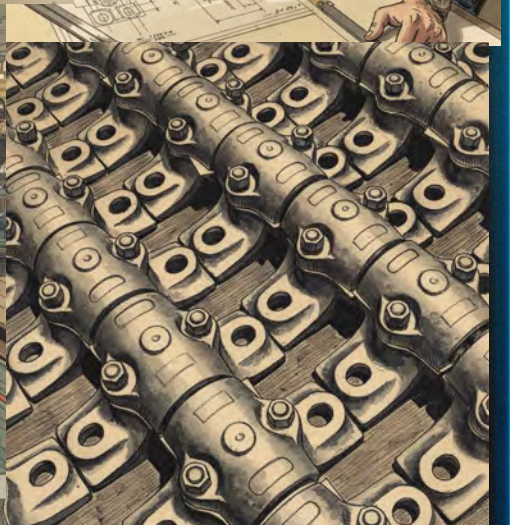
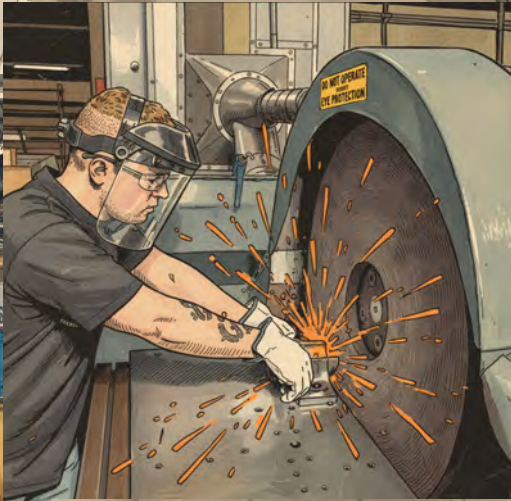
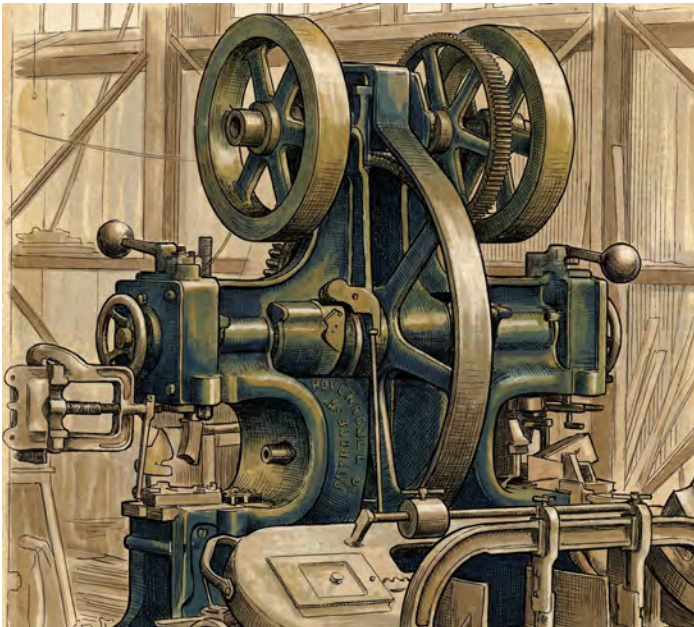


ROYERSFORD
FOUNDRY & MACHINE CO.



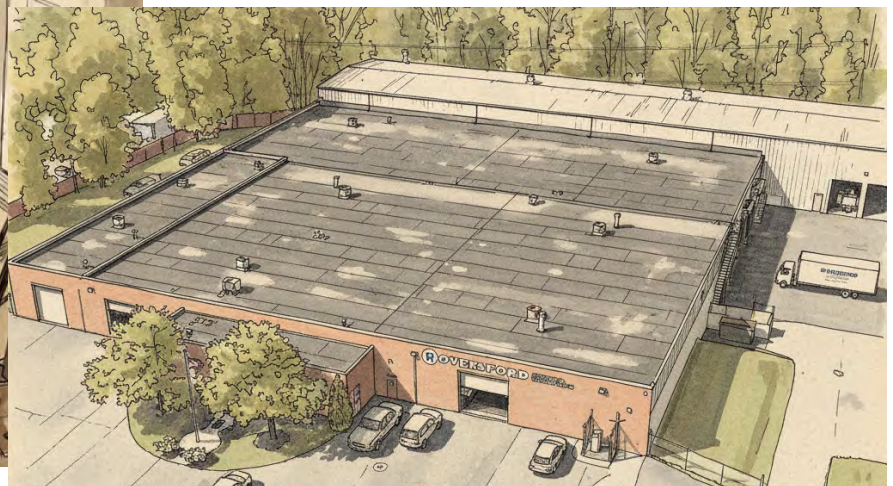
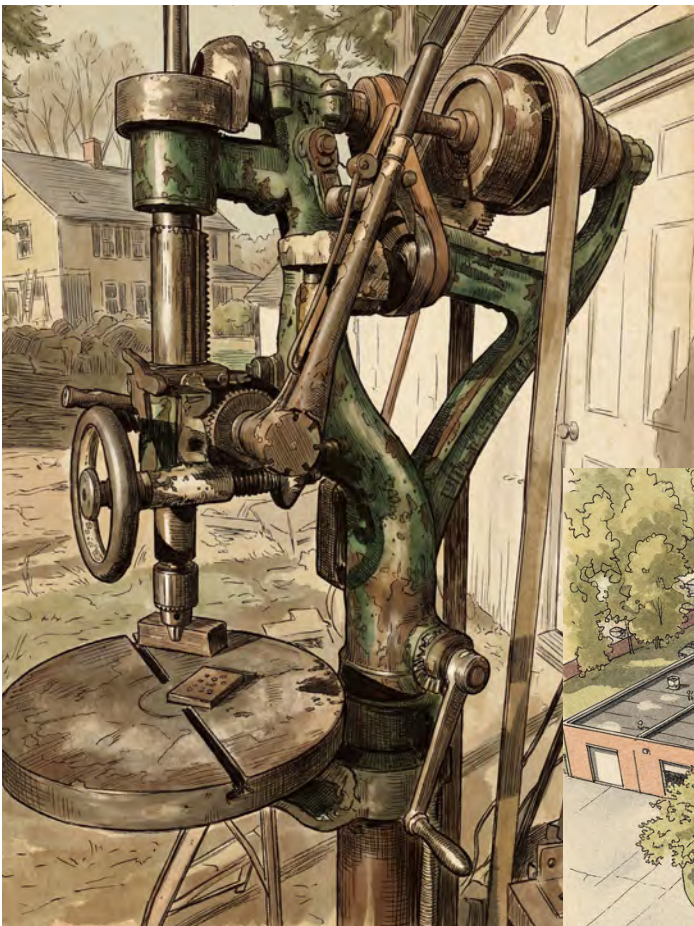
Over 135 years of service...



Since 1890, Royersford has been designing and manufacturing power transmission products built to work – and built to last. For more than a century, our bearings, machine tools, and assemblies have earned their place in OEM and replacement applications by delivering consistent, trouble-free performance in demanding industrial environments.

While manufacturing methods, technology, and markets have evolved, our standards have not. Royersford remains committed to precision craftsmanship, practical engineering, and dependable service. Our modern manufacturing facility combines time-proven machining practices with advanced CNC equipment, allowing us to maintain tight tolerances while adapting to today’s production requirements.

Every Royersford product reflects generations of hands-on experience and a belief that quality is not an option – it is expected. The result is straightforward: reliable products, responsive support, and long-term value our customers can count on.



PRECISION...WHEN PRECISION COUNTS.

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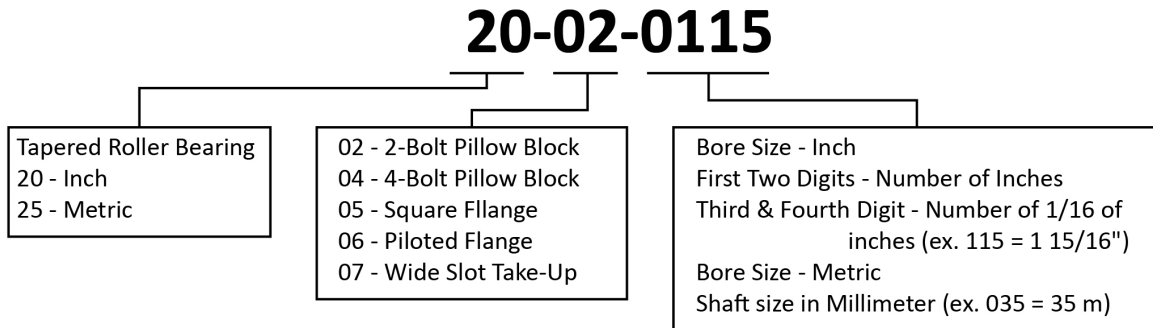




TYPE E

TAPERED ROLLER BEARINGS

Type E Nomenclature



*All standard units include suffix -501

**Additional suffixes (5XX) will be used to designate modified or special assemblies

Type E Component and Replacement Kit Nomenclature

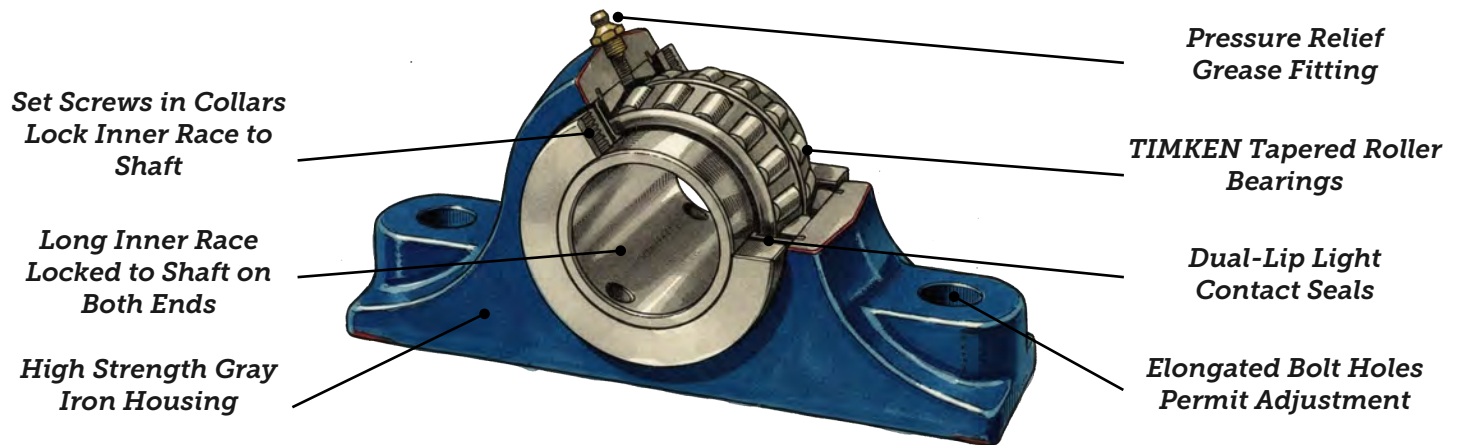
Item	P/N	Description
1	20-22-XXXX	EPB-2B
2	20-24-XXXX	EPB-4B
3	20-25-XXXX	EFB
4	20-26-XXXX	EPFB
5	20-27-XXXX	ETU
6	20-31-XXXX	EDC
7	20-32-XXXX	EAN
8	20-RK-XXXX	Replacement Kit
9	20-SR-XXXX	Snap Ring
10	20-SL-XXXX	Seals

Notes:

- Items 1-5 These are replacement machined housings
- Items 6 & 7 These are miscellaneous machined parts
- Item 8 Up to 3" includes all Timken parts, 2 snap rings, 2 seals, assortment of shims
3-3/16 to 5" includes all Timken parts, 2 seals
- Items 9 & 10 These are miscellaneous parts
- Items 1-10 -XXXX Refers to Nominal Bearing Size. Ex -0103

Type E Tapered Roller Bearings

Royersford Type E mounted bearings are built for high-speed, heavy-duty industrial applications where durability and dependable shaft locking matter most. Made in the USA with compact, rugged gray iron housings and premium Timken tapered roller bearings; these units deliver exceptional load capacity, long service life, and quick, contamination-free installation. Available in shaft sizes from 1-³/₁₆" through 5" and widely stocked throughout the US and Canada.



Key Benefits:

- Handles slight misalignment without performance loss
- Perfect for applications with high radial and thrust loads with minimal misalignment
- Factory assembled, sealed, and lubricated– install in minutes with minimal downtime
- Positive locking collars + set screws for secure shaft engagement
- Timken tapered roller bearings for superior radial & thrust load capacity

Why Timken Tapered Roller Bearings Stand Out

- Timken tapered inserts deliver robust performance in demanding applications
 - Vacuum-degassed steel for long service life
 - Excellent balance of radial and thrust load handling
 - Long inner race distributes load evenly
 - Designed to handle slight angular misalignment
- These attributes give Royersford Type E bearings a performance edge that reduces downtime and boosts overall reliability.

Materials & Construction

- High-strength gray iron housings, made in the USA
- Compact footprint without sacrificing ruggedness
- Fully machined mounting surfaces for precise alignment
- Available in 2 and 4-bolt pillow blocks, square and piloted flanges, and take-up units

Shaft Locking System

- Dual ductile iron or steel collars secure the inner race
- Two set screws provide additional holding strength
- Prevents slippage in high-load or high-vibration environments

Sealing System

- Dual-lip light contact seals
- Primary lip retains lubrication
- Secondary lip blocks dirt, dust, and moisture
- Seal efficiency is maintained across the full self-alignment range
- Locking collars "sling" contaminants away from seals

Installation Advantages

- Delivered pre-lubricated, pre-sealed, and pre-adjusted
- Eliminates contamination during setup
- Reduces downtime
- Simplifies maintenance
- Avoids premature failure

Technical Specs

- Race adjust: Snap rings + shims on units up to 3"
- Adjustment nut on sizes 3 - ³/₁₆" to 5"
- Bore tolerance:
 - +.001" / -.000" for bores less than 3"
 - +.002" / -.000" for bores greater than 3"
- Units are fully factory assembled, sealed, and lubricated

Common Industry Applications and Equipment Uses

(include but are not limited to)

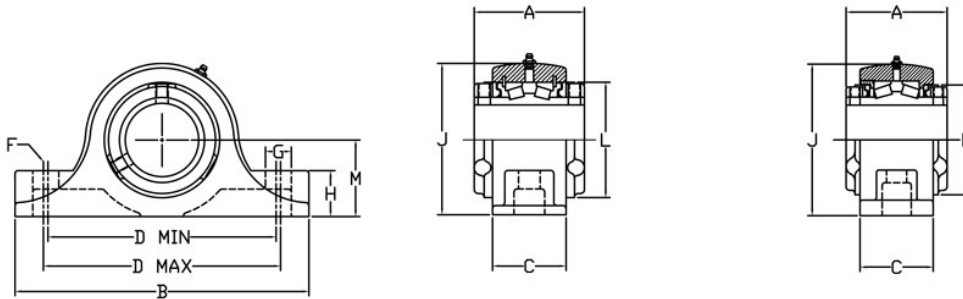
- **Industries:** Aggregates, Mining, Cement, Bulk Handling Equipment, Pulp and Paper, Conveying, Power Generation, Oil, and Gas
- **Applications:**
 - Conveyors and Conveyor Drive Systems
 - Gear Reducers & Gearboxes
 - Crushers, Pulverizers, & Mills
 - Mixers, Agitators, & Processing Equipment
 - Fans, Blowers, Pumps, & Compressors

2-Bolt Pillow Block Bearings

Type E Pillow Blocks are the most widely used of the E series due to the variety of mounting methods. All units are supplied with Timken tapered roller bearings, dual locking collars, and Royersford's exclusive dual-lip, light contact seals.



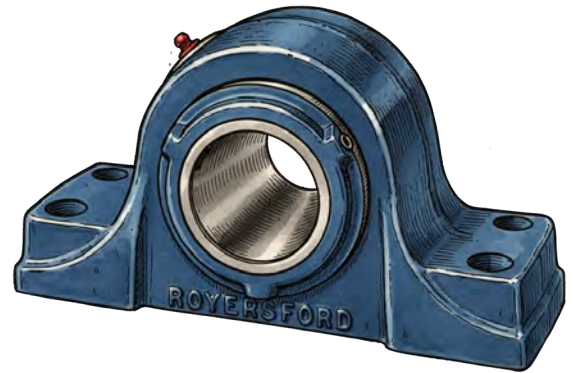
1 3/16 THRU 3' CONSTRUCTION 3 3/16 THRU 3 1/2 CONSTRUCTION



Shaft Size	Part Number	Wt.	A	B	C	D (Minimum)	D (Maximum)	F	G	H	J	L	M
1 3/16 1 1/4	20-02-0103 20-02-0104	4	2 3/4	6	1 7/8	4 3/4	4 13/16	3/8	19/32	7/8	3	2 1/4	1 1/2
1 3/8 1 7/16	20-02-0106 20-02-0107	6.9	3	7 3/8	2 1/8	5 3/8	5 7/8	1/2	3/4	1 1/8	3 3/4	2 3/4	1 7/8
1 1/2 1 5/8 1 11/16	20-02-0108 20-02-0110 20-02-0111	9.5	3 3/8	7 7/8	2 3/8	6 1/8	6 3/8	1/2	3/4	1 1/4	4 1/4	3 3/16	2 1/8
1 3/4 1 7/8 1 15/16 2	20-02-0112 20-02-0114 20-02-0115 20-02-0200	11	3 1/2	8 7/8	2 1/2	6 7/8	7 1/8	5/8	7/8	1 1/16	4 1/2	3 7/16	2 1/4
2 3/16	20-02-0203	14	3 3/4	9 5/8	2 5/8	7 5/8	7 7/8	5/8	7/8	1 1/2	5	3 3/4	2 1/2
2 1/4 2 7/16 2 1/2	20-02-0204 20-02-0207 20-02-0208	19	4	10 1/2	2 7/8	8 3/8	8 5/8	5/8	7/8	1 5/8	5 1/2	4 1/16	2 3/4
2 11/16 2 3/4	20-02-0211 20-02-0212	26	4 1/2	12	3	9 5/16	9 11/16	3/4	1	1 7/8	6 1/4	4 23/32	3 1/8
2 15/16 3	20-02-0215 20-02-0300	26	4 1/2	12	3	9 5/16	9 11/16	3/4	1	1 7/8	6 1/4	4 23/32	3 1/8
3 3/16 3 1/4 3 7/16 3 1/2	20-02-0303 20-02-0304 20-02-0307 20-02-0308	44	5	14	3 5/8	10 13/16	11 3/16	7/8	1 3/16	2 1/4	7 1/2	5 7/16	3 3/4

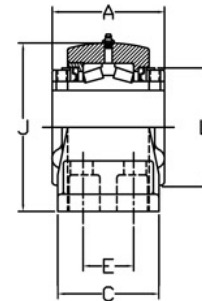
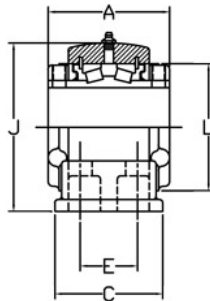
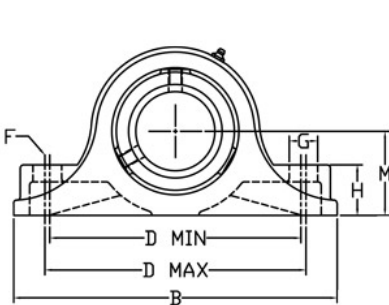
All product weights are listed in pounds (Lbs.) unless otherwise noted.

4-Bolt Pillow Block Bearings



2 1/4 THRU 3" CONSTRUCTION

3 3/16 THRU 5" CONSTRUCTION



Shaft Size	Part Number	Wt.	A	B	C	D		E	F	G	H	J	L	M
						Min	Max							
2 1/4 2 7/16 2 1/2	20-04-0204 20-04-0207 20-04-0208	19.0	4	10 1/2	3 1/2	8 3/8	8 3/8	1 7/8*	5/8	7/8	1 5/8	5 1/2	4 1/16	2 3/4
2 11/16 2 3/4 2 15/16 3	20-04-0211 20-04-0212 20-04-0215 20-04-0300	26.0	4 1/2	12	4	9 9/16	9 11/16	2 1/8*	5/8	1	1 7/8	6 1/4	4 23/32	3 1/8
3 3/16 3 1/4 3 7/16 3 1/2	20-04-0303 20-04-0304 20-04-0307 20-04-0308	44.0	5	14	4 1/2	10 13/16	11 3/16	2 3/8*	3/4	1 3/16	2 1/4	7 1/2	5 7/16	3 3/4
3 15/16 4	20-04-0315 20-04-0400	65.0	6 1/4	15 1/4	4 1/2	12 1/4	12 3/4	2 1/4	3/4	1 1/4	2 7/16	8 1/2	5 15/16	4 1/4
4 7/16 4 1/2	20-04-0407 20-04-0408	81.0	6 3/4	16 5/8	4 5/8	13 1/4	13 3/4	2 1/2	3/4	1 1/8	2 3/4	9 3/8	6 13/16	4 3/4
4 15/16 5	20-04-0415 20-04-0500	132.0	7 1/4	18 1/2	5 1/8	15 1/4	15 3/4	2 7/8	7/8	1 1/4	3	10 7/8	7 13/32	5 1/2

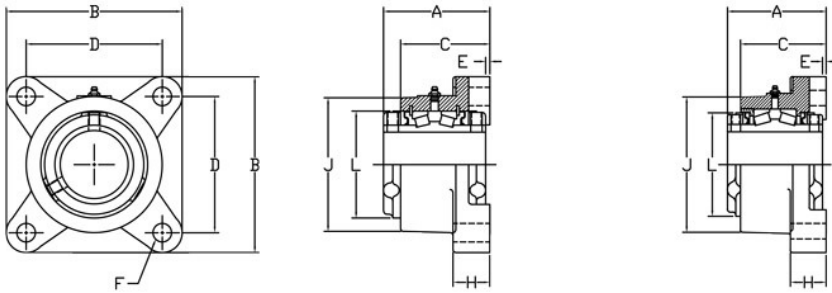
* 2-Bolt Base regularly furnished in sizes 2 1/4" to 3 1/2" inclusive. 4-Bolt base will be furnished when specified.
All product weights are listed in pounds (Lbs.) unless otherwise noted.

