8-40	4.000
S8-41	4.125
S8-42	4.250

STOCK NO.	A
S8-43	4.375
S8-45	4.500
S8-46	4.625
S8-47	4.750
S8-48	4.875
S8-50	5.000
S8-52	5.250
S8-55	5.500
S8-57	5.750
S8-60	6.000
S8-62	6.250
S8-65	6.500
S8-67	6.750
S8-70	7.000
S8-72	7.250
S8-75	7.500
S8-77	7.750
S8-80	8.000
S8-85	8.500

STOCK NO.	A
S8-90	9.000
S8-95	9.500
S8-100	10.000
S8-110	11.000
S8-120	12.000
S8-130	13.000
S8-140	14.000
S8-150	15.000
S8-160	16.000
S8-180	18.000
S8-200	20.000
S8-220	22.000
S8-240	24.000
S8-260	26.000
S8-280	28.000
S8-300	30.000
S8-320	32.000
S8-340	34.000
S8-360	36.000

GROUND SHAFTING

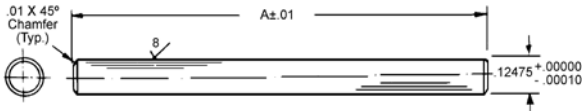
DIAMETER	MATERIAL
1/8" TO 1-1/4"	COLD ROLLED STEEL 12L14 OR 12L15 ROCKWELL B75-95 (OILED TO PREVENT RUSTING)



STOCK NO.	FRACT. DIA. (Ref.)	ACTUAL DIA.		L ± 1/8
S20-1	1/8	.1247		
S20-2	3/16	.1872		
S20-3	1/4	.2497	+ .0000	35
S20-4	5/16	.3122	- .0002	
S20-5	3/8	.3747		
S20-6	1/2	.4997		
S20-7	5/8	.6247		
S20-8	3/4	.7497	+ .0000	35
S20-9	1	.9997	- .0004	
S20-10	1-1/4	1.2497		

ULTRA GROUND SHAFTING

DIAMETER	MATERIAL
1/8"	303 STAINLESS STEEL



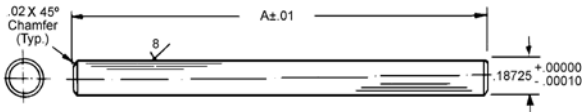
Straight within .0002 in./in.

STOCK NO.	A
S2-10-U	1.000
S2-11-U	1.125
S2-12-U	1.250
S2-13-U	1.375
S2-15-U	1.500
S2-16-U	1.625
S2-17-U	1.750
S2-18-U	1.875
S2-20-U	2.000
S2-21-U	2.125

STOCK NO.	A
S2-22-U	2.250
S2-23-U	2.375
S2-25-U	2.500
S2-26-U	2.625
S2-27-U	2.750
S2-28-U	2.875
S2-30-U	3.000
S2-31-U	3.125
S2-32-U	3.250
S2-35-U	3.500

STOCK NO.	A
S2-37-U	3.750
S2-40-U	4.000
S2-45-U	4.500
S2-50-U	5.000
S2-55-U	5.500
S2-60-U	6.000
S2-65-U	6.500
S2-70-U	7.000
S2-75-U	7.500
S2-80-U	8.000

DIAMETER	MATERIAL
3/16"	303 STAINLESS STEEL



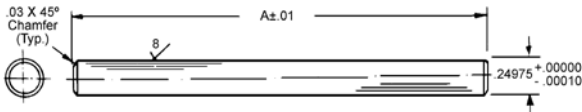
Straight within .00015 in./in.

STOCK NO.	A
S3-10-U	1.000
S3-11-U	1.125
S3-12-U	1.250
S3-13-U	1.375
S3-15-U	1.500
S3-16-U	1.625
S3-17-U	1.750
S3-18-U	1.875
S3-20-U	2.000
S3-21-U	2.125

STOCK NO.	A
S3-22-U	2.250
S3-23-U	2.375
S3-25-U	2.500
S3-26-U	2.625
S3-27-U	2.750
S3-28-U	2.875
S3-30-U	3.000
S3-31-U	3.125
S3-32-U	3.250
S3-35-U	3.500

STOCK NO.	A
S3-37-U	3.750
S3-40-U	4.000
S3-45-U	4.500
S3-50-U	5.000
S3-55-U	5.500
S3-60-U	6.000
S3-65-U	6.500
S3-70-U	7.000
S3-75-U	7.500
S3-80-U	8.000

DIAMETER	MATERIAL
1/4"	303 STAINLESS STEEL



Straight within .0002 in./in.

Special shaft length and modifications are available on request. Send sketch or print for quotation.

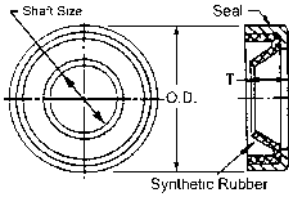
STOCK NO.	A
S4-10-U	1.000
S4-11-U	1.125
S4-12-U	1.250
S4-13-U	1.375
S4-15-U	1.500
S4-16-U	1.625
S4-17-U	1.750
S4-18-U	1.875
S4-20-U	2.000
S4-21-U	2.125
S4-22-U	2.250

STOCK NO.	A
S4-23-U	2.375
S4-25-U	2.500
S4-27-U	2.750
S4-30-U	3.000
S4-31-U	3.125
S4-32-U	3.250
S4-33-U	3.375
S4-35-U	3.500
S4-36-U	3.625
S4-37-U	3.750
S4-40-U	4.000

STOCK NO.	A
S4-45-U	4.500
S4-50-U	5.000
S4-55-U	5.500
S4-60-U	6.000
S4-65-U	6.500
S4-70-U	7.000
S4-75-U	7.500
S4-80-U	8.000
S4-85-U	8.500
S4-90-U	9.000
S4-100-U	10.000

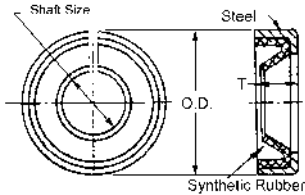
SHAFT SEALS

STYLE	FOR SHAFT SIZES
REGULAR	1/4" TO 2"



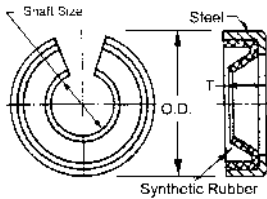
STOCK NO.	SHAFT SIZE	OUTSIDE DIA.	T
LMG-R-1	1/4	.504	.125
LMG-R-2	3/8	.629	.125
LMG-R-3	1/2	.879	.125
LMG-R-4	3/4	1.254	.125
LMG-R-5	1	1.567	.187
LMG-R-6	1-1/4	2.004	.375
LMG-R-7	1-1/2	2.379	.375
LMG-R-8	2	3.004	.375

STYLE	FOR SHAFT SIZES
ADJUSTABLE	1/2" TO 2"



STOCK NO.	SHAFT SIZE	OUTSIDE DIA.	T
LMG-A-3	1/2	.879	.125
LMG-A-4	3/4	1.254	.125
LMG-A-5	1	1.567	.187
LMG-A-6	1-1/4	2.004	.375
LMG-A-7	1-1/2	2.379	.375
LMG-A-8	2	3.004	.375

STYLE	FOR SHAFT SIZES
OPEN	1/2" TO 2"

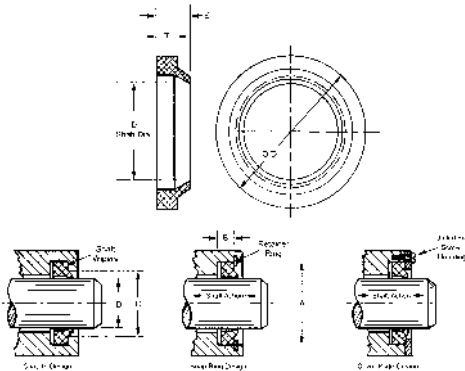


STOCK NO.	SHAFT SIZE	OUTSIDE DIA.	T
LMG-P-3	1/2	.879	.125
LMG-P-4	3/4	1.254	.125
LMG-P-5	1	1.567	.187
LMG-P-6	1-1/4	2.004	.375
LMG-P-7	1-1/2	2.379	.375
LMG-P-8	2	3.004	.375



SHAFT WIPERS

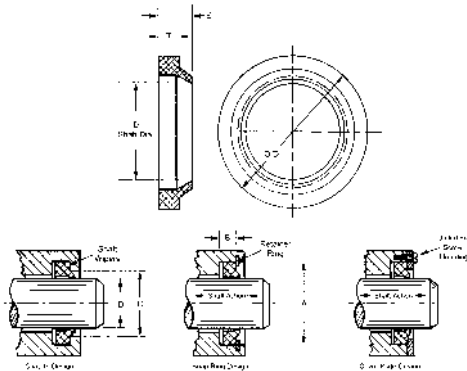
FOR SHAFT SIZES	MATERIAL	TEMPERATURE RANGE
1/2" TO 4"	POLYURETHANE 90A DURO	-40°F TO +190°F



STOCK NO	WIPER DIMENSIONS					HOUSING DIMENSIONS		
	SHAFT (REF.)	D (+.000/- .002)	O.D.	T	E (MAX)	A (+.004/- .000)	B (+/- .003)	C (+.005/- .000)
ANW-9	1/2	.498	.766	.104	.187	.760	.107	.647
ANW-10	9/16	.560	.829	.104	.187	.823	.107	.710
ANW-11	5/8	.623	.891	.104	.187	.885	.107	.772
ANW-12	11/16	.685	.954	.104	.187	.948	.107	.834
ANW-13	3/4	.748	1.016	.104	.187	1.010	.107	.897
ANW-14	13/16	.810	1.090	.104	.187	1.084	.107	.960
ANW-15	7/8	.873	1.153	.104	.187	1.147	.107	1.023
ANW-16	15/16	.935	1.215	.104	.187	1.209	.107	1.085
ANW-17	1	.998	1.278	.104	.187	1.272	.107	1.148
ANW-18	1-1/16	1.060	1.340	.104	.187	1.334	.107	1.210
ANW-19	1-1/8	1.123	1.403	.104	.187	1.397	.107	1.273
ANW-20	1-3/16	1.185	1.465	.104	.187	1.459	.107	1.335
ANW-21	1-1/4	1.248	1.528	.104	.187	1.522	.107	1.398
ANW-22	1-5/16	1.310	1.622	.104	.187	1.614	.107	1.480
ANW-23	1-3/8	1.373	1.685	.104	.187	1.677	.107	1.542
ANW-24	1-7/16	1.435	1.747	.104	.187	1.739	.107	1.605
ANW-25	1-1/2	1.498	1.810	.104	.187	1.802	.107	1.668
ANW-26	1-5/8	1.623	1.935	.104	.187	1.927	.107	1.793
ANW-27	1-3/4	1.748	2.060	.104	.187	2.052	.107	1.918
ANW-28	1-7/8	1.873	2.185	.104	.187	2.177	.107	2.043
ANW-29	2	1.998	2.310	.104	.187	2.302	.107	2.178
ANW-30	2-1/8	2.123	2.435	.104	.187	2.427	.107	2.303
ANW-31	2-1/4	2.248	2.560	.104	.187	2.552	.107	2.428
ANW-32	2-3/8	2.373	2.685	.104	.187	2.677	.107	2.553
ANW-33	2-1/2	2.498	2.810	.104	.187	2.802	.107	2.678
ANW-34	2-5/8	2.623	2.999	.119	.211	2.989	.122	2.834
ANW-35	2-3/4	2.748	3.124	.119	.211	3.114	.122	2.959
ANW-36	2-7/8	2.873	3.249	.119	.211	3.239	.122	3.084
ANW-37	3	2.997	3.374	.119	.211	3.364	.122	3.209
ANW-38	3-1/8	3.122	3.499	.119	.211	3.489	.122	3.334
ANW-39	3-1/4	3.247	3.624	.199	.211	3.614	.122	3.459
ANW-40	3-3/8	3.372	3.749	.199	.211	3.739	.122	3.584
ANW-41	3-1/2	3.497	3.874	.199	.211	3.864	.122	3.709
ANW-42	3-5/8	3.622	3.999	.199	.211	3.989	.122	3.834
ANW-43	3-3/4	3.747	4.124	.199	.211	4.114	.122	3.959
ANW-44	3-7/8	3.872	4.249	.199	.211	4.239	.122	4.084
ANW-45	4	3.997	4.439	.135	.238	4.427	.138	4.240

SHAFT WIPERS

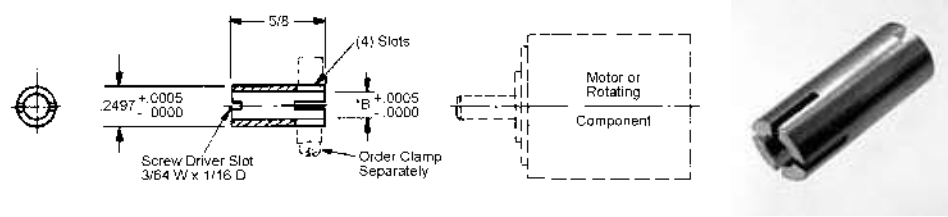
FOR SHAFT SIZES	MATERIAL	TEMPERATURE RANGE
1/4" TO 4"	MOLYBDENUM DISULFIDE IMPREGNATED POLYURETHANE 90A DURO	-65°F TO +200°F



STOCK NO.	WIPER DIMENSIONS				HOUSING DIMENSIONS		
	D	O.D.	T	E (MAX)	A (+.004/- .000)	B (+/- .003)	C (+.005/- .000)
USW-4	1/4	1/2	1/8	.210	.497	.124	.410
USW-6	3/8	5/8	1/8	.210	.622	.124	.535
USW-8	1/2	3/4	1/8	.210	.747	.124	.660
USW-10	5/8	7/8	1/8	.210	.872	.124	.785
USW-12	3/4	1-1/8	3/16	.305	1.122	.187	.995
USW-14	7/8	1-1/4	3/16	.305	1.247	.187	1.120
USW-16	1	1-3/8	3/16	.305	1.372	.187	1.245
USW-18	1-1/8	1-1/2	3/16	.305	1.497	.187	1.370
USW-20	1-1/4	1-5/8	3/16	.305	1.622	.187	1.495
USW-22	1-3/8	1-3/4	3/16	.305	1.747	.187	1.620
USW-24	1-1/2	1-7/8	3/16	.305	1.872	.187	1.745
USW-26	1-5/8	2	3/16	.305	1.997	.187	1.870
USW-27	1-11/16	2-1/16	3/16	.305	2.060	.187	1.935
USW-28	1-3/4	2-1/8	3/16	.305	2.122	.187	1.995
USW-29	1-13/16	2-3/16	3/16	.305	2.185	.187	2.060
USW-30	1-7/8	2-1/4	3/16	.305	2.247	.187	2.120
USW-31	1-15/16	2-5/16	3/16	.305	2.310	.187	2.185
USW-32	2	2-1/2	1/4	.395	2.497	.249	2.327
USW-34	2-1/8	2-5/8	1/4	.395	2.622	.249	2.452
USW-36	2-1/4	2-3/4	1/4	.395	2.747	.249	2.577
USW-37	2-5/16	2-13/16	1/4	.395	2.810	.249	2.640
USW-38	2-3/8	2-7/8	1/4	.395	2.872	.249	2.702
USW-40	2-1/2	3	1/4	.395	2.997	.249	2.827
USW-42	2-5/8	3-1/8	1/4	.395	3.122	.249	2.952
USW-44	2-3/4	3-1/4	1/4	.395	3.247	.249	3.077
USW-45	2-13/16	3-5/16	1/4	.395	3.310	.249	3.140
USW-46	2-7/8	3-3/8	1/4	.395	3.372	.249	3.202
USW-48	3	3-1/2	1/4	.395	3.497	.249	3.327
USW-49	3-1/8	3-5/8	1/4	.395	3.622	.249	3.452
USW-50	3-1/4	3-3/4	1/4	.395	3.747	.249	3.577
USW-51	3-3/8	3-7/8	1/4	.395	3.872	.249	3.702
USW-52	3-1/2	4	1/4	.395	3.997	.249	3.827
USW-53	3-5/8	4-1/8	1/4	.395	4.122	.249	3.952
USW-54	3-3/4	4-1/4	1/4	.395	4.247	.249	4.077
USW-56	4	4-1/2	1/4	.395	4.497	.249	4.327

SHAFT ADAPTERS

BORES	STYLE	MATERIAL
.1200 TO .1873	CLAMP	303 STAINLESS STEEL

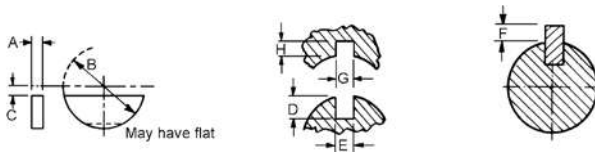


STOCK NO.	B BORE SIZE	ROTATING COMPONENT SHAFT DIA.	CLAMP (ORDER SEPARATELY) STOCK NO.
SA-3	.1200	.1200	CG1-8
SA-4	.1248	1/8	
SA-1	.1560	5/32	
SA-5	.1772	.1772	
SA-2	.1873	3/16	

* Concentric within .0003

WOODRUFF KEYS

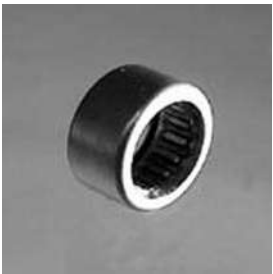
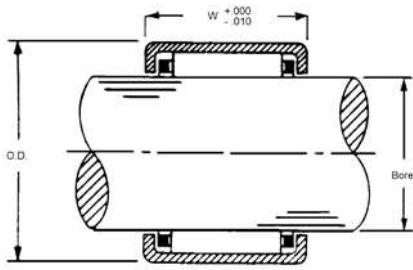
TYPE	MATERIAL
ANSI B17.2 - 1967, R 1978	303 STAINLESS STEEL



STOCK NO.	ANSI KEY NO. (Ref.)	KEY SIZE		C	D +.005	F +.010	H +.005	G +.002	E +.0015
		A +.001	B -.010						
K1-1	202	.0625	.250	.016	.0728	.0262	.0372	.0635	.0615
K1-2	202.5	.0625	.312	.016	.1038	.0262	.0372	.0635	.0615
K1-3	302.5	.0938	.312	.016	.0882	.0419	.0529	.0948	.0928
K1-4	203	.0625	.375	.016	.1358	.0262	.0372	.0635	.0615
K1-5	303	.0938	.375	.016	.1202	.0419	.0529	.0948	.0928
K1-6	403	.1250	.375	.016	.1045	.0575	.0685	.1260	.1240
K1-7	204	.0625	.500	.047	.1668	.0262	.0372	.0635	.0615
K1-8	304	.0938	.500	.047	.1511	.0419	.0529	.0948	.0928
K1-10	404	.1250	.500	.047	.1355	.0575	.0685	.1260	.1240
K1-11	305	.0938	.625	.062	.1981	.0419	.0529	.0948	.0928
K1-12	405	.1250	.625	.062	.1825	.0575	.0685	.1260	.1240
K1-9	505	.1563	.625	.062	.1669	.0731	.0841	.1573	.1553

DYNA-SPEED NEEDLE ROLLER BEARINGS

TYPE	MATERIAL
DRAWN CUP DESIGN FOR 1/8" TO 1" HARDENED SHAFTS	ROLLER CUP - CASE HARDENED STEEL NEEDLE ROLLERS - 52100 HARDENED STEEL BEARING CAGE - PLASTIC

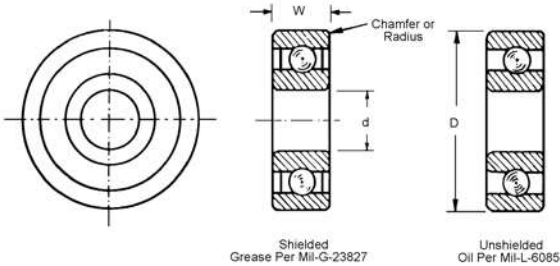


STOCK NO.	BORE	BEARING OUTSIDE DIA. (Ref.)	HOUSING BORE DIA.	BEARING W	MAX. SPEED RPM	LOAD CAPACITIES DYNAMIC (lbs.)	STATIC (lbs.)	HARDENED SHAFTING (ORDER SEPARATELY) STOCK LENGTH 12 INCHES OTHER LENGTHS ON REQUEST	
								SHAFTING STOCK NO.	SHAFT DIA.
NRB-24	1/8	.250	.2500- .2505	.250	70,000	240	165	-	.1250- .1247
NRB-34	3/16	.343	.3432- .3437	.250	70,000	400	305	-	.1875- .1872
NRB-36	3/16	.343	.3432- .3437	.375	70,000	620	530	-	.1875- .1872
NRB-44	1/4	.437	.4370- .4380	.250	55,000	360	260	-	.2500- .2495
NRB-47	1/4	.437	.4370- .4380	.438	55,000	920	870	-	.2500- .2495
NRB-55	5/16	.500	.4995- .5005	.312	44,000	650	590	-	.3125- .3120
NRB-59	5/16	.500	.4995- .5005	.562	44,000	1340	1480	-	.3125- .3120
NRB-65	3/8	.562	.5620- .5630	.312	37,000	650	610	LMS-46-12	.3750- .3745
NRB-610	3/8	.562	.5620- .5630	.625	37,000	1660	2040	LMS-46-12	.3750- .3745
NRB-86	1/2	.687	.6870- .6880	.375	27,000	1040	1210	LMS-48-12	.5000- .4995
NRB-812	1/2	.687	.6870- .6880	.750	27,000	2230	3200	LMS-48-12	.5000- .4995
NRB-107	5/8	.812	.8120- .8130	.438	22,000	1480	2100	LMS-50-12	.6250- .6245
NRB-1012	5/8	.812	.8120- .8130	.750	22,000	2700	4450	LMS-50-12	.6250- .6245
NRB-126	3/4	1.000	.9995- 1.0005	.375	18,000	1600	1860	LMS-52-12	.7500- .7495
NRB-1212	3/4	1.000	.9995- 1.0005	.750	18,000	4150	5300	LMS-52-12	.7500- .7495
NRB-168	1	1.250	1.2495- 1.2505	.500	14,000	2850	4300	LMS-56-12	1.0000- .9995
NRB-1616	1	1.250	1.2495- 1.2505	1.000	14,000	6500	10,400	LMS-56-12	1.0000- .9995

- Extremely high speed
- High load capacity
- Low profile, Light weight
- Caged needle bearings offer up to 3 times the speed of uncaged designs
- Extremely low rolling friction
- High lubrication capacity
- Low sensitivity to misalignment

BALL BEARINGS

BORE SIZE	TYPE	MATERIAL
3/64" TO 1/2"	SINGLE ROW PRECISION ABEC-3 AND ABEC-7	440C STAINLESS STEEL

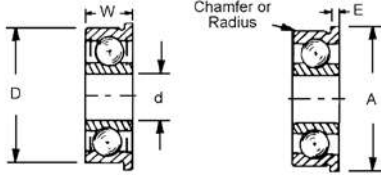
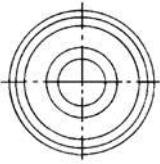


ABEC-3 STOCK NO.	ABEC-7 STOCK NO.	d	D	w	SHIELD DATA	DYNAMIC LOAD (LBS.)	STATIC LOAD (LBS.)
B1-37-Q3 B1-37-S-Q3	B1-37 B1-37-S	.0469	.1562	.0625 .0937	UNSHIELDED SHIELDED	17	6
B1-38-Q3 B1-38-S-Q3	B1-38 B1-38-S	.0550	.1875	.0781 .1094	UNSHIELDED SHIELDED	26	9
B1-33-Q3 B1-33-S-Q3	B1-33 B1-33-S	.0781	.2500	.0937 .1406	UNSHIELDED SHIELDED	36	14
B1-34-Q3 B1-34-S-Q3	B1-34 B1-34-S	.0937	.3125	.1094 .1406	UNSHIELDED SHIELDED	60	24
B1-35-Q3 B1-35-S-Q3	B1-35 B1-35-S	.1250	.2500	.0937 .1094	UNSHIELDED SHIELDED	33	13
B1-36-Q3 B1-36-S-Q3	B1-36 B1-36-S		.3125	.1094 .1406	UNSHIELDED SHIELDED	60	24
B1-24-Q3 B1-5-Q3	B1 -24 B1-5		.3750	.1562 .1562	UNSHIELDED SHIELDED	68	28
B1-42-Q3 B1-42-S-Q3	B1-42 B1-42-S		.3125	.1094 .1250	UNSHIELDED SHIELDED	33	14
B1-40-Q3 B1-40-S-Q3	B1-40 B1-40-S	.1875	.3125	.1094 .1250	UNSHIELDED SHIELDED	33	14
B1-25-Q3 B1-27-Q3	B1-25 B1-27		.3750	.1250 .1250	UNSHIELDED SHIELDED	76	33
B1-26-Q3 B1-7-Q3	B1-26 B1-7		.5000	.1562 .1960	UNSHIELDED SHIELDED	141	67
B1-29-Q3 B1-30-Q3	B1-29 B1-30		.3750	.1250 .1250	UNSHIELDED SHIELDED	37	17
B1-31-Q3 B1-32-Q3	B1-31 B1-32	.2500	.5000	.1250 .1875	UNSHIELDED SHIELDED	114	57
B1-28-Q3 B1-9-Q3	B1-28 B1-9		.6250	.1960 .1960	UNSHIELDED SHIELDED	158	78
B1-43-Q3 B1-43-S-Q3	B1-43 B1-43-S		.3125	.1562 .1562	UNSHIELDED SHIELDED	56	31
B1-39-Q3 B1-13-Q3	B1-39 B1-13	.3750	.8750	.2188 .2812	UNSHIELDED SHIELDED	356	176
B1-44-Q3 B1-44-S-Q3	B1-44 B1-44-S	.5000	.8750	.2188 .2812	UNSHIELDED SHIELDED	203	114
B1-15-Q3	B1-15		1.1250	.3125	SHIELDED	827	464

See Reference section for bearing tolerances.