Square Flange Bearings

Type E Square Flange Bearings offer all of the features of the pillow block series. They are available in shaft sizes from 1 3/16" thru 4 1/2". These units are well suited for mounting on horizontal or vertical frames or supports.



1 3/16 THRU 3" CONSTRUCTION 3 3/16 THRU 4 1/2 CONSTRUCTION

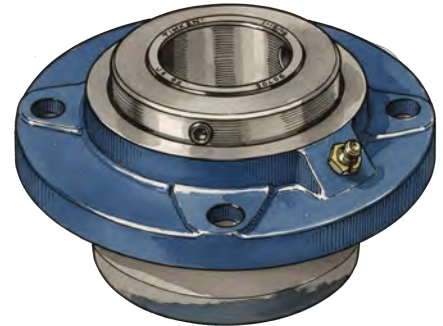


Shaft Size	Part Number	Wt.	A	B	C	D	E	F Bolt	H	J	L
1 3/16 1 1/4	20-05-0103 20-05-0104	4.5	2 13/16	3 3/4	2 11/32	2 7/8	1/16	3/8	1	2 15/16	2 1/4
1 3/8 1 7/16	20-05-0106 20-05-0107	6.9	3 1/16	4 5/8	2 19/32	3 1/2	1/16	1/2	1 1/16	3 1/2	2 3/4
1 1/2 1 5/8 1 11/16	20-05-0108 20-05-0110 20-05-0111	11	3 1/2	5 3/8	2 31/32	4 1/8	1/8	1/2	1 3/16	4 3/16	3 3/16
1 3/4 1 7/8 1 15/16 2	20-05-0112 20-05-0114 20-05-0115 20-05-0200	12	3 5/8	5 5/8	3 3/32	4 3/8	1/8	1/2	1 3/16	4 7/16	3 7/16
2 3/16	20-05-0203	16	3 7/8	6 1/4	3 9/32	4 7/8	1/8	5/8	1 3/8	4 7/8	3 3/4
2 1/4 2 7/16 2 1/2	20-05-0204 20-05-0207 20-05-0208	21	4 3/16	6 7/8	3 9/16	5 3/8	3/16	5/8	1 1/2	5 5/16	4 1/16
2 11/16 2 3/4 2 15/16 3	20-05-0211 20-05-0212 20-05-0215 20-05-0300	27	4 11/16	7 3/4	3 15/16	6	3/16	3/4	1 5/8	6	4 23/32
3 3/16 3 1/4 3 7/16 3 1/2	20-05-0303 20-05-0304 20-05-0307 20-05-0308	52	5 1/4	9 1/4	4 1/2	7	1/4	3/4	1 7/8	7 1/4	5 7/16
3 15/16 4	20-05-0315 20-05-0400	75	6 1/2	10 1/4	5 5/8	7 3/4	1/4	7/8	2 1/8	8 1/4	5 15/16
4 7/16 4 1/2	20-05-0407 20-05-0408	88	7 3/32	10 7/8	5 15/16	8 3/4	11/32	7/8	2 7/16	8 3/4	6 13/32

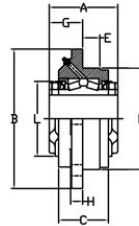
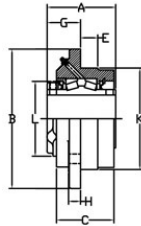
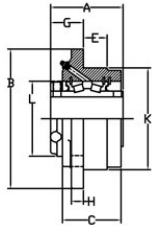
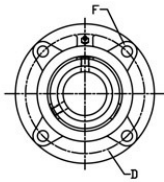
All product weights are listed in pounds (Lbs.) unless otherwise noted.

Piloted Flange Bearings

Type E Piloted Flange Bearings are designed to be supported by the cartridge of the block. Their primary uses are in applications where the majority of the housing is recessed in the structural member of the frame or support. Sizes up to 3 1/2" are of the single collar design while 3 15/16" thru 5" use dual locking collars.



1 3/16 THRU 3" CONSTRUCTION 3 3/16 THRU 3 1/2" CONSTRUCTION 3 15/16 THRU 5" CONSTRUCTION



Shaft Size	Part Number	Wt.	A	B	C	D	E	F Bolt**	G	H	K*	L
1 3/16 1 1/4	20-06-0103 20-06-0104	5.1	2 3/4	5	2 7/32	4 1/8	3/4	3/8	1 5/16	7/16	3 3/8	2 1/4
1 3/8 1 7/16	20-06-0106 20-06-0107	6.3	3	5 1/4	2 15/32	4 3/8	7/8	3/8	1 1/2	1/2	3 3/8	2 3/4
1 1/2 1 5/8 1 11/16	20-06-0108 20-06-0110 20-06-0111	9.1	3 3/8	6 1/8	2 25/32	5 1/8	1 1/16	7/16	1 9/16	1/2	4 1/4	3 3/16
1 3/4 1 7/8 1 15/16 2	20-06-0112 20-06-0114 20-06-0115 20-06-0200	11	3 1/2	6 3/8	2 29/32	5 3/8	1 3/16	7/16	1 9/16	9/16	4 1/2	3 7/16
2 3/16	20-06-0203	14	3 3/4	7 1/8	3 3/32	6	1 3/16	1/2	1 11/16	9/16	5	3 3/4
2 1/4 2 7/16 2 1/2	20-06-0204 20-06-0207 20-06-0208	17	4	7 5/8	3 5/16	6 1/2	1 5/16	1/2	1 13/16	5/8	5 1/2	4 1/16
2 11/16 2 3/4 2 15/16 3	20-06-0211 20-06-0212 20-06-0215 20-06-0300	26	4 1/2	8 3/4	3 11/16	7 1/2	1 1/2	5/8	2	3/4	6 3/8	4 23/32
3 3/16 3 1/4 3 7/16 3 1/2	20-06-0303 20-06-0304 20-06-0307 20-06-0308	43	5	10 1/4	4 3/16	8 5/8	1 1/4	3/4	2 7/16	7/8	7 3/8	5 7/16
3 15/16 4	20-06-0315 20-06-0400	58	6 1/4	10 7/8	4 1/2	9 3/8	1 1/2	3/4	2 11/16	15/16	8 1/8	5 15/16
4 7/16 4 1/2	20-06-0407 20-06-0408	93	6 3/4	13 1/2	4 1/8	11 3/4	1 1/2	3/4***	3 1/32	1	10 1/4	6 13/32
4 15/16 5	20-06-0415 20-06-0500	122	7 1/4	14 3/4	5 1/16	12 3/4	1 3/4	7/8***	2 31/32	1 1/4	11	7 13/32

All product weights are listed in pounds (Lbs.) unless otherwise noted.

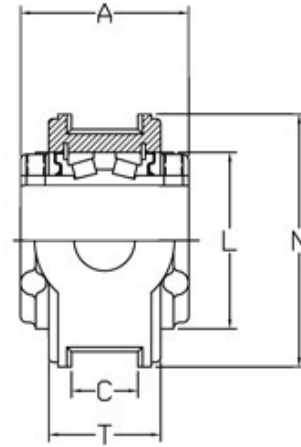
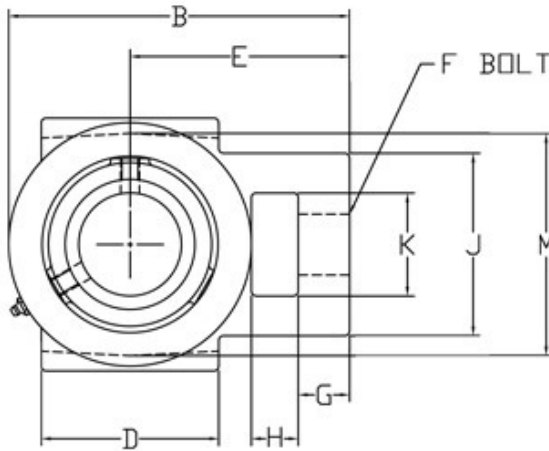
* +.000 - .002

** 4 equally spaced unless otherwise noted.

*** 6 equally spaced

Wide Slot Take-Up Bearings

Type E Wide Slot Take-Up Bearings are designed for use in standard Center Pull Take-Up Frames or similar applications. These units have wide cast ways for supporting guides and are suitable for either horizontal or vertical applications.



Shaft Size	Part Number	Wt.	A	B	C	D	E	F Screw	G	H	J	K	L	M	N	T
1 3/8 1 7/16	20-07-0106 20-07-0107	7.5	3	5 3/32	17/32	2 3/4	3 7/32	3/4	11/16	3/8	2 7/16	1 7/16	2 3/4	3 1/2	4 1/8	2 1/16
1 1/2 1 5/8 1 11/16	20-07-0108 20-07-0110 20-07-0111	11.8	3 3/8	6	21/32	3 1/4	3 13/16	1	15/16	3/4	3 5/16	1 15/16	3 5/16	4	4 3/4	2 5/16
1 3/4 1 7/8 1 15/16 2	20-07-0112 20-07-0114 20-07-0115 20-07-0200	13	3 1/2	6 5/16	21/32	3 3/4	3 15/16	1	15/16	3/4	3 5/16	1 15/16	3 7/16	4	4 3/4	2 7/16
2 3/16	20-07-0203	16	3 3/4	7 1/8	25/32	3 3/4	4 5/8	1 1/8	1	1	3 7/8	2 1/4	3 3/4	4 1/2	5 1/4	2 9/16
2 1/4 2 7/16 2 1/2	20-07-0204 20-07-0207 20-07-0208	22	4	7 13/16	1 1/32	4 1/2	5 1/16	1 1/2	1 1/16	1 1/4	4 1/4	2 1/2	4 1/16	5 5/8	6	2 3/4
2 11/16 2 3/4 2 15/16 3	20-07-0211 20-07-0212 20-07-0215 20-07-0300	29	4 1/2	9 1/8	1 25/32	4 3/4	5 7/8	1 1/2	1 3/8	1 1/4	4 7/8	2 3/4	4 23/32	5 15/16	6 3/4	3

All product weights are listed in pounds (Lbs.) unless otherwise noted.

Type E Selection and Load Ratings

Royersford "Type E" tapered-roller bearings have the capacity to carry heavy radial loads, thrust loads and combined radial/thrust loads. The maximum recommended load which can be applied is limited by various components in the system, such as bearing, housing, shaft, shaft attachment, speed and life requirements as listed in this catalog.

Select a bearing from the "Type E" Selection Chart having a radial load rating at the operating speed equal to or greater than the calculated "Equivalent Radial Load" for the desired L_{10} Life. This simple method is all that is required for the majority of general applications and provides for occasional average shock loads. (Equivalent Radial Load = P)

L_{10} Hours Life is the life which may be expected from at least 90% of a given group of bearings operating under identical conditions.

For L_{10} Hours Life other than those listed in the selection chart, multiply the Equivalent Radial Load by one of the following factors for 50,000 L_{10} Hours Life factor of 1.16; 80,000, 1.34. Then select a bearing from the bold face (30,000 L_{10} ratings only) in the selection chart having rating only greater than this value.

Heavy Service: For heavy shock loads, frequent shock loads or severe vibrations add up to 50% (equivalent to severity of conditions) to the Equivalent Radial Load to obtain a Modified Radial Load.

Thrust load values shown in the table below are recommended as a guide for the radial applications that will give adequate L_{10} life. Where substantial radial load is also present, it is advisable to calculate the L_{10} life to assure it meets the requirements. The maximum thrust load should not exceed the limits shown in the table labeled "Allowable Thrust-Pillow Block Housings." The effectiveness of the shaft attachment to carry thrust load depends on proper tightening of the setscrews, shaft tolerance, and shaft deflection. Therefore, it is advisable to use auxiliary thrust carrying devices such as shaft shoulder, snap

ring, or a thrust collar to locate the bearing under heavier thrust loads or where extreme reliability is desired.

The shaft tolerances recommended are adequate for normal radial, thrust, and radial/thrust load applications. The radial load is limited by the attachment to the shaft (see Table 1). Since the allowable load, especially at low speed, is very large, the shaft should be checked to assure adequate strength.

RPM Range	20-200	201-2000	Over 2000
Recommended Thrust Load	$C_{90}/4$	$C_{90}/8$	$C_{90}/12$

The magnitude and direction of both the thrust and radial load must be taken into account when selecting a housing. When pillow blocks are utilized, heavy loads should be directed through the base. Where a load pulls the housing away from the mounting base, both the hold-down bolts and housing must be of adequate strength. Auxiliary load carrying devices such as shear bars are advisable for side or end loading of pillow blocks and radial loads for flange units.

To determine the L_{10} Hours Life for loads and RPM's not listed, use the following equation:

$$L_{90} = \left(\frac{C_{90}}{P} \right)^{10/3} \times \frac{1,500,000}{\text{RPM}}$$

Where:
 L_{10} = Life, Hours
 C_{90} = Dynamic Capacity, lbs. (Table 1)
 P = Equivalent Radial Load, lbs.

When the load on a two row roller bearing is solely a radial load with no thrust (axial) load, the load is shared equally by both rows of rollers and the equivalent radial load (P) is equal to the actual radial load. However, when a thrust (axial) load is applied, the loading on the two rows is shared unequally depending on the ratio of thrust to radial load. The use of the X radial factor and Y thrust factor from Table 1 convert the actual applied thrust and radial loads to an equivalent radial load which has the same effect on the life of a bearing as a radial load of this magnitude.

$$P = XF_R + YF_A$$

Where:

- P = Equivalent radial load, lbs.
- F_R = Radial load, lbs. - (See Table 1 for allowable slip fit maximum)
- F_A = Thrust (axial) load, lbs.
- e = Thrust to radial load factor (Table 1)
- X = Radial load factor (Table 1)
- Y = Thrust load factor (Table 1)

To find X and Y, first calculate F_A / F_R and compare to e. Determine X and Y from Table 1. Light thrust F_R / F_A less than or equal to e have thrust F_R / F_A greater than e. Substitute all known values into the equivalent radial load equation. The equivalent radial load (P) thus determined can be used in the L_{10} life formula or compared to the allowable equivalent radial load rating desired in the expanded rating table on page 4 to select a bearing.

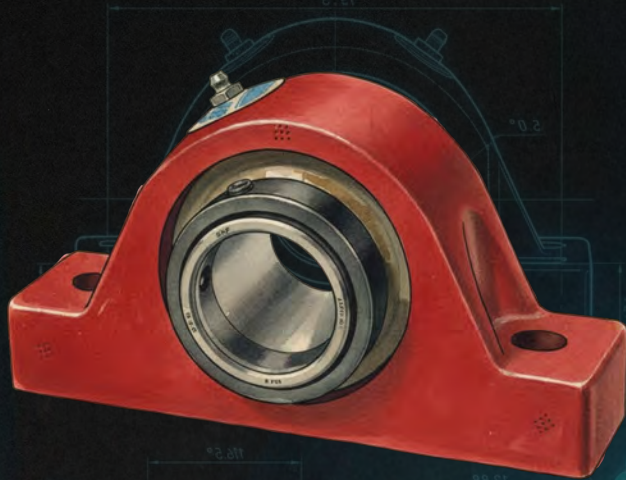
If calculated value of P is less than F_R use
 $P = F_R$

Shaft Size	e	$F_A/F_R \leq e$		$F_A/F_R > e$		Dynamic		Static		Maximum RPM	Maximum Slip Fit Radial Load, F_R^{***}	
		X	Y_1	X	Y_2	C_{90}		C_0			Lbs	N
						Lbs	N	Lbs	N			
1 3/16 - 1 1/4	0.47	1	1.42	0.67	2.12	3040	13500	15760	70000	4490	1420	6300
1 3/8 - 1 1/8 35 MM	0.44	1	1.52	0.67	2.26	4860	21600	26000	115600	3820	2120	9440
1 1/2 - 1 1/4 40 MM	0.43	1	1.57	0.67	2.34	6260	27900	33000	146400	3320	2650	11800
1 3/4 - 2 45 MM, 50 MM	0.32	1	2.11	0.67	3.14	8230	36600	43000	191600	3050	2590	11500
2 3/16 55MM	0.35	1	1.91	0.67	2.84	8720	38800	48200	214000	2730	3040	13500
2 1/4 - 2 1/2 60 MM, 65 MM	0.39	1	1.74	0.67	2.59	9270	41200	54000	240000	2420	3540	15700
2 1/2 - 3 1/2 70 MM, 75 MM	0.45	1	1.50	0.67	2.23	9790	43600	61200	272000	2060	4340	19300
3 1/16 - 3 1/2 80 MM, 85 MM, 90 MM	0.49	1	1.37	0.67	2.04	15600	69400	108600	482000	1640	7560	33600
3 1/2 - 4 100 MM	0.47	1	1.42	0.67	2.12	21400	95300	154000	686000	1530	10000	44500
4 7/16 - 4 1/2 110 MM, 115 MM	0.52	1	1.31	0.67	1.95	26300	117000	188400	838000	1360	13400	59400
4 15/16 - 5 125 MM	0.46	1	1.47	0.67	2.19	36200	161000	266000	1186000	1200	16300	72700

Radial Load Ratings in Pounds

Shaft Sizes	Minimum Hours Life *	Allowable Equivalent Radial Load Rating (lbf) at Various Revolution Per Minute														
		10	25	50	100	250	500	750	1000	1250	1500	1750	2000	2500	3000	3500
1- ³ / ₁₆ 1- ¹ / ₄	10000	6850	5204	4227	3433	2608	2118	1876	1721	1609	1524	1455	1398	1307	1238	1182
	30000	4927	3743	3040	2469	1876	1524	1349	1238	1157	1096	1046	1005	940	890	850
	40000	4519	3433	2789	2265	1721	1398	1238	1135	1062	1005	960	922	862	816	780
	60000	4002	3040	2469	2006	1524	1238	1096	1005	940	890	850	816	764	723	690
	100000	3433	2608	2118	1721	1307	1062	940	862	807	764	729	700	655	620	592
1- ³ / ₈ 1- ¹ / ₂ 35 MM	10000	10951	8319	6757	5489	4169	3387	2999	2751	2573	2436	2326	2234	2090	1978	1889
	30000	7876	5983	4860	3948	2999	2436	2157	1978	1850	1752	1673	1607	1503	1423	1359
	40000	7225	5489	4458	3621	2751	2234	1978	1815	1697	1607	1534	1474	1379	1305	1246
	60000	6398	4860	3948	3206	2436	1978	1752	1607	1503	1423	1359	1305	1221	1156	1104
	100000	5489	4169	3387	2751	2090	1607	1503	1379	1289	1221	1166	1120	1047	992	947
1- ¹ / ₂ 1- ⁵ / ₈ 1- ¹¹ / ₁₆ 40 MM	10000	14106	10716	8704	7070	5371	4362	3863	3543	3314	3137	2996	2878	2692	2548	-
	30000	10145	7707	6260	5085	3863	3137	2778	2548	2383	2257	2155	2070	1936	1833	-
	40000	9306	7070	5742	4664	3543	2878	2548	2338	2186	2070	1976	1899	1776	1681	-
	60000	8241	6260	5085	4130	3137	2548	2257	2070	1396	1833	1750	1681	1572	1489	-
	100000	7070	5371	4362	3543	2692	2186	1936	1776	1661	1572	1501	1442	1349	1277	-
1- ³ / ₄ 1- ⁷ / ₈ 1- ¹⁵ / ₁₆ 2 45 MM 50 MM	10000	18545	14088	11443	9295	7061	5735	5078	4658	4357	4125	3938	3784	3539	3350	-
	30000	13338	10132	8230	6685	5078	4125	3652	3350	3133	2967	2833	2721	2545	2410	-
	40000	12235	9295	7550	6132	4658	3784	3350	3073	2874	2721	2598	2496	2335	2210	-
	60000	10834	8230	6685	5430	4125	3350	2967	2721	2545	2410	2301	2210	2067	1957	-
	100000	9295	7061	5735	4658	3539	2874	2545	2335	2184	2067	1974	1896	1774	1679	-
2- ³ / ₁₆ 55 MM	10000	19649	14927	12124	9848	7481	6076	5381	4936	4616	4370	4173	4009	3749	-	-
	30000	14132	10736	8720	7083	5381	4370	3870	3550	3320	3143	3001	2883	2697	-	-
	40000	12964	9848	7999	6497	4936	4009	3550	3256	3045	2883	2753	2645	2474	-	-
	60000	11479	8720	7083	5753	4370	3550	3143	2883	2697	2553	2438	2342	2190	-	-
	100000	9848	7481	6076	4936	3749	3045	2697	2474	2314	2190	2091	2009	1879	-	-
2- ¹ / ₄ 2- ⁷ / ₁₆ 2- ¹ / ₂ 60 MM 65 MM	10000	20888	15868	12889	10469	7953	6460	5720	5247	4907	4646	4436	4262	3986	-	-
	30000	15023	11413	9270	7530	5720	4646	4114	3774	3529	3342	3191	3065	2867	-	-
	40000	13781	10469	8504	6907	5247	4262	3774	3462	3238	3065	2927	2812	2630	-	-
	60000	12203	9270	7530	6116	4646	3774	3342	3065	2867	2714	2591	2490	2329	-	-
	100000	10469	7953	6460	5247	3986	3238	2867	2630	2459	2329	2223	2136	1998	-	-
2- ¹¹ / ₁₆ 2- ³ / ₄ 2- ¹⁵ / ₁₆ 3 70 MM 75 MM	10000	22060	16758	13612	11056	8399	6822	6041	5541	5182	4907	4685	4501	-	-	-
	30000	15866	12053	9790	7952	6041	4907	4345	3985	3727	3529	3369	3237	-	-	-
	40000	14554	11056	8981	7294	5541	4501	3985	3656	3419	3237	3091	2969	-	-	-
	60000	12887	9790	7952	6459	4907	3985	3529	3237	3028	2866	2737	2629	-	-	-
	100000	11056	8339	6822	5541	4209	3419	3028	2777	2597	2459	2348	2256	-	-	-
3- ³ / ₁₆ 3- ¹ / ₄ 3- ⁷ / ₁₆ 3- ¹ / ₂ 80 MM 85 MM 90 MM	10000	35152	26704	21690	17618	13384	10871	9626	8830	8258	7819	7465	-	-	-	-
	30000	25282	19206	15600	12671	9626	7819	6923	6351	5939	5623	5369	-	-	-	-
	40000	23192	17618	14310	11623	8830	7172	6351	5826	5448	5158	4925	-	-	-	-
	60000	20536	15600	12671	10292	7819	6351	5623	5158	4824	4568	4361	-	-	-	-
	100000	17618	13384	10871	8830	6708	5448	4824	4425	4139	3919	3741	-	-	-	-
3- ¹⁵ / ₁₆ 4 100 MM	10000	48222	36632	29754	24168	18359	14912	13205	12113	11328	10725	-	-	-	-	-
	30000	34682	26346	21400	17382	13205	10725	9497	8712	8148	7714	-	-	-	-	-
	40000	31814	24168	19631	15945	12113	9839	8712	7991	7474	7076	-	-	-	-	-
	60000	28171	21400	17382	14119	10725	8712	7714	7076	6618	6266	-	-	-	-	-
	100000	24168	18359	14912	12113	9202	7474	6618	6071	5678	5375	-	-	-	-	-
4- ⁷ / ₁₆ 4- ¹ / ₂ 110 MM 115 MM	10000	59263	45020	36567	29702	22563	18327	16228	14886	13922	-	-	-	-	-	-
	30000	42623	32379	26300	21362	16228	13181	11672	10706	10013	-	-	-	-	-	-
	40000	39099	29702	24125	19596	14886	12091	10706	9821	9185	-	-	-	-	-	-
	60000	34621	26300	21362	17352	13181	10706	9480	8696	8133	-	-	-	-	-	-
	100000	29702	22563	18327	14886	11308	9185	8133	7461	6978	-	-	-	-	-	-
4- ¹⁵ / ₁₆ 5 125 MM	10000	81571	61966	50332	40882	31057	25226	22337	20490	19163	-	-	-	-	-	-
	30000	58668	44567	36200	29404	22337	18143	16065	14737	13782	-	-	-	-	-	-
	40000	53817	40882	33207	26972	20490	16643	14737	13518	12643	-	-	-	-	-	-
	60000	47653	36200	29404	23883	18143	14737	13049	11970	11195	-	-	-	-	-	-
	100000	40882	31057	25226	20490	15565	12643	11195	10269	9604	-	-	-	-	-	-

* "Minimum Hours Life" is the life which may be expected from at least 90% of a given group of bearings operating under identical conditions. The average life will be approximately five times the minimum life.
 Note: Because the allowable loads, especially at low speeds, are extremely high, be sure that the shaft strength is adequate and pillow blocks are base loaded. When the load line falls outside the base, fastener and housing deflection or failure may occur. These conditions require designs using proper engineering principles applied to materials, fasteners, mounting and etc. with adequate safety factors.

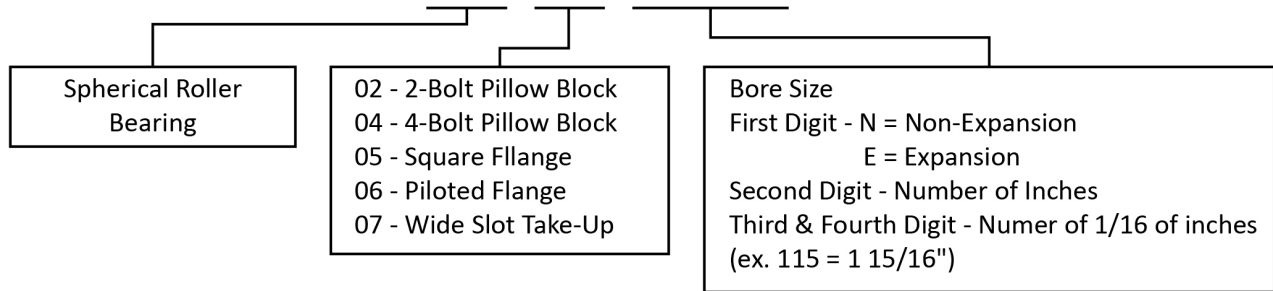


R2000

**MOUNTED SPHERICAL ROLLER
BEARINGS WITH SKF INSERTS**

R2000 Nomenclature

40-02-N115



*All standard units include suffix -501

**Additional suffixes (5XX) will be used to designate modified or special assemblies

R2000 Component and Replacement Kit Nomenclature

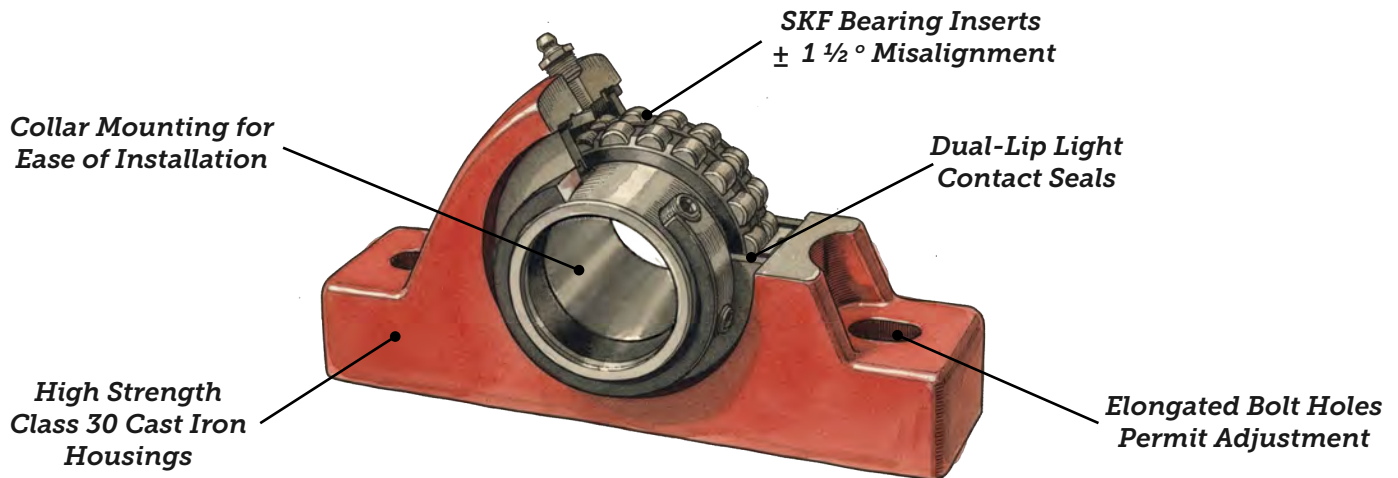
Item	P/N	Description
1	40-22-XXXX	RPB-2B
2	40-24-XXXX	RPB-4B
3	40-25-XXXX	RFB
4	40-26-XXXX	RPFB
5	40-27-XXXX	RTU
6	40-RK-XXXX	Replacement Kit
7	40-SR-XXXX	Snap Ring
8	40-SL-XXXX	Seals

Notes

- Items 1-5: These are replacement machined housings
- Item 6: Includes all SKF parts, 3 snap rings, and 2 seals
- Items 7 & 8: These are miscellaneous parts
- Items 1-8: -XXXX Refers to Nominal Bearing Size. Ex -0103

R2000 Mounted Spherical Bearings

Royersford R2000 Mounted Spherical Bearings are engineered to handle misalignment and last. Made in the USA with compact, rugged gray iron housings and premium SKF spherical inserts to deliver long-lasting performance in applications requiring high load capacity and self-alignment. Designed for fast installation and dependable operation, R2000 bearings are available in shaft sizes from 1 $\frac{7}{16}$ " through 5" and widely stocked throughout the US and Canada.



Interchangeable with other collar mounted spherical roller bearings in single piece housings

Key Benefits:

- Self-Aligning spherical strength for demanding applications
- Heavy radial & axial load capacity
- Factory assembled, sealed, and lubricated
- Handles $\pm 1 \frac{1}{2}^\circ$ misalignment
- Expansion units provide 0.100" movement
- SKF spherical performance with Royersford durability

Why SKF Spherical Bearings Stand Out

- Engineered for demanding industrial environments
- Excellent performance under high loads
- Allows both running and static misalignment
- Operates reliably at elevated temperatures

Materials & Construction

- High-strength gray iron housings, made in the USA
- Compact footprint without sacrificing ruggedness
- Fully machined mounting surfaces for precise alignment
- Available in 2 and 4-bolt pillow blocks, square and piloted flanges, and take-up units

Expansion & Non-Expansion Options

- Non-Expansion units: Fixed for precise shaft control
- Expansion units: Allow up to 0.100" axial movement
- Both styles handle $\pm 1 \frac{1}{2}^\circ$ misalignment for easier installation and longer bearing life

Sealing System (Dual-Lip Seal)

- Blocks contaminants
- Retains lubrication
- Self-purging to extend service life

Installation Advantages

- Delivered pre-lubricated, pre-sealed, and pre-adjusted
- Eliminates contamination during setup
- Reduces downtime
- Simplifies Maintenance
- Avoids premature failure
- Self-aligning design allows for fast mounting

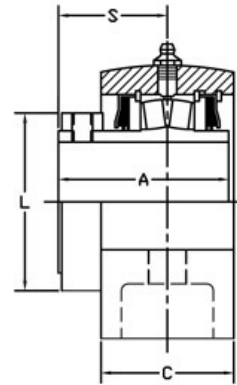
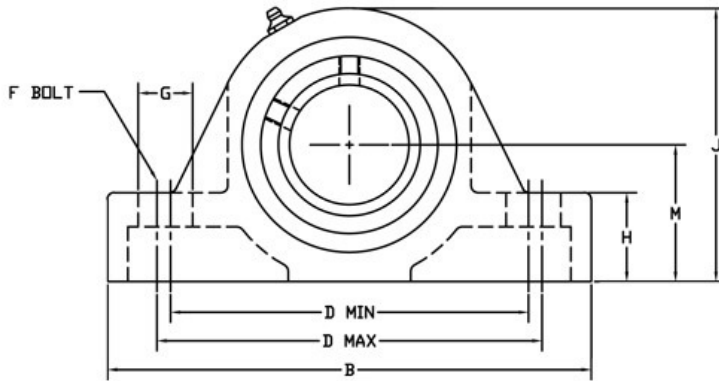
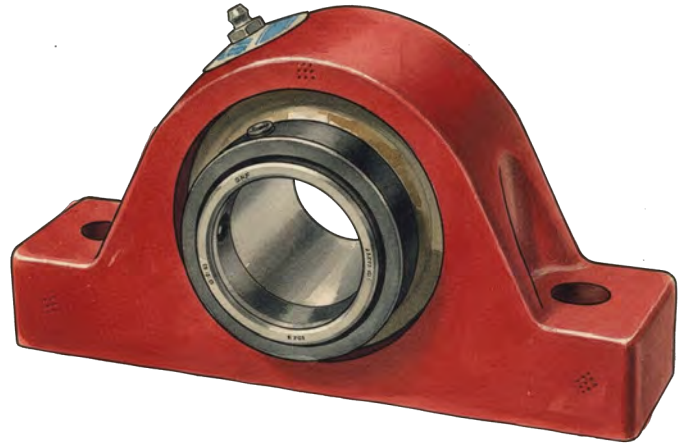
Common Industry Applications and Equipment Uses

(include but are not limited to)

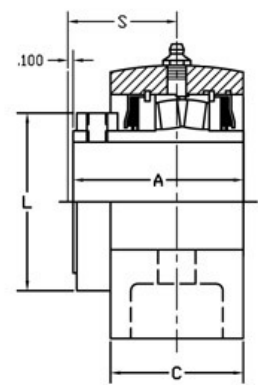
- **Industries:** Aggregates, Mining, Cement, Bulk Handling Equipment, Pulp & Paper, and Conveying
- **Applications:**
 - Conveyors and Material Handling Systems
 - Fans, Blowers, and Ventilation Systems
 - Agricultural Machinery
 - Processing Equipment is subject to misalignment or vibration

2-Bolt Pillow Block Bearings

R2000 Pillow Blocks are the most widely used of the series due to the variety of mounting methods. All units are supplied with SKF spherical roller bearings, set screw locking collars, and Royersford's exclusive dual-lip, light contact seals.



NON-EXPANSION

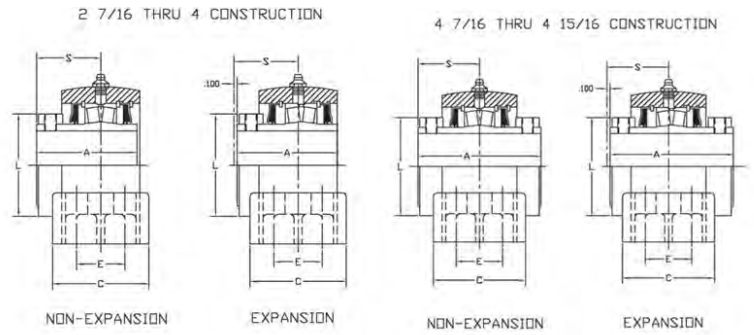
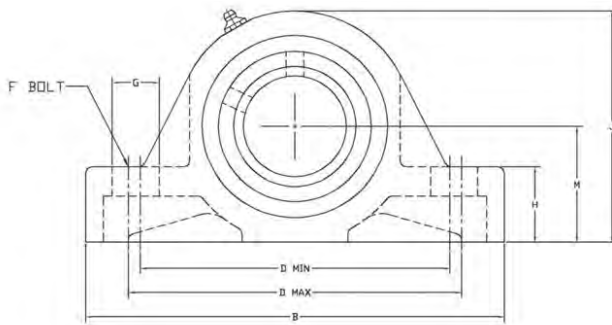
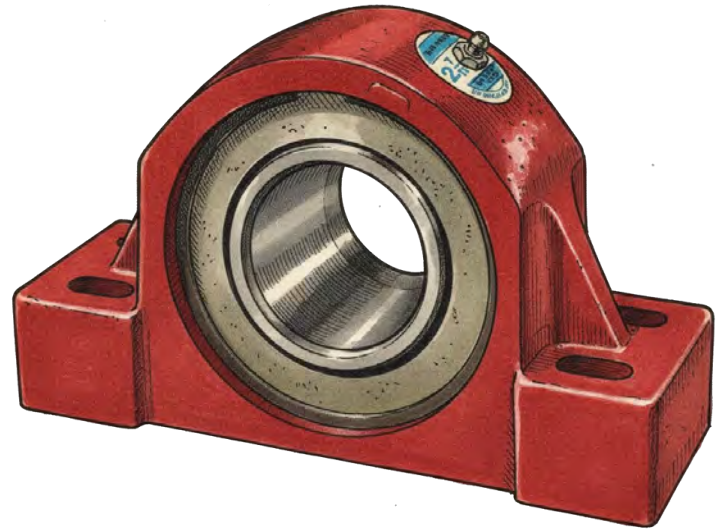


EXPANSION

Shaft Size (in.)			Wt.	A (in.)	B (in.)	C (in.)	D (Min.) (in.)	D (Max.) (in.)	F Bolt (in.)	G (in.)	H (in.)	J (in.)	L (in.)	M (in.)	S (in.)
	Non-Expansion	Expansion													
1 1/16 1 1/2	40-02-N107 40-02-N108	40-02-E107 40-02-E108	7	2 3/4	6 7/8	2 3/16	4 11/16	5 5/16	1/2	7/8	1 3/16	3 7/8	2 3/8	1 7/8	1 3/4
1 1/4 1 3/4	40-02-N111 40-02-N112	40-02-E111 40-02-E112	8.1	2 7/8	7 7/8	2 3/16	5 3/16	5 13/16	1/2	7/8	1 1/16	4 1/4	2 3/8	2 1/8	1 7/8
1 15/16 2	40-02-N115 40-02-N200	40-02-E115 40-02-E200	10	2 7/8	8 3/8	2 3/16	6	6 1/2	3/4	1 1/16	1 3/8	4 3/8	2 7/8	2 1/4	1 7/8
2 1/16	40-02-N203	40-02-E203	12	3 3/8	8 7/8	2 1/16	6 1/16	7 1/16	3/4	1	1 3/8	5	3 3/4	2 1/2	2
2 1/4 2 1/2	40-02-N207 40-02-N208	40-02-E207 40-02-E208	18.1	3 3/8	9 1/4	2 1/16	6 13/16	7 1/16	3/4	1	1 3/4	5 1/16	4	2 3/4	2 1/8
2 11/16 2 3/4 2 15/16 3	40-02-N211 40-02-N212 40-02-N215 40-02-N300	40-02-E211 40-02-E212 40-02-E215 40-02-E300	23.2	3 3/8	10 7/16	2 13/16	7 13/16	8 7/16	3/4	1 1/16	2	6 1/16	4 1/2	3 1/4	2 3/8
3 1/16 3 1/2	40-02-N307 40-02-N308	40-02-E307 40-02-E308	33.7	4 1/2	13	3 1/16	9 3/16	10 13/16	3/4	1 3/4	2 1/4	7 1/2	5 3/8	3 3/4	2 13/16
3 11/16 3 15/16 4	40-02-N311 40-02-N315 40-02-N400	40-02-E311 40-02-E315 40-02-E400	55.6	4 13/16	14 1/4	3 1/16	10	11 3/4	1	2	2 1/2	8 1/16	6	4 3/8	2 3/4

All product weights are listed in pounds (Lbs.) unless otherwise noted.

4-Bolt Pillow Block Bearings

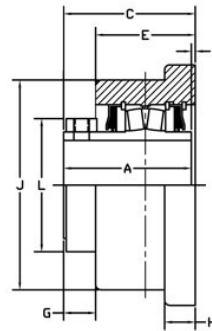
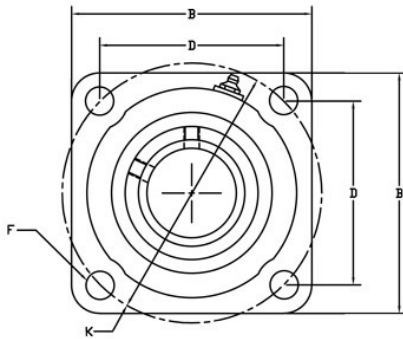


Shaft Size (in.)	Construction		Wt.	A (in.)	B (in.)	C (in.)	D (Min.) (in.)	D (Max.) (in.)	E (in.)	F Bolt (in.)	G (in.)	H (in.)	J (in.)	L (in.)	M (in.)	S (in.)
	Non-Expansion	Expansion														
2 7/16 2 1/2	40-04-N207 40-04-N208	40-04-E207 40-04-E208	18.7	3 3/8	9 1/4	3 3/4	6 7/8	7 7/8	1 3/8	1/2	1	1 3/4	5 11/16	4	2 3/4	2 1/8
2 11/16 2 3/4 2 15/16 3	40-04-N211 40-04-N212 40-04-N215 40-04-N300	40-04-E211 40-04-E212 40-04-E215 40-04-E300	25.6	3 3/8	10 7/16	3 3/4	7 7/8	8 3/8	1 7/8	5/8	1	2	6 7/16	4 1/2	3 1/4	2 3/8
3 1/16 3 1/2	40-04-N307 40-04-N308	40-04-E307 40-04-E308	36.7	4 1/2	13	3 3/8	9 1/4	10 3/4	2	3/4	1 1/2	2 1/4	7 1/2	5 1/8	3 3/4	2 15/32
3 11/16 3 15/16 4	40-04-N311 40-04-N315 40-04-N400	40-04-E311 40-04-E315 40-04-E400	57	4 15/32	15 1/4	4 1/2	11	13	2 1/4	3/4	1 7/8	2 1/2	8 7/16	6	4 1/4	2 31/32
4 1/16 4 1/2	40-04-N407 40-04-N408	40-04-E407 40-04-E408	67.6	6 1/8	16 5/8	4 3/8	13	14	2 1/2	3/4	1 3/8	2 3/4	9 3/8	6 1/8	4 3/4	3 1/16
4 15/16 5	40-04-N415 40-04-N500	40-04-E415 40-04-E500	100	6 3/8	18 1/2	5 1/8	15	16	2 3/4	7/8	1 1/2	3	10 7/8	6 3/8	5 1/2	3 1/16

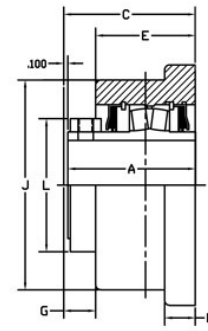
All product weights are listed in pounds (Lbs.) unless otherwise noted.

Square Flange Bearings

R2000 Square Flange Bearings offer all of the features of the pillow block series. These units are well suited for mounting on horizontal or vertical frames or supports. All units are supplied with SKF spherical roller bearings, set screw locking collars, and Royersford's exclusive dual-lip, light contact seals.



NON-EXPANSION



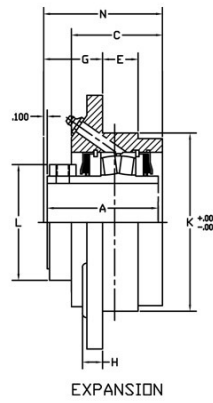
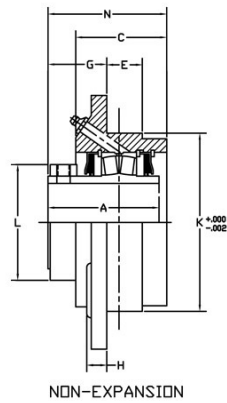
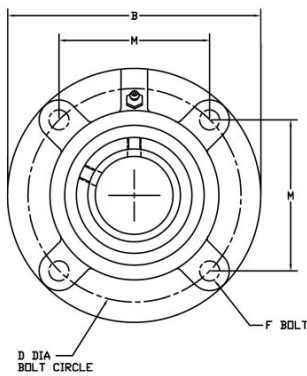
EXPANSION

Shaft Size (in.)	Expansion		Wt.	A (in.)	B (in.)	C (in.)	D (in.)	E (in.)	F Bolt (in.)	G (in.)	H (in.)	J (in.)	K (in.)	L (in.)	P (in.)
	Non-Expansion	Expansion													
1 1/16 1 1/2	40-05-N107 40-05-N108	40-05-E107 40-05-E108	7.2	2 3/4	4 5/8	2 7/8	3 1/2	2 1/4	1/2	5/8	3/4	3 3/8	5	2 3/8	1/8
1 1/4 1 3/4	40-05-N111 40-05-N112	40-05-E111 40-05-E112	10	2 7/8	5	3	3 7/8	2 1/4	1/2	3/4	3/4	4 1/2	5 1/2	2 7/8	1/8
1 5/16 2	40-05-N115 40-05-N200	40-05-E115 40-05-E200	11	2 7/8	5 1/8	3	4 1/8	2 1/4	1/2	3/4	3/4	4 3/4	5 3/4	2 7/8	1/8
2 1/16	40-05-N203	40-05-E203	13.5	3 1/8	5 7/8	3 7/8	4 1/2	2 1/8	5/8	25/32	3/4	5 1/8	6 3/8	3 1/4	3/32
2 1/8 2 1/2	40-05-N207 40-05-N208	40-05-E207 40-05-E208	17.3	3 3/8	6 3/8	3 15/32	4 25/32	2 11/16	5/8	25/32	7/8	5 3/4	6 3/4	4	3/32
2 1/4 2 3/4 2 15/16 3	40-05-N211 40-05-N212 40-05-N215 40-05-N300	40-05-E211 40-05-E212 40-05-E215 40-05-E300	28.5	3 5/8	7 3/8	3 13/16	5 1/8	2 7/8	3/4	15/16	1	6 5/8	7 7/8	4 1/2	3/16
3 1/16 3 1/2	40-05-N307 40-05-N308	40-05-E307 40-05-E308	40.6	4 1/2	8 3/8	4 1/4	6 23/32	3 3/8	3/4	15/16	1 1/8	7 3/8	9 1/2	5 1/8	7/32
3 1/4 3 15/16 4	40-05-N311 40-05-N315 40-05-N400	40-05-E311 40-05-E315 40-05-E400	69.1	4 13/32	9 1/2	4 3/4	7 17/32	3 3/8	7/8	1 1/8	1 3/8	8 3/8	10 3/4	6	5/32

All product weights are listed in pounds (Lbs.) unless otherwise noted.