BALL BEARINGS

BORE SIZE	TYPE	MATERIAL
3/64" TO 1/2"	SINGLE ROW - FLANGED PRECISION ABEC-3 AND ABEC-7	440C STAINLESS STEEL



ABEC-3 STOCK NO.	ABEC-7 STOCK NO.	d	D	w	A	SHIELD DATA	E	DYNAMIC LOAD (LBS.)	STATIC LOAD (LBS.)
B2-16-Q3 B2-16-S-Q3	B2-16 B2-16-S	.0469	.1562	.0625 .0937	.203	UNSHIELDED* SHIELDED**	.013 .031	17	6
B2-17-Q3 B2-17-S-Q3	B2-17 B2-17-S	.0550	.1875	.0781 .1094	.234	UNSHIELDED* SHIELDED**	.023 .031	26	9
B2-12-Q3 B2-12-S-Q3	B2-12 B2-12-S	.0781	.2500	.0937 .1406	.296	UNSHIELDED* SHIELDED**	.023 .031	36	14
B2-13-Q3 B2-13-S-Q3	B2-13 B2-13-S	.0937	.3125	.1094 .1406	.359	UNSHIELDED* SHIELDED**	.023 .031	60	24
B2-14-Q3 B2-14-S-Q3	B2-14 B2-14-S	.1250	.2500	.0937 .1094	.296	UNSHIELDED* SHIELDED**	.023 .031	33	13
B2-15-Q3 B2-15-S-Q3	B2-15 B2-15-S		.3125	.1094 .1406	.359	UNSHIELDED* SHIELDED**	.023 .031	60	24
B2-5-Q3 B2-5-S-Q3	B2-5 B2-5-S		.3750	.1562 .1562	.440	UNSHIELDED* SHIELDED**	.030 .030	68	28
B2-20-Q3 B2-20-S-Q3	B2-20 B2-20-S	.1562	.3125	.1094 .1250	.359	UNSHIELDED* SHIELDED**	.023 .036	33	14
B2-18-Q3 B2-18-S-Q3	B2-18 B2-18-S	.1875	.3125	.1094 .1250	.359	UNSHIELDED* SHIELDED**	.023 .036	33	14
B2-9-Q3 B2-9-S-Q3	B2-9 B2-9-S		.3750	.1250 .1250	.422	UNSHIELDED* SHIELDED**	.023 .031	76	33
B2-6-Q3 B2-6-S-Q3	B2-6 B2-6-S		.5000	.1960 .1960	.565	UNSHIELDED* SHIELDED**	.042 .042	141	67
B2-10-Q3 B2-10-S-Q3	B2-10 B2-10-S	.2500	.3750	.1250 .1250	.422	UNSHIELDED* SHIELDED**	.023 .036	37	17
B2-11-Q3 B2-11-S-Q3	B2-11 B2-11-S		.5000	.1250 .1875	.547	UNSHIELDED* SHIELDED**	.023 .045	114	57
B2-7-Q3 B2-7-S-Q3	B2-7 B2-7-S		.6250	.1960 .1960	.690	UNSHIELDED* SHIELDED**	.042 .042	158	78
B2-21-Q3 B2-21-S-Q3	B2-21 B2-21-S	.3125	.5000	.1562 .1562	.547	UNSHIELDED* SHIELDED**	.031 .031	56	31
B2-8-Q3 B2-8-S-Q3	B2-8 B2-8-S	.3750	.8750	.2812 .2812	.969	UNSHIELDED* SHIELDED**	.062 .062	356	176
B2-22-S-Q3	B2-22-S	.5000	1.1250	.3125	1.225	SHIELDED**	.062	827	464

*Unshielded is oiled per MIL-6085.

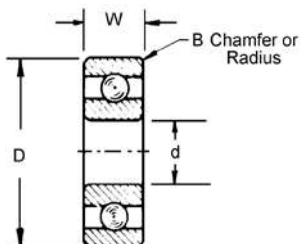
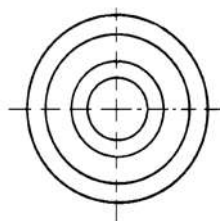
**Shielded is greased per MIL-G-23827.

See Reference section for bearing tolerances.

BALL BEARINGS

BORE SIZE	TYPE	MATERIAL
1/8" TO 3/4"	OPEN - PLAIN PRECISION ABEC-5	440C STAINLESS STEEL

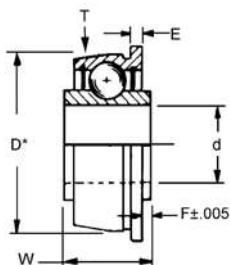
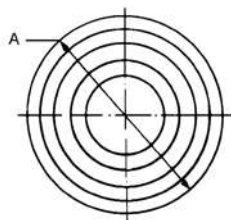
Lubrication: Oil Per Mil-L-6085



STOCK NO.	d	D	W	DYNAMIC LOAD (LBS)	STATIC LOAD (LBS)
B10-5	.1250	.3125	.1094	62	24
B10-6	.1875	.3750	.1250	79	33
B10-7	.2500	.5000	.1250	128	55
B10-8	.3125	.5000	.1562	95	47
B10-1	.3750	.6250	.1562	95	49
B10-2	.5000	.7500	.1562	111	66
B10-3	.6250	.8750	.1562	114	75
B10-4	.7500	1.0000	.1562	126	92

See Reference section for bearing tolerances.

BORE SIZE	TYPE	MATERIAL
1/8" TO 5/16"	SHIELDED - FLANGED PRECISION ABEC-3	440C STAINLESS STEEL



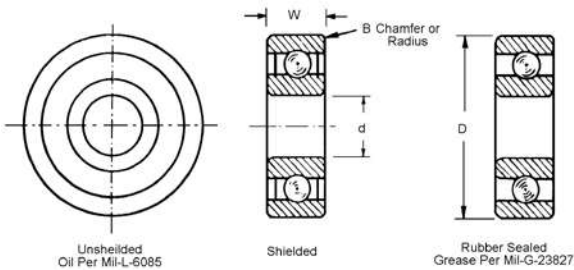
STOCK NO.	SHAFT SIZE	d	D	w	A	F	E	DYNAMIC LOAD (LBS)	STATIC T IN/FT.	TAPER
B2-1	1/8	.1250	.3757	.189	.4380		.037	69	16	.075
B2-2	3/16	.1875	.5632	.251	.6250	.015	.042	198	51	.068
B2-3	1/4	.2500	.6257	.251	.6875		.042	233	68	.068
B2-4	5/16	.3125	.6882	.251	.7500		.042	240	72	.068

* Measured at the midpoint of the raceway.

See Section K (Reference Section) for Bearing Tolerances.

BALL BEARINGS

BORE SIZE	TYPE	MATERIAL
1/8" TO 1-1/4"	SINGLE ROW - UNFLANGED PRECISION ABEC-1	52100 CHROME STEEL

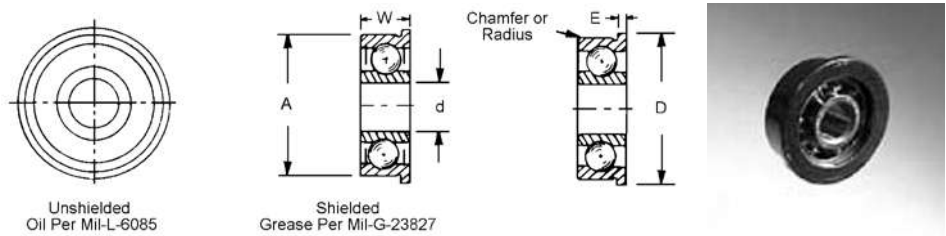


STOCK NO.	d	D	W	B	SHIELD AND LUBE DATA	DYNAMIC LOAD (LBS) CAPACITY	STATIC LOAD (LBS) CAPACITY
B11-1 B11-2 B11-3	.1250	.3750	.156 .156 .156	.005 .005 .005	UNSHIELDED SHIELDED RUBBER SEALED	71	29
B11-4 B11-5 B11-6	.1875	.5000	.156 .196 .196	.012 .012 .012	UNSHIELDED SHIELDED RUBBER SEALED	139	60
B11-7 B11-8 B11-9	.2500	.6250	.196 .196 .196	.012 .012 .012	UNSHIELDED SHIELDED RUBBER SEALED	159	71
B11-10 B11-11 B11-12	.3750	.8750	.218 .281 .281	.016 .016 .016	UNSHIELDED SHIELDED RUBBER SEALED	451	219
B11-13 B11-14 B11-15	.5000	1.1250	.250 .312 .312	.016 .016 .016	UNSHIELDED SHIELDED RUBBER SEALED	880	500
B1-17 B1-19 B1-21 B1-23	.6250 .7500 1.0000 1.2500	1.3750 1.6250 2.0000 2.2500	.343 .437 .500 .375	.031 .031 .031 .031	SHIELDED SHIELDED SHIELDED UNSHIELDED	1175 1630 2015 1940	710 1073 1408 1582

See Section K (Reference Section) for Bearing Tolerances.

BALL BEARINGS

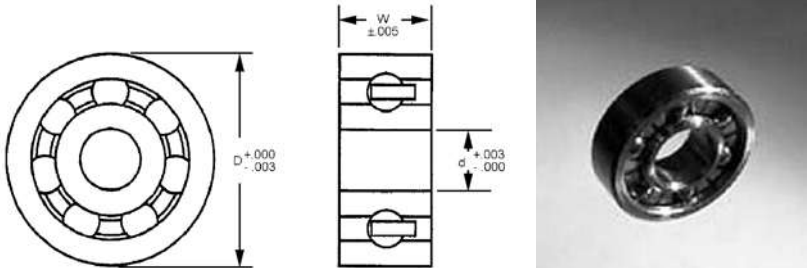
BORE SIZE	TYPE	MATERIAL
1/8" TO 3/8"	SINGLE ROW - FLANGED PRECISION ABEC-1	52100 CHROME STEEL



STOCK NO.	d	D	W	A	SHIELD AND LUBE DATA	E	DYNAMIC LOAD (LBS) CAPACITY	STATIC LOAD (LBS) CAPACITY
B13-1 B13-2	.1250	.3750	.156 .156	.440	UNSHIELDED SHIELDED	.030	71	29
B13-4 B13-5	.1875	.5000	.156 .196	.565	UNSHIELDED SHIELDED	.042	139	60
B13-7 B13-8	.2500	.6250	.196 .196	.690	UNSHIELDED SHIELDED	.042	159	71
B13-10 B13-11	.3750	.8750	.281 .281	.969	UNSHIELDED SHIELDED	.062	451	219

See Section K (Reference Section) for Bearing Tolerances.

BORE SIZE	TYPE	MATERIAL
1/4" TO 1"	SINGLE ROW	316 STAINLESS STEEL RACEWAYS AND BALLS CAGE IS POLYMER

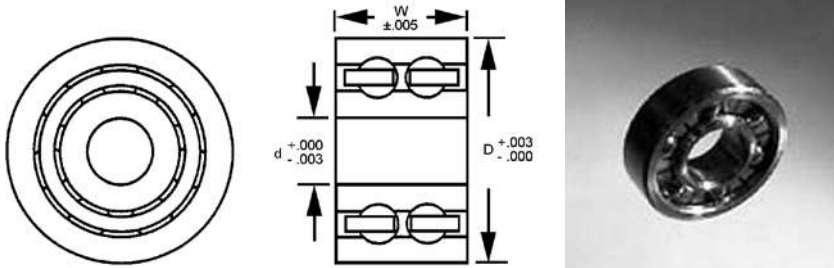


STOCK NO.	d	D	W	MAXIMUM RPM WITH NO LOAD	DYNAMIC LOAD (LBS) CAPACITY	STATIC LOAD (LBS) CAPACITY
B11-7-6	1/4	5/8	.196	2,352	89	51
B11-8-6	1/4	3/4	7/32	2,352	78	51
B11-9-6	1/4	3/4	9/32	2,352	78	51
B11-10-6	3/8	7/8	7/32	1,600	126	99
B11-11-6	3/8	7/8	9/32	1,600	126	99
B11-13-6	1/2	1-1/8	1/4	1,142	165	129
B11-14-6	5/8	1-1/8	1/4	1,142	165	129
B11-15-6	3/8	1-1/8	3/8	1,142	165	129
B11-16-6	1/2	1-1/8	3/8	1,142	165	129
B11-18-6	5/8	1-3/8	7/16	1,069	207	138
B11-19-6	3/4	1-5/8	5/16	840	234	156
B11-21-6	1	2	1/2	729	276	183

Load and speed calculations are for reference only. W.M. Berg recommends testing in actual environment to be encountered.

BALL BEARINGS

BORE SIZE	TYPE	MATERIAL
1/4" TO 1"	DOUBLE ROW	316 STAINLESS STEEL RACEWAYS AND BALLS CAGE IS POLYMER

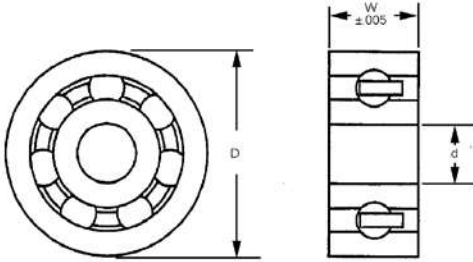


STOCK NO.	d	D	W	MAXIMUM RPM WITH NO LOAD	DYNAMIC LOAD (LBS) CAPACITY	STATIC LOAD (LBS) CAPACITY
B11D-7-6	1/4	5/8	3/8	2,352	117	76
B11D-10-6	3/8	7/8	1/2	1,600	189	148
B11D-13-6	1/2	1-1/8	7/16	1,142	247	193
B11D-17-6	5/8	1-3/8	7/16	1,069	310	207
B11D-19-6	3/4	1-5/8	5/8	840	351	234
B11D-21-6	1	2	3/4	729	414	274

Load and speed calculations are for reference only. W.M. Berg recommends testing in actual environment to be encountered.

BALL BEARINGS

BORE SIZE	TYPE	MATERIAL
3/16" TO 1"	SINGLE ROW	316 STAINLESS STEEL BALLS ACETAL PLASTIC RACEWAYS

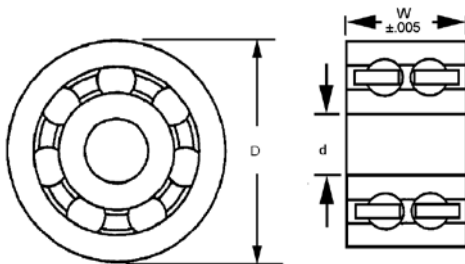


STOCK NO.	d*	D*	W	MAXIMUM RPM WITH NO LOAD	DYNAMIC LOAD (LBS) CAPACITY	STATIC LOAD (LBS) CAPACITY
B11A-4-6	3/16	1/2	5/32	3,167	17	11
B11A-5-6	3/16	5/8	.196	2,352	26	17
B11A-7-6	1/4	5/8	.196	2,352	26	17
B11A-8-6	1/4	3/4	7/32	2,352	26	17
B11A-9-6	1/4	3/4	9/32	2,352	26	17
B11A-10-6	3/8	7/8	7/32	1,600	42	33
B11A-11-6	3/8	7/8	9/32	1,600	42	33
B11A-13-6	1/2	1-1/8	1/4	1,142	55	43
B11A-15-6	3/8	1-1/8	3/8	1,142	55	43
B11A-17-6	5/8	1-3/8	3/8	1,069	69	46
B11A-18-6	5/8	1-3/8	7/16	1,069	69	46
B11A-19-6	3/4	1-5/8	5/16	840	78	52
B11A-21-6	1	2	1/2	729	92	61

* Inner and Outer Diameter Tolerancing:
 $D = 1/2" - 7/8" +.000 / -.003$
 $D = 1-1/8" - 2" +.000 / -.004$
 $d = 3/16" - 3/4" +.003 / -.000$
 $d = 1" +.004 / -.000$

Load and speed calculations are for reference only. W.M. Berg recommends testing in actual environment to be encountered.

BORE SIZE	TYPE	MATERIAL
1/4" TO 1"	DOUBLE ROW	316 STAINLESS STEEL BALLS ACETAL PLASTIC RACEWAYS



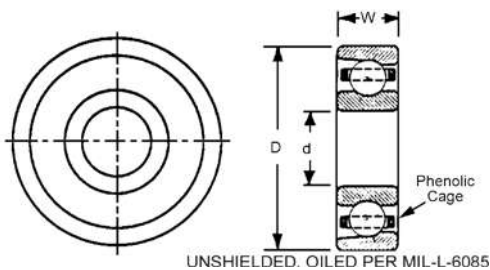
STOCK NO.	d*	D*	W	MAXIMUM RPM WITH NO LOAD	DYNAMIC LOAD (LBS) CAPACITY	STATIC LOAD (LBS) CAPACITY
B11AD-7-6	1/4	5/8	3/8	1,881	37	20
B11AD-8-6	1/4	3/4	3/8	1,881	37	20
B11AD-10-6	3/8	7/8	1/2	1,280	60	43
B11AD-13-6	1/2	1-1/8	7/16	913	78	61
B11AD-17-6	5/8	1-3/8	7/16	855	85	68
B11AD-19-6	3/4	1-5/8	5/8	672	92	75
B11AD-21-6	1	2	3/4	583	127	110

* Inner and Outer Diameter Tolerancing:
 $D = 5/8" - 7/8" +.000 / -.003$
 $D = 1-1/8" - 2" +.000 / -.004$
 $d = 1/4" - 3/4" +.003 / -.000$
 $d = 1" +.004 / -.000$

Load and speed calculations are for reference only. W.M. Berg recommends testing in actual environment to be encountered.

ANGULAR CONTACT BALL BEARINGS

BORE SIZE	TYPE	MATERIAL
1/8" TO 1/4"	NON-SEPARABLE ABEC-7	400 SERIES MARTENSITIC STAINLESS STEEL

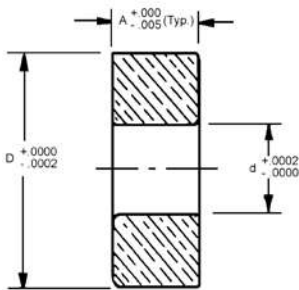


STOCK NO.	d	D	W	MAX. SPEED (RPM)	STATIC RADIAL LOAD (LBS.)	DYNAMIC RADIAL LOAD (LBS.)	STATIC THRUST LOAD (LBS)
B14-1	.1250	.3750	.1562	85,000	27	97	76
B14-2	.1875	.5000	.1562	55,000	52	190	167
B14-3	.2500	.6250	.1960	49,000	63	229	229

See Section K (Reference Section) for Bearing Tolerances.

OIL-LESS BEARINGS

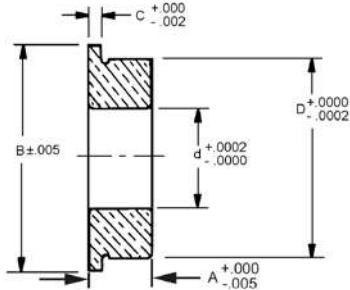
BORE SIZE	TYPE	MATERIAL
3/64" TO 1/2"	PLAIN ULTRA PRECISION	SINTERED BRONZE MIL-B-5687A TYPE 1 VACUUM IMPREGNATED MIL-L-6085



STOCK NO.	SHAFT SIZE	d	D	A
B3-1	3/64	.0469	.1563	.093
B3-2	1.4 MM	.0550	.1876	.109
B3-3	1/16	.0627	.2501	.093
B3-17	5/64	.0781	.2500	.094
B3-4	5/64	.0783	.2501	.093
B3-18	3/32	.0937	.3125	.109
B3-5	3/32	.0939	.3126	.109
B3-19	1/8	.1250	.2500	.094
B3-20	1/8	.1250	.3125	.109
B3-13	1/8	.1250	.3750	.156
B3-6	1/8	.1252	.3751	.140
B3-7	5/32	.1564	.3126	.125
B3-14	3/16	.1875	.5000	.156
B3-15	3/16	.1875	.5000	.196
B3-21	3/16	.1875	.3750	.125
B3-8	3/16	.1877	.5001	.156
B3-16	1/4	.2500	.6250	.196
B3-22	1/4	.2500	.5000	.188
B3-9	1/4	.2502	.6251	.196
B3-10	5/16	.3127	.6876	.250
B3-11	3/8	.3752	.8751	.281
B3-12	1/2	.5002	1.1251	.312



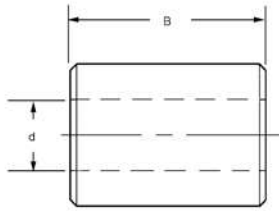
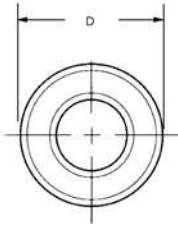
BORE SIZE	TYPE	MATERIAL
3/64" TO 1/2"	FLANGED ULTRA PRECISION	SINTERED BRONZE MIL-B-5687A TYPE 1 VACUUM IMPREGNATED MIL-L-6085



STOCK NO.	SHAFT SIZE	d	D	A	B	C
B4-1	3/64	.0469	.1563	.093	.203	.031
B4-2	1.4 MM	.0550	.1876	.109	.234	.031
B4-3	1/16	.0627	.2501	.093	.296	.031
B4-16	5/64	.0781	.2500	.094	.296	.023
B4-4	5/64	.0783	.2501	.093	.296	.031
B4-17	3/32	.0937	.3125	.109	.359	.023
B4-5	3/32	.0939	.3126	.109	.359	.031
B4-18	1/8	.1250	.2500	.094	.296	.023
B4-19	1/8	.1250	.3125	.109	.359	.023
B4-13	1/8	.1250	.3750	.156	.440	.030
B4-6	1/8	.1252	.3751	.140	.422	.031
B4-7	5/32	.1564	.3126	.125	.359	.036
B4-14	3/16	.1875	.5000	.196	.565	.042
B4-21	3/16	.1875	.3750	.125	.422	.031
B4-8	3/16	.1877	.5001	.156	.565	.042
B4-15	1/4	.2500	.6250	.196	.690	.042
B4-22	1/4	.2500	.5000	.188	.547	.045
B4-9	1/4	.2502	.6251	.196	.690	.042
B4-10	5/16	.3127	.6876	.250	.750	.042
B4-11	3/8	.3752	.8751	.281	.969	.062
B4-12	1/2	.5002	1.1251	.312	1.250	.062

OIL-LESS BEARINGS

BORE SIZE	TYPE	MATERIAL
1/8" TO 1/2"	PLAIN GRADE S.A.E 30	SINTERED BRONZE MIL-B-5687 TYPE 1 OIL IMPREGNATED

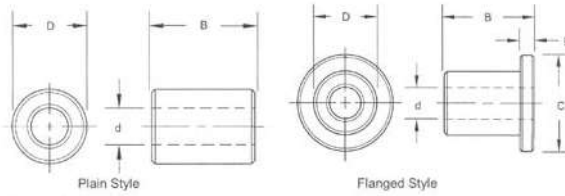


STOCK NO.	SHAFT SIZE	d +.002	D -.002	B ±.005	SHAFT STOCK NO.
B6-1 B6-2 B6-3 B6-4	1/8	.125	.252	.125 .250 .375 .500	S1-8
B6-5 B6-6 B6-7 B6-30 B6-8	3/16	* * * * .1875	.315	.250 .375 .500 .625 .750	S1-11
B6-9 B6-10 B6-11 B6-12 B6-54	1/4	.250	.378	.250 .375 .500 .625 .750	LMS-5-36
B6-37 B6-13 B6-14 B6-15 B6-16 B6-55	5/16	** *** *** ** .3125 .3125	.440	.250 .375 .500 .625 .750 1.000	S1-16
B6-41 B6-42 B6-17 B6-18 B6-19 B6-20	3/8	.375	.503	.250 .375 .500 .625 .750 1.000	LMS-7-36
B6-46 B6-21 B6-22 B6-23 B6-24 B6-57	1/2	.500	.628	.375 .500 .625 .750 1.000 1.250	LMS-9-36

* d = .1875 - .1895
 ** d = .3135 - .3155
 *** d = .3135 - .3155

OIL-LESS BEARINGS

SHAFT SIZE	TYPE	MATERIAL
1/8" TO 1/2"	PLAIN AND FLANGED STYLE	TEFLON-MIL-P-19468

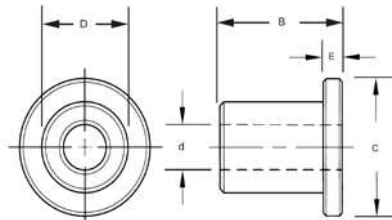


- Long Life
- Smooth Operation
- No Lubrication Required
- Minimal Breakaway Torque Resistance
- Max. PV = 10,000
- 450° F Max. Temperature Use

PLAIN STYLE	FLANGED STYLE	SHAFT SIZE	d +.005	D +.000 -.003	B ±.010	FLANGED ONLY		SHAFT STOCK NO.
STOCK NO.	STOCK NO.					C ±.010	E ±.005	
B8-1 --- B8-2 B8-3	B9-1 B9-2 B9-3 ---	1/8	.126	.254	.125 .187 .250 .375	.312	.047	S1-8
--- B8-5 B8-6 B8-7	B9-5 B9-6 B9-7 ---	3/16	.188	.317	.125 .250 .375 .500	.375	.047	S1-11
B8-9 B8-10 B8-11 B8-12	B9-9 B9-10 B9-11 ---	1/4	.251	.379	.250 .375 .500 .625	.500	.047	S1-73
--- B8-13 B8-14 B8-15 B8-16	B9-13 B9-14 B9-15 B9-16 ---	5/16	.313	.441	.250 .375 .500 .625 .750	.562	.093	S1-16
B8-17 B8-18 B8-19 B8-20	B9-17 B9-18 B9-19 B9-20	3/8	.376	.504	.375 .500 .625 .750	.687	.093	S1-75
B8-21 B8-22 B8-23 B8-24	B9-21 B9-22 B9-23 B9-24	1/2	.501	.629	.500 .625 .750 1.000	.875	.125	S1-77

OIL-LESS BEARINGS

BORE SIZE	TYPE	MATERIAL
1/8" TO 1/2"	FLANGED GRADE S.A.E 30	SINTERED BRONZE MIL-B-5687 TYPE 1 OIL IMPREGNATED



STOCK NO.	SHAFT SIZE	d + .002	D - .002	B ± .005	C ± .005	E ± .005	SHAFT STOCK NO.
B7-30 B7-31 B7-32	1/8	.125	.252	.125 .250 .375	.360	.047	S1-8
B7-1 B7-2	1/8	.125	.315	.250 .375	.360	.047	
B7-6 B7-7 B7-8 B7-35 B7-36	3/16	.187 * * * *	.315	.125 .250 .375 .500 .625	.360	.047	S1-11
B7-9 B7-10 B7-11 B7-12 B7-52	1/4	.250	.378	.250 .375 .500 .625 .750	.500	.047	LMS-5-36
B7-37 B7-38 B7-39 B7-40 B7-53	5/16	** *** *** ** .3125	.440	.250 .375 .500 .625 .750	.563 .560 .560 .563 .625	.062	S1-16 --- ---
B7-41 B7-42 B7-43 B7-44 B7-45 B7-54	3/8	.375	.503	.250 .375 .500 .625 .750 1.000	.625	.062	LMS-7-36
B7-46 B7-47 B7-48 B7-49 B7-50	1/2	.500	.628	.375 .500 .625 .750 1.000	.875	.062	LMS-9-36

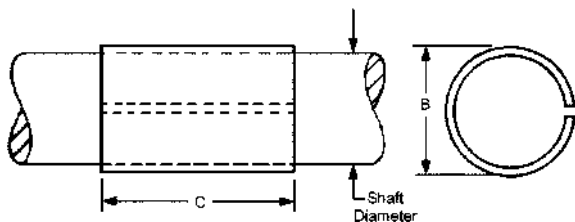
* d = .188 - .189

** d = .313 - .314

*** d = .3115 - .3125

LONG-LIFE® BEARINGS

SERIES	FOR SHAFT SIZES	MATERIAL
DRY UNLUBRICATED	1/8" TO 1"	STEEL BACKED POROUS BRONZE AND PTFE-LEAD



- Lasts up to 10x longer than oil impregnated porous bronze bearings
- High loads
- Runs cool - excellent heat dissipation
- Operates in extreme temperatures
- Reduce costs - lower maintenance, eliminate hardened shafting and expensive shaft preparations
- Excellent for rotating, sliding or oscillating motion and both trust and radial loading
- In fully lubricated environments provides protection during dry starts and from lubrication system failure

Maximum Continuous Load: 50,000 PV's Unlubricated
2,000,000 PV's Lubricated
PV Factor = psi x sfpm

Maximum Continuous Speed: 1,000 sfpm Unlubricated
2,000 sfpm Lubricated

Temperature Range: +536°F to -328°F

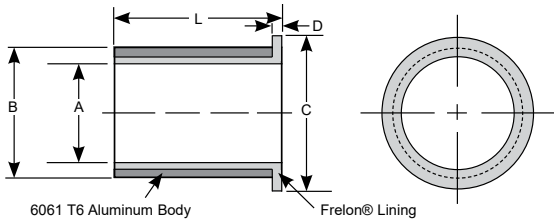
Compressive Strength: 44,000 psi

STOCK NO.	NOMINAL SHAFT SIZE	ACTUAL SHAFT DIA.	NOMINAL OUTSIDE DIA. B	HOUSING BORE	C	REC SHAFT
DU14-1 DU14-2	1/8	.1247/.1240	3/16	.1882/.1877	1/8 3/16	S1-8
DU14-5 DU14-6 DU14-7	3/16	.1872/.1865	1/4	.2510/.2504	3/16 1/4 3/8	S1-11
DU14-8 DU14-9	1/4	.2497/.2488	5/16	.3135/.3129	1/4 3/8	S1-14
DU14-10 DU14-11	5/16	.3122/.3113	3/8	.3760/.3754	3/8 1/2	S1-16
DU14-12 DU14-13 DU14-14 DU14-15 DU14-16 DU14-17	3/8	.3747/.3738	15/32	.4698/.4691	3/16 1/4 3/8 1/2 5/8 3/4	S1-18
DU14-18 DU14-19	7/16	.4372/.4362	17/32	.5323/.5315	1/2 3/4	-
DU14-21 DU14-22 DU14-23 DU14-24 DU14-25	1/2	.4997/.4987	19/32	.5948/.5941	1/4 3/8 1/2 5/8 7/8	S1-20
DU14-31 DU14-32 DU14-33	5/8	.6247/.6237	23/32	.7199/.7191	1/4 1/2 3/4	S1-22
DU14-38 DU14-39 DU14-40 DU14-41 DU14-42	3/4	.7497/.7485	7/8	.8761/.8753	3/8 1/2 5/8 3/4 1	S1-23
DU14-51 DU14-53 DU14-54	1	.9997/.9985	1-1/8	1.1261/1.1253	1/2 1 1-1/4	S1-24

Long-Life® is a trademark of Glacier Metal Co.

PRECISION BEARINGS

BORE SIZE	TYPE	MATERIAL
3/16" TO 1/2"	FLANGED	6061-T6 ALUMINUM BODY WITH FRELON LINING



Factors Affecting Wear Rate / Life
Shafting requirements for Frelon® bearing material.

- Best Performance:**
- Finish of 8-12 RMS / Hardness of RC60
- Acceptable Performance:**
- Finish of 8-16 RMS / Hardness of RC35
 - Rougher shafting can be used, but both bearing and shafting will wear at accelerated rates and binding may occur.

Chrome Plated Shafting Is Not Recommended!

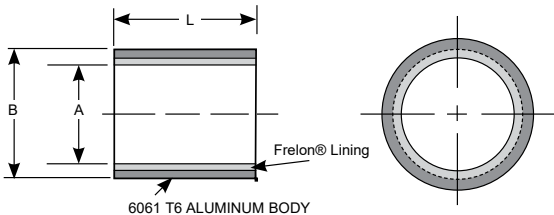
Lubrication
Reduces friction 50%, and reduces heat buildup allowing greater speeds.

- Recommended:**
- Waylube Oil, Light Weight Oils, Petroleum Based Grease; 3-in-1 Oils
- Not Recommended**
- WD-40, PTFE Sprays, Fluorocarbon, Silicon

STOCK NO.	NOMINAL BEARING SIZE			A BEARING I.D.		B O.D.		C FLANGE O.D.	D FLANGE	L LENGTH	
	A	B	L	Min.	Max.	Min.	Max.	Max.	Max.	Min.	Max.
BPSF0305-2	3/16	5/16	1/4	0.1890	0.1900	0.3135	0.3145	0.4370	.0625	0.230	0.250
BPSF0305-4	3/16	5/16	1/2	0.1890	0.1900	0.3135	0.3145	0.4370	.0625	0.480	0.500
BPSF0405-2	1/4	3/8	1/4	0.2515	0.2525	0.3760	0.3770	0.5000	.0625	0.230	0.250
BPSF0405-3	1/4	3/8	3/8	0.2515	0.2525	0.3760	0.3770	0.5000	.0625	0.355	0.375
BPSF0405-4	1/4	3/8	1/2	0.2515	0.2525	0.3760	0.3770	0.5000	.0625	0.480	0.500
BPSF0610-4	3/8	5/8	1/2	0.3765	0.3775	0.6260	0.6270	0.8750	0.125	0.480	0.500
BPSF0610-6	3/8	5/8	3/4	0.3765	0.3775	0.6260	0.6270	0.8750	0.125	0.730	0.750
BPSF0710-6	7/16	5/8	3/4	0.4390	0.4400	0.6260	0.6270	0.9375	0.125	0.730	0.750
BPSF0812-4	1/2	3/4	1/2	0.5015	0.5025	0.7510	0.7520	1.0000	0.125	0.980	1.000
BPSF0812-6	1/2	3/4	3/4	0.5015	0.5025	0.7510	0.7520	1.0000	0.125	0.730	0.750
BPSF0812-8	1/2	3/4	1	0.5015	0.5025	0.7510	0.7520	1.0000	0.125	0.980	1.000



BORE SIZE	TYPE	MATERIAL
3/16" TO 1/2"	SLEEVE	6061-T6 ALUMINUM BODY WITH FRELON LINING



Factors Affecting Wear Rate / Life
Shafting requirements for Frelon® bearing material.

- Best Performance:**
- Finish of 8-12 RMS / Hardness of RC60
- Acceptable Performance:**
- Finish of 8-16 RMS / Hardness of RC35
 - Rougher shafting can be used, but both bearing and shafting will wear at accelerated rates and binding may occur.

Chrome Plated Shafting Is Not Recommended!

Lubrication
Reduces friction 50%, and reduces heat buildup allowing greater speeds.

- Recommended:**
- Waylube Oil, Light Weight Oils, Petroleum Based Grease; 3-in-1 Oils
- Not Recommended**
- WD-40, PTFE Sprays, Fluorocarbon, Silicon

STOCK NO.	NOMINAL BEARING SIZE			A BEARING I.D.		B O.D.		L LENGTH	
	A	B	L	Min.	Max.	Min.	Max.	Min.	Max.
BPS0305-2	3/16	5/16	1/4	0.1890	0.1900	0.3135	0.3145	0.230	0.250
BPS0305-4	3/16	5/16	1/2	0.1890	0.1900	0.3135	0.3145	0.480	0.500
BPS0406-2	1/4	3/8	1/4	0.2515	0.2525	0.3760	0.3770	0.230	0.250
BPS0406-3	1/4	3/8	3/8	0.2515	0.2525	0.3760	0.3770	0.355	0.375
BPS0406-4	1/4	3/8	1/2	0.2515	0.2525	0.3760	0.3770	0.480	0.500
BPS0610-4	3/8	5/8	1/2	0.3765	0.3775	0.6260	0.6270	0.480	0.500
BPS0610-6	3/8	5/8	3/4	0.3765	0.3775	0.6260	0.6270	0.730	0.750
BPS0710-6	7/16	5/8	3/4	0.4390	0.4400	0.6260	0.6270	0.730	0.750
BPS0812-4	1/2	3/4	1/2	0.5015	0.5025	0.7510	0.7520	0.480	0.500
BPS0812-6	1/2	3/4	3/4	0.5015	0.5025	0.7510	0.7520	0.730	0.750
BPS0812-8	1/2	3/4	1	0.5015	0.5025	0.7510	0.7520	0.980	1.000



PRECISION BEARINGS

DIMENSIONAL INFORMATION

STOCK NO.		MAXIMUM STATIC LOAD (LBS.)	BEARING WEIGHT	RECOMMENDED HOUSING BORE			
				SLIP FIT & EPOXY		PRESS FIT	
FLANGED	SLEEVE		OZ.	Min.	Max.	Max.	Max.
BPSF0305-2	BPS0305-2	130	0.023	.3145	0.3155	0.3125	0.3130
BPSF0305-4	BPS0305-4	272	0.044	.3145	0.3155	0.3125	0.3130
BPSF0406-2	BPS0406-2	174	0.031	.3770	0.3780	0.3750	0.3755
BPSF0406-3	BPS0406-3	268	0.044	.3770	0.3780	0.3750	0.3755
BPSF0406-4	BPS0406-4	362	0.055	.3770	0.3780	0.3750	0.3755
BPSF0610-4	BPS0610-4	542	0.20	0.6270	0.6280	0.6250	0.6255
BPSF0610-6	BPS0610-6	824	0.25	0.6270	0.6280	0.6250	0.6255
BPSF0710-6	BPS0710-6	962	0.20	0.6270	0.6280	0.6250	0.6255
BPSF0812-4	BPS0812-4	722	0.25	0.7520	0.7530	0.7500	0.7505
BPSF0812-6	BPS0812-6	1098	0.30	0.7520	0.7530	0.7500	0.7505
BPSF0812-8	BPS0812-8	1474	0.40	0.7520	0.7530	0.7500	0.7505

Installation Instructions

1. Slip the bearing sleeve into the housing and epoxy into place with bonding agent. CAUTION: Do NOT let any of the adhesive touch the bearing liner. It will harden and interfere with the running clearance.
2. Freeze the bearing at 0°F (-17.75°C) for 30-45 minutes. Using gloves, remove the bearings from the freezer and slip them into housing. As they heat to room temperature, full contact between the bearing and housing will be achieved. The greatest advantage to his technique over traditional pressing is greater accuracy in alignment.
3. Temperature Range (-400°F/+500°F, -240°C/+260°C)

Speed Characteristics

Exceeding these speeds causes frictional heat and accelerates liner wear.

Bearing Material	No Lube Continuous Motion	No Lube Intermittent Motion	With Lubrication
Frelon® Gold	300 sfm 60 in/sec. 1.524 m/sec.	825 sfm 165 in/sec. 4.19 m/sec.	825 sfm 165 in/sec. 4.19 m/sec.

Performance Ratings (For Linear Motion)

Plane bearings are rated by their limiting PV which is a combination of load over a given surface area and velocity.

Bearing Material	Max. "PV"	Max. "P"	Max. "V" (No Lubrication)
Frelon® Gold	20,000 (psi) x ft/Min) or 430 (kgf/cm² x m/min)	3000 psi or 210.9 (kgf/cm² x m/min)	300 sfm or 91.44 m/min.

PV = The performance measurement of plane bearings. P x V where P = pressure (load) in psi (kgf/cm²). V = velocity (speed) in sfm (m/min.)

THERMOPLASTIC BEARINGS

REFERENCE CHART

The B15/16 Series is a thick-walled light-duty bearing used in many types of machinery to dampen vibration and shock loads. They are dimensionally interchangeable with most sintered metal bearings, and can be retro-fitted without changing the housing bore or shaft. Typically they're used in agricultural and exercise equipment and machinery such as woodworking, packaging, and welding equipment.

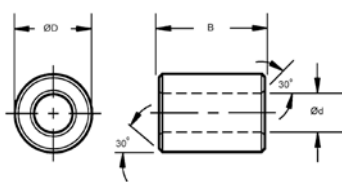
The B17/18 Series is available for situations where even the excellent abrasion resistance of the B19/20 Series is insufficient. It's superior characteristics are especially well suited for high performance requirements. Applications include, for example, pneumatic cylinders, lifting equipment, fitness machinery, industrial brakes, clutches and automotive components in general.

The B19/20 Series was initially designed for applications in chemical processing equipment. This material is a unique combination of exotic materials best suited for high load, temperature and speed applications. It is resistant to virtually any substance except for concentrated sulfuric acids. At present, this material is unique and unequalled. Applications include chemical mountings and pumps, oven manufacture, semi-conductors, film developing equipment, equipment for industrial-sized kitchens, etc.

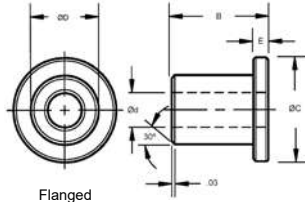
	B15/16 SERIES	B17/18 SERIES	B19/20 SERIES
MAX. LOAD (PSI)	2,300	9,425	21,750
TEMP. RANGE			
LONG TERM.	-40f 240f	-40f 275f	-149f 485f
SHORT TERM.	390f	410f	600f
WEAR BARRIER	175f	250f	410f
MAX. PV (NO LUB.)	9,800	28,000	100,000
SPEEDS (FPM)			
OSCILLATING (CONTINUOUS)	195	390	585
OSCILLATING (SHORT TERM)	390	590	780
ROTATIONAL (CONTINUOUS)	195	295	295
ROTATIONAL (SHORT TERM)	390	490	685
LINEAR (CONTINUOUS)	585	975	975
LINEAR (SHORT TERM)	975	1,180	1,170
COEFFICIENT OF FRICTION. DYNAMIC STEEL, DRY.	.18-.30	.08-.15	.11-.17
MAINTENANCE FREE	YES	YES	YES
DRY OPERATION	YES	YES	YES
COMPRESSIVE STRENGTH	2610 PSI	9425 PSI	21,750 PSI
SPACE REQUIREMENTS	MEDIUM WALL THICKNESS	THIN WALLED	THIN WALLED
DENSITY 1B/IN3	.040	.051	.053
MODULUS OF ELASTICITY PSI	246,500	797,500	957,000
H ₂ O ABSORPTION @50% HUM. & 72 ° F (%)	1.6	.65	.10

THERMOPLASTIC BEARINGS

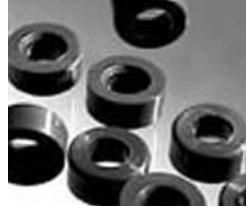
BORE SIZE	SHAFT SIZE	TYPE
1/8" TO 1/2"	.1250 TO .5000	SLEEVE AND FLANGED



Sleeve



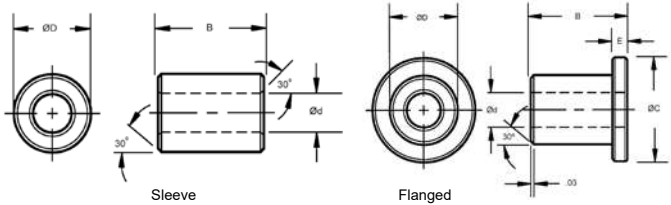
Flanged



SLEEVE STOCK NO.	FLANGED STOCK NO.	NOMINAL SIZES Ød	ØD	B	ØC	E (+0.1-.0055)	I.D. AFTER PRESS FIT		HOUSING BORE		SHAFT SIZE	
							MAX.	MIN.	MAX.	MIN.	MAX.	MIN.
B15-1	B16-1	1/8	1/4	1/8	.360	.047	.1280	.1262	.2515	.2510	.1250	.1241
B15-2	B16-2	1/8	1/4	3/16	.360	.047	.1280	.1262	.2515	.2510	.1250	.1241
B15-3	B16-3	1/8	1/4	1/4	.360	.047	.1280	.1262	.2515	.2510	.1250	.1241
B15-4	B16-4	1/8	1/4	3/8	.360	.047	.1280	.1262	.2515	.2510	.1250	.1241
B15-5	B16-5	3/16	1/4	1/4	.375	.032	.1905	.1887	.2515	.2510	.1875	.1866
B15-6	B16-6	3/16	1/4	3/8	.375	.032	.1905	.1887	.2515	.2510	.1875	.1866
B15-7	B16-7	3/16	1/4	1/2	.375	.032	.1905	.1887	.2515	.2510	.1875	.1866
B15-8	B16-8	3/16	5/16	3/16	.370	.047	.1905	.1887	.3140	.3135	.1875	.1866
B15-9	B16-9	3/16	5/16	1/4	.370	.047	.1905	.1887	.3140	.3135	.1875	.1866
B15-10	B16-10	3/16	5/16	5/16	.370	.047	.1905	.1887	.3140	.3135	.1875	.1866
B15-11	B16-11	3/16	5/16	3/8	.370	.047	.1905	.1887	.3140	.3135	.1875	.1866
B15-12	B16-12	3/16	5/16	1/2	.370	.047	.1905	.1887	.3140	.3135	.1875	.1866
B15-13	B16-13	1/4	5/16	1/4	.438	.032	.2539	.2516	.3140	.3135	.2500	.2491
B15-14	B16-14	1/4	5/16	3/8	.438	.032	.2539	.2516	.3140	.3135	.2500	.2491
B15-15	B16-15	1/4	5/16	1/2	.438	.032	.2539	.2516	.3140	.3135	.2500	.2491
B15-16	B16-16	1/4	3/8	3/16	.560	.047	.2539	.2516	.3765	.3760	.2500	.2491
B15-17	B16-17	1/4	3/8	1/4	.560	.047	.2539	.2516	.3765	.3760	.2500	.2491
B15-18	B16-18	1/4	3/8	5/16	.560	.047	.2539	.2516	.3765	.3760	.2500	.2491
B15-19	B16-19	1/4	3/8	3/8	.560	.047	.2539	.2516	.3765	.3760	.2500	.2491
B15-20	B16-20	1/4	3/8	1/2	.560	.047	.2539	.2516	.3765	.3760	.2500	.2491
B15-21	B16-21	1/4	3/8	5/8	.560	.047	.2539	.2516	.3765	.3760	.2500	.2491
B15-22	B16-22	1/4	3/8	3/4	.560	.047	.2539	.2516	.3765	.3760	.2500	.2491
B15-23	B16-23	5/16	3/8	1/4	.500	.032	.3164	.3141	.3765	.3760	.3125	.3116
B15-24	B16-24	5/16	3/8	3/8	.500	.032	.3164	.3141	.3765	.3760	.3125	.3116
B15-25	B16-25	5/16	3/8	1/2	.500	.032	.3164	.3141	.3765	.3760	.3125	.3116
B15-26	B16-26	5/16	7/16	3/16	.560	.062	.3164	.3141	.4390	.4385	.3125	.3116
B15-27	B16-27	5/16	7/16	1/4	.560	.062	.3164	.3141	.4390	.4385	.3125	.3116
B15-28	B16-28	5/16	7/16	5/16	.560	.062	.3164	.3141	.4390	.4385	.3125	.3116
B15-29	B16-29	5/16	7/16	3/8	.560	.062	.3164	.3141	.4390	.4385	.3125	.3116
B15-30	B16-30	5/16	7/16	1/2	.560	.062	.3164	.3141	.4390	.4385	.3125	.3116
B15-31	B16-31	5/16	7/16	5/8	.560	.062	.3164	.3141	.4390	.4385	.3125	.3116
B15-32	B16-32	5/16	7/16	3/4	.560	.062	.3164	.3141	.4390	.4385	.3125	.3116
B15-33	B16-33	3/8	7/16	1/4	.563	.032	.3789	.3766	.4390	.4385	.3750	.3741
B15-34	B16-34	3/8	7/16	3/8	.563	.032	.3789	.3766	.4390	.4385	.3750	.3741
B15-35	B16-35	3/8	7/16	1/2	.563	.032	.3789	.3766	.4390	.4385	.3750	.3741
B15-36	B16-36	3/8	1/2	3/16	.625	.062	.3789	.3766	.5015	.5010	.3750	.3741
B15-37	B16-37	3/8	1/2	1/4	.625	.062	.3789	.3766	.5015	.5010	.3750	.3741
B15-38	B16-38	3/8	1/2	5/16	.625	.062	.3789	.3766	.5015	.5010	.3750	.3741
B15-39	B16-39	3/8	1/2	3/8	.625	.062	.3789	.3766	.5015	.5010	.3750	.3741
B15-40	B16-40	3/8	1/2	1/2	.625	.062	.3789	.3766	.5015	.5010	.3750	.3741
B15-41	B16-41	3/8	1/2	5/8	.625	.062	.3789	.3766	.5015	.5010	.3750	.3741
B15-42	B16-42	3/8	1/2	3/4	.625	.062	.3789	.3766	.5015	.5010	.3750	.3741
B15-43	B16-43	3/8	1/2	1	.625	.062	.3789	.3766	.5015	.5010	.3750	.3741
B15-44	B16-44	7/16	9/16	3/8	.687	.062	.4422	.4395	.5635	.5625	.4375	.4365
B15-45	B16-45	7/16	9/16	1/2	.687	.062	.4422	.4395	.5635	.5625	.4375	.4365
B15-46	B16-46	1/2	5/8	1/4	.875	.062	.5047	.5020	.6260	.6250	.5000	.4990
B15-47	B16-47	1/2	5/8	5/16	.875	.062	.5047	.5020	.6260	.6250	.5000	.4990
B15-48	B16-48	1/2	5/8	3/8	.875	.062	.5047	.5020	.6260	.6250	.5000	.4990
B15-49	B16-49	1/2	5/8	1/2	.875	.062	.5047	.5020	.6260	.6250	.5000	.4990
B15-50	B16-50	1/2	5/8	5/8	.875	.062	.5047	.5020	.6260	.6250	.5000	.4990
B15-51	B16-51	1/2	5/8	3/4	.875	.062	.5047	.5020	.6260	.6250	.5000	.4990
B15-52	B16-52	1/2	5/8	1	.875	.062	.5047	.5020	.6260	.6250	.5000	.4990

THERMOPLASTIC BEARINGS

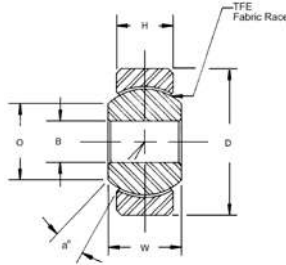
BORE SIZE	SHAFT SIZE	TYPE
1/8" TO 1/2"	.1250 TO .5000	SLEEVE AND FLANGED