Piloted Flange Bearings

R2000 Piloted Flange Bearings offer all of the features of the pillow block series. These units are well suited for mounting on horizontal or vertical frames or supports. All units are supplied with SKF spherical roller bearings, set screw locking collars, and Royersford's exclusive dual-lip, light contact seals.

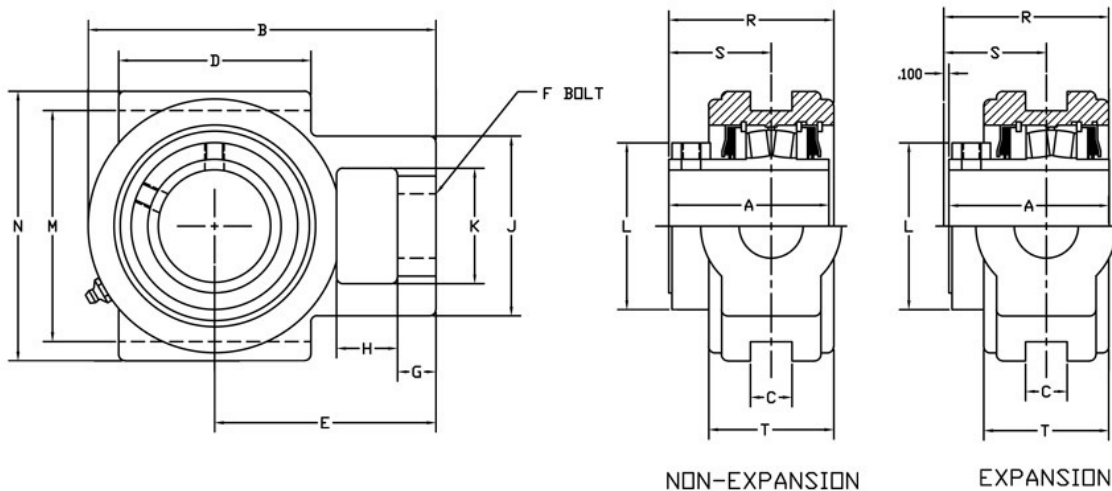
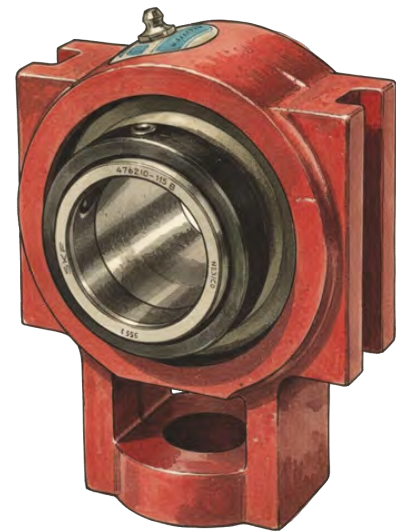


Shaft Size (in.)	Non-Expansion	Expansion	Wt.	A (in.)	B (in.)	C (in.)	D (in.)	E (in.)	F Bolt (in.)	G (in.)	H (in.)	K* (in.)	L (in.)	M (in.)	N (in.)
1 1/16 1 1/2	40-06-N107 40-06-N108	40-06-E107 40-06-E108	7	2 3/4	5 1/4	2 3/16	4 3/8	3/4	3/8	1 15/32	1/2	3 5/8	2 3/8	3 3/32	2 13/16
1 13/16 1 3/4	40-06-N111 40-06-N112	40-06-E111 40-06-E112	8.5	2 7/8	6 1/8	2 3/16	5 1/8	7/8	7/16	1 1/2	1/2	4 1/4	2 5/8	3 5/8	2 13/16
1 15/16 2	40-06-N115 40-06-N200	40-06-E115 40-06-E200	10.5	2 7/8	6 3/8	2 3/16	5 3/8	7/8	7/16	1 1/2	9/16	4 1/2	2 7/8	3 5/16	2 7/8
2 3/16	40-06-N203	40-06-E203	14.5	3 1/8	7 3/8	2 7/16	6	1	1/2	1 9/16	9/16	5	3 1/4	4 1/4	3 1/4
2 7/16 2 1/2	40-06-N207 40-06-N208	40-06-E207 40-06-E208	16	3 3/8	7 5/8	2 11/16	6 1/2	1	1/2	1 7/8	5/8	5 1/2	4	4 19/32	3 1/2
2 11/16 2 3/4 2 15/16 3	40-06-N211 40-06-N212 40-06-N215 40-06-N300	40-06-E211 40-06-E212 40-06-E215 40-06-E300	22	3 5/8	8 3/4	2 13/16	7 1/2	1 1/4	5/8	2	3/4	6 3/8	4 1/2	5 19/64	3 13/16
3 7/16 3 1/2	40-06-N307 40-06-N308	40-06-E307 40-06-E308	33	4 1/32	10 1/4	3 3/16	8 5/8	1 1/4	3/4	2 5/16	15/16	7 3/8	5 1/8	6 3/32	4 1/4
3 11/16 3 15/16 4	40-06-N311 40-06-N315 40-06-N400	40-06-E311 40-06-E315 40-06-E400	45	4 19/32	10 7/8	3 9/16	9 3/8	1 1/2	3/4	2 5/8	1 1/16	8 1/8	6	6 5/8	4 3/4

All product weights are listed in pounds (Lbs.) unless otherwise noted.
 * + .000 - .002

Wide Slot Take-Up Bearings

R2000 Wide Slot Take-Up Bearings are designed for use in standard Center Pull Take-Up frames or similar applications. These units have wide cast ways for supporting guides and are suitable for either horizontal or vertical applications. All units are supplied with SKF spherical roller bearings, set screw locking collars, and Royersford's exclusive dual lip, light contact seals.



Shaft Size (in.)	Expansion		Wt.	A (in.)	B (in.)	C (in.)	D (in.)	E (in.)	F Bolt (in.)	G (in.)	H (in.)	J (in.)	K (in.)	L (in.)	M (in.)	N (in.)	R (in.)	S (in.)	T (in.)
	Non-Expansion	Expansion																	
1 7/16 1 1/2	40-07-N107 40-07-N108	40-07-E107 40-07-E108	7	2 3/4	5 3/8	1 7/16	3	3 1/16	3/4	5/8	1 1/16	2 7/16	1 7/16	2 3/8	3 1/2	4 1/8	2 27/32	1 3/4	2 3/16
1 11/16 1 3/4	40-07-N111 40-07-N112	40-07-E111 40-07-E112	9.2	2 7/8	6	1 1/16	3 3/8	3 13/16	1	3/4	1 1/16	2 7/8	1 15/16	2 3/8	4	4 3/4	2 31/32	1 7/8	2 3/16
1 15/16 2	40-07-N115 40-07-N200	40-07-E115 40-07-E200	14	2 7/8	6 1/8	1 1/16	3 1/2	3 15/16	1	3/4	1 1/16	2 7/8	1 15/16	2 7/8	4	4 3/4	2 31/32	1 7/8	2 3/16
2 3/16	40-07-N203	40-07-E203	18	3 1/8	6 25/32	1 1/16	3 3/4	4 1/8	1 1/8	3/4	1 1/16	3 1/2	2 1/4	3 1/4	4 1/2	5 1/4	3 7/32	2	2 7/16
2 7/16 2 1/2	40-07-N207 40-07-N208	40-07-E207 40-07-E208	24	3 3/8	7 3/4	1 1/16	4 3/4	4 15/16	1 1/4	7/8	1 1/16	3 3/4	2 1/2	4	5 1/8	5 7/8	3 15/32	2 1/8	2 15/16
2 11/16 2 3/4 2 15/16 3	40-07-N211 40-07-N212 40-07-N215 40-07-N300	40-07-E211 40-07-E212 40-07-E215 40-07-E300	30.5	3 3/8	8 13/16	1 13/16	4 3/4	5 5/16	1 1/2	1	1 1/16	4 1/4	2 3/4	4 1/2	5 15/16	6 3/4	3 29/32	2 3/8	2 13/16
3 7/16 3 1/2	40-07-N307 40-07-N308	40-07-E307 40-07-E308	37	4 1/2	10 1/8	1 13/16	6 1/4	6 7/16	1 3/4	1	1 13/16	4 7/8	2 7/8	5 1/8	6 13/16	7 3/8	4 3/16	2 19/32	3 3/16
3 11/16 3 15/16 4	40-07-N311 40-07-N315 40-07-N400	40-07-E311 40-07-E315 40-07-E400	47.3	4 19/32	11 15/16	2 1/16	7	7 3/8	2	1 1/8	2 1/8	5 3/8	3 3/8	6	8 3/8	9 1/16	4 3/4	2 31/32	3 3/16

All product weights are listed in pounds (Lbs.) unless otherwise noted.

R2000 Selection and Load Ratings

Royersford R2000 Spherical Roller Bearings have the capacity to carry substantial radial loads, thrust loads and combined radial/thrust loads. The maximum recommended load which can be applied is limited by the various components of the system, such as bearing, housing, shaft, shaft attachment, speed and life requirements as listed in this catalog.

Select a bearing from the R2000 Selection Chart having a radial load rating at the operating speed equal to or greater than the calculated "Equivalent Radial Load" for a desired L_{10} Life. This simple method is all that is required for a majority of general applications and provides for occasional average shock loads.

L_{10} Hours of Life – is the life that may be expected from at least 90% of a given group of bearings operating under identical conditions.

To determine L_{10} hours for loads & RPM's not listed, use the following equation.

$$L_{10} = \left(\frac{C}{P} \right)^{10/3} \times \frac{16667}{\text{RPM}}$$

Where:

L_{10} = Life hours
 C = Dynamic Capacity (from table 1)
 P = Equivalent Radial Load

If the load on a double row spherical bearing is only in the radial direction (no axial load), the Equivalent Radial Load (P) is equal to the actual radial load. In situations where the bearing load consists of radial and axial (thrust) loads, the total load must be converted into an Equivalent Radial Load by the following equation.

$$P = XF_R + YF_A$$

Where:

F_A = Axial (thrust) Load
 F_R = Radial Load
 X = Radial Load Factor from table 1
 Y = Thrust Load Factor from table 1

To find the X and Y values, first calculate F_A/F_R and compare to the value of e in Table 1. Using the appropriate values for X and Y, substitute all known values into the Equivalent Radial Load equation. The result can then be used to determine the L_{10} life or compared to the radial load ratings in Table 2.

If P is less than F_R use $P=F_R$

If you have only axial (thrust) load, the equivalent radial load $P = YF_A$ where Y is taken from the column for values $>e$.

The magnitude and direction of both radial and thrust loads must be taken into account when selecting a housing. When pillow blocks are utilized, heavy loads should be directed thru the base. Where

a load pulls the housing away from the mounting base, both the hold-down bolts and housing must be of adequate strength. Auxiliary load carrying devices (such as shear bars) are advisable for side or end loading of pillow blocks and radial loads for flanged units.

The effectiveness of the shaft attachment to carry a thrust load depends on proper tightening of the set screws, shaft tolerance and shaft deflections. It is advisable to use auxiliary thrust carrying devices (shaft shoulder, thrust collar, snap ring, etc.) to locate the bearing under heavier thrust loads or where extreme reliability is desired (see Table 3 for set screw information).

The shaft tolerances recommended below are adequate for normal radial and radial/thrust load applications. Where the applied radial load exceeds the Maximum Slip Fit Radial Load, a snug-to-light press fit of the shaft is required. Since the allowable load, especially at low RPM, is very large, the shaft should be checked to assure adequate shaft strength.

Shaft Tolerances	
SHAFT SIZE	TOLERANCE
UP TO 1-15/16"	+ .0000 - .0005"
2" TO 5"	+ .0000 - .0010"

Table 1 – Radial/Thrust Factors

Shaft Size	e	$F_A/F_R \leq e$		$F_A/F_R > e$		Dynamic		Static	Maximum RPM	Maximum Slip Fit Radial Load, F_R
		X	Y_1	X	Y_2	Lbs	N	Lbs		Lbs
1 7/16 - 1 1/2	0.28	1.0	2.4	0.67	3.6	16600	73400	18300	2800	2000
1 13/16 - 1 3/4	0.26	1.0	2.6	0.67	3.9	17300	77000	19800	2650	2100
1 15/16 - 2	0.24	1.0	2.8	0.67	4.2	19000	84500	22500	2400	2300
2 3/16	0.24	1.0	2.8	0.67	4.2	22400	99600	26500	2150	2700
2 7/16 - 2 1/2	0.24	1.0	2.8	0.67	4.2	33300	148000	41100	1800	4000
2 11/16 - 3	0.22	1.0	3.0	0.67	4.6	35500	158000	46800	1600	4200
3 3/16 - 3 1/2	0.23	1.0	2.9	0.67	4.4	56900	253000	76400	1300	6800
3 11/16 - 4	0.24	1.0	2.8	0.67	4.2	69900	311000	93300	1200	8400
4 7/16 - 4 1/2	0.25	1.0	2.7	0.67	4.0	91700	408000	126000	1100	11000
4 15/16 - 5	0.26	1.0	2.6	0.67	3.9	123000	547000	180000	900	14800

Table 3 - Set Screw Information

Shaft Size (Inches)	Set Screw		Tightening Torque (In-Lbs)	Permissible Axial Load (Lbs)
	No.	Size		
1 7/16 - 2 3/16	2	3/8"-24	250	515
2 7/16 - 3 1/2	2	1/2"-20	620	900
3 11/16 - 4	2	5/8"-18	1325	1200
4 7/16 - 5	4	5/8"-18	1325	2400

Table 2 – Easy Selection Table

Shaft Size (inches)	L ₁₀ Life Hours	Radial Load Ratings (Lbs.) at Various Revolutions per Minute									
		50	100	250	500	1000	1200	1500	1750	2000	2500
1 1/16 1 1/8	5000	7365	5980	4545	3690	3000	2835	2655	2535	2435	2275
	10000	5980	4860	3690	3000	2435	2305	2155	2055	1975	1850
	30000	4300	3495	2655	2455	1750	1655	1550	1480	1420	1330
	50000	3690	3000	2275	1850	1500	1420	1330	1270	1220	1140
	100000	3000	2435	1850	1500	1220	1155	1080	1030	990	825
1 1/16 1 1/4	5000	7675	6235	4735	3845	3125	2955	2765	2640	2535	2370
	10000	6235	5065	3845	3125	2535	2400	2245	2145	2060	1925
	30000	4485	3640	2765	2245	1825	1725	1615	1540	1480	1385
	50000	3845	3125	2370	1925	1565	1480	1385	1320	1270	1190
	100000	3125	2535	1925	1565	1270	1200	1125	1075	1030	966
1 1/16 2	5000	8430	6845	5200	4225	3430	3245	3035	2900	2785	-
	10000	6845	5560	4225	3430	2785	2635	2465	2355	2260	-
	30000	4925	4000	3035	2465	2005	1900	1775	1695	1625	-
	50000	4225	3430	2605	2115	1720	1625	1520	1450	1395	-
	100000	3430	2785	2115	1720	1395	1320	1235	1180	1135	-
2 1/16	5000	9940	8070	6130	4980	4045	3830	3580	3420	3285	-
	10000	8070	6555	4980	4045	3285	3110	2910	2775	2665	-
	30000	5805	4715	3580	2910	2360	2235	2090	1995	1920	-
	50000	4980	4045	3070	2495	2025	1920	1795	1710	1645	-
	100000	4045	3285	2495	2025	1645	1555	1455	1390	1335	-
2 1/16 2 1/2	5000	14775	12000	9115	7405	6015	5695	5325	5085	4885	-
	10000	12000	9745	7405	6015	4885	4625	4325	4130	3965	-
	30000	8630	7010	5325	4325	3510	3325	3110	2970	2850	-
	50000	7405	6015	4570	3410	3015	2850	2665	2545	2445	-
	100000	6015	4885	3710	3015	2445	2315	2165	2070	1985	-
2 1/16 3	5000	15750	12795	9720	7895	6410	6070	5675	5420	-	-
	10000	12795	10390	7895	6410	5205	4930	4610	4400	-	-
	30000	9200	7475	5675	4610	3745	3545	3315	3165	-	-
	50000	7895	6410	4870	3955	3210	3040	2845	2715	-	-
	100000	6410	5205	3955	3210	2610	2470	2310	2205	-	-
3 1/16 3 1/2	5000	25250	20510	15580	12655	10275	9730	-	-	-	-
	10000	20510	16655	12655	10275	8345	7905	-	-	-	-
	30000	14750	11980	9100	7390	6005	5685	-	-	-	-
	50000	12655	10275	7805	6340	5150	4875	-	-	-	-
	100000	10275	9345	6340	5150	4180	3960	-	-	-	-
3 1/16 4	5000	31020	25195	19140	15545	12625	11955	-	-	-	-
	10000	25165	20465	15545	12625	10255	9710	-	-	-	-
	30000	18120	14705	11180	9080	7375	6980	-	-	-	-
	50000	15545	12625	9590	7790	6325	5990	-	-	-	-
	100000	12625	10255	7790	6325	5140	4865	-	-	-	-
4 1/16 4 1/2	5000	40695	66050	25110	20395	16565	15680	-	-	-	-
	10000	33050	26845	20395	16565	13455	12740	-	-	-	-
	30000	23770	19310	14665	11915	9675	9160	-	-	-	-
	50000	20395	16565	12585	10220	8300	7860	-	-	-	-
	100000	16565	13455	10220	8300	6740	6385	-	-	-	-
4 1/16 5	5000	54585	44335	33680	27355	22220	-	-	-	-	-
	10000	44335	36010	27355	22220	18045	-	-	-	-	-
	30000	31885	25900	19675	15980	12980	-	-	-	-	-
	50000	27355	22220	16880	13710	11135	-	-	-	-	-
	100000	22220	18045	13710	11135	9045	-	-	-	-	-

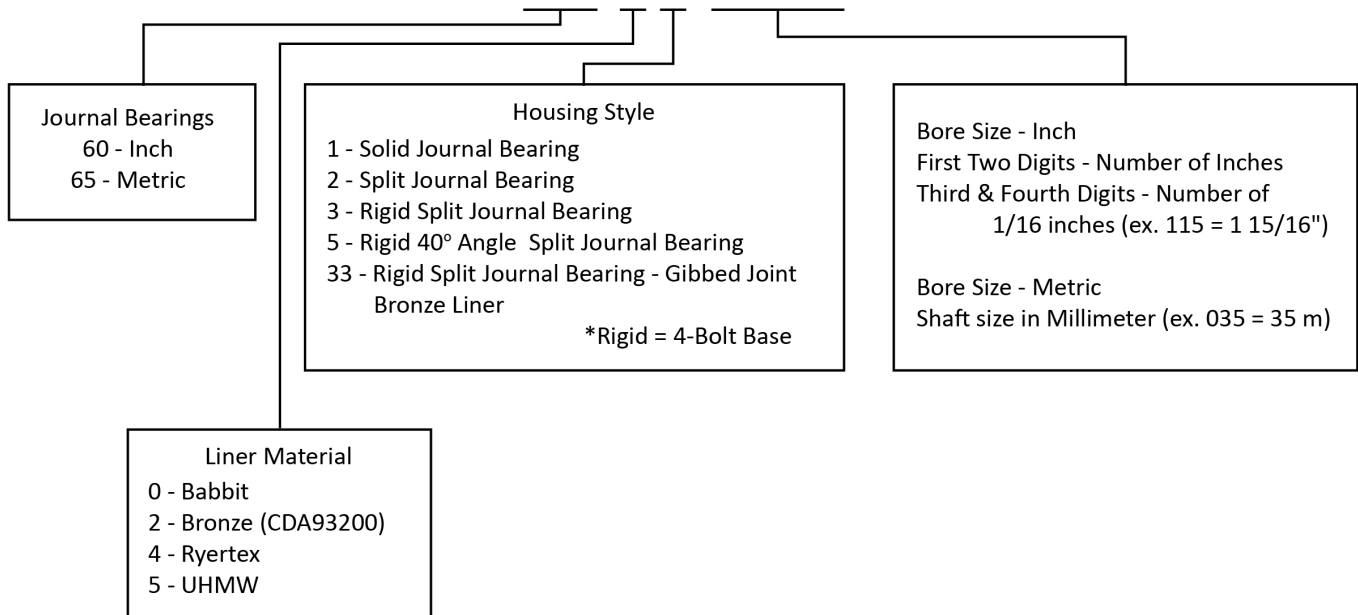




JOURNAL BEARINGS

Journal Bearings Nomenclature

60-01-0115

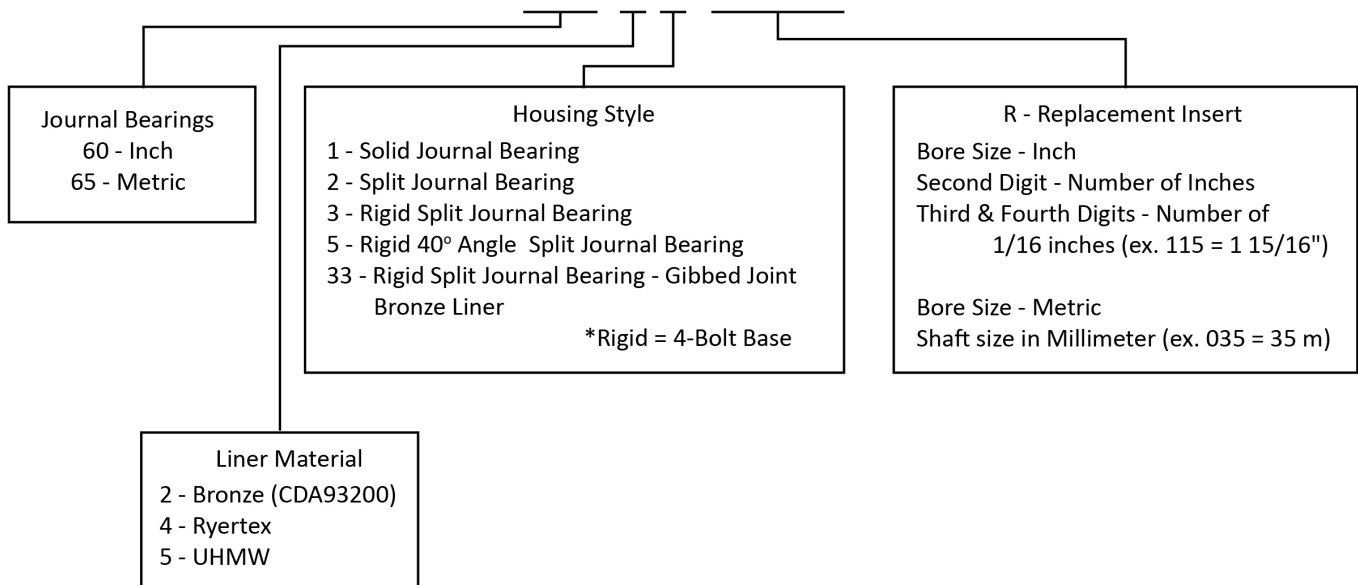


*All standard units include suffix -501

**Additional suffixes (5XX) will be used to designate modified or special assemblies

Replacement Nomenclature

60-2X-R115

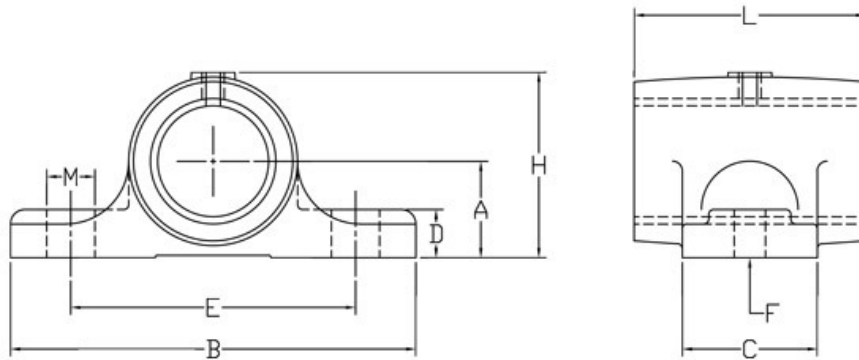


*All standard units include suffix -501

**Additional suffixes (5XX) will be used to designate modified or special assemblies

Journal Bearings

Royersford Journal Bearings are backed by generations of American manufacturing experience, delivering reliable performance, material flexibility, long service life, precision machining for demanding industrial environments, and the confidence that comes from domestic production. Our Journal Bearings are made in the USA and built for reliable, continuous operation in base-load applications running at moderate speeds.



Key Benefits

- Designed for continuous duty at moderate operating speeds
- Available in solid or split housings and a choice of Babbitt or Bronze liner materials
- Manufactured with a high-strength gray iron housing
- Special materials available for high-temperature, submerged, or unique applications
- Slotted mounting holes for easy alignment and adjustment
- Precision-machined and ready-to-install construction
- Multiple material and configuration options reduce customization lead time
- Alternate housing and liner materials, non-standard sizes, and metric sizes available upon request

Bearing Materials & Temperature Ratings

Royersford Journal Bearings are available in multiple materials to suit specific load and temperature requirements:

- **Babbitt Bearings**
 - Recommended for ambient temperatures up to 130° F
 - Ideal for standard base-load applications
- **Bronze Bearings**
 - Suitable for higher or impact loads
 - Operates at ambient temperatures up to 300° F
- **Specialty Materials**
 - Alternate liner materials include, but are not limited to: UHMW, Ryertex, Aluminum Bronze, Oilite Bronze
 - Alternate housing materials include, but are not limited to: Steel, Cast Iron with Specialty Coatings, and plastic

Housing & Construction

- American-made and machined housings, broached and bored for precise fit
- Integrated grease grooves for consistent lubrication
- Housings tapped for grease cups or pressure style fittings
- Ends finished to serve as bearing surfaces for sheaves or collars

Installation Advantages

- Simple, compact design supports fast installation and minimizes downtime
- Slotted mounting allows easy alignment and adjustment
- Factory machining and material options reduce on-site work and downtime

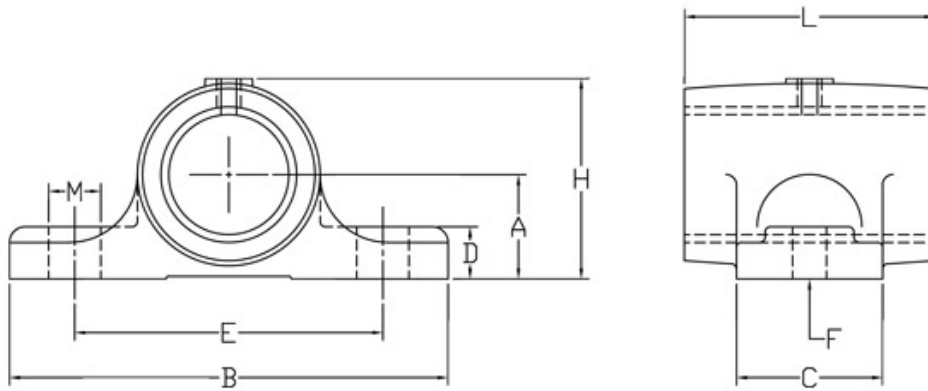
Common Industry Applications & Equipment Uses

(include but are not limited to)

- **Industries:** Conveying, Material Handling, Mining & Aggregate, Pulp & Paper, Steel & Metals Processing, Cement & Bulk Material Handling, Marine Propulsion, Oil & Gas, and Water & Wastewater Treatment
- **Applications:**
 - Power Transmission & Line Shafting
 - Conveyor Rollers & Idlers
 - Fans, Blowers, Pumps, and Rotating Equipment
 - Light to Moderate-Duty Machinery

Solid Journal Bearings (Babbitt)

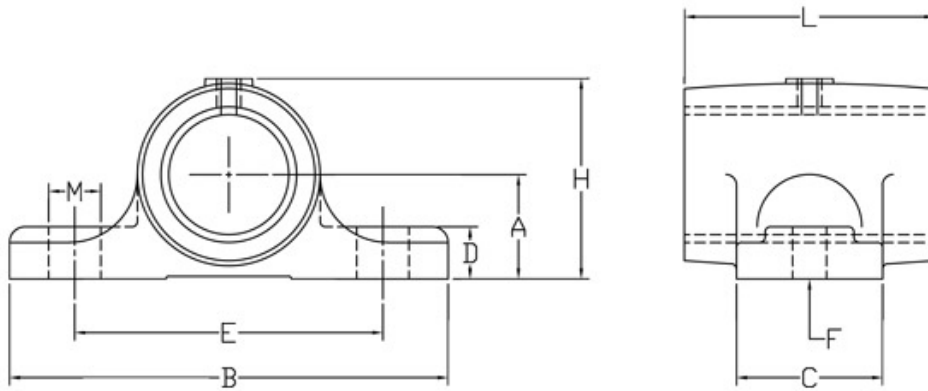
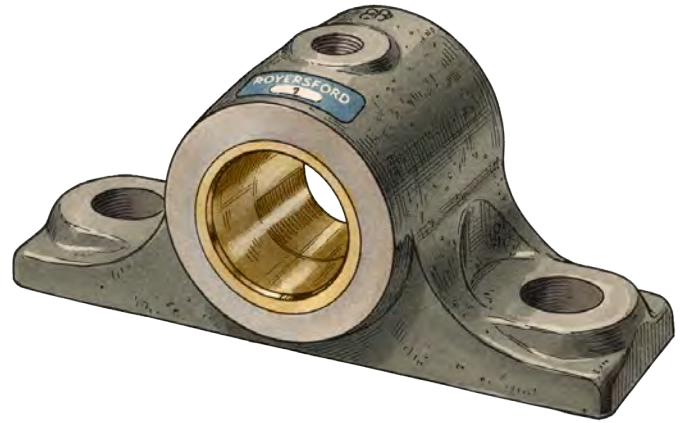
Solid journal bearings are used where a removable cap is not required. Loading range can be to within 30° of either side of the grease groove.



Shaft Size	Part Number	Wt.	A	B	C	D	E	F Dia. Bolt	H	L	M	Pipe Tap
	Babbitt											
1/2	60-01-0008	0.6	3/4	3	1	5/16	2 1/8	5/16	1 3/8	1 3/8	1/2	1/8
5/8 3/4	60-01-0010 60-01-0012	0.9	13/16	3 3/4	1 1/8	3/8	2 5/8	5/16	1 19/32	1 5/8	1/2	1/8
7/8 15/16 1	60-01-0014 60-01-0015 60-01-0100	1.7	1 1/8	4 5/8	1 3/8	1/2	3 3/8	3/8	2 1/2	2	9/16	1/8
1 1/8 1 3/16 1 1/4	60-01-0102 60-01-0103 60-01-0104	3.0	1 3/8	5	1 5/8	5/8	3 5/8	3/8	2 15/32	2 1/2	5/8	1/8
1 5/16 1 3/8 1 7/16 1 1/2	60-01-0105 60-01-0106 60-01-0107 60-01-0108	4.0	1 1/2	5 3/4	2	3/4	4	1/2	2 13/16	3	11/16	1/8
1 11/16 1 3/4	60-01-0111 60-01-0112	6.0	1 13/16	6 1/2	2 1/4	7/8	4 3/8	5/8	3 1/4	3 1/2	3/4	1/4
1 7/8 1 15/16 2	60-01-0114 60-01-0115 60-01-0200	7.0	1 11/16	7	2 1/2	1	4 3/4	5/8	3 1/4	4	3/4	1/4
2 3/16 2 1/4	60-01-0203 60-01-0204	10.0	2 1/8	7 5/8	2 3/4	1 1/16	5 1/4	5/8	3 29/32	4 1/2	7/8	1/4
2 7/16 2 1/2	60-01-0207 60-01-0208	12.5	2 1/8	8	3	1 1/8	5 3/4	5/8	4 1/8	5	7/8	1/4
2 11/16 2 3/4	60-01-0211 60-01-0212	14.5	2 3/8	9 3/8	3 1/4	1 1/8	6 1/2	3/4	4 1/2	5 1/2	1 1/8	1/4
2 15/16 3	60-01-0215 60-01-0300	19.5	2 1/2	10 1/2	3 1/2	1 1/4	7 3/8	3/4	4 13/16	6	1 1/4	3/8

All product weights are listed in pounds (Lbs.) unless otherwise noted.

Solid Journal Bearings (Bronze)

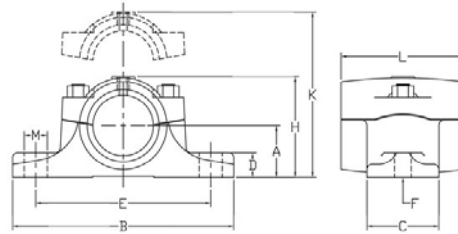


Shaft Size	Part Number	Wt.	A	B	C	D	E	F Dia. Bolt	H	L	M	Pipe Tap
	Bronze											
1/2	60-21-0008	0.6	3/4	3	1	5/16	2 1/8	5/16	1 3/8	1 3/8	1/2	1/8
5/8 3/4	60-21-0010 60-21-0012	0.9	13/16	3 3/4	1 1/8	3/8	2 5/8	5/16	1 19/32	1 5/8	1/2	1/8
7/8 15/16 1	60-21-0014 60-21-0015 60-21-0100	1.7	1 1/8	4 5/8	1 3/8	1/2	3 3/8	3/8	2 1/2	2	9/16	1/8
1 1/8 1 3/16 1 1/4	60-21-0102 60-21-0103 60-21-0104	3.0	1 3/8	5	1 5/8	5/8	3 5/8	3/8	2 15/32	2 1/2	5/8	1/8
1 5/16 1 3/8 1 7/16 1 1/2	60-21-0105 60-21-0106 60-21-0107 60-21-0108	4.0	1 1/2	5 3/4	2	3/4	4	1/2	2 13/16	3	11/16	1/8
1 11/16 1 3/4	60-21-0111 60-21-0112	6.0	1 13/16	6 1/2	2 1/4	7/8	4 3/8	5/8	3 1/4	3 1/2	3/4	1/4
1 7/8 1 15/16 2	60-21-0114 60-21-0115 60-21-0200	7.0	1 11/16	7	2 1/2	1	4 3/4	5/8	3 1/4	4	3/4	1/4
2 3/16 2 1/4	60-21-0203 60-21-0204	10.0	2 1/8	7 5/8	2 3/4	1 1/16	5 1/4	5/8	3 29/32	4 1/2	7/8	1/4
2 7/16 2 1/2	60-21-0207 60-21-0208	12.5	2 1/8	8	3	1 1/8	5 3/4	5/8	4 1/8	5	7/8	1/4
2 11/16 2 3/4	60-21-0211 60-21-0212	14.5	2 3/8	9 3/8	3 1/4	1 1/8	6 1/2	3/4	4 1/2	5 1/2	1 1/8	1/4
2 15/16 3	60-21-0215 60-21-0300	19.5	2 1/2	10 1/2	3 1/2	1 1/4	7 3/8	3/4	4 13/16	6	1 1/4	3/8

All product weights are listed in pounds (Lbs.) unless otherwise noted.

Split Journal Bearings (Babbitt)

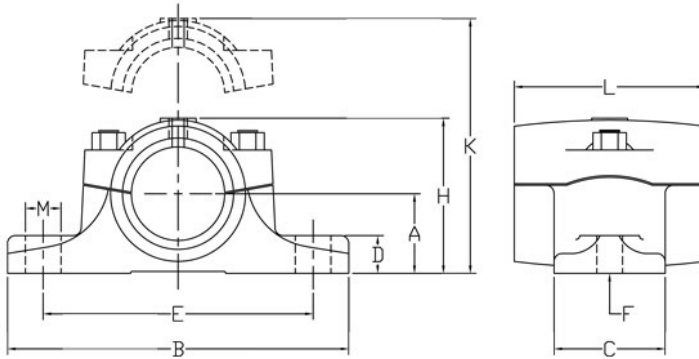
Split bearings are recommended for application where it is necessary to remove a cap for servicing or replacing a bearing. This style eliminates removing pulleys and couplings from the shaft when replacement is required. Loading range is limited to 30° below the joint. The angular parting of the cap is provided with shims to compensate for wear and adjustments.



Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	H	K	L	M	Pipe Tap
1/2	60-02-0008	0.7	3/4	3 3/4	1	3/8	2 7/8	5/16	1 1/2	2 1/8	1 3/8	1/2	1/8
5/8	60-02-0010	1.2	7/8	4 1/4	1 1/8	1/2	3 1/4	5/16	1 3/4	2 1/2	1 5/8	1/2	1/8
13/16	60-02-0011												
3/4	60-02-0012												
7/8	60-02-0014	1.9	1	4 3/4	1 3/8	9/16	3 5/8	3/8	2 1/16	3	2	9/16	1/8
13/16	60-02-0015												
1	60-02-0100												
1 1/16	60-02-0101	3	1 1/4	5 1/4	1 5/8	5/8	4 1/8	3/8	2 7/16	3 1/2	2 1/2	5/8	1/8
1 1/8	60-02-0102												
1 3/16	60-02-0103												
1 1/4	60-02-0104												
1 3/16	60-02-0105	4	1 3/8	6 1/4	2	3/4	4 7/8	1/2	2 11/16	3 7/8	3	13/16	1/8
1 3/8	60-02-0106												
1 7/16	60-02-0107												
1 1/2	60-02-0108												
1 5/8	60-02-0110	6	1 1/2	6 3/4	2 3/4	13/16	5 1/4	1/2	3	4 3/8	3 1/2	3/4	1/4
1 11/16	60-02-0111												
1 3/4	60-02-0112												
1 7/8	60-02-0114	8	1 3/4	7 1/2	2 1/2	7/8	6	5/8	3 7/16	4 7/8	4	13/16	1/4
1 15/16	60-02-0115												
2	60-02-0200												
2 1/8	60-02-0202	12	1 7/8	8 1/2	2 3/4	1	6 1/2	5/8	3 3/4	5 1/4	4 1/2	1	1/4
2 3/16	60-02-0203												
2 1/4	60-02-0204												
2 3/8	60-02-0206	15	2 1/8	8 7/8	3	1 1/8	7	5/8	4 3/16	5 3/4	5	1	1/4
2 7/16	60-02-0207												
2 1/2	60-02-0208												
2 5/8	60-02-0210	18.5	2 1/4	10	3 1/4	1 1/16	7 3/4	3/4	4 1/2	6 3/8	5 1/2	1 1/8	1/4
2 11/16	60-02-0211												
2 3/4	60-02-0212												
2 15/16	60-02-0215	22.5	2 1/2	10 3/4	3 1/2	1 3/16	8 1/2	3/4	4 7/8	6 3/4	6	1 1/8	3/8
3	60-02-0300												
3 7/16	60-02-0307	35	2 7/8	12	4	1 1/2	9 1/4	7/8	5 5/8	7 5/8	7	1 3/8	1/2
3 1/2	60-02-0308												
3 15/16	60-02-0315	46	3 1/8	13 1/2	4 1/2	1 5/8	10 1/2	1	6 3/16	8 1/2	8	1 1/2	1/2
4	60-02-0400												

Ryertex UHMW, Oilite and other linings available. Price upon request. Sizes not listed will be priced upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

Split Journal Bearings (Bronze)

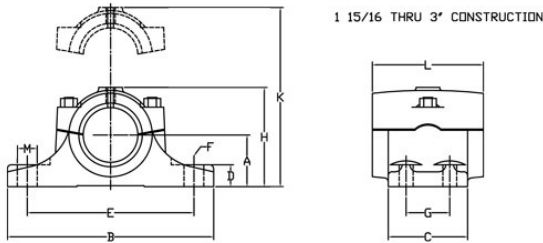


Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	H	K	L	M	Pipe Tap
1 1/16 1	60-22-0015 60-22-0100	1.9	1	4 3/4	1 3/8	9/16	3 5/8	3/8	2 1/16	3	2	1/16	1/8
1 1/8 1 1/8 1 3/16 1 1/4	60-22-0101 60-22-0102 60-22-0103 60-22-0104	3	1 1/4	5 1/4	1 5/8	5/8	4 1/8	3/8	2 7/16	3 1/2	2 1/2	5/8	1/8
1 5/16 1 3/8 1 7/16 1 1/2	60-22-0105 60-22-0106 60-22-0107 60-22-0108	4	1 3/8	6 1/4	2	3/4	4 7/8	1/2	2 11/16	3 7/8	3	1 1/16	1/8
1 5/8 1 13/16 1 3/4	60-22-0110 60-22-0111 60-22-0112	6	1 1/2	6 3/4	2 1/4	13/16	5 1/4	1/2	3	4 3/8	3 1/2	3/4	1/4
1 7/8 1 15/16 2	60-22-0114 60-22-0115 60-22-0200	8	1 3/4	7 1/2	2 1/2	7/8	6	5/8	3 7/16	4 7/8	4	1 3/16	1/4
2 1/8 2 3/16 2 1/4	60-22-0202 60-22-0203 60-22-0204	12	1 7/8	8 1/2	2 3/4	1	6 1/2	5/8	3 3/4	5 1/4	4 1/2	1	1/4
2 3/8 2 7/16 2 1/2	60-22-0206 60-22-0207 60-22-0208	15	2 1/8	8 7/8	3	1 1/8	7	5/8	4 3/16	5 3/4	5	1	1/4
2 5/8 2 11/16 2 3/4	60-22-0210 60-22-0211 60-22-0212	18.5	2 1/4	10	3 1/4	1 3/16	7 3/4	3/4	4 1/2	6 3/8	5 1/2	1 1/8	1/4
2 15/16 3	60-22-0215 60-22-0300	22.5	2 1/2	10 3/4	3 1/2	1 3/16	8 1/2	3/4	4 7/8	6 3/4	6	1 1/8	3/8
3 1/16 3 1/2	60-22-0307 60-22-0308	35	2 7/8	12	4	1 1/2	9 1/4	7/8	5 5/8	7 5/8	7	1 3/8	1/2
3 15/16 4	60-22-0315 60-22-0400	46	3 3/8	13 1/2	4 1/2	1 5/8	10 1/2	1	6 3/16	8 1/2	8	1 1/2	1/2

Ryertex UHMW, Oilite and other linings available. Price upon request. Sizes not listed will be priced upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

Rigid Split Journal Bearings

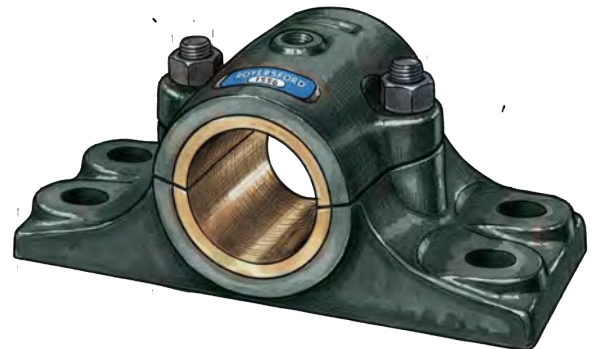
This style has all the features of the regular split type and also accommodates the larger shaft sizes. Housings are larger for greater strength. 4-bolt bases in the smaller sizes and the addition of a 4-bolt cap design for the larger sizes are especially useful for rugged applications demanding more rigidity.