SLEEVE STOCK NO.	FLANGED STOCK NO.	NOMINAL SIZES Ød	ØD	B	ØC	E (+0./-0.055)	I.D. AFTER PRESS FIT		HOUSING BORE		SHAFT SIZE	
							MAX.	MIN.	MAX.	MIN.	MAX.	MIN.
B17-1	B18-1	1/8	3/16	3/16	.312	.032	.1269	.1251	.1878	.1873	.1243	.1236
B17-2	B18-2	1/8	3/16	1/4	.312	.032	.1269	.1251	.1878	.1873	.1243	.1236
B17-3	B18-3	1/8	3/16	3/8	.312	.032	.1269	.1251	.2503	.1873	.1243	.1236
B17-4	B18-4	3/16	1/4	1/4	.375	.032	.1892	.1873	.2503	.2497	.1865	.1858
B17-5	B18-5	3/16	1/4	3/8	.375	.032	.1892	.1873	.2503	.2497	.1865	.1858
B17-6	B18-6	3/16	1/4	1/2	.375	.032	.1892	.1873	.2503	.2497	.1865	.1858
B17-7	B18-7	1/4	5/16	1/4	.500	.032	.2521	.2498	.3128	.3122	.2490	.2481
B17-8	B18-8	1/4	5/16	3/8	.500	.032	.2521	.2498	.3128	.3122	.2490	.2481
B17-9	B18-9	1/4	5/16	1/2	.500	.032	.2521	.2498	.3128	.3122	.2490	.2481
B17-10	B18-10	5/16	3/8	1/4	.562	.032	.3148	.3125	.3753	.3747	.3115	.3106
B17-11	B18-11	5/16	3/8	3/8	.562	.032	.3148	.3125	.3753	.3747	.3115	.3106
B17-12	B18-12	5/16	3/8	1/2	.562	.032	.3148	.3125	.3753	.3747	.3115	.3106
B17-13	B18-13	5/16	3/8	3/4	.562	.032	.3148	.3125	.3753	.3747	.3115	.3106
B17-14	B18-14	3/8	15/32	1/4	.687	.046	.3773	.3750	.4691	.4684	.3740	.3731
B17-15	B18-15	3/8	15/32	3/8	.687	.046	.3773	.3750	.4691	.4684	.3740	.3731
B17-16	B18-16	3/8	15/32	1/2	.687	.046	.3773	.3750	.4691	.4684	.3740	.3731
B17-17	B18-17	3/8	15/32	3/4	.687	.046	.3773	.3750	.4691	.4684	.3740	.3731
B17-18	B18-18	7/16	17/32	1/2	.750	.046	.4406	.4379	.5316	.5309	.4365	.4355
B17-19	B18-19	1/2	19/32	1/4	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980
B17-20	B18-20	1/2	19/32	3/8	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980
B17-21	B18-21	1/2	19/32	1/2	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980
B17-22	B18-22	1/2	19/32	3/4	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980
B17-23	B18-23	1/2	19/32	1	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980
B19-1	B20-1	1/8	3/16	3/16	.312	.032	.1269	.1251	.1878	.1873	.1243	.1236
B19-2	B20-2	1/8	3/16	3/8	.312	.032	.1269	.1251	.1878	.1873	.1243	.1236
B19-3	B20-3	3/16	1/4	1/4	.375	.032	.1892	.1873	.2503	.2497	.1865	.1858
B19-4	B20-4	3/16	1/4	3/8	.375	.032	.1892	.1873	.2503	.2497	.1865	.1858
B19-5	B20-5	3/16	1/4	1/2	.375	.032	.1892	.1873	.2503	.2497	.1865	.1858
B19-6	B20-6	1/4	5/16	1/4	.500	.032	.2521	.2498	.3128	.3122	.2490	.2481
B19-7	B20-7	1/4	5/16	3/8	.500	.032	.2521	.2498	.3128	.3122	.2490	.2481
B19-8	B20-8	1/4	5/16	1/2	.500	.032	.2521	.2498	.3128	.3122	.2490	.2481
B19-9	B20-9	5/16	3/8	1/4	.562	.032	.3148	.3125	.3753	.3747	.3115	.3106
B19-10	B20-10	5/16	3/8	3/8	.562	.032	.3148	.3125	.3753	.3747	.3115	.3106
B19-11	B20-11	5/16	3/8	1/2	.562	.032	.3148	.3125	.3753	.3747	.3115	.3106
B19-12	B20-12	3/8	15/32	1/4	.687	.046	.3773	.3750	.4691	.4684	.3740	.3731
B19-13	B20-13	3/8	15/32	3/8	.687	.046	.3773	.3750	.4691	.4684	.3740	.3731
B19-14	B20-14	3/8	15/32	1/2	.687	.046	.3773	.3750	.4691	.4684	.3740	.3731
B19-15	B20-15	3/8	15/32	3/4	.687	.046	.3773	.3750	.4691	.4684	.3740	.3731
B19-16	B20-16	7/16	17/32	1/2	.750	.046	.4406	.4379	.5316	.5309	.4365	.4355
B19-17	B20-17	1/2	19/32	3/8	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980
B19-18	B20-18	1/2	19/32	1/2	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980
B19-19	B20-19	1/2	19/32	3/4	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980
B19-20	B20-20	1/2	19/32	1	.875	.046	.5030	.5003	.5941	.5934	.4990	.4980

SPHERICAL BEARINGS

BORE SIZE	TYPE	MATERIAL
.1900 TO .6250	SELF LUBRICATING	440C R/C 55-62 BALL, 410 RC 23-25 HOUSING, RACE TEFLON FABRIC COATED PERM. BONDED (I.D.)

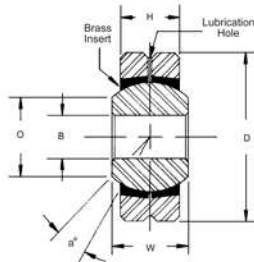


STAINLESS STEEL STOCK NUMBER	B +.0000 -.0005	D +.0000 -.0005	W +.000 -.002	H ±.005	O FLAT DIA. REF.	BALL DIA REF.	ap	RADIAL STATIC LOAD LIMIT Lbs.
RJS-3	.1900	.5625	.281	.218	.293	.406	10	3,975
RJS-4	.2500	.6562	.343	.250	.364	.500	10	6,040
RJS-5	.3125	.7500	.375	.281	.419	.562	10	8,750
RJS-6	.3750	.8125	.406	.312	.515	.656	9	10,540
RJS-7	.4375	.9062	.437	.343	.570	.718	8	13,200
RJS-8	.5000	1.0000	.500	.390	.641	.813	8	17,900
RJS-10	.6250	1.1875	.625	.500	.739	.968	8	30,500

- High radial and thrust load
- Long life cycle
- Temperature range
-65°F to + 250° F

Options Available:
Bore diameters under .1900
and other materials.

BORE SIZE	TYPE	MATERIAL
.1900 TO .6250	LUBRICATION REQUIRED	52100 STEEL R/C 56 MIN. HARD CHROME PLATED BALL, LOW CARBON STEEL HOUSING, RACE BRASS



CARBON STEEL STOCK NUMBER	B +.0000 -.0005	D +.0000 -.0005	W +.000 -.002	H ±.005	O FLAT DIA. REF.	BALL DIA REF.	ap	RADIAL STATIC LOAD LIMIT Lbs.
RJC-3	.1900	.6250	.281	.187	.293	.406	12.0	2,961
RJC-4	.2500	.7500	.375	.281	.354	.515	12.5	5,246
RJC-5	.3125	.8750	.437	.313	.447	.625	12.0	6,554
RJC-6**	-	1.0000	.500	.375	.517	.718	10.5	10,785
RJC-7	.4375	1.1875	.562	.437	.586	.812	8.5	11,100
RJC-8	.5000	1.3125	.687	.531	.637	.937	10.0	15,600
RJC-10	.6250	1.5625	.875	.687	.802	1.187	10.0	25,700

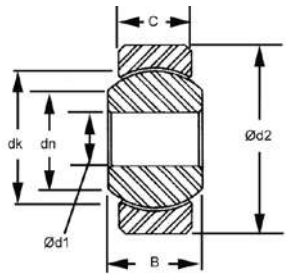
- High radial and thrust load
- Long life cycle
- Temperature range
-65°F to + 250° F

Options Available:
Bore diameters under .1900
and other materials.

** Bore diameter .3765/3745,
Housing material is low
carbon steel oil coated on
outside diameter, and race
material is low carbon steel.

THERMOPLASTIC SPHERICAL BEARINGS

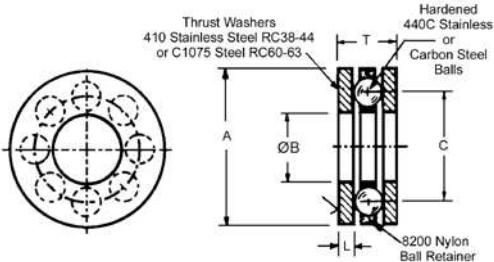
BORE SIZE	TYPE	MATERIAL
.1900 TO .7500	SELF LUBRICATING	REINFORCED THERMOPLASTIC HOUSING, BALL B15/16 BEARING THERMOPLASTIC



STOCK NUMBER	Ød1	Ød2	dn	dk REF	B	C
SKGLI-03	.1900	.5625	.307	.438	.312	.218
SKGLI-04	.2500	.6562	.354	.516	.375	.250
SKGLI-05	.3125	.7500	.447	.625	.437	.281
SKGLI-06	.3750	.8125	.504	.718	.500	.312
SKGLI-07	.4375	.9062	.600	.828	.562	.343
SKGLI-08	.5000	1.0000	.700	.938	.625	.390
SKGLI-10	.6250	1.1875	.838	1.125	.750	.500
SKGLI-12	.7500	1.4375	.978	1.312	.875	.593

THRUST BEARINGS

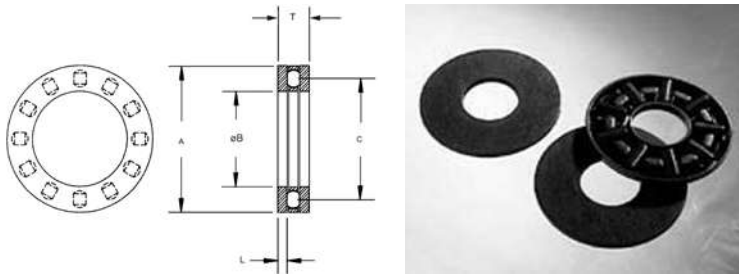
BORE SIZE	MATERIAL
.128 TO 1.253	410 STAINLESS STEEL OR C1075 CARBON STEEL



STAINLESS STEEL STOCK NUMBER	CARBON STEEL STOCK NUMBER	ØB +.005 -.000	A +.000 -.005	C	T	L ± .002	NO. OF BALLS	STAINLESS STEEL LOAD RATING AT 15 RPM	CARBON STEEL LOAD RATING AT 15 RPM
B5-1-SS	B5-1	.128	.434	9/32	.195	.050	6	63 LBS.	89 LBS.
B5-2-SS	B5-2	.190	.497	11/32	.195	.050	7	73 LBS.	104 LBS.
B5-3-SS	B5-3	.253	.559	13/32	.195	.050	8	83 LBS.	119 LBS.
B5-4-SS	B5-4	.315	.622	15/32	.195	.050	9	94 LBS.	134 LBS.
B5-5-SS	B5-5	.378	.809	19/32	.249	.062	6	104 LBS.	149 LBS.
B5-6-SS	B5-6	.503	.934	23/32	.249	.062	8	139 LBS.	198 LBS.
B5-7-SS	B5-7	.628	1.122	7/8	.342	.093	6	170 LBS.	243 LBS.
B5-8-SS	B5-8	.753	1.247	1"	.342	.093	8	255 LBS.	322 LBS.
B5-10-SS	B5-10	1.003	1.622	1-5/16	.437	.125	10	347 LBS.	496 LBS.
B5-12-SS	B5-12	1.253	1.872	1-9/16	.437	.125	14	486 LBS.	694 LBS.

ROLLER THRUST BEARINGS

BORE SIZE	MATERIAL
.252 TO 1.252	52100 CHROME STEEL ROLLERS CAGE 1008 CARBON STEEL, WASHERS 1074 STEEL



STOCK NUMBER	ØB +.000 -.010	A +.000 -.020	C	T	L +.000 -.003	DYNAMIC LOAD RATING (Lbs.)
BR5-1	.252	.677	.45	.142	.032	1,100
BR5-2	.377	.802	.58	.142	.032	1,300
BR5-3	.502	.927	.71	.142	.032	1,550
BR5-4	.627	1.115	.87	.268	.095	1,750
BR5-5	.752	1.240	.99	.268	.095	1,950
BR5-6	.877	1.427	1.14	.330	.126	2,480
BR5-7	1.002	1.552	1.27	.330	.126	2,700
BR5-8	1.252	1.927	1.58	.330	.126	3,850

REFERENCE & TECHNICAL DATA

Table of Contents

GEAR REFERENCE GUIDE	2-13	DRILL & TAP REFERENCE DATA	23
TABLE OF PITCH DIAMETERS		MECHANICAL PROPERTIES	24
6 TO 53 TEETH	14	MILITARY SPECIFICATIONS & MANUFACTURING	
54 TO 101 TEETH	15	TOLERANCES	25
102 TO 149 TEETH	16	MATERIAL SPECIFICATIONS	26
150 TO 197 TEETH	17		
GEAR WEAR & LUBRICATION	18		
GEAR MOUNTING	19		
BEARING TOLERANCES	20-21		
METRIC CONVERSIONS & QUALITY			
SPECIFICATIONS	22		

GEAR REFERENCE GUIDE

WM Berg manufactures several styles of gears. Each gear has and serves its own particular application. Listed below are brief descriptions and application notes for the variety of available styles. Further information can be obtained from numerous gear and mechanical design handbooks, or by contacting our engineering department.

Gear Types

Spur Gears are the most recognized style of gear. Spur gears are used exclusively to transmit rotary motion between parallel shafts, while maintaining uniform speed and torque. The involute tooth form, being the simplest to generate, permits high manufacturing tolerances to be attained.

Internal Gears, unlike spur gears, have teeth cut on the inside diameter (I.D.) of the gear blank. They are generally stronger and more efficient than the mating pinion gear. The pitch diameter (P.D.) of the internal gear must be at least 1.5 times the P.D. of the mating pinion. If this condition is not met, interferences between the tips of the teeth will occur. Internal gears provide the designer with the ability to achieve higher contact and drive ratios than standard spur gears at shorter center distances. They also enable a velocity change without a directional change. This would require an idler gear with standard spurs.

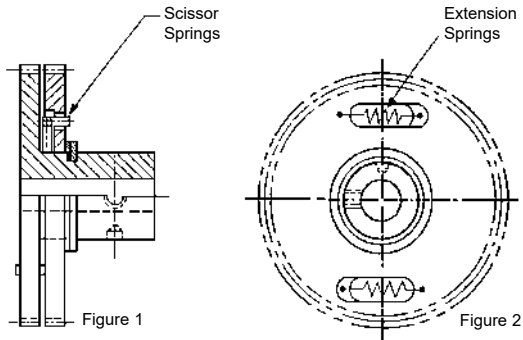
Helical Gears are similar to spur gears with the exception that the teeth are cut at an angle to the axis of the shaft (helix angle). The helix cut creates a wider contact area enabling higher strengths and torques to be achieved. Though helical gearsets operate quieter and smoother than spur gears, they are slightly less efficient. Helical gears can run on parallel shafts or may be offset as much as the helix angle will permit. Axial thrust loads are developed during operation and must be considered when selecting bearings and mounting arrangements.

Gear Racks are best described as spur gears of infinite pitch radius. They will translate rotary motion to linear motion (rack driven by pinion) and vice versa. Gear racks will mate pinions of the same pitch.

Anti-Backlash Gears are the most widely used and most inexpensive method of eliminating the inaccuracies encountered in low torque gear trains, where precise positioning is essential to an application.

The split gear design incorporates springs, which force the floating gear in a direction opposite the rotation of the fixed gear, effectively enlarging the tooth width and overcoming the space, or backlash, between the teeth of the gear with which it is meshed.

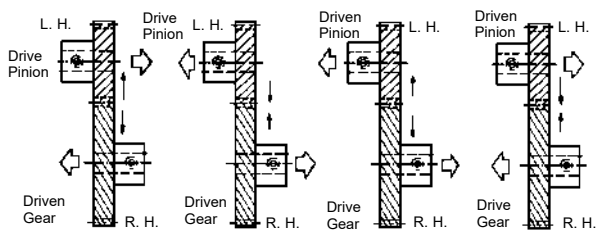
Two types of design are available, one utilizing scissor springs (Figure 1), and the second for larger diameter gears, utilizing extension springs (Figure 2). Anti-backlash gears are stocked in aluminum or stainless steel but can be supplied in other materials or to other configurations on request.



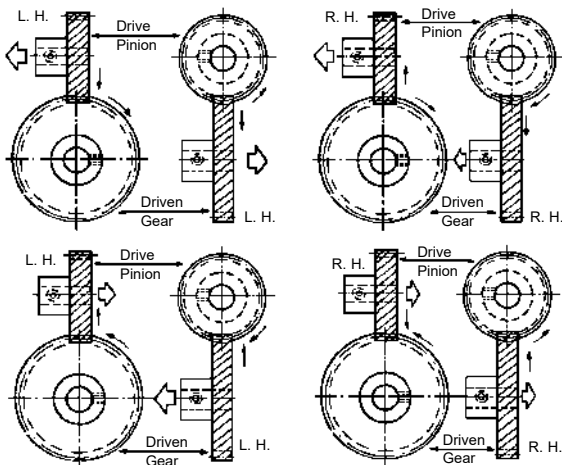
GEAR REFERENCE GUIDE

Helical Gears

Parallel Shafts



Right Angle Shafts



L. H. = Left Hand
R.H. = Right Hand
-> = Direction of Thrust

Special helical gears cut to order.

Bevel Gears are used exclusively to transmit rotary motion between intersecting shafts. Though commonly seen in right angle drives, bevel gears can be cut to drive any angle. A cross section of the gear tooth reveals a profile similar to a spur gear. However, as the tooth is generated, the cross section decreases the closer it gets to the center of the gear. Bevel gear sets will produce axial thrust loads which must be compensated for when selecting bearings and designing mounting fixtures. Bevel gears of 1:1 ratio are referred to as miter gears.

Worms & Worm Gears are the best choice of gearing when high drive reduction is required. Worm wheels resemble helical gears with the addition of a throat cut into the out diameter (O.D.) of the wheel. The throat permits the worm wheel to fully envelope the threads of the worm. Threads, not teeth, are cut on the worm. Adjusting the number of threads can achieve different ratios without altering mounting arrangements. A unique feature of worm and wheel assemblies is their ability to prohibit back driving. Certain pitches and leads of the worm will not permit the worm wheel to drive the worm. This is useful when an application requires the output to lock-up should the application operate in the opposite direction. The worm is self locking when the helix angle is less than 5° . The worm is back drivable when the helix angle is greater than 10° . Worm and worm wheel assemblies must be mounted on perpendicular, non-intersecting shafts.

GEAR REFERENCE GUIDE

While many gearing assemblies can be developed from our extensive inventory, our engineers have designed multiple styles of gearboxes that are “ready to install”. Refer to the catalog for styles and selection, then contact our sales department for availability and pricing.

TABLE 1: Gear Assembly Efficiencies

TYPE	EFFICIENCY RANGE %	RATIO RANGE	PITCH LINE VELOCITY (FEET/MIN)
SPUR	97 TO 99	1:1 TO 10:1	10,000
BEVEL	97 TO 99	1:1 TO 8:1	10,000
WORM	50 TO 90	5:1 TO 400:1	25,000
HELICAL	96 TO 98	1:1 TO 8:1	10,000

Special Bore
+ .0005
Tol. - .0000

Designator	Designator	Designator
.0781 = B	.1873 = H	.3748 = M
.0900 = V	.1875 = HH	.3750 = MM
.0937 = D	.2405 = J	.4998 = R
.1200 = E	.2498 = K	.5000 = RR
.1248 = F	.2500 = KK	.6248 = T
.1250 = FF	.3123 = L	.6250 = TT
.1562 = G	.3125 = LL	.6871 = W

Example:
Stock Number P48S28-120 (1/4" bore to be rebored to .3748)
Specify as follows: P48S28-120-M

Table 2 lists the standard metric motor shaft and bearing bore diameters that are most commonly used.
To modify US standard bore components to metric bores, select nearest standard to designed metric bore and modify bore. Modification charge will apply. **NOTE:** True metric components are also available; see metric catalog.

TABLE 2: Metric Motor Shaft & Bearing Bore Diameters

U.S. Standard Bore Diameters		Standard Metric System Bores		Recommended Rebore Dimensions & Tolerances
Fractional	Decimal	mm	Metric Tolerances	
1/8	.1248 + .0005	4	H7	.1573 + .0005
3/16	.1873 + .0005	5	H7	.1966 + .0005
3/16	.1873 + .0005	6	H7	.2360 + .0005
1/4	.2498 + .0005	7	H7	.2757 + .0006
1/4	.2498 + .0005	8	H7	.3148 + .0006
5/16	.3123 + .0005	9	H7	.3541 + .0006
3/8	.3748 + .0005	10	H7	.3935 + .0006
3/8	.3748 + .0005	12	H7	.4725 + .0007
1/2	.4998 + .0005	14	H7	.5510+ .0007
1/2	.4998 + .0005	15	H7	.5907+ .0007

Other basic Berg code designators
W = Worm Wheel
H = Helical Gears
M = Miter & Bevel Gears
R = Racks Spur
S = Shafting

AP = Anti-backlash Pin Hub
AC = Anti-backlash Clamp Hub
PH = Pin Hub
CH = Clamp Hub
CG = Clamps - Gears

NOTE: Most gears as specified by the Berg numbering system are stock. Any others, not listed in our catalogs, are considered specials and are gears cut to order using basic stock blanks.

All prices and quantity discounts are available on request. No exchanges or returns are expected on special non-stock parts as all such parts are made to your particular specification and have no resale value.

GEAR REFERENCE GUIDE

Gear Tooth Strength

Many factors must be considered when designing a gear train. The information listed on this page should be used as a general guideline for your application. We recommend consulting our engineering department if more critical strength calculation is required.

When a gear train is transmitting motion, it is safe to assume that all of the load is being carried by one tooth. This is because as the load approaches the end of the tooth, where the bending force would be the greatest, a second tooth comes into mesh to share the load. Simple results can be obtained from the Lewis bending strength equation.

$$W_t = \frac{SFY}{D.P.}$$

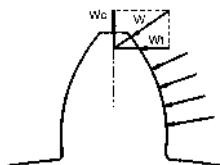
W_t = Maximum transmitted load (lbs)

S = Maximum bending tooth stress (taken as 1/3 of the tensile strength), see Mechanical Properties table

F = Face width of gear (in.)

D.P. = Diametral Pitch = 1/module (for equation only)

Y = Lewis Factor



NOTE: The maximum bending tooth stress (S) is valid for well lubricated, low shock applications. For high shock, poorly lubricated applications, the safe stress could be as low as .025 S . If your design calls for an unfriendly environment for gears, you might want to lower S to assure a reasonable amount of gear life.

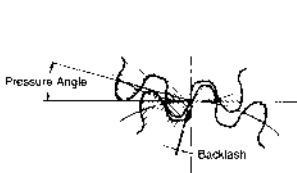
LEWIS FACTOR, Y	NO OF TEETH	14 1/2° INVOLUTE	20° INVOLUTE
	10	0.175	0.201
	11	0.192	0.225
	12	0.210	0.245
	13	0.223	0.264
	14	0.236	0.276
	15	0.245	0.289
	16	0.255	0.295
	17	0.264	0.302
	18	0.270	0.308
	19	0.277	0.314
	20	0.283	0.320
	22	0.290	0.330
	24	0.302	0.337
	26	0.308	0.344
	28	0.314	0.352
	30	0.318	0.358
	32	0.322	0.364
	34	0.325	0.370
	36	0.329	0.377
	38	0.332	0.383
	40	0.336	0.388
	45	0.340	0.399
	50	0.345	0.408
	55	0.352	0.415
	60	0.355	0.421
	65	0.358	0.425
	70	0.360	0.429
	75	0.361	0.433
	80	0.363	0.436
	90	0.365	0.442
	100	0.368	0.446
	150	0.375	0.458
	200	0.378	0.463
	300	0.382	0.471
	RACK	0.390	0.484

GEAR REFERENCE GUIDE

TABLE 3: Gear Tooth Proportions

DIAMETRAL PITCH	CIRCULAR PITCH	CIRCULAR THICKNESS	ADDENDUM	DEDENDUM	WORKING DEPTH	WHOLE DEPTH
12	.26180	.13090	.0833	.1020	.1667	.1853
16	.19635	.09818	.0625	.0770	.1250	.1385
20	.15708	.07854	.0500	.0620	.1000	.1120
24	.13090	.06545	.0417	.0520	.0833	.0937
1/10	.10000	.05000	.0318	.0402	.0637	.0720
32	.09817	.04909	.0313	.0395	.0625	.0708
48	.06545	.03272	.0208	.0270	.0417	.0487
1/20	.05000	.02500	.0159	.0211	.0318	.0370
64	.04909	.02454	.0156	.0208	.0313	.0364
72	.04363	.02182	.0139	.0187	.0278	.0352
80	.03927	.01963	.0125	.0170	.0250	.0295
96	.03272	.01636	.0104	.0145	.0208	.0249
100	.03142	.01571	.0100	.0140	.0200	.0240
120	.02618	.01309	.0083	.0120	.0167	.0203
200	.01571	.00785	.0050	.0080	.0100	.0130

Gear Terms & Abbreviations



Base Diameter - (B.D.) The diameter of the circle from which the involute is generated.

Backlash - Is the amount by which the width of a tooth space exceeds the thickness of the engaging tooth of a mating gear, when both gears are at nominal center distances.

Center Distance - (C.D.) Distance between the centers of mating gears.

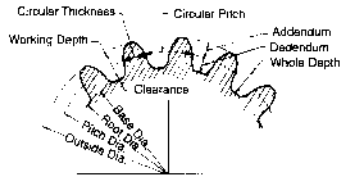
Circular Pitch - (C.P.) The distance, along the Pitch Circle, between corresponding points of adjacent teeth.