4-Bolt Base - 2-Bolt Cap (Babbitt)

Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
1 ¹⁵ / ₁₆ 2	60-03-0115 60-03-0200	10	1 ³ / ₄	8 ¹ / ₄	3 ¹ / ₂	⁷ / ₈	6 ¹ / ₂	¹ / ₂	1 ³ / ₄	3 ⁷ / ₁₆	4 ⁷ / ₁₆	4	³ / ₄	¹ / ₄
2 ³ / ₁₆ 2 ¹ / ₄	60-03-0203 60-03-0204	13	1 ⁷ / ₈	8 ¹ / ₂	3 ¹ / ₂	1	6 ³ / ₄	¹ / ₂	1 ³ / ₄	3 ³ / ₄	4 ⁷ / ₈	4 ¹ / ₂	³ / ₄	¹ / ₄
2 ⁷ / ₁₆ 2 ¹ / ₂	60-03-0207 60-03-0208	18	2 ⁵ / ₈	10 ¹ / ₄	4	1 ¹ / ₈	8	⁵ / ₈	2	4 ³ / ₁₆	5 ⁵ / ₁₆	5	1	¹ / ₄
2 ¹¹ / ₁₆ 2 ³ / ₄	60-03-0211 60-03-0212	21	2 ¹ / ₄	10 ¹ / ₂	4 ¹ / ₄	1 ¹ / ₄	8 ¹ / ₄	⁵ / ₈	2 ¹ / ₄	4 ¹ / ₂	5 ⁷ / ₈	5 ¹ / ₂	1	¹ / ₄
2 ¹⁵ / ₁₆ 3	60-03-0215 60-03-0300	26	2 ¹ / ₂	11	4 ¹ / ₂	1 ³ / ₈	8 ³ / ₄	⁵ / ₈	2 ¹ / ₂	4 ⁷ / ₈	6 ³ / ₄	6	1	³ / ₈

4-Bolt Base - 2-Bolt Cap (Bronze)

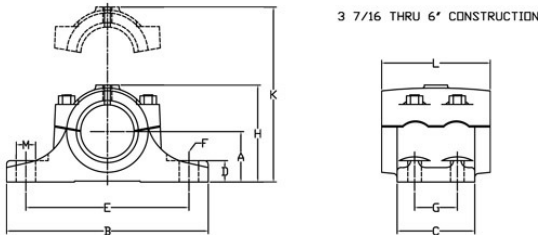


Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
1 ¹⁵ / ₁₆ 2	60-23-0115 60-23-0200	10	1 ³ / ₄	8 ¹ / ₄	3 ¹ / ₂	⁷ / ₈	6 ¹ / ₂	¹ / ₂	1 ³ / ₄	3 ⁷ / ₁₆	4 ⁷ / ₁₆	4	³ / ₄	¹ / ₄
2 ³ / ₁₆ 2 ¹ / ₄	60-23-0203 60-23-0204	13	1 ⁷ / ₈	8 ¹ / ₂	3 ¹ / ₂	1	6 ³ / ₄	¹ / ₂	1 ³ / ₄	3 ³ / ₄	4 ⁷ / ₈	4 ¹ / ₂	³ / ₄	¹ / ₄
2 ⁷ / ₁₆ 2 ¹ / ₂	60-23-0207 60-23-0208	18	2 ⁵ / ₈	10 ¹ / ₄	4	1 ¹ / ₈	8	⁵ / ₈	2	4 ³ / ₁₆	5 ⁵ / ₁₆	5	1	¹ / ₄
2 ¹¹ / ₁₆ 2 ³ / ₄	60-23-0211 60-23-0212	21	2 ¹ / ₄	10 ¹ / ₂	4 ¹ / ₄	1 ¹ / ₄	8 ¹ / ₄	⁵ / ₈	2 ¹ / ₄	4 ¹ / ₂	5 ⁷ / ₈	5 ¹ / ₂	1	¹ / ₄
2 ¹⁵ / ₁₆ 3	60-23-0215 60-23-0300	26	2 ¹ / ₂	11	4 ¹ / ₂	1 ³ / ₈	8 ³ / ₄	⁵ / ₈	2 ¹ / ₂	4 ⁷ / ₈	6 ³ / ₄	6	1	³ / ₈

Ryertex UHMW, Oilite and other linings available. Price upon request. Sizes not listed will be priced upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

Rigid Split Journal Bearings

This style has all the features of the regular split type and also accommodates the larger shaft sizes. Housings are larger for greater strength. 4-bolt bases in the smaller sizes and the addition of a 4-bolt cap design for the larger sizes are especially useful for rugged applications demanding more rigidity.



4-Bolt Base - 4-Bolt Cap (Babbitt)

Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
3 7/16 3 1/2	60-03-0307 60-03-0308	43	3 1/4	13	5	1 3/8	10 1/2	3/4	2 3/4	6 1/4	8 1/8	7	1 1/4	1/2
3 15/16 4	60-03-0315 60-03-0400	62	3 1/2	14 3/4	5 1/2	1 1/2	12	3/4	3	6 13/16	9 3/8	8	1 3/8	1/2
4 7/16 4 1/2	60-03-0407 60-03-0408	86	4 1/8	16 1/2	6 1/4	1 3/4	13 1/2	7/8	3 1/2	7 7/8	10 3/8	9	1 1/2	1/2
4 15/16 5	60-03-0415 60-03-0500	116	4 1/2	18	7	1 7/8	15	7/8	4	8 9/16	11 1/4	10	1 3/8	1/2
5 7/16 5 1/2	60-03-0507 60-03-0508	166	5	19 1/4	7 3/4	2	15 3/4	1	4 1/2	9 3/8	12 1/4	11	1 3/4	1/2
5 15/16 6	60-03-0515 60-03-0600	198	5 1/2	20 1/2	8 1/2	2 1/8	16 1/2	1 1/8	5	10 1/4	13 3/4	12	1 7/8	1/2

4-Bolt Base - 4-Bolt Cap (Bronze)

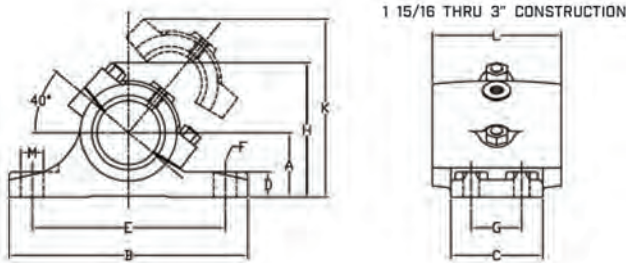


Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
3 7/16 3 1/2	60-23-0307 60-23-0308	43	3 1/4	13	5	1 3/8	10 1/2	3/4	2 3/4	6 1/4	8 1/8	7	1 1/4	1/2
3 15/16 4	60-23-0315 60-23-0400	62	3 1/2	14 3/4	5 1/2	1 1/2	12	3/4	3	6 13/16	9 3/8	8	1 3/8	1/2
4 7/16 4 1/2	60-23-0407 60-23-0408	86	4 1/8	16 1/2	6 1/4	1 3/4	13 1/2	7/8	3 1/2	7 7/8	10 3/8	9	1 1/2	1/2
4 15/16 5	60-23-0415 60-23-0500	116	4 1/2	18	7	1 7/8	15	7/8	4	8 9/16	11 1/4	10	1 3/8	1/2
5 7/16 5 1/2	60-23-0507 60-23-0508	166	5	19 1/4	7 3/4	2	15 3/4	1	4 1/2	9 3/8	12 1/4	11	1 3/4	1/2
5 15/16 6	60-23-0515 60-23-0600	198	5 1/2	20 1/2	8 1/2	2 1/8	16 1/2	1 1/8	5	10 1/4	13 3/4	12	1 7/8	1/2

Ryertex UHMW, Oilite and other linings available. Price upon request. Sizes not listed will be priced upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

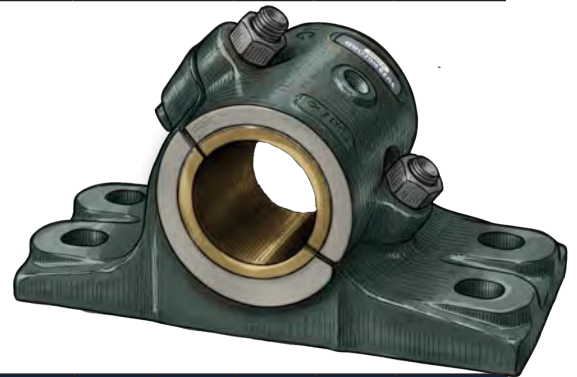
Rigid 40° Angle Split Journal Bearings

These bearings are of the standard rigid split style with the exception of the cap being a 40° angle to the base rather than parallel. They incorporate the 120° loading range but accommodate applications where the base may not be parallel with the ground such as a conveyor drive mechanism.



*4-Bolt Base - 2-Bolt Cap
(Babbitt)*

Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
1 15/16 2	60-05-0115 60-05-0200	11	2 3/4	8 3/4	3 1/2	7/8	6 1/2	1/2	1 3/4	4 1/2	5 1/4	4	3/4	1/4
2 3/16 2 1/4	60-05-0203 60-05-0204	14	2 1/2	8 1/2	3 1/2	1	6 3/4	1/2	1 3/4	4 7/8	5 3/4	4 1/2	3/4	1/4
2 7/16 2 1/2	60-05-0207 60-05-0208	16	2 3/4	10 1/4	4	1 1/8	8	5/8	2	5 5/16	6 1/8	5	1	1/4
2 11/16 2 3/4	60-05-0211 60-05-0212	28	3	10 1/2	4 1/4	1 1/4	8 1/4	5/8	2 1/4	6	7	5 1/2	1	1/4
2 15/16 3	60-05-0215 60-05-0300	30	3 1/4	11	4 1/2	1 3/8	8 3/4	5/8	2 1/2	6 3/8	7 1/2	6	1	3/8



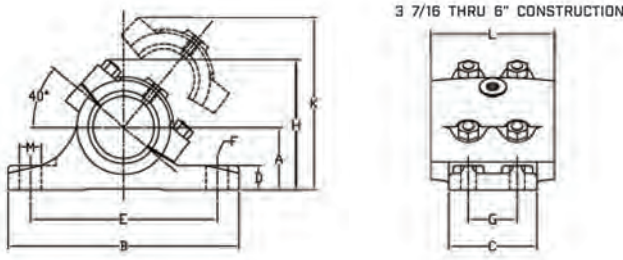
*4-Bolt Base - 2-Bolt Cap
(Bronze)*

Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
1 15/16 2	60-25-0115 60-25-0200	11	2 3/4	8 3/4	3 1/2	7/8	6 1/2	1/2	1 3/4	4 1/2	5 1/4	4	3/4	1/4
2 3/16 2 1/4	60-25-0203 60-25-0204	14	2 1/2	8 1/2	3 1/2	1	6 3/4	1/2	1 3/4	4 7/8	5 3/4	4 1/2	3/4	1/4
2 7/16 2 1/2	60-25-0207 60-25-0208	16	2 3/4	10 1/4	4	1 1/8	8	5/8	2	5 5/16	6 1/8	5	1	1/4
2 11/16 2 3/4	60-25-0211 60-25-0212	28	3	10 1/2	4 1/4	1 1/4	8 1/4	5/8	2 1/4	6	7	5 1/2	1	1/4
2 15/16 3	60-25-0215 60-25-0300	30	3 1/4	11	4 1/2	1 3/8	8 3/4	5/8	2 1/2	6 3/8	7 1/2	6	1	3/8

Ryertex UHMW, Oilite and other linings available. Price upon request. Sizes not listed will be priced upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

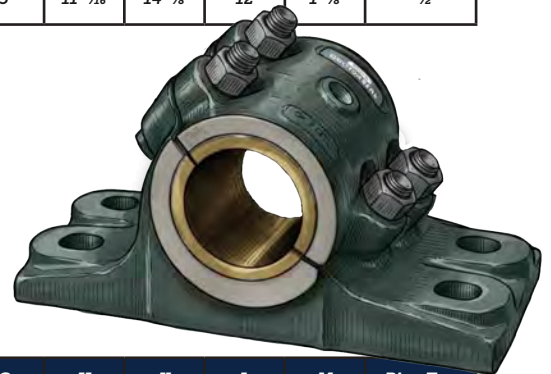
Rigid 40° Angle Split Journal Bearings

These bearings are of the standard rigid split style with the exception of the cap being a 40° angle to the base rather than parallel. They incorporate the 120° loading range but accommodate applications where the base may not be parallel with the ground such as a conveyor drive mechanism.



4-Bolt Base - 4-Bolt Cap
(Babbitt)

Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
3 7/16 3 1/2	60-05-0307 60-05-0308	42	3 1/2	13	5	1 1/2	10 1/2	3/4	2 3/4	7 1/8	9	7	1 1/4	1/2
3 13/16 4	60-05-0315 60-05-0400	60	3 3/4	14 3/4	5 1/2	1 5/8	12	3/4	3	8 3/4	10 1/4	8	1 3/8	1/2
4 7/16 4 1/2	60-05-0407 60-05-0408	86	4 1/8	16 1/2	6 3/4	1 3/4	13 1/2	7/8	3 1/2	8 7/8	11	9	1 1/2	1/2
4 13/16 5	60-05-0415 60-05-0500	120	4 1/2	18	7	1 7/8	15	7/8	4	9 3/4	12	10	1 5/8	1/2
5 7/16 5 1/2	60-05-0507 60-05-0508	163	5	19 3/4	8	2	15 3/4	1	4 1/2	10 13/16	13 1/2	11	1 7/8	1/2
5 13/16 6	60-05-0515 60-05-0600	191	5 1/2	20 1/2	8 1/2	2 1/8	16 1/2	1 1/8	5	11 3/16	14 5/8	12	1 7/8	1/2



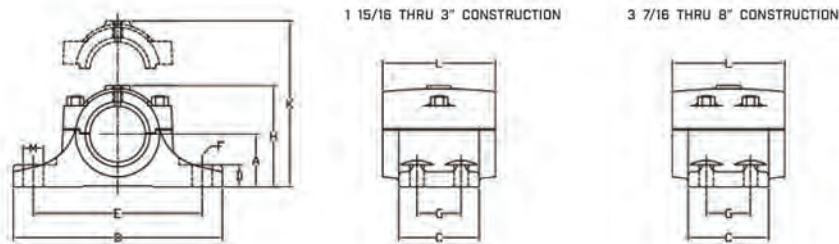
4-Bolt Base - 4-Bolt Cap
(Bronze)

Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
3 7/16 3 1/2	60-25-0307 60-25-0308	42	3 1/2	13	5	1 1/2	10 1/2	3/4	2 3/4	7 1/8	9	7	1 1/4	1/2
3 13/16 4	60-25-0315 60-25-0400	60	3 3/4	14 3/4	5 1/2	1 5/8	12	3/4	3	8 3/4	10 1/4	8	1 3/8	1/2
4 7/16 4 1/2	60-25-0407 60-25-0408	86	4 1/8	16 1/2	6 3/4	1 3/4	13 1/2	7/8	3 1/2	8 7/8	11	9	1 1/2	1/2
4 13/16 5	60-25-0415 60-25-0500	120	4 1/2	18	7	1 7/8	15	7/8	4	9 3/4	12	10	1 5/8	1/2
5 7/16 5 1/2	60-25-0507 60-25-0508	163	5	19 3/4	8	2	15 3/4	1	4 1/2	10 13/16	13 1/2	11	1 7/8	1/2
5 13/16 6	60-25-0515 60-25-0600	191	5 1/2	20 1/2	8 1/2	2 1/8	16 1/2	1 1/8	5	11 3/16	14 5/8	12	1 7/8	1/2

Ryertex UHMW, Oilite and other linings available. Price upon request. Sizes not listed will be priced upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

Rigid Split Journal Bearing - Gibbed Joint

Service requirements with side loading or angular pressures need bearings with a gibbed joint. These bearings enable loads to be accommodated to within 30° each side of the grease groove. They have all the features of the regular split bearings as well as the rigid style. These bearings are only available with bronze lining material.



4-Bolt Base - 2-Bolt Cap (Bronze)

Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
1 15/16 2	60-33-0115 60-33-0200	10	1 3/4	8 1/4	3 1/2	7/8	6 1/2	1/2	1 3/4	3 7/16	4 7/16	4	3/4	1/4
2 3/16 2 3/4	60-33-0203 60-33-0204	13	1 3/4	8 1/2	3 1/2	1	6 3/4	1/2	1 3/4	3 3/4	4 7/8	4 1/2	3/4	1/4
2 7/16 2 1/2	60-33-0207 60-33-0208	18	2 1/8	10 1/2	4	1 1/8	8	5/8	2	4 3/16	5 5/16	5	1	1/4
2 11/16 2 3/4	60-33-0211 60-33-0212	21	2 1/4	10 1/2	4 1/4	1 1/4	8 1/4	5/8	2 1/4	4 1/2	5 7/8	5 1/2	1	1/4
2 15/16 3	60-33-0215 60-33-0300	26	2 1/2	11	4 1/2	1 3/8	8 3/4	5/8	2 1/2	4 7/8	6 3/4	6	1	3/8

4-Bolt Base - 4-Bolt Cap (Bronze)

Shaft Size	Part Number	Wt.	A	B	C	D	E	F-Dia. Bolt	G	H	K	L	M	Pipe Tap
3 1/16 3 1/2	60-33-0307 60-33-0308	43	3 1/4	13	5	1 3/8	10 1/2	3/4	2 3/4	6 1/4	8 1/8	7	1 1/4	1/2
3 15/16 4	60-33-0315 60-33-0400	62	3 1/2	14 3/4	5 1/2	1 1/2	12	3/4	3	6 13/16	9 3/8	8	1 3/8	1/2
4 7/16 4 1/2	60-33-0407 60-33-0408	86	4 1/8	16 1/2	6 1/4	1 3/4	13 1/2	7/8	3 1/2	7 7/8	10 3/8	9	1 1/2	1/2
4 15/16 5	60-33-0415 60-33-0500	116	4 1/2	18	7	1 7/8	15	7/8	4	8 9/16	11 1/4	10	1 5/8	1/2
5 7/16 5 1/2	60-33-0507 60-33-0508	166	5	19 1/4	7 3/4	2	15 3/4	1	4 1/2	9 3/8	12 1/4	11	1 3/4	1/2
5 15/16 6	60-33-0515 60-33-0600	198	5 1/2	20 1/2	8 1/2	2 1/8	16 1/2	1 1/8	5	10 1/4	13 3/4	12	1 7/8	1/2
6 1/16 6 1/2	60-33-0607 60-33-0608	260	6	22	9 1/2	2 1/4	18	1 1/8	5 1/2	11	15 1/8	13	1 7/8	1/2
6 15/16 7	60-33-0615 60-33-0700	311	6 1/2	23	10	2 3/8	19	1 1/4	6	11 3/4	15 7/8	14	2	1/2
7 1/16 7 1/2	60-33-0707 60-33-0708	468	7	26	11	2 1/2	21 1/2	1 3/8	6 3/4	13 5/16	17 7/8	16	2 1/4	1/2
7 15/16 8	60-33-0715 60-33-0800	435	7	26	11	2 1/2	21 1/2	1 3/8	6 3/4	13 5/16	17 7/8	16	2 1/4	1/2

Ryertex, UHMW, Oilite and other linings available. Price upon request. Sizes not listed will be priced upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

Journal Bearings Load Ratings & Selection

Royersford Journal Bearings are compact plain bearings designed to support continuous radial loads at moderate shaft speeds. They are available in solid and split styles and constructed with babbitt or bronze bearing materials for different operating conditions.

Selection Criteria

To select the correct Journal Bearing:

- 1. Determine the operating conditions:** radial load, shaft speed, lubrication method, and ambient temperature.
- 2. Choose a bearing rating** from the load tables below with a radial load rating at or above the expected load and speed for your application.
3. Ensure bearings operate within the recommended conditions listed in this section.

Operating Requirements

For the load ratings in the tables to apply, the following conditions must be maintained:

- Adequate grease lubrication must be provided and maintained.
- Proper bearing alignment must be achieved and maintained for uniform load distribution.
- Normal running loads should not exceed values in the load tables. Occasional peak loads should not exceed ratings by more than 100%.
- The direction of the load should not be closer than 30° to the grease groove or, if applicable, the joint between the cap and base.
- Shaft journal surface finish should meet commercial shafting standards (approximately 32 micro inches), and journal diameters should be within standard tolerances.
- Ambient temperature limits are **130°F for babbitted bearings** and **300°F for bronze bushed bearings**. If the shaft conducts heat from another source, the journal surface temperature must stay within these limits.

Bearings must be protected from adverse operating conditions. If conditions fall outside the recommended ranges, apply a service factor up to 2.0 for values left of the zigzag line in the ratings tables and up to 3.0 for values right of it.

Journal Bearing Selection

MPTA RADIAL LOAD RATINGS FOR RIGID BABBITTED SLEEVE BEARINGS STD. NO. 401

Shaft Sizes	RPM															
	10	50	100	150	200	250	300	350	400	450	500	600	700	800	900	1000
½	100	100	100	95	95	95	95	95	90	90	90	85	85	85	80	80
⅝	150	150	145	145	140	140	135	135	135	130	130	125	120	115	110	110
¾	180	175	175	170	170	165	160	160	155	155	150	145	140	130	125	120
⅞	260	255	250	245	240	235	230	225	220	215	210	200	190	180	150	-
1 ¼	280	275	265	260	255	250	245	240	235	225	220	210	200	185	105	-
1	295	290	285	280	270	265	260	250	245	240	230	220	205	-	-	-
1 ⅝	415	410	400	390	380	370	355	345	335	325	315	295	245	-	-	-
1 ¾, 1 ¼	440	430	420	410	395	385	375	360	350	340	325	305	190	-	-	-
1 ⅝, 1 ⅜	585	570	555	535	520	505	485	470	455	435	420	345	-	-	-	-
1 ⅞, 1 ½	640	625	605	585	565	545	525	500	480	460	440	205	-	-	-	-
1 ¾, 1 ¼	875	850	820	785	755	720	690	655	625	590	340	-	-	-	-	-
1 ⅞, 2	1150	1110	1060	1010	965	915	865	815	730	335	-	-	-	-	-	-
2 ¼, 2 ¼	1460	1400	1330	1260	1190	1120	1050	975	410	-	-	-	-	-	-	-
2 ⅞, 2 ½	1800	1730	1630	1530	1430	1340	1240	645	-	-	-	-	-	-	-	-
2 ¼, 2 ¼	2190	2080	1950	1820	1690	1560	1150	110	-	-	-	-	-	-	-	-
2 ⅞, 3	2600	2470	2300	2130	1960	1790	675	-	-	-	-	-	-	-	-	-
3 ⅞, 3 ½	3550	3330	3060	2790	2520	1200	-	-	-	-	-	-	-	-	-	-
3 ⅞, 4	4640	4310	3910	3500	2760	-	-	-	-	-	-	-	-	-	-	-
4 ⅞, 4 ½	5870	5410	4830	4250	1410	-	-	-	-	-	-	-	-	-	-	-
4 ⅞, 5	7240	6600	5810	5010	-	-	-	-	-	-	-	-	-	-	-	-
5 ⅞, 5 ½	8750	7900	6840	4360	<i>For Speeds Lower Than 10 RPM Consult Factory.</i>											
5 ⅞, 6	10410	9300	7910	2390												

Bearings should be protected against adverse operating conditions.

If the aforementioned operating conditions cannot be met, apply a service factor depending on the specific application of up to 2.0 for areas in the rating table to the left of the zigzag line and of up to 3.0 for areas to the right... Ratings are for bearings having a length of approximately twice the diameter.

Journal Bearing Selection

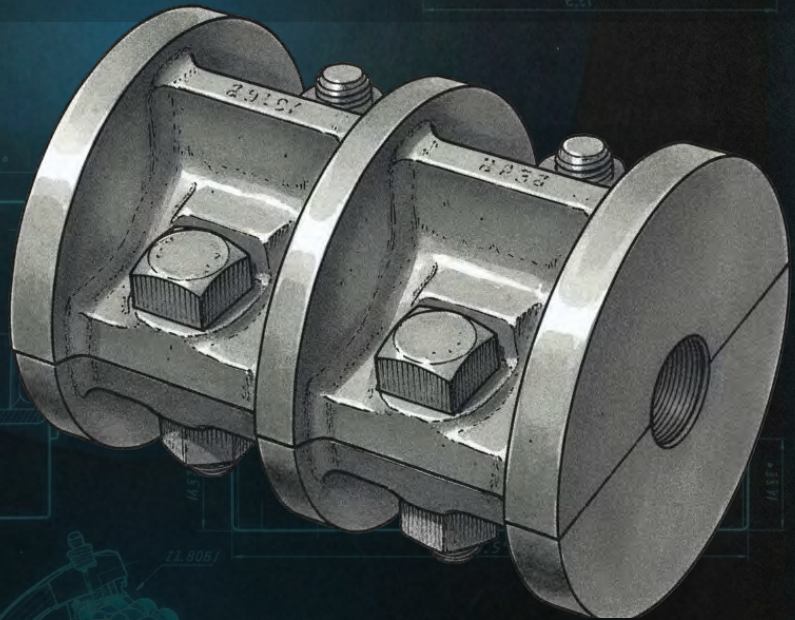
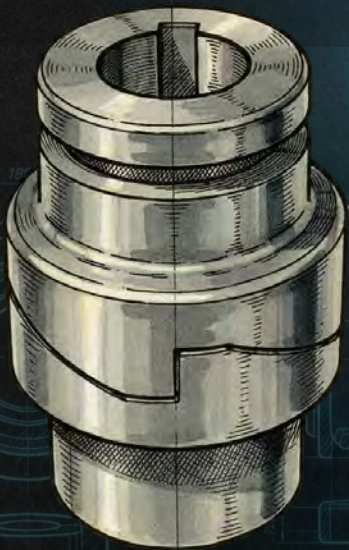
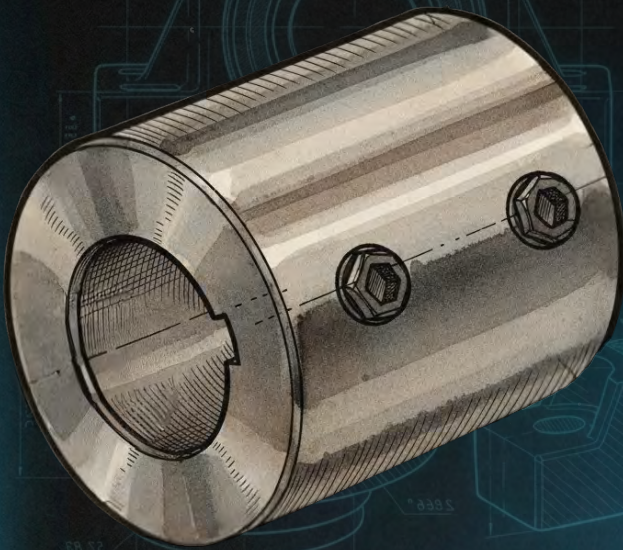
MPTA RADIAL LOAD RATINGS FOR RIGID BRONZE SLEEVE BEARINGS STD. NO. 401

Shaft Sizes	RPM															
	10	50	100	150	200	250	300	350	400	450	500	600	700	800	900	1000
½	170	170	165	165	165	165	165	160	160	160	160	155	155	150	150	145
⅝	250	250	245	245	245	240	240	235	235	235	230	255	220	220	215	210
¾	300	300	295	295	290	285	285	280	280	275	270	265	260	255	250	240
⅞	435	430	425	420	415	410	405	400	395	390	385	375	365	355	325	245
1 ⁵ / ₁₆	465	460	455	450	445	435	430	425	420	415	410	395	385	375	295	200
1	495	490	485	480	470	465	460	450	445	440	430	420	405	360	255	150
1-¼	700	690	680	670	660	650	640	630	620	605	595	575	525	360	195	-
1 ⅜, 1 ¼	735	730	715	705	695	680	370	660	645	635	625	600	485	300	115	-
1 ⅝, 1 ⅜	980	965	950	930	915	895	880	865	845	830	815	735	465	195	-	-
1 ⅞, 1 ½	1070	1050	1030	1010	995	975	955	935	915	895	875	635	315	-	-	-
1 11/16, 1 ¾	1470	1440	1410	1370	1340	1310	1280	1240	1210	1180	930	410	-	-	-	-
1 13/16, 2	1920	1880	1830	1790	1740	1690	1640	1590	1500	1110	715	-	-	-	-	-
2 ⅜, 2 ¼	2440	2390	2320	2240	2170	2100	2030	1960	1390	830	265	-	-	-	-	-
2 ⅝, 2 ½	3020	2940	2850	2750	2650	2560	2460	1860	1090	-	-	-	-	-	-	-
2 11/16, 2 ¾	3660	3560	3430	3300	3170	3040	2620	1580	545	-	-	-	-	-	-	-
2 13/16, 3	4370	4230	4060	3890	3720	3550	2440	-	-	-	-	-	-	-	-	-
3 ⅞, 3 ½	5960	5740	5470	5200	4930	3610	1440	-	-	-	-	-	-	-	-	-
3 15/16, 4	7790	7460	7060	6650	5910	-	-	-	-	-	-	-	-	-	-	-
4 ⅞, 4 ½	9860	9400	8820	8240	5400	-	-	-	-	-	-	-	-	-	-	-
4 15/16, 5	12180	11540	10740	9950	4090	-	-	-	-	-	-	-	-	-	-	-
5 ⅞, 5 ½	14740	13880	12820	10340	1820	For Speeds Lower Than 10 RPM Consult Factory.										
5 15/16, 6	17530	16420	15040	9520	-											
6 ⅞, 6 ½	20560	19150	17390	7900	-											
6 15/16, 7	23840	22070	19870	5350	-											
7 ⅞, 7 ½	29170	26850	23950	1880	-											
7 15/16, 8	31090	28450	23410	-	-											

Bearings should be protected against adverse operating conditions.

If the aforementioned operating conditions cannot be met, apply a service factor depending on the specific application of up to 2.0 for areas in the rating table to the left of the zigzag line and of up to 3.0 for areas to the right... Ratings are for bearings having a length of approximately twice the diameter.

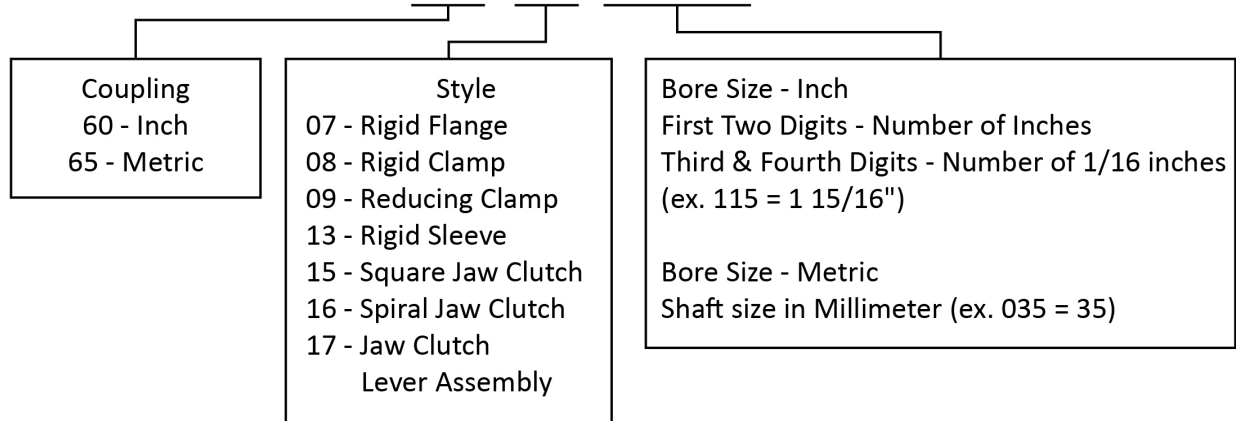




RIGID SHAFT COUPLINGS

Rigid Shaft Couplings Nomenclature

60-07-0115



*All standard units include suffix -501

**Additional suffixes (5XX) will be used to designate modified or special assemblies

Rigid Shaft Couplings

Royersford Shaft Couplings are precision-machined components designed to connect two in-line shafts and reliably transmit power between them. Built for durability, balance, and safe operation, these couplings deliver dependable performance in applications where shaft misalignment is absent. The fixed connection ensures positive power transmission and consistent performance under load. Special coupling designs can be adapted to connect shafts of different diameters, offering flexibility for unique installation requirements.



Key Benefits

- Designed to connect in-line shafts and transmit power efficiently
- Rigid coupling design provides a fixed, secure shaft connection
- Available in special configurations to accommodate different shaft diameters
- Manufactured from high-strength gray iron
- Finish-machined for proper balance and smooth operation
- Bolt heads and nuts are shielded for operator safety
- Keys furnished with all couplings

Materials & Construction

- Standard material: high-strength gray iron. Made in USA
- Suitable for transmitting the rated load capacities of C1018 commercial shafting
- All couplings are fully machined to ensure proper balance
- Robust construction supports long service life in industrial environments

Safety Features

- Bolt heads and nuts are shielded by the flange or ribs
- Reduces exposure to rotating hardware
- Enhances safety during operation

Installation Notes

- Keys are supplied with every coupling
- For optimal performance and longevity, bearings should be positioned as close as possible to the coupling

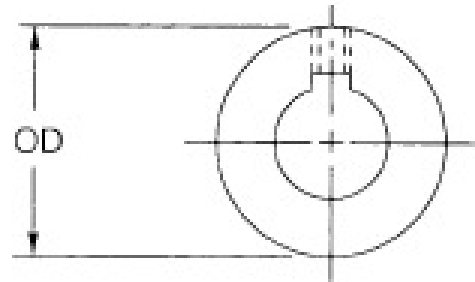
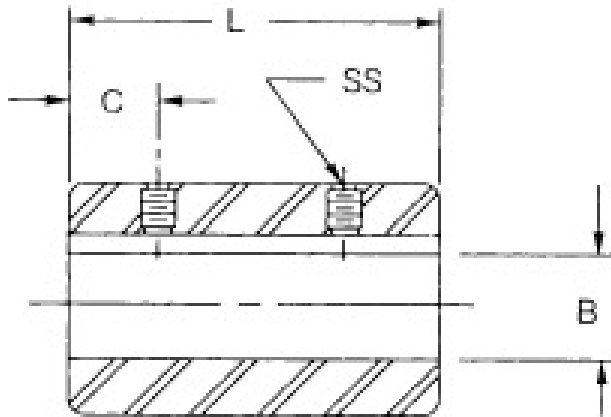
Common Industry Applications & Equipment Uses

(include but are not limited to)

- **Industries:** Conveying, Material Handling, Mining & Aggregate, Pulp & Paper, Steel & Metals Processing, Cement & Bulk Material Handling, Marine Propulsion, Oil & Gas, and Water & Wastewater Treatment
- **Applications:**
 - Power Transmission & Line Shafting
 - Conveyor Rollers & Idlers
 - Fans, Blowers, Pumps, and Rotating Equipment
 - Light to Moderate-Duty Machinery

Rigid Sleeve Couplings (Steel)

Couplings are finished machined to insure proper balance. Keys are furnished for all couplings. Bearings should be positioned as close as possible to the couplings.

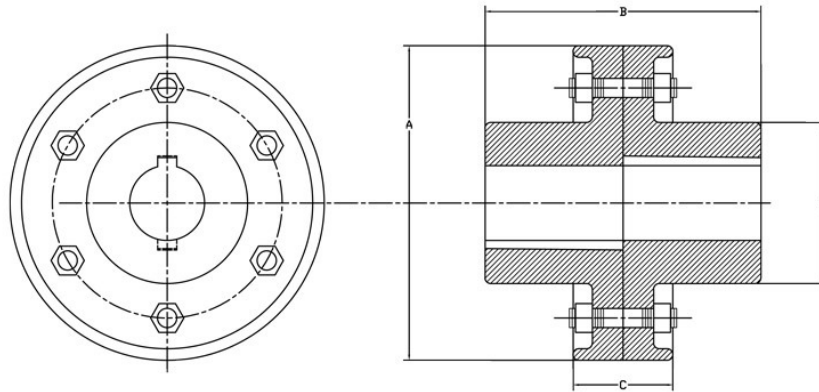
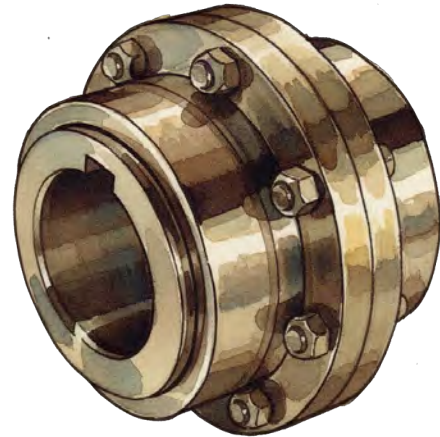


Part Number	OD	L	B	C	Set Screw
60-13-0004	0.5	0.75	0.25	0.19	8 - 32 x 1/8
60-13-0005	0.63	1	0.31	0.25	8 - 32 x 1/8
60-13-0006	0.75	1	0.37	0.25	10 - 24 x 1/8
60-13-0008	1	1.5	0.5	0.38	1/4 - 20 x 1/4
60-13-0010	1.25	2	0.62	0.5	5/16 - 18 x 5/16
60-13-0012	1.5	2	0.75	0.5	5/16 - 18 x 3/8
60-13-0014	1.75	2	0.87	0.5	5/16 - 18 x 3/8
60-13-0100	2	3	1	0.75	3/8 - 16 x 1/2
60-13-0102	2.13	3	1.12	0.75	3/8 - 16 x 1/2
60-13-0104	2.25	4	1.25	1	3/8 - 16 x 1/2
60-13-0106	2.5	4.5	1.37	1	3/8 - 16 x 1/2

Rigid Flange Couplings

This style coupling is used where the smallest overall length is necessary and ease of installation is not a factor. Couplings are fitted to the shafts and use tapered keys. Shaft sizes of 3 11/16" and above have male and female type construction.

All flange couplings are made to order. Sizes not listed, Reducers, Special Keyways, Male & Female Construction, and Metric Bores are priced upon request. Flange couplings are made with undersized bores for a press fit unless otherwise requested.

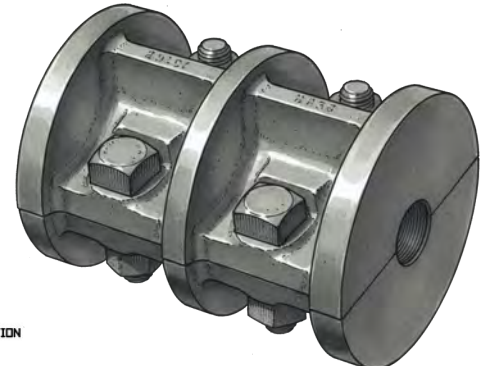


Shaft Size	Part Number	Wt.	A	B	C	D	Keyway	Number of Bolts	Bolts Size
1 5/16	60-07-0015	6	4 7/8	3 1/4	1 5/8	1 7/8	1/4	3	1/2
1 3/4	60-07-0103	16.5	6 3/4	4 7/8	2 1/8	2 3/4	1/4	4	1/2
1 7/8	60-07-0107	25	7 5/8	5 5/8	2 3/8	3 3/8	3/8	5	1/2
1 11/16	60-07-0111	36	8 3/8	2 1/2	2 1/2	4	3/8	5	5/8
1 15/16	60-07-0115	49	9	7 3/8	2 7/8	4 1/2	1/2	5	5/8
2 3/16	60-07-0203	59	9 1/2	8 1/4	3	5	1/2	5	5/8
2 7/16	60-07-0207	70	10 1/4	9	3 1/4	5 1/4	5/8	6	5/8
2 15/16	60-07-0215	98	10 7/8	10	3 1/4	6 1/4	3/4	6	3/4
3 1/16	60-07-0307	120	12 1/4	10 7/8	3 3/8	6 3/4	7/8	6	3/4
3 15/16	60-07-0315	160	13	11 1/8	3 7/8	8	1	6	3/4
4 1/16	60-07-0407	190	14 3/8	1 3/8	4 1/8	8 1/2	1	6	7/8
4 15/16	60-07-0415	375	16 1/2	13 7/8	5 3/4	10 1/2	1 1/4	8	7/8
5 1/16	60-07-0507	450	17 3/4	14 3/4	6	10 3/4	1 1/4	8	7/8
5 15/16	60-07-0515	530	19	16	6 1/2	11 1/4	1 1/2	8	1

Sizes not listed-Reducers-Special Keyways-Male & Female Construction-Metric Bores-Made to order-Priced upon request. Flange Couplings are bored undersize for a press fit unless otherwise requested. All product weights are listed in pounds (Lbs.) unless otherwise noted.

Rigid Clamp Couplings

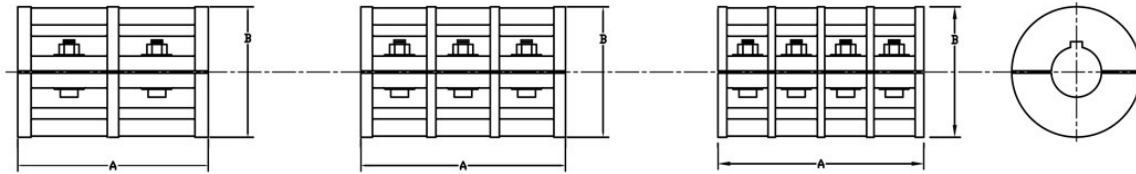
Clamp couplings are used when ease of installation and removal is advantageous. Pulleys and bearings do not need to be removed for replacement. The coupling is bored with shims in place which are removed for installation enabling a clamp fit on the shaft over a straight key.



15/16 THRU 1 1/4 CONSTRUCTION

1 5/16 THRU 4" CONSTRUCTION

4 7/16 THRU 6" CONSTRUCTION



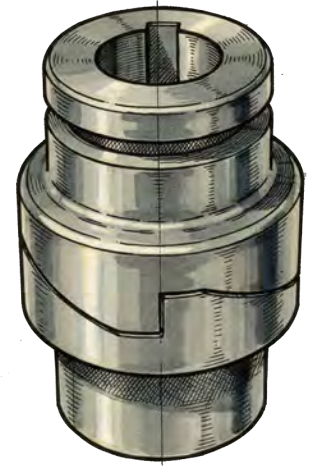
Shaft Size	Part Number	Wt.	A	B	Keyway	Number of Bolts	Bolts Size
1 ⁹ / ₁₆ 1	60-08-0015 60-08-0100	9	5 ³ / ₈	4	¹ / ₄	4	¹ / ₂
1 ¹ / ₈ 1 ³ / ₁₆ 1 ¹ / ₄	60-08-0102 60-08-0103 60-08-0104	12	6 ¹ / ₄	4 ¹ / ₄	¹ / ₄	4	¹ / ₂
1 ³ / ₁₆ 1 ¹ / ₂ 1 ⁷ / ₁₆ 1 ¹ / ₂	60-08-0105 60-08-0106 60-08-0107 60-08-0108	15 ¹ / ₂	7 ¹ / ₈	4 ¹ / ₂	³ / ₈	6	¹ / ₂
1 ¹ / ₈ 1 ¹ / ₄ 1 ³ / ₄	60-08-0110 60-08-0111 60-08-0112	24	8 ¹ / ₄	5 ¹ / ₈	³ / ₈	6	⁵ / ₈
1 ⁷ / ₈ 1 ¹⁵ / ₁₆ 2	60-08-0114 60-08-0115 60-08-0200	29	8 ⁵ / ₈	5 ¹ / ₂	¹ / ₂	6	⁵ / ₈
2 ¹ / ₈ 2 ³ / ₁₆ 2 ¹ / ₄	60-08-0202 60-08-0203 60-08-0204	32	9 ⁵ / ₁₆	5 ³ / ₄	¹ / ₂	6	³ / ₄
2 ³ / ₈ 2 ⁷ / ₁₆ 2 ¹ / ₂	60-08-0206 60-08-0207 60-08-0208	41 ¹ / ₂	9 ⁷ / ₈	6 ¹ / ₄	⁵ / ₈	6	³ / ₄
2 ⁵ / ₈ 2 ¹¹ / ₁₆ 2 ³ / ₄	60-08-0210 60-08-0211 60-08-0212	51	10 ⁷ / ₈	7 ¹ / ₄	⁵ / ₈	6	³ / ₄
2 ⁷ / ₈ 2 ¹⁵ / ₁₆ 3	60-08-0214 60-08-0215 60-08-0300	63	12	7 ¹ / ₄	³ / ₄	6	⁷ / ₈
3 ³ / ₁₆ 3 ¹ / ₄	60-08-0303 60-08-0304	72	12 ⁷ / ₈	7 ⁷ / ₈	³ / ₄	6	⁷ / ₈
3 ⁷ / ₁₆ 3 ¹ / ₂	60-08-0307 60-08-0308	80	13 ¹ / ₂	8	⁷ / ₈	6	⁷ / ₈
3 ¹ / ₄ 3 ³ / ₄	60-08-0311 60-08-0312	136	14 ¹ / ₂	9 ¹ / ₂	⁷ / ₈	6	⁷ / ₈
3 ¹⁵ / ₁₆ 4	60-08-0315 60-08-0400	166	15 ¹ / ₂	10 ¹ / ₄	1	6	1
4 ⁷ / ₁₆ 4 ¹ / ₂	60-08-0407 60-08-0408	234	17 ¹ / ₂	11	1	8	1
4 ¹⁵ / ₁₆ 5	60-08-0415 60-08-0500	294	18 ³ / ₈	11 ³ / ₄	1 ¹ / ₄	8	1 ¹ / ₈
5 ⁷ / ₁₆ 5 ¹ / ₂	60-08-0507 60-08-0508	399	19 ¹ / ₄	14 ¹ / ₄	1 ¹ / ₄	8	1 ¹ / ₄
5 ¹⁵ / ₁₆ 6	60-08-0515 60-08-0600	578	20	16	1 ¹ / ₂	8	1 ³ / ₈

Sizes not listed - Reducers - Special Keyways - Metric Bores - Ductile Iron or Steel - Made to order - Priced upon request.
All product weights are listed in pounds (Lbs.) unless otherwise noted.