Circular Thickness - Thickness of tooth on pitch circle.

Diametral Pitch - (D.P.) Number of teeth in a gear having one inch pitch diameter. Ex.: A gear having 48 teeth and a 1" pitch diameter is a 48 diametral pitch.

Number of Teeth - (N)

Outside Diameter - (O.D.) Diameter measuring on tops of teeth.



Pressure Angle - (P.A.) The angle between a line tangent to the pitch circle and a line perpendicular to the tooth profile at the point of contact.

Pitch Diameter - (P.D.) Diameter of the pitch circle.

Pitch Circle - An imaginary circle, whose diameter is equal to the number of teeth divided by diametral pitch.

Testing Diameter - (T.D.) A diameter, established by inspection with a master gear of known size. It is equal to twice the difference between the tight mesh center distance, and the sum of the master gear testing diameter, divided by 2.

$$T.D. = 2 \times \left(\frac{\text{Tight Mesh Center Distance}}{2} - \frac{T.D. \text{ Master Gear}}{2} \right)$$

Module - (M) A measurement of gear tooth size obtained by dividing the pitch diameter, in mm, by the number of teeth.

GEAR REFERENCE GUIDE

TABLE 4: Rules & Formulas for Standard Full Depth Spur Gears

TO GET	HAVING	RULE	FORMULA
The diametral pitch	THE CIRCULAR PITCH	DIVIDE 3.1416 BY THE CIRCULAR PITCH	$DP = \frac{3.1416}{CP}$
The diametral pitch	THE PITCH DIAMETER AND THE NUMBER OF TEETH	DIVIDE NUMBER OF TEETH BY PITCH DIAMETER	$DP = \frac{N}{PD}$
The diametral pitch	THE OUTSIDE DIAMETER AND THE NUMBER OF TEETH	DIVIDE NUMBER OF TEETH PLUS 2 BY THE OUTSIDE DIAMETER	$DP = \frac{N + 2}{OD}$
Pitch Diameter	THE NUMBER OF TEETH AND THE DIAMETRAL PITCH	DIVIDE THE NUMBER OF TEETH BY THE DIAMETRAL PITCH	$PD = \frac{N}{DP}$
Pitch Diameter	THE OUTSIDE DIAMETER AND THE DIAMETRAL PITCH	SUBTRACT FROM THE OUTSIDE DIAMETER THE QUOTIENT OF 2 DIVIDED BY THE DIAMETRAL PITCH	$PD = OD - \frac{2}{DP}$
Outside Diameter	THE NUMBER OF TEETH AND THE DIAMETRAL PITCH	DIVIDE NUMBER OF TEETH PLUS 2 BY THE DIAMETRAL PITCH	$OD = \frac{N + 2}{DP}$
Outside Diameter	THE PITCH DIAMETER AND THE NUMBER OF TEETH	DIVIDE THE NUMBER OF TEETH PLUS 2 BY THE QUOTIENT OF NUMBER OF TEETH DIVIDED BY THE PITCH DIAMETER	$OD = \frac{N + 2}{\frac{N}{PD}}$
Number of teeth	THE PITCH DIAMETER AND THE DIAMETRAL PITCH	MULTIPLY PITCH DIAMETER BY THE DIAMETRAL PITCH	$N = PD \times DP$
Thickness of tooth	THE DIAMETRAL PITCH	DIVIDE 1.5708 BY THE DIAMETRAL PITCH	$T = \frac{1.5708}{DP}$
Addendum	THE DIAMETRAL PITCH	DIVIDE 1 BY THE DIAMETRAL PITCH	$ADD. = \frac{1}{DP}$
Addendum	THE PITCH DIAMETER AND THE NUMBER OF TEETH	DIVIDE THE PITCH DIAMETER BY THE NUMBER OF TEETH	$ADD. = \frac{PD}{N}$
Working depth	THE DIAMETRAL PITCH	DIVIDE 2 BY THE DIAMETRAL PITCH	$WDE = \frac{2}{DP}$
Whole depth	THE DIAMETRAL PITCH	DIVIDE 2 BY THE DIAMETRAL PITCH AND ADD .002	$WD = \frac{2.2}{DP} + .002$
Clearance	THE DIAMETRAL PITCH	DIVIDE .2 BY THE DIAMETRAL PITCH AND ADD .002	$C = \frac{2}{DP} + .002$
Standard center distance	NUMBERS OF TEETH IN MATING GEARS & DIAMETRAL PITCH	ADD THE NUMBERS OF TEETH IN THE MATING GEARS & DIVIDE BY 2 TIMES THE DIAMETRAL PITCH	$\frac{N1 + N2}{2 \times DP}$
Backlash	PRESSURE ANGLE, STANDARD CENTER DISTANCE, & MEASURED CENTER DISTANCE	MULTIPLY 2 TIMES THE TANGENT OF THE PRESSURE ANGLE TIMES THE DIFFERENCE BETWEEN THE STANDARD & THE MEASURED CENTER DISTANCES	$B = 2 (\tan PA) \times \text{Diff.}$

GEAR REFERENCE GUIDE

Explanation of Class “C” Backlash

The American Gear Manufacturers Association (AGMA) publishes gear standards which are recognized and accepted throughout the country. However, many designers tend to use tolerances much tighter than necessary to “play safe” in obtaining final backlash tolerance.

This practice can be costly and is not very realistic. There is not always a benefit in paying for AGMA quality 12 or 14 gears if quality 10 will do the job just as well. Of course, there are applications where the output backlash tolerances will require the use of more precise gears but their use and added cost will be justified.

You will notice that none of the gears in our catalog show a pitch diameter tolerance. The pitch diameter is theoretical, and therefore, should not be tolerated. Tolerancing of pitch diameter will usually cause binding between mating gears at one or more points which results in excessive gear tooth wear, improper lubrication, shaft distortion and bearing overload, shortening the unit's life and drastically reducing accuracy.

Typically, a letter — A, B, C or D — is used to define the amount of tooth thinning to assure minimum backlash at standard center distance. This letter designation, along with the AGMA quality number and diametral pitch, are used in the “center distance inspection” of a gear. There is no possibility of interference between mating gears at standard distance with this evaluation method. However, the center distance tolerance will increase or decrease backlash values depending on whether they are plus or minus. Our gears are all cut to class “C” backlash in AGMA 10 quality and 20° pressure angles.

Standard AGMA Center Distance Inspection Procedure

The following shows the excursion of an indicating device when checking the total composite error and size of a gear on a variable center distance fixture, with a master of known accuracy.

It is recommended that the tolerances for tooth thickness shown in Table 5 be used in conjunction with pin measurements in order to obtain closer correlation with a size determination made by means of a master gear.

Column 1 gives the quality class. Column 2 gives the diametral pitch range for backlash values shown in column 8. Column 3 gives the backlash values for two gears of equal tooth thickness derived from column 8. Column 4 shows the total composite error for each of the classes shown in column 1.

Column 5 shows the minimum reduction in standard tooth thickness. This value is obtained by adding one half of the minimum value of column 2 (which gives the tooth thickness reduction per gear) to one half of the total composite error converted from a radial displacement to an equivalent tooth thickness. This is accomplished by multiplying the radial displacement to an equivalent tooth thickness. This is accomplished by multiplying the radial displacement by $2 \tan \alpha$ of operating pressure angle.

Column 6 gives the maximum deduction in standard tooth thickness obtained in a similar manner.

Column 7 gives the maximum indicator reading which is obtained by converting the values in column 5 to radial displacements and subtracting from them one half of the total composite error shown in column 4.

Column 8 gives the minimum indicator reading. This is obtained by converting the values in column 6 to radial displacements and adding one half of the total composite error.

The values in columns 5 and 6 are taken through the middle of the total composite error and are therefore in closer agreement with a determination of tooth thickness made by means of pins which ignore tooth to tooth error and runout.

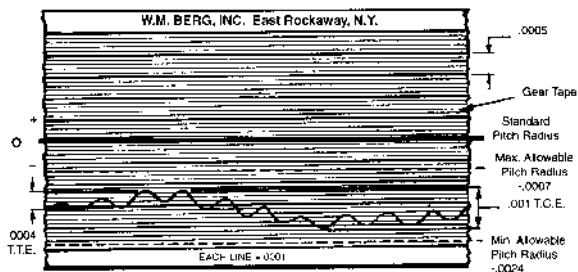
This procedure, along with the accompanying tables, is the method used to check all Berg precision gears. We have found this method, which takes into consideration most problems commonly encountered in gear train design (such as bind, backlash, center distance tolerance, runout, composite error, etc.) to be the one which gives the most realistic results. Of course, it does not take into account the fit of gears, shafts and bearings; these problems are dealt with later on in this section under “recommended practices”. All setups on gear checking fixtures are set up with “certified” master gears, and class “xx” accuracy carbide measuring wires are used.

TABLE 5: Tooth Thickness Tolerances for Class “C” Backlash Gears with 20° Pressure Angles

AGMA QUALITY CLASS	DIAMETRAL PITCH	BACKLASH IN MATING GEARS	TOTAL COMPOSITE ERROR	MINIMUM REDUCTION IN STD. TOOTH THICKNESS (Δt Min.)	MAXIMUM REDUCTION IN STD. TOOTH THICKNESS (Δt Max.)	INDICATOR LIMITS (GAGE ZEROED AT STANDARD PITCH RADIUS ALL VALUES MINUS)	
						MINIMUM	MAXIMUM
QUALITY 10 QUALITY 12 QUALITY 14	16 TO 48	.001-.002	PER AGMA STANDARD 2000-A88	.0009 .0007 .0006	.0014 .0012 .0011	.0007	.0024 .0019 .0017
QUALITY 10 QUALITY 12 QUALITY 14	1/20 TO 120	.0008-.0015		.0007 .0005 .0004	.0011 .0009 .0008	.0005	.0020 .0015 .0013

GEAR REFERENCE GUIDE

Typical Inspection Tape for a 48 D.P., 20° P.A. Quality 10C Gear



Recommended Practices

When specifying materials, it's recommended to have stainless steel pinions and aluminum mating gears. This is because pinions typically rotate through more cycles, thus experiencing greater tooth wear. Meshing stainless steel pinion with an aluminum gear tends to minimize this wear. The face widths of pinions are usually wider than face widths of mating gears to ensure full face contact without critical adjustment.

Where minimum backlash is a factor, it is important that fits between the bore of gears, inside diameter of bearings and the outside diameter of shafting be held as close as possible. The accuracy of precision gears is lost unless these fits are held closely. This means that a form of selective fitting must be used because it is too costly, if not impossible, to hold tolerances that will allow perfect fit assembly. The extent of this selective fitting is determined by the accuracy requirements of the finished assembly.

Factors That Control Backlash

- Precision class of gears
- Center distance tolerance
- Type of fit between gears, shafts & bearings
- Precision accuracy of bearings
- Straightness & adequate support of shafts

It is important when drilling gears to shafts that the shafts be properly supported. Failure to do so can result in bending shafts with the resultant runout conditions.

NOTE: Gears with 14 1/2° pressure angle will not mesh properly with gears of 20° pressure angle.

It is imperative that the gears are not damaged in handling. Our gears are packaged to avoid handling damage. If they can be left in this package until used the danger should be minimized. If they are removed they should be put on tote boards and covered to prevent gears from contacting each other, and to keep them clean.

Gear Train Design

Determining appropriate backlash is a key challenge of designing fine pitch gear trains. Backlash in mating gears or in a gear train can be broken down into three basic factors:

- The AGMA quality of gears, i.e. quality 10, 12, or 14 (former precision standards 1, 2, or 3)
- The letter which designates backlash, i.e. "C"
- The center distance & tolerance on which these gears operate

NOTE: Berg precision stock gears are manufactured to AGMA quality 10C, unless otherwise specified.

The accepted definition of backlash is "the amount by which the width of a tooth space exceeds the tooth thickness of the engaging tooth on the pitch circles." At first glance this meaning might lead us to think that backlash is a function of the gear cutting operation only. However, the teeth of a gear contribute very little to its overall backlash value.

A complete understanding of all the elements that induce backlash is mandatory in order to properly and economically design a gear train. The following factors must be individually considered for their own parameter:

- Standard center distance
- Center distance tolerance
- Size & tolerance of mating gears
- Total composite error of gears
- Fits between bores, shafts & bearings
- Bearing accuracy
- Radial play of bearing
- Shaft straightness & alignment
- Fits between electrical &/or mechanical component pilot diameters & housing bores
- Eccentricity & radial play of electrical &/or mechanical component shafts

Each factor, except standard center distance, tends to induce a "change in the center distance" which will push together or pull apart mating gears. Consequently, this push pull action produces two backlash values, minimum at the point of tightest mesh and maximum at the point of loosest mesh.

GEAR REFERENCE GUIDE

Standard Center Distance

Standard center distance can be considered the starting point in the calculation of overall backlash values. Standard (theoretical) center distance is calculated by taking one-half (1/2) the sum of the (theoretical) pitch diameters of mating gears.

$$\text{Example: C.D.} = \frac{\text{P.D.}^1 + \text{P.D.}^2}{2}$$

Two gears having theoretical P.D.s of one inch (1") and two inches (2") respectively have a standard center distance of:

$$\text{C.D.} = \frac{1" + 2"}{2} = 1,500 \text{ C.D.}$$

Center Distance Tolerance

The problem of center distance and its tolerance is usually an extremely important area for consideration. It is important to remember that the minimum and maximum backlash values between mating gears, as outlined in the previous tables, are based on "standard" center distance mountings. Thus, if the center distance is in excess of the standard value, backlash will be increased. By the same token, if the C.D. is less than standard, backlash will be decreased. However, caution must be exercised to avoid interference between mating gears as a result of this decrease.

TABLE 6: Relationship of Change in C.D. to Backlash

ΔC (DIFFERENCE BETWEEN STANDARD AND ACTUAL CENTER DISTANCE)	B (BACKLASH IN INCHES)
.0001	.00007
.0002	.00014
.0003	.00022
.0004	.00029
.0005	.00036
.0006	.00044
.0007	.00051
.0008	.00058
.0009	.00066
.0010	.00073
.0011	.00080
.0012	.00087
.0013	.00095
.0014	.00102
.0015	.00109
.0016	.00116
.0017	.00124
.0018	.00131
.0019	.00138
.0020	.00146

The relationship of "change in center distance," which can be positive or negative depending upon C.D. tolerance, to backlash is expressed by the formula:

$$B = 2 \tan \phi \times \Delta C \quad (1)$$

In which:

B = backlash in inches

ϕ = pressure angle

ΔC = difference between standard (theoretical) and actual center distance (ex. $\tan 20^\circ = .36397$)

1. Standard centers + .001 tolerance

$$B = 2 \tan 20^\circ \times \Delta C$$

$$B = .72794 \times .001 = + .00073 \text{ backlash}$$

2. Standard centers - .0005 tolerance

$$B = 2 \tan 20^\circ \times \Delta C$$

$$B = .72794 \times .0005 = - .00036 \text{ backlash}$$

Backlash calculations can be divided into two categories:

- Systems where backlash is not critical
- Systems where backlash is critical & exact totals must be known

Section 1: Backlash Calculations for Non-Critical Gear Trains

Let us set up two test problems falling into the non-critical category. These two problems will deal with center distance tolerance, size and tolerance of mating gears, and total composite error of gears as they collectively contribute the greatest amount of change in center distance.

1. Two mating gears, 96 D.P. -20° P.A. having standard centers with A + .001 -.000 tolerance.

Step A: Referring to Berg quality 10 gears yield a maximum of .0015 backlash at standard centers.

Step B: With an actual center distance .001 greater than standard, an additional .0073 backlash is introduced (see Table 6).

Step C: The total probable maximum backlash would be .0015 + .00073 = .00223

2. Again two mating gears, 96 D.P. -20° P.A. must have no more than .0015 backlash measured at the loosest point of mesh (see Table 5).

Step A: Referring to Berg quality 10C gears yield a maximum of .0015 backlash at standard centers.

Step B: Actual center distance .0005 greater than standard yields an additional .00036 backlash.

Step C: The total probable backlash would be .0015 + .00036 = .00186 or .00036 above limit.

One solution would be to use quality 12C gears with the same center distance and tolerance. Again we find that the maximum backlash for quality 12C gears is .00109 and the center distance tolerance results in an additional .00036 for a total of .00145 or .00005 below limit.

GEAR REFERENCE GUIDE

Another means of overcoming this problem would be to incorporate anti-backlash or spring loaded gears. When this type of gear is used, center distance tolerance can be increased thereby reducing the cost of machining the housing. The increase in center distance when using anti-backlash gears should not exceed oz./D.P.

Before deciding on either of these two possibilities, let us see what can be done using quality 10C gears.

Referring to the minimum backlash value we have .0008. This indicates that there is a minimum of .0011 clearance (see Table 6). Now, because the center distance was dimensioned $+.0000/-0.0005$ minimum backlash would be reduced to .00036/.00044 and the maximum could still be .00109 or .0045 below the limit, using Berg gears.

Section 2: Backlash Critical Gear Trains

If the previous section does not pinpoint the amount for backlash that your system will possess accurately enough for you then there are many steps that can be employed during the manufacturing process that can limit the amount of backlash in a gear train. These include cutting gears to class "D" or "E" backlash, and/or AGMA quality 12 or 14.

If backlash is critical and Berg anti-backlash gears will not suffice, consult our engineering department for how these changes will influence backlash.

Fine Pitch Gear Inspection Procedure

There has been much discussion and confusion regarding the center distance method of testing fine pitch gears. The Berg center distance method of testing uses the limits and tolerances as outlined in AGMA standards.

Figures 3 and 4 are schematic diagrams showing the basic requirements for making a center distance check. The diagrams are not to be interpreted as a recommended or suggested means of construction.

In order to make this check, the following items are required:

- Rolling Fixture
 - This fixture must incorporate provisions for accurately mounting both the master and the gear to be tested.
 - A means of accurately adjusting the weights to the correct testing pressure.
- Master Gear
 - With a maximum total composite error of .0001 and a standard pitch diameter of $\pm .0001$ tolerance over wires.
- Hardened or ground pins or carbide lapped pins (preferred) for mounting both the master and gear to be inspected.

Let's assume that we wish to inspect a gear having the following characteristics:

64	Diametral pitch
20°	Pressure angle
.2500	$+.0000/-0.0002$ bore
80	Teeth
1.2500	Theoretical pitch diameter
AGMA quality 12C	

First, select the proper master gear and correct size carbide gage pin to fit this master. Since the masters we use have a $.5000'' + .0001/-0.0000$ bore, we use a lapped pin of .4995 diameter to assure free movement without wobble.

We follow the same procedure in selecting a pin on which to mount the gear to be inspected. In this case, the lapped pin diameter would be .24975. The studs or pins are then mounted on the rolling fixture and caution is used to assure parallelism between the studs after mounting.

Next, set the rolling fixture to the proper testing pressure which in the case of 64 C.P. is 12 ounces, per gear standards. The testing pressure is an important factor in the rolling check to assure uniform pressure and correct mesh during the entire test.

The rolling fixture must now be set to the proper center distance by the uses of "jo-blocks". The master gear we are using has a pitch diameter of 1.5000 and the gear to be inspected has a theoretical pitch diameter of 1.2500. These two pitch diameters are added together and divided by two. This gives us a figure of 1.375. Then, add together and divide by two the pin diameters on which the master gear and the test gear (.49995 + .24975 respectively) are mounted. This gives us a figure of .3749. The figure is subtracted from the 1.375 figure to arrive at our "jo-block" setting of 1.001".

While holding the "jo-blocks" between the two studs or pins on the rolling fixture, the dial indicator is set to zero. This setting is the nominal or set up center distance and is made under the "testing pressure". All gears being tested must read to the minus side of the indicator otherwise interference between mating gears, with a standard distance, may result at assembly.

Because the gear to be tested is 64 diametral pitch AGMA quality 12C, we refer to our data section to obtain the dial indicators limits.

We find in column 7 that the maximum limit is $-.0005$ and in column 8 the minimum is $-.0015$. Please note that all figures given are minus values. These limits can never be exceeded or the gears will not be in tolerance.

GEAR REFERENCE GUIDE

Figure 4 shows these limits as seen on a dial indicator as well as how they would be recorded on a paper chart. For the sake of clarity, however, we have not drawn the .0001" graduation lines across the chart.

It must be remembered that although our dial limits have a range of from -.0005 to -.0015, the total composite error of an AGMA 12C gear is .0005 as shown in column 4. This means that our dial fluctuation cannot exceed .0005 within the -.0005 to -.0015 dial limit range. Should the pointer movement not exceed the .0005 maximum total composite error, the gear would be an AGMA quality 10C. This is true even though the gear is within the dial limits on a quality 12C.

Figure 3 shows the limits for AGMA quality 10C gear. The same procedure as used to test for 12C is followed. It must be remembered that the dial indicator limits and the total composite error are greater (refer to previous page for limits).

Measuring & Checking Forces

When making measurement-over-wire measurements or when checking the gears on a variable-center-distance device, the amount of force applied to the measuring wires or applied to maintain intimate contact between the gear to be checked and the master gear shall be as listed in the table below.

Inch	
Diametral Pitch	Checking Force Oz.
16	30 To 34
20	26 To 30
24	26 To 30
1/10	22 To 26
32	22 To 26
48	18 To 22
1/20	10 To 14
64	10 To 14
72	10 To 14
80	8 To 10
96	7 To 9
100	3 To 5
120	3 To 5
200	2 To 4

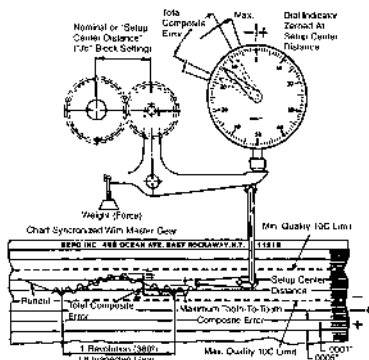


Figure 3 - AGMA Quality 10C Chart

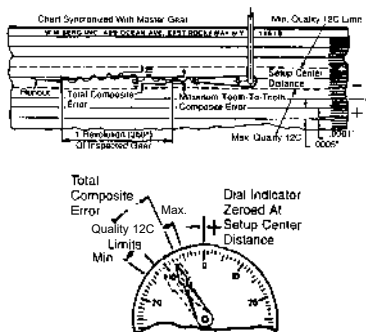
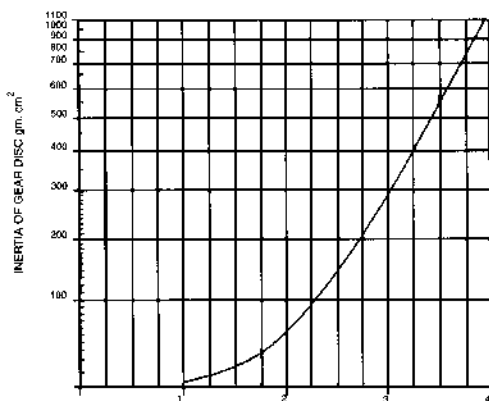


Figure 4 - AGMA Quality 12C Chart

GEAR REFERENCE GUIDE

Inertia of Gears

To obtain the inertia of 1/8 face width aluminum gears, read directly from the graph.



Diameter of Gear Discs

To obtain the inertia of gears with other face and/or made of stainless steel, read from the graph at the given diameter then multiply by the appropriate factor.

TABLE 7: Gear Discs in Inches

FACE WIDTH	1/16	3/32	1/4	3/16	1/4	3/8	1/2
FACTOR	5	.75	.83	1.5	2.0	3.0	4.0

MATERIAL	ALUMINUM	ST. STEEL
FACTOR	1	2.82

Example: 2" diameter - 1/4" face stainless steel gear
 from graph 2" diameter is 56 gm cm²
 $56 \times 2.0 \times 2.82 = 318 \text{ gm cm}^2$

TABLE 8: Inertia of Gear Clamps

CLAMP STK. NO.	INERTIA gm cm ²	CLAMP STK. NO.	INERTIA gm cm ²	CLAMP STK. NO.	INERTIA gm cm ²
CG1-4	1.91	CG1-18	61.55	CG2-5	4.95
CG1-5	2.30	CG1-19	61.55	CG2-6	4.95
CG1-8	8.86	CG1-20	0.28	CG3-1	2.01
CG1-9	11.84	CG1-21	1.50	CG3-2	2.01
CG1-11	8.86	CG2-1	2.00	CG3-3	4.01
CG1-12	11.84	CG2-2	2.00	CG3-4	4.01
CG1-14	32.35	CG2-3	2.91	CG3-5	4.97
CG1-15	61.55	CG2-4	2.91	CG3-6	4.97
CG1-17	32.35	-----	-----	CG4-1	0.18

TABLE OF PITCH DIAMETERS

TABLE 9: Pitch Diameters 6 to 53 Teeth

To find outside diameter add 2 teeth.

Theoretical P.D.s only. All gears cut to AGMA standards.

N = Number of teeth

NOTE: Applies to spur and bevel gears only (not to helical gears).

N	DIAMETRAL PITCH													N
	16	20	24	1/10	32	48	1/20	64	72	80	96	100	120	
6	.3750	.3000	.2500	.1909	.1875	.1250	.0954	.0937	.0833	.0750	.0625	.0600	.0500	6
7	.4375	.3500	.2916	.2228	.2187	.1458	.1114	.1093	.0972	.0875	.0729	.0700	.0583	7
8	.5000	.4000	.3333	.2546	.2500	.1666	.1273	.1250	.1111	.1000	.0833	.0800	.0666	8
9	.5625	.4500	.3750	.2864	.2812	.1875	.1432	.1406	.1250	.1125	.0937	.0900	.0750	9
10	.6250	.5000	.4166	.3183	.3125	.2083	.1591	.1562	.1388	.1250	.1041	.1000	.0833	10
11	.6875	.5500	.4583	.3501	.3437	.2291	.1750	.1718	.1527	.1375	.1145	.1100	.0916	11
12	.7500	.6000	.5000	.3819	.3750	.2500	.1909	.1875	.1666	.1500	.1250	.1200	.1000	12
13	.8125	.6500	.5416	.4138	.4062	.2708	.2069	.2031	.1805	.1625	.1354	.1300	.1083	13
14	.8750	.7000	.5833	.4456	.4375	.2916	.2228	.2187	.1944	.1750	.1458	.1400	.1166	14
15	.9375	.7500	.6250	.4774	.4687	.3125	.2387	.2343	.2083	.1875	.1562	.1500	.1250	15
16	1.0000	.8000	.6666	.5092	.5000	.3333	.2546	.2500	.2222	.2000	.1666	.1600	.1333	16
17	1.0625	.8500	.7083	.5411	.5312	.3541	.2705	.2656	.2361	.2125	.1770	.1700	.1416	17
18	1.1250	.9000	.7500	.5729	.5625	.3750	.2864	.2812	.2500	.2250	.1875	.1800	.1500	18
19	1.1875	.9500	.7916	.6047	.5937	.3958	.3023	.2968	.2638	.2375	.1979	.1900	.1583	19
20	1.2500	1.0000	.8333	.6366	.6250	.4166	.3183	.3125	.2777	.2500	.2083	.2000	.1666	20
21	1.3125	1.0500	.8750	.6684	.6562	.4375	.3342	.3281	.2916	.2625	.2187	.2100	.1750	21
22	1.3750	1.1000	.9166	.7002	.6875	.4583	.3501	.3437	.3055	.2750	.2291	.2200	.1833	22
23	1.4375	1.1500	.9583	.7321	.7187	.4791	.3660	.3593	.3194	.2875	.2395	.2300	.1916	23
24	1.5000	1.2000	1.0000	.7639	.7500	.5000	.3819	.3750	.3333	.3000	.2500	.2400	.2000	24
25	1.5625	1.2500	1.0416	.7957	.7812	.5208	.3978	.3906	.3472	.3125	.2604	.2500	.2083	25
26	1.6250	1.3000	1.0833	.8276	.8125	.5416	.4138	.4062	.3611	.3250	.2708	.2600	.2166	26
27	1.6875	1.3500	1.1250	.8594	.8437	.5625	.4297	.4218	.3750	.3375	.2812	.2700	.2250	27
28	1.7500	1.4000	1.1666	.8912	.8750	.5833	.4456	.4375	.3888	.3500	.2916	.2800	.2333	28
29	1.8125	1.4500	1.2083	.9230	.9062	.6041	.4615	.4531	.4027	.3625	.3020	.2900	.2416	29
30	1.8750	1.5000	1.2500	.9549	.9375	.6250	.4774	.4687	.4166	.3750	.3125	.3000	.2500	30
31	1.9375	1.5500	1.2916	.9867	.9687	.6458	.4933	.4843	.4305	.3875	.3229	.3100	.2583	31
32	2.0000	1.6000	1.3333	1.0185	1.0000	.6666	.5092	.5000	.4444	.4000	.3333	.3200	.2666	32
33	2.0625	1.6500	1.3750	1.0504	1.0312	.6875	.5252	.5156	.4583	.4125	.3437	.3300	.2750	33
34	2.1250	1.7000	1.4166	1.0822	1.0625	.7083	.5411	.5312	.4722	.4250	.3541	.3400	.2833	34
35	2.1875	1.7500	1.4583	1.1140	1.0937	.7291	.5570	.5468	.4861	.4375	.3654	.3500	.2916	35
36	2.2500	1.8000	1.5000	1.1459	1.1250	.7500	.5729	.5625	.5000	.4500	.3750	.3600	.3000	36
37	2.3125	1.8500	1.5416	1.1777	1.1562	.7708	.5888	.5781	.5138	.4625	.3854	.3700	.3083	37
38	2.3750	1.9000	1.5833	1.2095	1.1875	.7916	.6047	.5937	.5277	.4750	.3958	.3800	.3166	38
39	2.4375	1.9500	1.6250	1.2414	1.2187	.8125	.6207	.6093	.5416	.4875	.4062	.3900	.3250	39
40	2.5000	2.0000	1.6666	1.2732	1.2500	.8333	.6366	.6250	.5555	.5000	.4166	.4000	.3333	40
41	2.5625	2.0500	1.7083	1.3050	1.2812	.8541	.6525	.6406	.5694	.5125	.4270	.4100	.3416	41
42	2.6250	2.1000	1.7500	1.3369	1.3125	.8750	.6684	.6562	.5833	.5250	.4375	.4200	.3500	42
43	2.6875	2.1500	1.7916	1.3687	1.3437	.8958	.6843	.6718	.5972	.5375	.4479	.4300	.3583	43
44	2.7500	2.2000	1.8333	1.4005	1.3750	.9166	.7002	.6875	.6111	.5500	.4583	.4400	.3666	44
45	2.8125	2.2500	1.8750	1.4323	1.4062	.9375	.7161	.7031	.6250	.5625	.4687	.4500	.3750	45
46	2.8750	2.3000	1.9166	1.4642	1.4375	.9583	.7321	.7187	.6388	.5750	.4791	.4600	.3833	46
47	2.9375	2.3500	1.9583	1.4960	1.4687	.9791	.7480	.7343	.6527	.5875	.4895	.4700	.3916	47
48	3.0000	2.4000	2.0000	1.5278	1.5000	1.0000	.7639	.7500	.6666	.6000	.5000	.4800	.4000	48
49	3.0625	2.4500	2.0416	1.5597	1.5312	1.0208	.7798	.7656	.6805	.6125	.5104	.4900	.4083	49
50	3.1250	2.5000	2.0833	1.5915	1.5625	1.0416	.7957	.7812	.6944	.6250	.5208	.5000	.4166	50
51	3.1875	2.5500	2.1250	1.6233	1.5937	1.0625	.8116	.7968	.7083	.6375	.5312	.5100	.4250	51
52	3.2500	2.6000	2.1666	1.6552	1.6250	1.0833	.8276	.8125	.7222	.6500	.5416	.5200	.4333	52
53	3.3125	2.6500	2.2083	1.6870	1.6562	1.1041	.8435	.8281	.7361	.6625	.5520	.5300	.4416	53

TABLE OF PITCH DIAMETERS

TABLE 10: Pitch Diameters 54 to 101 Teeth

To find outside diameter add 2 teeth.

Theoretical P.D.s only. All gears cut to AGMA standards.

N = Number of teeth

NOTE: Applies to spur and bevel gears only (not to helical gears).

N	DIAMETRAL PITCH													N
	16	20	24	1/10	32	48	1/20	64	72	80	96	100	120	
54	3.3750	2.7000	2.2500	1.7188	1.6875	1.1250	.8594	.8437	.7500	.6750	.5625	.5400	.4500	54
55	3.4375	2.7500	2.2916	1.7507	1.7187	1.1458	.8753	.8593	.7638	.6875	.5729	.5500	.4583	55
56	3.5000	2.8000	2.3333	1.7825	1.7500	1.1666	.8912	.8750	.7777	.7000	.5833	.5600	.4666	56
57	3.5625	2.8500	2.3750	1.8143	1.7812	1.1875	.9071	.8906	.7916	.7125	.5937	.5700	.4750	57
58	3.6250	2.9000	2.4166	1.8461	1.8125	1.2083	.9230	.9062	.8055	.7250	.6041	.5800	.4833	58
59	3.6875	2.9500	2.4583	1.8780	1.8437	1.2291	.9390	.9218	.8194	.7375	.6145	.5900	.4916	59
60	3.7500	3.0000	2.5000	1.9098	1.8750	1.2500	.9549	.9375	.8333	.7500	.6250	.6000	.5000	60
61	3.8125	3.0500	2.5416	1.9416	1.9062	1.2708	.9708	.9531	.8472	.7625	.6354	.6100	.5083	61
62	3.8750	3.1000	2.5833	1.9735	1.9375	1.2916	.9867	.9687	.8611	.7750	.6458	.6200	.5166	62
63	3.9375	3.1500	2.6250	2.0053	1.9687	1.3125	1.0026	.9843	.8750	.7875	.6562	.6300	.5250	63
64	4.0000	3.2000	2.6666	2.0371	2.0000	1.3333	1.0185	1.0000	.8888	.8000	.6666	.6400	.5333	64
65	4.0625	3.2500	2.7083	2.0690	2.0312	1.3541	1.0345	1.0156	.9027	.8125	.6770	.6500	.5416	65
66	4.1250	3.3000	2.7500	2.1008	2.0625	1.3750	1.0504	1.0312	.9168	.8250	.6875	.6600	.5500	66
67	4.1875	3.3500	2.7916	2.1326	2.0937	1.3958	1.0663	1.0468	.9305	.8375	.6979	.6700	.5583	67
68	4.2500	3.4000	2.8333	2.1645	2.1250	1.4166	1.0822	1.0625	.9444	.8500	.7083	.6800	.5666	68
69	4.3125	3.4500	2.8750	2.1963	2.1562	1.4375	1.0981	1.0781	.9583	.8625	.7187	.6900	.5750	69
70	4.3750	3.5000	2.9166	2.2281	2.1875	1.4583	1.1140	1.0937	.9722	.8750	.7291	.7000	.5833	70
71	4.4375	3.5500	2.9583	2.2600	2.2187	1.4791	1.1300	1.1093	.9861	.8875	.7395	.7100	.5916	71
72	4.5000	3.6000	3.0000	2.2918	2.2500	1.5000	1.1459	1.1250	1.0000	.9000	.7500	.7200	.6000	72
73	4.5625	3.6500	3.0416	2.3236	2.2812	1.5208	1.1618	1.1406	1.0138	.9125	.7604	.7300	.6083	73
74	4.6250	3.7000	3.0833	2.3554	2.3125	1.5416	1.1777	1.1562	1.0277	.9250	.7708	.7400	.6166	74
75	4.6875	3.7500	3.1250	2.3873	2.3437	1.5625	1.1936	1.1718	1.0416	.9375	.7812	.7500	.6250	75
76	4.7500	3.8000	3.1666	2.4191	2.3750	1.5833	1.2095	1.1875	1.0555	.9500	.7916	.7600	.6333	76
77	4.8125	3.8500	3.2083	2.4509	2.4062	1.6041	1.2254	1.2031	1.0694	.9625	.8020	.7700	.6416	77
78	4.8750	3.9000	3.2500	2.4828	2.4375	1.6250	1.2414	1.2187	1.0833	.9750	.8125	.7800	.6500	78
79	4.9375	3.9500	3.2916	2.5146	2.4687	1.6458	1.2573	1.2343	1.0972	.9875	.8229	.7900	.6583	79
80	5.0000	4.0000	3.3333	2.5464	2.5000	1.6666	1.2732	1.2500	1.1111	1.0000	.8333	.8000	.6666	80
81	5.0625	4.0500	3.3750	2.5783	2.5312	1.6875	1.2891	1.2656	1.1250	1.0125	.8437	.8100	.6750	81
82	5.1250	4.1000	3.4166	2.6101	2.5625	1.7083	1.3050	1.2812	1.1388	1.0250	.8541	.8200	.6833	82
83	5.1875	4.1500	3.4583	2.6419	2.5937	1.7291	1.3209	1.2968	1.1527	1.0375	.8645	.8300	.6916	83
84	5.2500	4.2000	3.5000	2.6738	2.6250	1.7500	1.3369	1.3125	1.1666	1.0500	.8750	.8400	.7000	84
85	5.3125	4.2500	3.5416	2.7056	2.6562	1.7708	1.3528	1.3281	1.1805	1.0625	.8854	.8500	.7083	85
86	5.3750	4.3000	3.5833	2.7374	2.6875	1.7916	1.3687	1.3437	1.1944	1.0750	.8958	.8600	.7166	86
87	5.4375	4.3500	3.6250	2.7692	2.7187	1.8125	1.3846	1.3593	1.2083	1.0875	.9062	.8700	.7250	87
88	5.5000	4.4000	3.6666	2.8011	2.7500	1.8333	1.4005	1.3750	1.2222	1.1000	.9166	.8800	.7333	88
89	5.5625	4.4500	3.7083	2.8329	2.7812	1.8541	1.4164	1.3906	1.2381	1.1125	.9270	.8900	.7416	89
90	5.6250	4.5000	3.7500	2.8647	2.8125	1.8750	1.4323	1.4062	1.2500	1.1250	.9375	.9000	.7500	90
91	5.6875	4.5500	3.7916	2.8966	2.8437	1.8958	1.4483	1.4218	1.2638	1.1375	.9479	.9100	.7583	91
92	5.7500	4.6000	3.8333	2.9284	2.8750	1.9166	1.4642	1.4375	1.2777	1.1500	.9583	.9200	.7666	92
93	5.8125	4.6500	3.8750	2.9602	2.9062	1.9375	1.4801	1.4531	1.2916	1.1625	.9687	.9300	.7750	93
94	5.8750	4.7000	3.9166	2.9921	2.9375	1.9583	1.4960	1.4687	1.3055	1.1750	.9791	.9400	.7833	94
95	5.9375	4.7500	3.9583	3.0239	2.9687	1.9791	1.5119	1.4843	1.3194	1.1875	.9895	.9500	.7916	95
96	6.0000	4.8000	4.0000	3.0557	3.0000	2.0000	1.5278	1.5000	1.3333	1.2000	1.0000	.9600	.8000	96
97	6.0625	4.8500	4.0416	3.0876	3.0312	2.0208	1.5438	1.5156	1.3472	1.2125	1.0104	.9700	.8083	97
98	6.1250	4.9000	4.0833	3.1194	3.0625	2.0416	1.5597	1.5312	1.3611	1.2250	1.0208	.9800	.8166	98
99	6.1875	4.9500	4.1250	3.1512	3.0937	2.0625	1.5756	1.5468	1.3750	1.2375	1.0312	.9900	.8250	99
100	6.2500	5.0000	4.1666	3.1830	3.1250	2.0833	1.5915	1.5625	1.3888	1.2500	1.0416	1.0000	.8333	100
101	6.3125	5.0500	4.2083	3.2149	3.1562	2.1041	1.6074	1.5781	1.4027	1.2625	1.0520	1.0100	.8416	101

TABLE OF PITCH DIAMETERS

TABLE 11: Pitch Diameters 102 to 149 Teeth

To find outside diameter add 2 teeth.

Theoretical P.D.s only. All gears cut to AGMA standards.

N = Number of teeth

NOTE: Applies to spur and bevel gears only (not to helical gears).

N	DIAMETRAL PITCH													N
	16	20	24	1/10	32	48	1/20	64	72	80	96	100	120	
102	6.3750	5.1000	4.2500	3.2467	3.1875	2.1250	1.6233	1.5937	1.4166	1.2750	1.0625	1.0200	.8500	102
103	6.4375	5.1500	4.2916	3.2785	3.2187	2.1458	1.6392	1.6093	1.4305	1.2875	1.0729	1.0300	.8563	103
104	6.5000	5.2000	4.3333	3.3104	3.2500	2.1666	1.6552	1.6250	1.4444	1.3000	1.0833	1.0400	.8666	104
105	6.5625	5.2500	4.3750	3.3422	3.2812	2.1875	1.6711	1.6406	1.4583	1.3125	1.0937	1.0500	.8750	105
106	6.6250	5.3000	4.4166	3.3740	3.3125	2.2083	1.6870	1.6562	1.4722	1.3250	1.1041	1.0600	.8833	106
107	6.6875	5.3500	4.4583	3.4059	3.3437	2.2291	1.7029	1.6718	1.4861	1.3375	1.1145	1.0700	.8916	107
108	6.7500	5.4000	4.5000	3.4377	3.3750	2.2500	1.7188	1.6875	1.5000	1.3500	1.1250	1.0800	.9000	108
109	6.8125	5.4500	4.5416	3.4695	3.4062	2.2708	1.7347	1.7031	1.5138	1.3625	1.1354	1.0900	.9083	109
110	6.8750	5.5000	4.5833	3.5014	3.4375	2.2916	1.7507	1.7187	1.5277	1.3750	1.1458	1.1000	.9166	110
111	6.9375	5.5500	4.6250	3.5332	3.4687	2.3125	1.7666	1.7343	1.5416	1.3875	1.1562	1.1100	.9250	111
112	7.0000	5.6000	4.6666	3.5650	3.5000	2.3333	1.7825	1.7500	1.5555	1.4000	1.1666	1.1200	.9333	112
113	7.0625	5.6500	4.7083	3.5889	3.5312	2.3541	1.7984	1.7656	1.5694	1.4125	1.1770	1.1300	.9416	113
114	7.1250	5.7000	4.7500	3.6287	3.5625	2.3750	1.8143	1.7812	1.5833	1.4250	1.1875	1.1400	.9500	114
115	7.1875	5.7500	4.7916	3.6605	3.5937	2.3958	1.8302	1.7968	1.5972	1.4375	1.1979	1.1500	.9583	115
116	7.2500	5.8000	4.8333	3.6923	3.6250	2.4166	1.8461	1.8125	1.6111	1.4500	1.2083	1.1600	.9666	116
117	7.3125	5.8500	4.8750	3.7242	3.6562	2.4375	1.8621	1.8281	1.6250	1.4625	1.2187	1.1700	.9750	117
118	7.3750	5.9000	4.9166	3.7560	3.6875	2.4583	1.8780	1.8437	1.6388	1.4750	1.2291	1.1800	.9833	118
119	7.4375	5.9500	4.9583	3.7878	3.7187	2.4791	1.8939	1.8593	1.6527	1.4875	1.2395	1.1900	.9916	119
120	7.5000	6.0000	5.0000	3.8197	3.7500	2.5000	1.9098	1.8750	1.6666	1.5000	1.2500	1.2000	1.0000	120
121	7.5625	6.0500	5.0416	3.8515	3.7812	2.5208	1.9257	1.8906	1.6805	1.5125	1.2604	1.2100	1.0083	121
122	7.6250	6.1000	5.0833	3.8833	3.8125	2.5416	1.9416	1.9062	1.6944	1.5250	1.2708	1.2200	1.0166	122
123	7.6875	6.1500	5.1250	3.9152	3.8437	2.5625	1.9576	1.9218	1.7083	1.5375	1.2812	1.2300	1.0250	123
124	7.7500	6.2000	5.1666	3.9470	3.8750	2.5833	1.9735	1.9375	1.7222	1.5500	1.2916	1.2400	1.0333	124
125	7.8125	6.2500	5.2083	3.9788	3.9062	2.6041	1.9894	1.9531	1.7361	1.5625	1.3020	1.2500	1.0416	125
126	7.8750	6.3000	5.2500	4.0107	3.9375	2.6250	2.0053	1.9687	1.7500	1.5750	1.3125	1.2600	1.0500	126
127	7.9375	6.3500	5.2916	4.0425	3.9687	2.6458	2.0212	1.9843	1.7638	1.5875	1.3229	1.2700	1.0583	127
128	8.0000	6.4000	5.3333	4.0743	4.0000	2.6666	2.0371	2.0000	1.7777	1.6000	1.3333	1.2800	1.0666	128
129	8.0625	6.4500	5.3750	4.1061	4.0312	2.6875	2.0530	2.0156	1.7916	1.6125	1.3437	1.2900	1.0750	129
130	8.1250	6.5000	5.4166	4.1380	4.0625	2.7083	2.0690	2.0312	1.8055	1.6250	1.3541	1.3000	1.0833	130
131	8.1875	6.5500	5.4583	4.1698	4.0937	2.7291	2.0849	2.0468	1.8194	1.6375	1.3645	1.3100	1.0916	131
132	8.2500	6.6000	5.5000	4.2016	4.1250	2.7500	2.1008	2.0625	1.8333	1.6500	1.3750	1.3200	1.1000	132
133	8.3125	6.6500	5.5416	4.2335	4.1562	2.7708	2.1167	2.0781	1.8472	1.6625	1.3854	1.3300	1.1083	133
134	8.3750	6.7000	5.5833	4.2653	4.1875	2.7916	2.1326	2.0937	1.8611	1.6750	1.3958	1.3400	1.1166	134
135	8.4375	6.7500	5.6250	4.2971	4.2187	2.8125	2.1485	2.1093	1.8750	1.6875	1.4062	1.3500	1.1250	135
136	8.5000	6.8000	5.6666	4.3290	4.2500	2.8333	2.1645	2.1250	1.8888	1.7000	1.4166	1.3600	1.1333	136
137	8.5625	6.8500	5.7083	4.3608	4.2812	2.8541	2.1804	2.1406	1.9027	1.7125	1.4270	1.3700	1.1416	137
138	8.6250	6.9000	5.7500	4.3926	4.3125	2.8750	2.1963	2.1562	1.9166	1.7250	1.4375	1.3800	1.1500	138
139	8.6875	6.9500	5.7916	4.4245	4.3437	2.8958	2.2122	2.1718	1.9305	1.7375	1.4479	1.3900	1.1583	139
140	8.7500	7.0000	5.8333	4.4563	4.3750	2.9166	2.2281	2.1875	1.9444	1.7500	1.4583	1.4000	1.1666	140
141	8.8125	7.0500	5.8750	4.4881	4.4062	2.9375	2.2440	2.2031	1.9583	1.7625	1.4687	1.4100	1.1750	141
142	8.8750	7.1000	5.9166	4.5200	4.4375	2.9583	2.2600	2.2187	1.9722	1.7750	1.4791	1.4200	1.1833	142
143	8.9375	7.1500	5.9583	4.5518	4.4687	2.9791	2.2759	2.2343	1.9861	1.7875	1.4895	1.4300	1.1916	143
144	9.0000	7.2000	6.0000	4.5836	4.5000	3.0000	2.2918	2.2500	2.0000	1.8000	1.5000	1.4400	1.2000	144
145	9.0625	7.2500	6.0416	4.6154	4.5312	3.0208	2.3077	2.2656	2.0138	1.8125	1.5104	1.4500	1.2083	145
146	9.1250	7.3000	6.0833	4.6473	4.5625	3.0416	2.3236	2.2812	2.0277	1.8250	1.5208	1.4600	1.2166	146
147	9.1875	7.3500	6.1250	4.6791	4.5937	3.0625	2.3395	2.2968	2.0416	1.8375	1.5312	1.4700	1.2250	147
148	9.2500	7.4000	6.1666	4.7109	4.6250	3.0833	2.3554	2.3125	2.0555	1.8500	1.5416	1.4800	1.2333	148
149	9.3125	7.4500	6.2083	4.7428	4.6562	3.1041	2.3714	2.3281	2.0694	1.8625	1.5520	1.4900	1.2416	149

TABLE OF PITCH DIAMETERS

TABLE 12: Pitch Diameters 150 to 197 Teeth

To find outside diameter add 2 teeth.

Theoretical P.D.s only. All gears cut to AGMA standards.

N = Number of teeth

NOTE: Applies to spur and bevel gears only (not to helical gears).

N	DIAMETRAL PITCH													N
	16	20	24	1/10	32	48	1/20	64	72	80	96	100	120	
150	9.3750	7.5000	6.2500	4.7746	4.6875	3.1250	2.3873	2.3437	2.0833	1.8750	1.5625	1.5000	1.2500	150
151	9.4375	7.5500	6.2916	4.8064	4.7187	3.1458	2.4032	2.3593	2.0972	1.8875	1.5729	1.5100	1.2583	151
152	9.5000	7.6000	6.3333	4.8383	4.7500	3.1666	2.4191	2.3750	2.1111	1.9000	1.5833	1.5200	1.2666	152
153	9.5625	7.6500	6.3750	4.8701	4.7812	3.1875	2.4350	2.3906	2.1250	1.9125	1.5937	1.5300	1.2750	153
154	9.6250	7.7000	6.4166	4.9019	4.8125	3.2083	2.4508	2.4062	2.1388	1.9250	1.6041	1.5400	1.2833	154
155	9.6875	7.7500	6.4583	4.9338	4.8437	3.2291	2.4669	2.4218	2.1527	1.9375	1.6145	1.5500	1.2916	155
156	9.7500	7.8000	6.5000	4.9656	4.8750	3.2500	2.4828	2.4375	2.1666	1.9500	1.6250	1.5600	1.3000	156
157	9.8125	7.8500	6.5416	4.9974	4.9062	3.2708	2.4987	2.4531	2.1805	1.9625	1.6354	1.5700	1.3083	157
158	9.8750	7.9000	6.5833	5.0292	4.9375	3.2916	2.5146	2.4687	2.1944	1.9750	1.6458	1.5800	1.3166	158
159	9.9375	7.9500	6.6250	5.0611	4.9687	3.3125	2.5305	2.4843	2.2083	1.9875	1.6562	1.5900	1.3250	159
160	10.0000	8.0000	6.6666	5.0929	5.0000	3.3333	2.5464	2.5000	2.2222	2.0000	1.6666	1.6000	1.3333	160
161	10.0625	8.0500	6.7083	5.1247	5.0312	3.3541	2.5623	2.5156	2.2361	2.0125	1.6770	1.6100	1.3416	161
162	10.1250	8.1000	6.7500	5.1566	5.0625	3.3750	2.5783	2.5312	2.2500	2.0250	1.6875	1.6200	1.3500	162
163	10.1875	8.1500	6.7916	5.1884	5.0937	3.3958	2.5942	2.5468	2.2638	2.0375	1.6979	1.6300	1.3583	163
164	10.2500	8.2000	6.8333	5.2202	5.1250	3.4166	2.6101	2.5625	2.2777	2.0500	1.7083	1.6400	1.3666	164
165	10.3125	8.2500	6.8750	5.2521	5.1562	3.4375	2.6260	2.5781	2.2916	2.0625	1.7187	1.6500	1.3750	165
166	10.3750	8.3000	6.9166	5.2839	5.1875	3.4583	2.6419	2.5937	2.3055	2.0750	1.7291	1.6600	1.3833	166
167	10.4375	8.3500	6.9583	5.3157	5.2187	3.4791	2.6578	2.6093	2.3194	2.0875	1.7395	1.6700	1.3916	167
168	10.5000	8.4000	7.0000	5.3476	5.2500	3.5000	2.6738	2.6250	2.3333	2.1000	1.7500	1.6800	1.4000	168
169	10.5625	8.4500	7.0416	5.3794	5.2812	3.5208	2.6897	2.6406	2.3472	2.1125	1.7604	1.6900	1.4083	169
170	10.6250	8.5000	7.0833	5.4112	5.3125	3.5416	2.7056	2.6562	2.3611	2.1250	1.7708	1.7000	1.4166	170
171	10.6875	8.5500	7.1250	5.4430	5.3437	3.5625	2.7215	2.6718	2.3750	2.1375	1.7812	1.7100	1.4250	171
172	10.7500	8.6000	7.1666	5.4749	5.3750	3.5833	2.7374	2.6875	2.3888	2.1500	1.7916	1.7200	1.4333	172
173	10.8125	8.6500	7.2083	5.5067	5.4062	3.6041	2.7533	2.7031	2.4027	2.1625	1.8020	1.7300	1.4416	173
174	10.8750	8.7000	7.2500	5.5385	5.4375	3.6250	2.7692	2.7187	2.4166	2.1750	1.8125	1.7400	1.4500	174
175	10.9375	8.7500	7.2916	5.5704	5.4687	3.6458	2.7852	2.7343	2.4305	2.1875	1.8229	1.7500	1.4583	175
176	11.0000	8.8000	7.3333	5.6022	5.5000	3.6666	2.8011	2.7500	2.4444	2.2000	1.8333	1.7600	1.4666	176
177	11.0625	8.8500	7.3750	5.6340	5.5312	3.6875	2.8170	2.7656	2.4583	2.2125	1.8437	1.7700	1.4750	177
178	11.1250	8.9000	7.4166	5.6659	5.5625	3.7083	2.8329	2.7812	2.4722	2.2250	1.8541	1.7800	1.4833	178
179	11.1875	8.9500	7.4583	5.6977	5.5937	3.7291	2.8488	2.7968	2.4861	2.2375	1.8645	1.7900	1.4916	179
180	11.2500	9.0000	7.5000	5.7295	5.6250	3.7500	2.8647	2.8125	2.5000	2.2500	1.8750	1.8000	1.5000	180
181	11.3125	9.0500	7.5416	5.7614	5.6562	3.7708	2.8807	2.8281	2.5138	2.2625	1.8854	1.8100	1.5083	181
182	11.3750	9.1000	7.5833	5.7932	5.6875	3.7916	2.8966	2.8437	2.5277	2.2750	1.8958	1.8200	1.5166	182
183	11.4375	9.1500	7.6250	5.8250	5.7187	3.8125	2.9125	2.8593	2.5416	2.2875	1.9062	1.8300	1.5250	183
184	11.5000	9.2000	7.6666	5.8569	5.7500	3.8333	2.9284	2.8750	2.5555	2.3000	1.9166	1.8400	1.5333	184
185	11.5625	9.2500	7.7083	5.8887	5.7812	3.8541	2.9443	2.8906	2.5694	2.3125	1.9270	1.8500	1.5416	185
186	11.6250	9.3000	7.7500	5.9205	5.8125	3.8750	2.9602	2.9062	2.5833	2.3250	1.9375	1.8600	1.5500	186
187	11.6875	9.3500	7.7916	5.9523	5.8437	3.8958	2.9761	2.9218	2.5972	2.3375	1.9479	1.8700	1.5583	187
188	11.7500	9.4000	7.8333	5.9842	5.8750	3.9166	2.9921	2.9375	2.6111	2.3500	1.9583	1.8800	1.5666	188
189	11.8125	9.4500	7.8750	6.0160	5.9062	3.9375	3.0080	2.9531	2.6250	2.3625	1.9687	1.8900	1.5750	189
190	11.8750	9.5000	7.9166	6.0478	5.9375	3.9583	3.0239	2.9687	2.6388	2.3750	1.9791	1.9000	1.5833	190
191	11.9375	9.5500	7.9583	6.0797	5.9687	3.9791	3.0398	2.9843	2.6527	2.3875	1.9895	1.9100	1.5916	191
192	12.0000	9.6000	8.0000	6.1115	6.0000	4.0000	3.0557	3.0000	2.6666	2.4000	2.0000	1.9200	1.6000	192
193	12.0625	9.6500	8.0416	6.1433	6.0312	4.0208	3.0716	3.0158	2.6805	2.4125	2.0104	1.9300	1.6083	193
194	12.1250	9.7000	8.0833	6.1752	6.0625	4.0416	3.0876	3.0312	2.6944	2.4250	2.0208	1.9400	1.6166	194
195	12.1875	9.7500	8.1250	6.2070	6.0937	4.0625	3.1035	3.0468	2.7083	2.4375	2.0312	1.9500	1.6250	195
196	12.2500	9.8000	8.1666	6.2388	6.1250	4.0833	3.1194	3.0625	2.7222	2.4500	2.0416	1.9600	1.6333	196
197	12.3125	9.8500	8.2083	6.2707	6.1562	4.1041	3.1353	3.0781	2.7361	2.4625	2.0520	1.9700	1.6416	197

GEAR WEAR & LUBRICATION

Wear

Another factor to consider in the successful design of a gear train is tooth surface wear. It can take on many forms but always leads to reduced accuracy and loss of smooth operation. Wear can eventually cause enough deterioration to introduce dynamic forces that are strong enough to break or bend gear teeth. The most common types of wear are pitting, scuffing and scoring.

Pitting is caused by localized metal fatigue on the surface of the gear. Microscopic cracks are forced to propagate which causes small metal chunks to break off. The best ways to avoid this are:

- Reduce contact stress
- Use hardened gears
- Use proper lubrication

Scuffing is caused by small surface irregularities that can rub each other as gear teeth come into and out of mesh. It is caused by the plastic deformation of microscopic surface protrusion. The best ways to avoid scuffing are:

- Use gears that are cut to a high quality surface finish
- "Run in" with 1/2 load for the first 10 hours
- Use proper lubrication at all times

Scoring is caused by small particles in the lubrication that get caught in the meshing teeth. This causes scratches that can extend from the root to the tip. These can be quite deep. The best ways to avoid scoring are:

- Proper high quality lubrication
- Change the lubrication after the "run in" period
- Change or filter the lubrication as needed

Lubrication

Using the proper lubrication can extend the life of your gear train by a factor of 4 or more. The lubrication will form a thin layer between the teeth in contact. This will reduce all types of tooth wear which will keep your gear running smoothly. This is especially important with worm gear sets and helical gear sets as these types of gears operate with more of a sliding motion than a rolling motion (as in spur gears).

There are many lubrications that work extremely well with gear sets. The one you choose depends on your application.

For lightly loaded, low speed systems, a light coating of grease can be brushed on during assembly. The grease will not fly oil or overheat, and should be replaced regularly to ensure optimal life.

For higher speed systems, an oil bath is recommended. Oil is more effective than other lubrications at dissipating heat. The gears will always be in contact with the oil, so flying off is not a problem. The oil should be replaced after the "run in" period and regularly thereafter.

Many other lubricants exist for applications in which oil and greases could present a problem. They vary greatly in price, durability, thickness, consistency and lubricity. For low torque and low speed systems where dry running is essential, you might make use of plastic gears against a metal pinion. Generally, this offers a low enough co-efficient of friction to ensure long life.

GEAR MOUNTING

There are several ways to mount a gear to a shaft. The method you choose will depend on your application. Berg supplies gears that will accommodate a variety of mounting methods. Our pin hub gears can be mounted in three ways:

1. We suggest using the set screw to secure the gear in the proper location, then using the spot drill to drill through the hub and shaft. Then the gear can be mounted with any one of a variety of pins (Berg carries a full line of pins).
2. For light load applications, you can rely solely on the set screw. This works best if the shaft is a relatively soft material so that the screw can form its own seat.
3. For precision applications, a light press fit could be appropriate. This would insure good concentricity between the gear, shaft and indirectly, the bearings. You must take precaution not to damage the gear during the press procedure.

Formula for Press Fit

$$P_{\max} = \frac{e_{\max} E}{2d} \left(1 - \left(\frac{d}{D} \right)^2 \right) \quad P_{\max} = -\frac{e_{\min} E}{2d} \left(1 - \left(\frac{d}{D} \right)^2 \right)$$

$$T = 1/2 p f P_{\min} l d^2$$

P = Unit pressure of max. or min. interfering surfaces (psi)

T = Torque required to slip (in lbs.)

e = Max. or min. interference (in.)

E = Modulus of elasticity of the softer material (psi), see Mechanical Properties table

d = Shaft diameter (in.)

D = Hub diameter (in.)

f = Coefficient of static friction (approximately 0.1 -0.15)

l = Length of fit (in.)

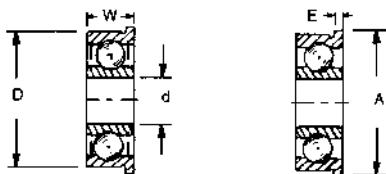
It is important to keep the maximum interfering pressure less than the yield strength in order for these formulae to remain valid. A good rule of thumb is for each 1" of diameter the interfering distance (e) should be about .001". This number tends to get smaller as d gets larger. For example, a 3" diameter uses an allowance of approximately .0025".

Our clamp hub gears allow you to securely mount a gear with the ability to reposition it as required. Consult catalog section I to determine which clamp of our large variety will work best with your gear selection.

BEARING TOLERANCES

The Annular Bearing Engineers Committee (ABEC) has established standards that divide precision ball bearings into quality classes. For most applications, ABEC 1 or ABEC 3 bearings will offer significant accuracy. However, there are times when highly precise position is required. In these applications, ABEC 5 or ABEC 7 bearings should be specified.

This page refers to ABEC tolerances that affect the mounting dimensions of ball bearings. The following page discusses tolerances that influence the operation of the bearings.



Outer Ring Tolerances

Outside Diameter (D)		Tolerance											
		D +0.0000			W +0.0000			A			E +0.0000		
OVER	INCL.	ABEC 3	ABEC 5	ABEC 7	ABEC 1	ABEC 3	ABEC 5	ABEC 7	ABEC 1	ABEC 3	ABEC 5	ABEC 7	ABEC 1
0	.7087	-.0009	-.0003	-.0002	-.0002	-.0003	-.0005	-.0010	—	-.0004	-.0003	-.0003	—
.7087	1.1811	-.0004	-.0003	-.0002	-.0002	-.0003	-.0005	-.0010	—	-.0004	-.0003	-.0003	—
1.1811	1.9685	-.0003	-.0003	-.0002	-.0002	-.0003	-.0005	-.0010	—	-.0004	-.0003	-.0003	—
1.9685	5.1496	-.0003	-.0004	-.0003	-.0002	-.0003	-.0005	-.0010	—	-.0004	-.0003	-.0003	—

Inner Ring Tolerances

Bore Diameter (d)		Tolerance							
		d +0.0000				W +0.0000			
OVER	NCL	ABEC 1	ABEC 3	ABEC 5	ABEC 7	ABEC 1	ABEC 3	ABEC 5	ABEC 7
0	.3937	-.0003	-.0002	-.0002	-.0002	-.0005	-.0003	-.0010	-.0010
.3937	.7087	-.0003	-.0002	-.0002	-.0002	-.0005	-.0003	-.0010	-.0010
.7087	1.1811	-.0004	-.0002	-.0002	-.0002	-.0005	-.0003	-.0010	-.0010
1.1811	1.9685	-.0005	-.0003	-.0002	-.0002	-.0005	-.0003	-.0010	-.0010

BEARING TOLERANCES

The following tolerances illustrate the differences between ABEC quality classes that could affect the performance of your assembly. These tolerances should be strongly considered if a high precision gear train is your goal.

Outer Ring Tolerances

Outside Diameter (in)		Tolerances													
		Radial Runout (max)				Wave Variation (max)		Outside Diameter Surface Runout with Reference Circle (max)		Groove Fillet with Reference Circle (max)		Outer Diameter 2 Point Circ Dia Round (max)		Outer Diameter 1 Point (max)	
OVER	INCL	ABEC 1	ABEC 3	ABEC 5	ABEC 7	ABEC 5	ABEC 7	ABEC 5	ABEC 7	ABEC 5	ABEC 7	ABEC 5	ABEC 7	ABEC 5	ABEC 7
0	.7587	.0006	.0004	.0002	.00015	.0002	.0001	.0003	.00015	.0002	.0002	.0001	.0001	.0001	.0001
.7087	1.1811	.0008	.0004	.0002	.00015	.0002	.0001	.0003	.00015	.0002	.0002	.0001	.0001	.0001	.0001
1.1811	1.9685	.0008	.0004	.0002	.00015	.0002	.0001	.0003	.00015	.0002	.0002	.0001	.0001	.0001	.0001
1.9685	3.1496	.0010	.0005	.0003	.0002	.0002	.00015	.0003	.00015	.0004	.0002	—	—	—	—

Inner Ring Tolerances

Bore Diameter (in)		Tolerance													
		Radial Runout (max)				Wave Variation (max)		Reference Runout with Bore Circle (max)		Groove Fillet with Reference Circle (max)		Bore 2-Point Out of Round (max)		Bore Taper (max)	
OVER	INCL.	ABEC 1	ABEC 3	ABEC 5	ABEC 7	ABEC 5	ABEC 7	ABEC 5	ABEC 7	ABEC 5	ABEC 7	ABEC 5	ABEC 7	ABEC 5	ABEC 7
0	.9937	.0003	.0002	.00015	.0001	.0002	.0001	.0003	.0001	.0003	.0001	.0001	.0001	.0001	.0001
.9937	.7087	.0004	.0003	.00015	.0001	.0002	.0001	.0003	.0001	.0003	.0001	.0001	.0001	.0001	.0001
.7087	1.1811	.0005	.0003	.00015	.00015	.0002	.0001	.0003	.00015	.0003	.00015	.0001	.0001	.0001	.0001
1.1811	1.9685	.0006	.0004	.0002	.00015	.0002	.0001	.0003	.00015	.0003	.00015	—	—	—	—

METRIC CONVERSIONS & QUALITY SPECIFICATIONS

FRACTIONAL INCHES CONVERTED TO DECIMAL INCHES AND MILLIMETERS					
Fraction of Inch	Decimal of Inch	Decimal Millimeters	Fraction of Inch	Decimal of Inch	Decimal Millimeters
1/64	.015625	0.39688	33/64	.515625	13.06688
1/32	.03125	0.79375	17/64	.53125	13.49375
3/64	.046875	1.19063	35/64	.546875	13.89063
1/16	.0625	1.5875	9/16	.5625	14.2875
5/64	.078125	1.98438	37/64	.578125	14.68438
3/32	.09375	2.38125	19/32	.59375	15.08125
7/64	.109375	2.77813	39/64	.609375	15.47813
1/8	.125	3.175	5/8	.625	15.875
9/64	.140625	3.57188	41/64	.640625	16.27188
5/32	.15625	3.96875	21/32	.65625	16.66875
11/64	.171875	4.36563	43/64	.671875	17.06563
3/16	.1875	4.7625	11/16	.6875	17.4625
13/64	.203125	5.15938	45/64	.703125	17.85938
7/32	.21875	5.55625	23/32	.71875	18.25625
15/64	.234375	5.95313	47/64	.734375	18.65313
1/4	.25	6.35	3/4	.75	19.05
17/64	.265625	6.74688	49/64	.765625	19.44688
9/32	.28125	7.14375	25/32	.78125	19.84375
19/64	.296875	7.54063	51/64	.796875	20.24063
5/16	.3125	7.9375	13/16	.8125	20.6375
21/64	.328125	8.33438	53/64	.828125	21.03438
11/32	.34375	8.73125	27/32	.84375	21.43125
23/64	.359375	9.12813	55/64	.859375	21.82813
3/8	.375	9.525	7/8	.875	22.225
25/64	.390625	9.92188	57/64	.890625	22.62188
13/32	.40625	10.31875	29/32	.90625	23.01875
27/64	.421875	10.71563	59/64	.921875	23.41563
7/16	.4375	11.1125	15/16	.9375	23.8125
29/64	.453125	11.50938	61/64	.953125	24.20938
15/32	.46875	11.90625	31/32	.96875	24.60625
31/64	.484375	12.30313	63/64	.984375	25.00313
1/2	.5	12.7	1"	1.0	25.4

Gears

BERG QUALITY CLASS	AGMA 390.03	DIN SPECIFICATIONS
QA	4	12
QD	7	10
QE	8	9
QF	9	8
QG	10	7
QJ	12	5
QM	14	3

Bearings

BERG QUALITY CLASS	AGMA ABEC	ISO 492 SPECIFICATIONS
QU	5	CLASS 5
QW	7	CLASS 4

Conversion Factors

39.37 INCHES/METER	14.223	LBS/IN ²
0.3937 INCHES/CM		KG/CM ²
0.03937 INCHES/mm	1.4503 X 10 ⁴	PSI/Pascal
3.2808 FT/M	5.71 X 103	LBS/IN
1 X 10 ⁶ METERS/MICRON		N/M
1 X 10 ³ mm/MICRON	8.85	LBS-INCHES
2.2046 LBS/KG		N-M
2.204 X 10 ³ LBS/GM	0.0885	LBS-INCHES
3.527 X 10 ³ OZ/GM		N-CM
0.0108 OZ/FT	1.416	OZ-INCHES
GM/M		N-CM
0.2248 LBS/N	0.0338	OZ/CC
0.102 KG/N	5.4668 X 10 ³	OZ-IN ² /GM-CM ³

AGMA - American Gear Manufacturers Association
DIN - Deutsches Institut für Normung
AFBNA - Anti Friction Bearings Manufacturers Association
ABEC - Annular Bearing Engineering Committee
ISO - International Organization for Standardization

DRILL & TAP REFERENCE DATA

Unified American National Screws

Drill & Tap Reference Data

SCREW SIZE		NUMBER OF THREADS PER INCH	TAP DRILL		CLEARANCE HOLE DRILL			
NUMBER	DECIMAL		DR. SIZE	DECIMAL	CLOSE FIT		FREE FIT	
					DR. SIZE	DECIMAL	DR. SIZE	DECIMAL
#000	.034	120	#71	.026	#63	.037	#57	.0430
#00	.047	96	#62	.038	#55	.052	#53	.0595
#0	.060	80	#56	.0465	#52	.0635	#50	.0700
#1	.073	64	#53	.0595	#48	.0760	#46	.0810
#1	.073	72	#53	.0595	#48	.0760	#46	.0810
#2	.086	56	#50	.0700	#43	.0890	#41	.0960
#2	.086	64	#50	.0700	#43	.0890	#41	.0960
#3	.099	48	#47	.0785	#37	.1040	#35	.1100
#3	.099	56	#45	.0820	#37	.1040	#35	.1100
#4	.112	40	#43	.0890	#32	.1160	#30	.1285
#4	.112	48	#42	.0935	#32	.1160	#30	.1285
#5	.125	40	#38	.1015	#30	.1285	#29	.1360
#5	.125	44	#37	.1040	#30	.1285	#29	.1360
#6	.138	32	#36	.1065	#27	.1440	#25	.1495
#6	.138	40	#33	.1130	#27	.1440	#25	.1495
#8	.164	32	#29	.1360	#18	.1695	#16	.1770
#8	.164	36	#29	.1360	#18	.1695	#16	.1770
#10	.190	24	#25	.1495	#9	.1960	#7	.2010
#10	.190	32	#21	.1590	#9	.1960	#7	.2010
#12	.216	24	#16	.1770	#2	.2210	I	.2280
#12	.216	28	#14	.1820	#2	.2210	I	.2280
1/4	.250	20	#7	.2010	F	.2570	H	.2660
1/4	.250	28	#3	.2130	F	.2570	H	.2660
5/16	.3125	18	F	.2570	P	.3230	Q	.3320
5/16	.3125	24	I	.2720	P	.3230	Q	.3320
3/8	.375	16	5/16	.3125	W	.3860	X	.3970
3/8	.375	24	Q	.3320	W	.3860	X	.3970
7/16	.4375	14	U	.3680	29/64	.4531	15/32	.4687
7/16	.4375	20	25/64	.3906	29/64	.4531	15/32	.4687
1/2	.500	13	27/64	.4219	33/64	.5156	17/32	.5312
1/2	.500	20	29/64	.4531	33/64	.5156	17/32	.5312

NO.	SIZE	NO.	SIZE	NO.	SIZE	NO.	SIZE	NO.	SIZE	NO.	SIZE
#1	.2280	#17	.1730	#33	.1130	#49	.0790	#65	.0350	A	.234
#2	.2210	#18	.1695	#34	.1110	#50	.0700	#66	.0330	B	.238
#3	.2130	#19	.1660	#35	.1100	#51	.0670	#67	.0320	C	.242
#4	.2090	#20	.1610	#36	.1065	#52	.0635	#68	.0310	D	.246
#5	.2055	#21	.1590	#37	.1040	#53	.0595	#69	.0295	E	.250
#6	.2040	#22	.1570	#38	.1015	#54	.0550	#70	.0280	F	.257
#7	.2010	#23	.1540	#39	.0995	#55	.0520	#71	.0260	G	.261
#8	.1990	#24	.1520	#40	.0980	#56	.0465	#72	.0250	H	.266
#9	.1960	#25	.1495	#41	.0960	#57	.0430	#73	.0240	I	.272
#10	.1935	#26	.1470	#42	.0935	#58	.0420	#74	.0225	J	.277
#11	.1910	#27	.1440	#43	.0890	#59	.0410	#75	.0210	K	.281
#12	.1890	#28	.1405	#44	.0860	#60	.0400	#76	.0200	L	.290
#13	.1850	#29	.1360	#45	.0820	#61	.0390	#77	.0180	M	.295
#14	.1820	#30	.1285	#46	.0810	#62	.0380	#78	.0160	N	.302
#15	.1800	#31	.1200	#47	.0785	#63	.0370	#79	.0145	O	.316
#16	.1770	#32	.1160	#48	.0760	#64	.0360	#80	.0135	P	.323

MECHANICAL PROPERTIES

Mechanical Properties from “Machine Design in Mechanical Design” by Robert L. Mott

Material	Hardness (Rockwell)	Tension Modulus (E)	Tensile Strength	Yield Strength	Shear Strength	Endurance Limit
303 Stainless Steel	B75-90	28 X 10 ⁶ PSI	90 X 10 ³ PSI	35 X 10 ³ PSI	75 X 10 ³ PSI	35 X 10 ³ PSI
17-4 PH Stainless Steel	C28-35	28.5 X 10 ⁶ PSI	150 X 10 ³ PSI	125 X 10 ³ PSI	83 X 10 ³ PSI	90 X 10 ³ PSI
416 Stainless Steel	C26-36	29 X 10 ⁶ PSI	75 X 10 ³ PSI	40X 10 ³ PSI	75 X 10 ³ PSI	40 X 10 ³ PSI
416 Stainless Steel - Hardened	C36-42	29 X 10 ⁶ PSI	135 X 10 ³ PSI	105 X 10 ³ PSI	75 X 10 ³ PSI	40 X 10 ³ PSI
12 L14 Steel	B75-90	30 X 10 ⁶ PSI	78 X 10 ³ PSI	60 X 10 ³ PSI	50 X 10 ³ PSI	–
2024T4 Aluminum	–	10.6 X 10 ⁶ PSI	68 X 10 ³ PSI	47 X 10 ³ PSI	40 X 10 ³ PSI	–
464 Brass Alloy	–	18 X 10 ⁶ PSI	57 X 10 ³ PSI	25 X 10 ³ PSI	40 X 10 ³ PSI	–
360 Brass Alloy	–	14 X 10 ⁶ PSI	49 X 10 ³ PSI	18 X 10 ³ PSI	30 X 10 ³ PSI	–

MILITARY SPECIFICATIONS & MANUFACTURING TOLERANCES

MATERIAL		FINISH		USED ON
MATERIAL DESIGNATION	MIL. or FED. SPECIFICATION	BERG FINISH DESIGNATION	MIL. FINISH SPECIFICATION	
303 STAINLESS STEEL (BAR)	ASTM A484 ASTM A582	—	QQ-P-35	GEARS, SHAFTS
302 STAINLESS STEEL (Spring Temp.)	MIL-W-6713 Comp. B	—	QQ-P-35	SPRINGS, RETAINER RINGS
416 STAINLESS STEEL (BAR)	ASTM A484 ASTM A582	—	QQ-P-35	RACKS-HEAT TREATABLE
440 STAINLESS STEEL (BAR)	QQ-S-763/C Class 10 Type A	CLEAR PASSIVATE	QQ-P-35	BALL BEARINGS (Hardened)
2024 ALUMINUM (BAR)	QQ-A-225/6 Cond. T4	CHROMIC ACID ANODIZED	MIL-A-8625 Type 1	GEARS, HANGERS, ETC.
2024 ALUMINUM (SHEET)	QQ-A-268 Cond. T4	BLACK ANODIZED	MIL-A-8625 Type 11	DIALS
108 ALUMINUM (CAST)	QQ-A-601 Comp. 8 Cond. T55	CHROMIC ACID OR BLACK ANODIZED	MIL-A-8625 Type 1 + Type 11	BREADBOARD COMPONENT
BRONZE (NAVAL BRASS)	QQ-B-637 Alloy 464	—	—	WORM WHEELS
BRASS-POROUS (OIL LESS)	MIL-B-5687 Type 1 Comp. A	LUBRICATED WITH S.A.E. 40 OIL	—	BEARINGS
BRASS (LAMINATED)	MIL-S-22499 Comp. 2CL.1	—	—	SHIMS
BERYLLIUM COPPER	MIL-C-6942	—	—	RETAINER RINGS
NYLON	MIL-M-20693 Type 1 Comp. A	—	—	GEARS
POLYURETHANE	—	—	—	GEARS, ROLLERS, BRG'S
PLEXIGLASS (CLEAR)	MIL-P-5425 Finish A	—	—	DIAL INDEX'S
STAINLESS STEEL CABLE	MIL-W-83420	—	—	BELTS & CHAINS
GALVANIZED ST CABLE	MIL-C-1511A-4	GALVANIZED	—	—
OIL	MIL-L-6085	—	—	GEARS & BEARINGS -65°F TO +250°F
GREASE	MIL-G-23827	—	—	GEARS & BEARINGS -65°F TO +250°F

Manufacturing Tolerances (unless otherwise specified):

- Fractional ± 1/32
- 2 Place Decimal ± 1/64
- 3 Place Decimal ± .010
- 4 Place Decimal ± .001

NOTE: Certification for materials and finishes are available on request - charges may apply.

MATERIAL SPECIFICATIONS

STAINLESS STEEL				
AISI; AA Material Designation	DIN Specs	U.S. Specs	UNS	ISO
303 Stainless Steel Rockwell B75-B90	1.4305	MIL-S-862	S30300	—
302 Stainless Steel (18-8)	1.4300	MIL-S-862	S30200	—
302 Stainless Steel - Spring Temper	—	MIL-W-6713	—	—
17-7PH Rockwell C38-C44	—	—	S17700	—
17-4PH Rockwell C32-C38	—	—	S17400	—
416 Rockwell C26 to C36	1.4005	MIL-S-862	S41600	—
416 Rockwell C36 to C42	—	—	—	—
410 Stainless Steel	1.4006	MIL-S-862	S41000	—
440 Stainless Steel	1.4112	MIL-S-763	S41003	—
420 Stainless Steel	1.4021	MIL-S-862	S42000	—
301 Stainless Steel	1.4310	MIL-S-5059	S30100	—
304 Stainless Steel	1.4301	MIL-S-862	S30400	—
316 Stainless Steel, Sintered	—	—	—	—
316 Stainless Steel, Sintered	1.4401	MIL-S-5059	S31600	—
NON-FERROUS METALS				
2024 T4 Aluminum	3.1355	—	—	AlCu4MgI
2024 T351 Aluminum	—	—	—	—
6063 T5 Aluminum	3.3206	—	—	AlMgSi
6061 T6 Aluminum	—	—	—	AlMgSiCu
Phosphor Bronze	—	—	C50500	—
Bronze, Sintered	—	MIL-B-5687	—	—
Brass, Naval, Alloy 464	—	QQ-B-637	C46200	—
713.0 Aluminum Casting, Tenzaloy	—	—	—	—
Zinc Alloy B86, AG40A (Zamak-3)	—	—	—	—
Beryllium Copper	—	MIL-C-6942	—	—
STEEL				
52100 Chrome Steel, Rockwell 062-C66	1.3505	MIL-S-980	G52986	—
12L14 Steel	1.0718	—	G12144	—
4140 Steel, Rockwell C48-C52	—	—	G41400	—
1095 Steel	—	—	G10750	—
1060 Steel Rockwell C60-C63	1.0601	MIL-S-16974	G10600	—
8620 Steel	1.6523	MIL-S-16974	G86200	—
PLASTIC				
Polyacetal				
Polyacetal, with lubricant fibers				
Polycarbonate				
Polycarbonate, Glass filled-10%, Black				

INDEX

60° V-BELTS	A209
60° V-BELT PULLEYS	A212 - A214
60° V-BELT CORDS	A215
FIELD SPLICE KITS	A226

ADJUSTABLE CAM ASSEMBLIES	C 16

AIRCRAFT CABLES	A92

ANTI-BACKLASH GEARS

PIN HUB - 24 PITCH	B 35 - B 36
PIN HUB - 32 PITCH	B 65 - B 67
PIN HUB - 48 PITCH	B 96 - B 101
PIN HUB - 64 PITCH	B 134 - B 140
PIN HUB - 72 PITCH	B 162 - B 163, B 165 - B 167
PIN HUB - 96 PITCH	B 191 - B 193, B 195
CLAMP HUB - 1/10 PITCH	B 44
CLAMP HUB - 24 PITCH	B 36 - B 37
CLAMP HUB - 32 PITCH	B 68 - B 69
CLAMP HUB - 48 PITCH	B 102 - B 107
CLAMP HUB - 64 PITCH	B 141 - B 147
CLAMP HUB - 72 PITCH	B 169 - B 173
CLAMP HUB - 96 PITCH	B 196 - B 201

ANTI-BACKLASH PINIONS

PIN HUB - 72 PITCH	B 164
PIN HUB - 96 PITCH	B 190, B 194
CLAMP HUB - 72 PITCH	B 168

ANTI-BACKLASH WORM GEARS

48 PITCH	B 229 - B 234
64 PITCH	B 239 - B 244

BALLS	F 61

BEARINGS

DYNA-SPEED NEEDLE ROLLER BEARINGS	I 29
BALL BEARINGS	I 30 - I 36
ANGULAR CONTACT BALL BEARINGS	I 37
OIL-LESS BEARINGS	I 38 - I 41
LONG-LIFE® BEARINGS	I 42
PRECISION BEARINGS	I 43 - I 44
DIMENSIONAL INFORMATION	I 44
THERMOPLASTIC BEARINGS	I 45 - I 47
REFERENCE CHART	I 45
SPHERICAL BEARINGS	I 48
THERMOPLASTIC SPHERICAL BEARINGS	I 49
THRUST BEARINGS	I 50
ROLLER THRUST BEARINGS	I 51

BEARING SPACERS	F 60

BELT TENSIONER GUIDE	A235

BELT & CHAIN TECHNICAL DATA	A236 - A237

BEVEL GEARBOXES

SHAFT SIZE 1/8", 3/16" & 1/4"	C 8

BUSHINGS	H 3

CABLE CRIMP BUSHINGS	A94

CABLE CRIMP TOOLS	A94

CABLE THIMBLES	A94

CAM FOLLOWERS	C 14

CHASSIS HANDLES	F 66

CLAMPS

SPLIT HUB CLAMPS	I 7 - I 11
SHAFT CLAMPS	I 12
THREADED SHAFT CLAMPS	I 13

CLUSTER GEARS & HUBS

24 PITCH	B 22
32 PITCH	B 50
48 PITCH	B 75 - B 76
64 PITCH	B 117 - B 118
72 PITCH	B 152 - B 153
96 PITCH	B 181
120 PITCH	B 204 - B 205

COLLARS

SET SCREW COLLARS	I 14 - I 15
PLASTIC ROD STOCKS	I 16

COUPLINGS

GUIDE FOR COUPLING SELECTION	G 2
TECHNICAL DATA	G 2
THIN WALL COUPLINGS	G 3 - G 6
POLYURETHANE COUPLINGS	G 7
SIX BEAM FLEXIBLE COUPLINGS	G 8 - G 13
THREE BEAM FLEXIBLE COUPLINGS	G 14 - G 17
SINGLE BEAM FLEXIBLE COUPLINGS	G 18 - G 19
ABSORBATHANE FLEXIBLE COUPLINGS	G 20
NEO-FLEX COUPLINGS	G 21 - G 22
SLEEVE COUPLINGS	G 23
SPIDER COUPLINGS	G 24
MULTI-JAW COUPLINGS	G 25
BELLOWS COUPLINGS	G 26 - G 28
OLDHAM COUPLINGS	G 29 - G 32
UNIVERSAL LATERAL COUPLINGS	G 33 - G 34

DIALS

DIAL CLAMPS	D 2
DRUM DIALS	D 3 - D 4
FLAT DIALS	D 5
ENGRAVED FLAT DISKS	D 6
FLAT DIAL INDEX	D 7
DRUM DIAL INDEX	D 7
ENGRAVED INDEX	D 8

FIBER CABLES	A93

FLEX-E-BELT® DRIVE SYSTEM	A17

GEAR DRIVE BELTS

.0982 CIRCULAR PITCH - 32 PITCH	A18
.1000 CIRCULAR PITCH - 1/10 PITCH	A31
.1309 CIRCULAR PITCH - 24 PITCH	A38

E-Z ENTRY BELT PULLEYS

.0982 CIRCULAR PITCH - 32 PITCH	A19 - A30
.1000 CIRCULAR PITCH - 1/10 PITCH	A32 - A37
.1309 CIRCULAR PITCH - 24 PITCH	A39 - A40

FIELD SPLICE KITS	A41

FLEX-E-GEAR® CABLE DRIVE CHAIN SYSTEM	A2

GEAR DRIVE CHAINS

.0982 CIRCULAR PITCH - 32 PITCH	A3
.1000 CIRCULAR PITCH - 1/10 PITCH	A9
.1309 CIRCULAR PITCH - 24 PITCH	A12

SPROCKET GEARS

.0982 CIRCULAR PITCH - 32 PITCH	A4 - A8
.1000 CIRCULAR PITCH - 1/10 PITCH	A10 - A11
.1309 CIRCULAR PITCH - 24 PITCH	A13 - A15

FIELD SPLICE KITS	A16

FLEX-E-GRIP® TIMING BELTS	A129

TIMING BELTS

.0816 (XXL) CIRCULAR PITCH - 1/8" WIDTH	A131
.200 (XL) CIRCULAR PITCH - 1/4" WIDTH	A135
.375 (L) CIRCULAR PITCH - 1/2" WIDTH	A139
.500 (H) CIRCULAR PITCH - 3/4" WIDTH	A143

TIMING PULLEYS

.0816 (XXL) CIRCULAR PITCH - PIN HUB	A132 - A134
.200 (XL) CIRCULAR PITCH - PIN HUB	A136 - A138
.375 (L) CIRCULAR PITCH - PIN HUB	A140 - A142
.500 (H) CIRCULAR PITCH - PIN HUB	A144

FIELD SPLICE KITS	A145

FLEX-E-PITCH® DRIVE SYSTEM	A71

CHAINS

.1475 CIRCULAR PITCH	A72
.250 CIRCULAR PITCH	A80
.375 CIRCULAR PITCH	A84
.500 CIRCULAR PITCH	A87 - A88

CHAIN SPROCKETS

PIN HUB - .1475 CIRCULAR PITCH	A73 - A77
PIN HUB - .250 CIRCULAR PITCH	A81, A83
PIN HUB - .375 CIRCULAR PITCH	A86
PIN HUB - .500 CIRCULAR PITCH	A90
HUBLESS - .1475 CIRCULAR PITCH	A78 - A79
HUBLESS - .250 CIRCULAR PITCH	A82
HUBLESS - .375 CIRCULAR PITCH	A85
HUBLESS - .500 CIRCULAR PITCH	A89

FIELD SPLICE KITS	A91

INDEX

FRICITION DRIVE ROLLERS A233 - A234

GEAR BLANKS

HUBLESS	B 2
PIN HUB	B 3 - B 4
CLAMP HUB	B 5

GEARBOXES - WORM WHEEL & HELICAL GEARS

SPEED REDUCER TECHNICAL DATA	C 2

GEAR RACKS

1/20 PITCH	B 113
1/10 PITCH	B 42 - B 43
16 PITCH	B 13
20 PITCH	B 19
24 PITCH	B 33 - B 34
32 PITCH	B 63 - B 64
48 PITCH	B 94 - B 95
64 PITCH	B 132 - B 133
72 PITCH	B 160 - B 161
80 PITCH	B 178
96 PITCH	B 188 - B 189
120 PITCH	B 209

GENEVA MECHANISMS

SHAFT SIZE 1/4"	C 13

GROOVED PULLEYS A227 - A232

HAND CRANKS D 12

HELICAL GEARS

16 PITCH	B 211
20 PITCH	B 211
24 PITCH	B 212
32 PITCH	B 212
48 PITCH	B 213 - B 214
64 PITCH	B 215 - B 216
SHAFT SIZE 1/8", 3/16" & 1/4"	C 5

HEX NUTS F 36

HIGH PRECISION & PRECISION LEAD SCREWS

LEAD SCREWS & COMPONENTS TECHNICAL DATA	E 2
ANTI-BACKLASH LEAD SCREW ASSEMBLIES	E 3
LEAD SCREWS	E 4
LEAD SCREW ASSEMBLIES	E 5 - E 6

HUBS

GEAR, SPROCKET & DIAL ASSEMBLIES	J 2
TECHNICAL DATA	J 2
GEAR, SPROCKET & DIAL HUBS	J 3 - J 5
DUAL GEAR HUBS	J 6

INLINE COUPLING SLIP CLUTCHES G 45

INTEGRAL SEAL SCREWS F 10 - F 11

INTERMITTENT MOTION ASSEMBLIES

SHAFT SIZE 1/4"	C 12

INTERNAL GEARS

24 PITCH	B 245
32 PITCH	B 245
48 PITCH	B 246
64 PITCH	B 246
72 PITCH	B 247
96 PITCH	B 247
120 PITCH	B 248

KNOBS D 13

KNURLED HAND CRANKS D 11

KNURLED HANDWHEELS D 9 - D 10

LINEAR BEARINGS

FLANGED TYPE LINEAR BEARINGS	E 13
LINEAR BALL BEARINGS	E 14 - E 15, E 18 - E 19
LINEAR BALL BEARINGS WITH SHAFT WIPERS	E 16
LINEAR BALL BEARINGS SELF-ALIGNING-BARREL STYLE	E 17
LINEAR "NO LUBE" BEARINGS	E 20 - E 21
LINEAR BEARING WIPERS - RETAINER	E 22

LINEAR SLIDES

LINEAR SLIDES TECHNICAL DATA	E 7
ULTRA-PRECISION LINEAR BALL SLIDES	E 8
LINEAR BALL SLIDES	E 9
LINEAR CROSSED ROLLER SLIDES	E 10
RACK DRIVEN BALL SLIDES	E 11
LINEAR TABLES	E 12

LOCK WASHERS F 39

MACHINE SCREWS

STAINLESS STEEL MACHINE SCREWS	F 3 - F 5
LONG-LOK® & NYLOC® MACHINE SCREWS	F 6 - F 7
NYLON MACHINE SCREWS	F 8 - F 9

MAX-M-DRIVE® CABLE DRIVE CHAINS A146

TIMING BELTS

.080 (MXL) CIRCULAR PITCH - 1/8" & 1/4" WIDTH	A147 - A150
.0816 (XXL) CIRCULAR PITCH - 1/8" & 1/4" WIDTH	A166 - A167
.200 (XL) CIRCULAR PITCH - 1/4" & 3/8" WIDTH	A168 - A169
.375 (L) CIRCULAR PITCH - 1/2" & 3/4" WIDTH	A182
.079 (GT) 2MM CIRCULAR PITCH	A187 - A188
.118 (GT) 3MM CIRCULAR PITCH	A189 - A190

TIMING PULLEYS

.080 (MXL) CIRCULAR PITCH - PIN HUB	A151 - A161
.0816 (XXL) CIRCULAR PITCH - PIN HUB	A162 - A165
.200 (XL) CIRCULAR PITCH - PIN HUB	A170 - A181
.375 (L) CIRCULAR PITCH - PIN HUB	A183 - A184
.079 (GT) 2 MM CIRCULAR PITCH - PIN HUB	A191 - A192, A194
.118 (GT) 3 MM CIRCULAR PITCH - PIN HUB	A191, A193, A195

TIMING PULLEY BAR STOCKS A185 - A186

MIN-E-PITCH® DRIVE SYSTEM A42

CABLE CHAINS

.15708 CIRCULAR PITCH - π /20 PITCH	A43

CHAIN SPROCKETS

.15708 CIRCULAR PITCH - π /20 PITCH - PIN HUB	A44 - A48
.15708 CIRCULAR PITCH - π /20 PITCH - HUBLESS	A49 - A50
.15708 CIRCULAR PITCH - π /20 PITCH - CLAMP HUB	A51

DUAL CHAINS

.15708 CIRCULAR PITCH - π /20 PITCH	A52

BELTS

.15708 CIRCULAR PITCH - π /20 PITCH	A53

DOUBLE SPROCKETS

.15708 CIRCULAR PITCH - π /20 PITCH - PIN HUB	A54 - A57
.15708 CIRCULAR PITCH - π /20 PITCH - HUBLESS	A58 - A59

3-D BELTS

.15708 CIRCULAR PITCH - π /20 PITCH	A60

3-D PULLEYS

.15708 CIRCULAR PITCH - π /20 PITCH - PIN HUB	A61 - A64
.15708 CIRCULAR PITCH - π /20 PITCH - HUBLESS	A65 - A66
.15708 CIRCULAR PITCH - π /20 PITCH - IDLER	A67 - A69

FIELD SPLICE KITS A70

MINIATURE MITER GEARBOXES

SHAFT SIZE 1/8"	C 7

MINIATURE SLIP CLUTCHES G 49

MINIATURE SYNCRO MOUNT CLAMPS D 19

MITER GEARBOXES

SHAFT SIZE 1/8", 3/16" & 1/4"	C 6

O-RING CORDS A216

O-RING BELTS

70A DUROMETER	A217 - A221
90A DUROMETER	A222 - A225

FIELD SPLICE KITS A226

OLDHAM SLIP COUPLINGS G 44

OVERRUNNING COUPLINGS G 40

INDEX

PINION SHAFTS

1/20 PITCH	B 114
1/10 PITCH	B 45
24 PITCH	B 38
32 PITCH	B 70
48 PITCH	B 108 - B 109
64 PITCH	B 148 - B 149
72 PITCH	B 174
80 PITCH	B 179
96 PITCH	B 202
120 PITCH	B 210

PINS

TAPER	F 44
GROOVED	F 45
ROLL OR SPRING	F 45
SPIRAL	F 46
CLEVIS	F 47
COTTER	F 47
DOWEL	F 48 - F 49
SOFT PINS	F 48

POW-R-VEE® BELTS A196

V-BELTS

2V	A198
3V	A200
4V	A203
5V	A205

V-BELT PULLEYS

2V	A199
3V	A201 - A202
4V	A204
5V	A206 - A207

FIELD SPLICE KITS A208

PRECISION CAPTIVE SCREWS F 23

PRECISION JIG BUTTONS F 24

PRECISION WORMS

16 PITCH	B 217
24 PITCH	B 219
32 PITCH	B 221
48 PITCH	B 224
64 PITCH	B 235

PRECISION WORM GEARS

16 PITCH	B 218
24 PITCH	B 220
32 PITCH	B 222 - B 223
48 PITCH	B 226 - B 228
64 PITCH	B 236 - B 238

PRECISION WORM SHAFTS

48 PITCH	B 225

RATCHETS & PAWLS C 17

RETAINER RINGS

EXTERNAL LUG DESIGN	F 50
EXTERNAL SNAP ON DESIGN	F 51
EXTERNAL POWER GRIP DESIGN	F 51
EXTERNAL BOWED SNAP ON DESIGN	F 52
STAINLESS STEEL INTERNAL	F 53
STAINLESS STEEL EXTERNAL	F 53
CARBON INTERNAL & EXTERNAL	F 54 - F 55
BEARING INTERNAL PUSH IN DESIGN	F 56
INTERNAL LUG DESIGN	F 56

ROLLER BEARING CAM FOLLOWERS C 15

ROLLER CLUTCHES G 51

ROW-L-ER® CHAINS A95

LINK CHAINS

.1475 CIRCULAR PITCH	A96
.250 CIRCULAR PITCH	A105, A120
.375 CIRCULAR PITCH	A113, A123
.500 CIRCULAR PITCH	A117, A126

ROW-L-ER® CHAINS CONT.

SPROCKETS

PIN HUB - .1475 CIRCULAR PITCH	A97 - A102
PIN HUB - .250 CIRCULAR PITCH	A106, A110 - A112, A121 - A122
PIN HUB - .375 CIRCULAR PITCH	A115 - A116, A124
PIN HUB - .500 CIRCULAR PITCH	A119, A127
HUBLESS - .1475 CIRCULAR PITCH	A103 - A104
HUBLESS - .250 CIRCULAR PITCH	A107 - A109
HUBLESS - .375 CIRCULAR PITCH	A118
HUBLESS - .500 CIRCULAR PITCH	A125, A128

LINK PLATE LUGS A125, A128

SCREW HEADS

TECHNICAL DATA	F 2

SERVO GEARBOXES

SHAFT SIZE 1/8"	C 9
SHAFT SIZE 3/16"	C 10
SHAFT SIZE 1/4"	C 11

SET SCREWS

SLOTTED HEAD & HEX SOCKET	F 12
BALL BUTTON	F 13
BRASS SOFT TIP HEX SOCKET	F 14
SILVER SOLDER TIP SLOTTED HEAD & HEX SOCKET	F 15
SOFT TIP SLOTTED HEAD	F 16, F 18
SOFT TIP HEX SOCKET HEAD	F 16 - F 17

SHAFTS

CASE HARDENED & GROUND SHAFTS	I 17
STAINLESS GROUND SHAFTS	I 18 - I 21
GROUND SHAFTING	I 22
ULTRA GROUND SHAFTING	I 23
SHAFT SEALS	I 24
SHAFT WIPERS	I 25 - I 26
SHAFT ADAPTERS	I 27
WOODRUFF KEYS	I 28

SHOULDER SCREWS

SLOTTED HEAD	F 19 - F 20
HEX SOCKET HEAD	F 21 - F 22

SLIP CLUTCHES G 46 - G 48

SLIP CLUTCHES & COUPLINGS G 50

SLIP COUPLINGS G 41 - G 43

SPACERS

LAMINATED INNER RACE SHIM	F 57
LAMINATED OUTER RACE SHIM	F 57
SHAFT SPACERS	F 58 - F 59

SPRINGS

COMPRESSION	F 62
EXPERIMENTAL	F 63
EXTENSION	F 63
TORSION	F 64
ANTI-BACKLASH EXTENSION	F 64
ANTI-BACKLASH TORSION	F 65
SPRING POSTS	F 65

SPRING WASHERS

BELLEVILLE	F 42
CURVED	F 42
BEARING PRE-LOADED	F 43

INDEX

SPUR GEARS

HUBLESS - 12 PITCH	B 6
HUBLESS - 16 PITCH	B 8 - B 9
HUBLESS - 20 PITCH	B 14
HUBLESS - 24 PITCH	B 20 - B 21
HUBLESS - 32 PITCH	B 46 - B 49
HUBLESS - 48 PITCH	B 72 - B 74
HUBLESS - 64 PITCH	B 115 - B 116
HUBLESS - 72 PITCH	B 151
HUBLESS - 80 PITCH	B 175
HUBLESS - 96 PITCH	B 180
HUBLESS - 120 PITCH	B 203
PIN HUB - 1/20 PITCH	B 111 - B 112
PIN HUB - 1/10 PITCH	B 40 - B 41
PIN HUB - 12 PITCH	B 7
PIN HUB - 16 PITCH	B 10 - B 11
PIN HUB - 20 PITCH	B 15 - B 17
PIN HUB - 24 PITCH	B 23 - B 32
PIN HUB - 32 PITCH	B 51 - B 60
PIN HUB - 48 PITCH	B 77 - B 89
PIN HUB - 64 PITCH	B 119 - B 128
PIN HUB - 72 PITCH	B 154 - B 157
PIN HUB - 80 PITCH	B 176 - B 177
PIN HUB - 96 PITCH	B 182 - B 186
PIN HUB - 120 PITCH	B 206 - B 208
CLAMP HUB - 16 PITCH	B 12
CLAMP HUB - 20 PITCH	B 18
CLAMP HUB - 32 PITCH	B 61 - B 62
CLAMP HUB - 48 PITCH	B 90 - B 93
CLAMP HUB - 64 PITCH	B 129 - B 131
CLAMP HUB - 72 PITCH	B 158 - B 159
CLAMP HUB - 96 PITCH	B 187

SPUR GEAR STOCKS

24 PITCH	B 39
32 PITCH	B 71
48 PITCH	B 110
64 PITCH	B 150

STUD MOUNTS

MALE - MALE	H 2
MALE - FEMALE	H 2
MALE - BUMPER	H 2

SWIVEL WASHERS F 41

SYNCHRO MOUNT CLAMPS D 14 - D 18

TELESCOPIC UNIVERSAL JOINTS G 39

THREADED STUDS F 34 - F 35

THRUST WASHERS & DISKS F 40

THUMB NUTS F 32 - F 33

THUMB SCREWS

PLASTIC HEAD, KNURLED	F 25 - F 26
STAINLESS STEEL, KNURLED	F 27 - F 29
STAINLESS STEEL, KNURLED SOCKET HEAD	F 30 - F 31

TORQUE LIMITERS G 46

ULTRA-PRECISION CROSS ROLLER SLIDES

LEAD SCREW DRIVEN SLIDE ASSEMBLIES	E 13

UNIVERSAL JOINTS G 35 - G 38

WASHERS

MOLDED NYLON	F 37
STAINLESS STEEL	F 37 - F 38

WORM & WORM WHEEL GEARS

SHAFT SIZE 1/8", 3/16" & 1/4"	C 3 - C 4



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The proper selection and application of products and components, including assuring that the product is safe for its intended use, are the responsibility of the customer. To view our Application Considerations, please visit <https://www.regalrexnord.com/Application-Considerations>.

To view our Standard Terms and Conditions of Sale, please visit <https://www.regalrexnord.com/Terms-and-Conditions-of-Sale> (which may redirect to other website locations based on product family).

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