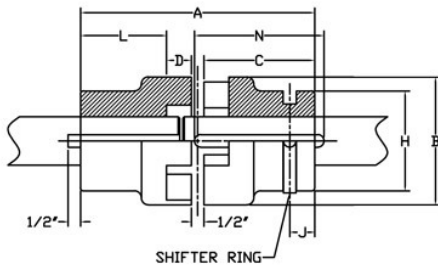
Jaw Clutch Couplings

These couplings are used to positively connect and disconnect rotating shafts where engagement and disengagement is not frequent. Couplings are machined all over to ensure precise engagement.

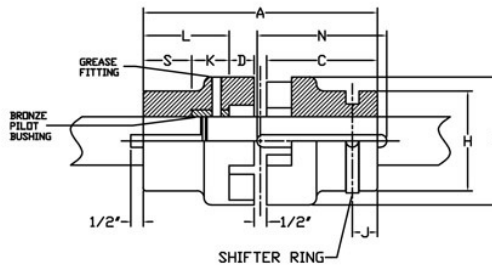
Square jaws are used where engagement and disengagement under power or in motion is not required. They transmit power in both directions. Spiral jaw couplings are made in right or left hand style and will transmit power in only one direction. They can be engaged or disengaged at low speeds. Sprocket attachments are available to function as a chain drive. A shifting lever mechanism is available at additional cost. All Jaw Clutch Couplings and Lever Assemblies are made to order.



STANDARD CONFIGURATION



SHOWN WITH OPTIONAL PILOT BUSHING & GREASE FITTING

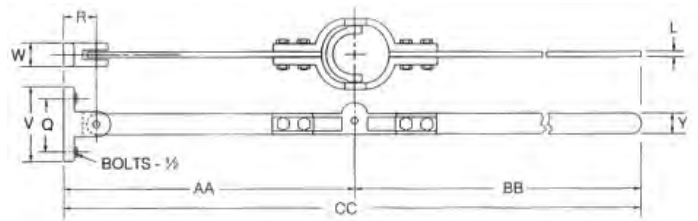


Nominal Shaft Size	Part Number	Type	Wt.	A	B	C	D	E	H	J	K	L	N	S	Keyway
1 1/16	60-15-0107	Square Jaw	16	8 1/2	4	4	7/8	1 1/2	3 3/8	7/8	5/8	3 1/8	4 3/4	2 1/2	3/8
1 1/4	60-15-0111	Square Jaw	21.2	9 1/4	4 1/2	4 3/8	7/8	1 3/4	3 11/16	1	5/8	3 1/2	5 1/8	2 7/8	3/8
1 5/16	60-15-0115	Square Jaw	22.5	9 3/8	5 1/8	4 7/16	1	2	4	1	5/8	3 7/16	5 3/16	2 13/16	1/2
2 3/16	60-15-0203	Square Jaw	31.2	9 3/4	5 1/2	4 5/8	1	2 1/4	4 3/8	1	3/4	3 5/8	5 3/8	2 7/8	1/2
2 1/2	60-15-0207	Square Jaw	35.9	10	6	4 3/4	1	2 1/2	4 5/8	1	1	3 3/4	5 9/16	2 3/4	5/8
2 15/16	60-15-0215	Square Jaw	47.1	10 1/2	7	5	1	3	5 1/8	1	1 1/4	4	5 7/8	2 3/4	3/4
3 1/16	60-15-0307	Square Jaw	71.6	11 3/4	8 1/4	5 5/8	1	3 1/2	6	1 1/4	1 1/2	4 5/8	6 5/8	3 1/8	7/8
3 15/16	60-15-0315	Square Jaw	103	14 1/2	9 1/2	7	1 1/8	4	7	1 1/4	1 3/4	5 7/8	8	4 1/8	1
4 1/16	60-15-0407	Square Jaw	156	21	11	7	1 1/8	4 1/2	7 1/2	1 1/2	2	5 7/8	8	3 3/8	1
4 15/16	60-15-0415	Square Jaw	223	22 1/4	11	10 7/8	1 3/8	5	8 1/4	1 1/2	2	9 1/2	11 3/4	7 1/2	1 1/4
5 1/16	60-15-0507	Square Jaw	264	24	12	11 3/4	1 1/2	5 1/2	8 3/4	2	2 1/2	10 1/4	12 7/8	7 3/4	1 1/4
5 15/16	60-15-0515	Square Jaw	314	25	13	12 1/4	1 1/2	6	9 3/4	2	2 1/2	10 3/4	13 1/2	8 1/4	1 1/2

Sizes not listed - Reducers - Metric Bores - Special Keyways - Set Screws - Sprocket Attachments - Ductile Iron or Steel clutches - Bronze Pilot Bushings - Available on special order - Price upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

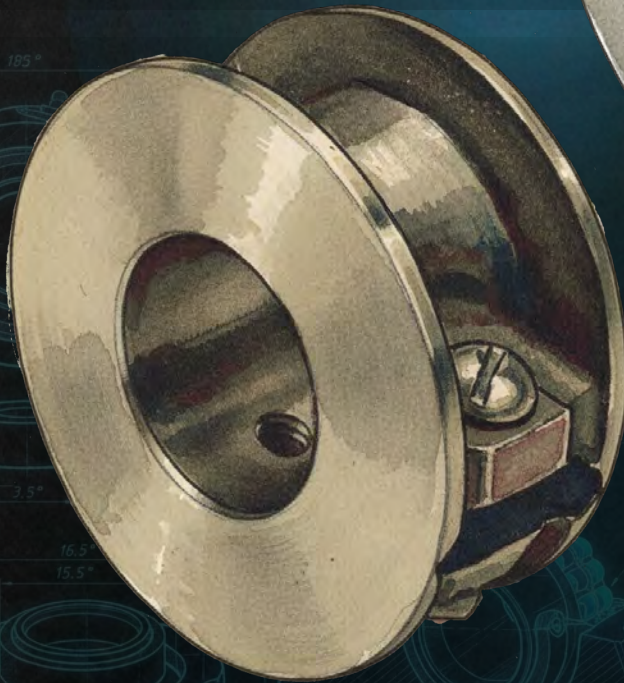
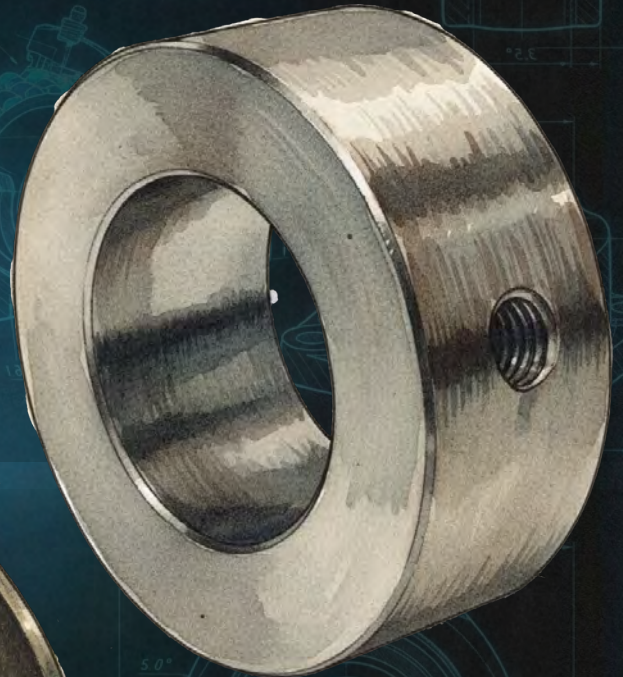
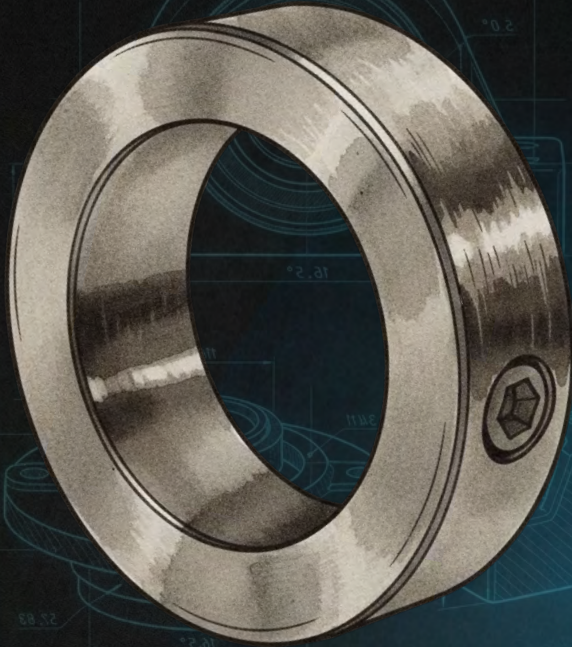
Nominal Shaft Size	Part Number	Type	Wt.	A	B	C	D	E	H	J	K	L	N	S	Keyway
1 1/16	60-16-0107	Spiral Jaw	16	8 1/2	4	4	7/8	1 1/2	3 3/8	7/8	5/8	3 1/8	4 3/4	2 1/2	3/8
1 1/4	60-16-0111	Spiral Jaw	21.2	9 3/4	4 1/2	4 3/8	7/8	1 3/4	3 11/16	1	5/8	3 1/2	5 1/8	2 7/8	3/8
1 5/16	60-16-0115	Spiral Jaw	22.5	9 3/8	5 1/8	4 7/16	1	2	4	1	5/8	3 7/16	5 3/16	2 13/16	1/2
2 3/16	60-16-0203	Spiral Jaw	31.2	9 3/4	5 1/2	4 5/8	1	2 1/4	4 3/8	1	3/4	3 5/8	5 3/8	2 7/8	1/2
2 7/16	60-16-0207	Spiral Jaw	35.9	10	6	4 3/4	1	2 1/2	4 5/8	1	1	3 3/4	5 5/16	2 3/4	5/8
2 15/16	60-16-0215	Spiral Jaw	47.1	10 1/2	7	5	1	3	5 1/8	1	1 1/4	4	5 7/8	2 3/4	3/4
3 7/16	60-16-0307	Spiral Jaw	71.6	11 3/4	8 1/4	5 5/8	1	3 1/2	6	1 1/4	1 1/2	4 5/8	6 5/8	3 1/8	7/8
3 15/16	60-16-0315	Spiral Jaw	103	14 1/2	9 1/2	7	1 1/8	4	7	1 1/4	1 3/4	5 7/8	8	4 1/8	1
4 7/16	60-16-0407	Spiral Jaw	156	21	11	7	1 1/8	4 1/2	7 1/2	1 1/2	2	5 7/8	8	3 7/8	1
4 15/16	60-16-0415	Spiral Jaw	223	22 1/4	11	10 7/8	1 3/8	5	8 1/4	1 1/2	2	9 1/2	11 3/4	7 1/2	1 1/4
5 7/16	60-16-0507	Spiral Jaw	264	24	12	11 3/4	1 1/2	5 1/2	8 3/4	2	2 1/2	10 3/4	12 7/8	7 3/4	1 1/4
5 15/16	60-16-0515	Spiral Jaw	314	25	13	12 1/4	1 1/2	6	9 1/4	2	2 1/2	10 3/4	13 1/2	8 1/4	1 1/2

Sizes not listed - Reducers - Metric Bores - Special Keyways - Set Screws - Sprocket Attachments - Ductile Iron or Steel clutches - Bronze Pilot Bushings - Available on special order - Price upon request.
 All product weights are listed in pounds (Lbs.) unless otherwise noted.



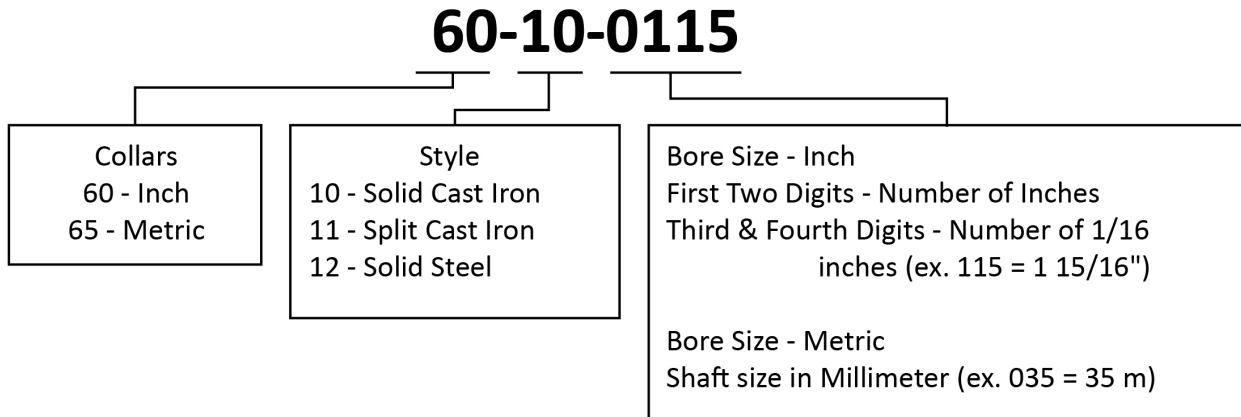
Lever Assemblies

Shaft Size	Part Number	AA	BB	CC	L	Q	R	V	W	Y
1 1/16	60-17-0107	22	38 1/4	60 1/4	3/8	4	2 1/2	6	1 7/8	1 1/2
1 1/4	60-17-0111	22 1/4	38 1/2	60 3/4	3/8	4	2 1/2	6	1 7/8	1 1/2
1 5/16	60-17-0115	22 1/4	38 1/2	60 3/4	3/8	4	2 1/2	6	1 7/8	1 1/2
2 3/16	60-17-0203	23	39	62	3/8	4	2 1/2	6	1 7/8	1 1/2
2 7/16	60-17-0207	23	39	62	3/8	4	2 1/2	6	1 7/8	1 1/2
2 15/16	60-17-0215	23 1/4	39 1/4	62 1/2	3/8	4	2 1/2	6	1 7/8	1 1/2
3 7/16	60-17-0307	23 5/8	39 3/4	63 3/8	1/2	4	2 1/2	6	1 7/8	2
3 15/16	60-17-0315	23 5/8	40 3/8	63 3/4	1/2	4	2 1/2	6	1 7/8	2
4 7/16	60-17-0407	27	43 1/4	70 1/4	1/2	4	2 1/2	6	1 7/8	2
4 15/16	60-17-0415	30	48	78	1/2	4	2 1/2	6	2	2
5 7/16	60-17-0507	30	54	84	1/2	4	2 1/2	6	2 1/2	2 1/2
5 15/16	60-17-0515	30	60	90	1/2	4	2 1/2	6	2 1/2	2 1/2



SAFETY SET COLLARS

Safety Set Collars Nomenclature



*All standard units include suffix -501

**Additional suffixes (5XX) will be used to designate modified or special assemblies

Safety Set Collars

Royersford Safety Set Collars are versatile components and are used across a wide range of industries as mechanical stops, mounting points for other components, or bearing faces on moving equipment. Designed for dependable holding power and ease of installation, these collars provide a reliable position in shaft-mounted applications.



Key Benefits:

- Used as mechanical stops, component mounts, or bearing faces
- Available in solid and split collar designs
- Manufactured from steel or durable, high-strength gray iron
- Set screw locking provides secure shaft retention
- Simple, compact design for easy integration
- Suitable for a wide range of industrial equipment

Design Options

- Royersford Safety Set Collars are offered in two standard configurations:
- **Solid Collars**
 - Manufactured to slip over the shaft
 - Secured in position using set screw(s)
- **Split Collars**
 - Can be installed or removed without disturbing other shaft components
 - Ideal for maintenance or retrofit applications
 - Also secured using set screw(s) for dependable holding power

Installation Advantages

- Straightforward installation and removal
- Split design minimizes downtime during service
- Set screw locking ensures reliable positioning during operation

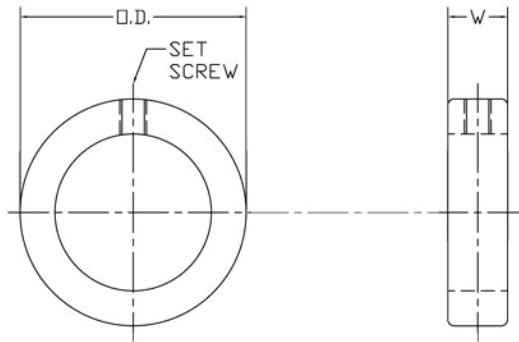
Common Industry Applications & Equipment Uses

(include but are not limited to)

- **Industries:** Manufacturing & General Industrial, Material Handling, Packaging Equipment, Food & Beverage, Processing, Agricultural Equipment, Steel & Metals Processing, Pulp & Paper, and Textile Machinery
- **Applications:**
 - Shaft Stops on Conveyors and Rollers
 - Locating bearings, sprockets, and pulleys
 - Spacing Components along shafts
 - End-stops on lead screws or guide rods
 - Mounting collars for sensors or accessories
 - Light-Duty bearing faces
 - Maintenance on retrofit applications

Solid Steel Shaft Collars

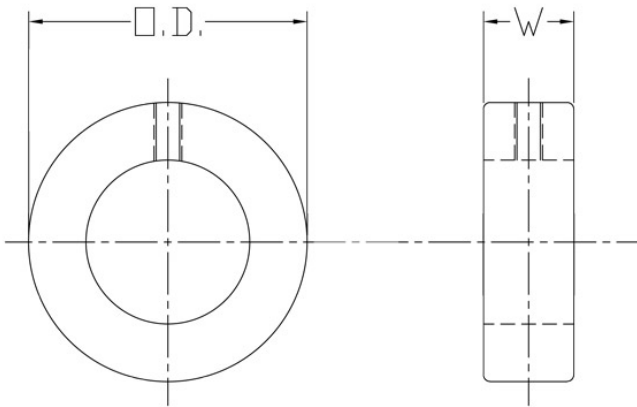
Solid steel collars are made from cold-rolled steel and available in sizes up to 3". They are smaller than iron collars and are used when space and appearance are important.



Shaft Size	Part Number	Wt. (Oz.)	Outside Diameter	Width	Set Screw
$\frac{3}{16}$	60-12-0003	$\frac{1}{4}$	$\frac{7}{16}$	$\frac{1}{4}$	#8
$\frac{1}{4}$	60-12-0004	$\frac{1}{4}$	$\frac{1}{2}$	$\frac{9}{32}$	#10
$\frac{5}{16}$	60-12-0005	$\frac{1}{2}$	$\frac{5}{8}$	$1\frac{1}{32}$	#10
$\frac{3}{8}$	60-12-0006	$\frac{1}{2}$	$\frac{3}{4}$	$\frac{3}{8}$	$\frac{1}{4}$
$\frac{7}{16}$	60-12-0007	1	$\frac{7}{8}$	$\frac{9}{16}$	$\frac{1}{4}$
$\frac{1}{2}$	60-12-0008	$1\frac{1}{8}$	1	$\frac{7}{16}$	$\frac{1}{4}$
$\frac{9}{16}$	60-12-0009	$1\frac{1}{8}$	1	$\frac{7}{16}$	$\frac{1}{4}$
$\frac{5}{8}$	60-12-0010	$1\frac{1}{2}$	$1\frac{1}{8}$	$\frac{1}{2}$	$\frac{5}{16}$
$1\frac{1}{16}$	60-12-0011	2	$1\frac{1}{4}$	$\frac{9}{16}$	$\frac{5}{16}$
$\frac{3}{4}$	60-12-0012	2	$1\frac{1}{4}$	$\frac{9}{16}$	$\frac{5}{16}$
$1\frac{3}{16}$	60-12-0013	2	$1\frac{5}{16}$	$\frac{9}{16}$	$\frac{5}{16}$
$\frac{7}{8}$	60-12-0014	$2\frac{1}{2}$	$1\frac{1}{2}$	$\frac{9}{16}$	$\frac{5}{16}$
$1\frac{5}{16}$	60-12-0015	$3\frac{1}{4}$	$1\frac{5}{8}$	$\frac{9}{16}$	$\frac{5}{16}$
1	60-12-0100	4	$1\frac{5}{8}$	$\frac{5}{8}$	$\frac{5}{16}$
$1\frac{1}{16}$	60-12-0101	$4\frac{1}{4}$	$1\frac{3}{4}$	$\frac{5}{8}$	$\frac{5}{16}$
$1\frac{1}{8}$	60-12-0102	$3\frac{3}{4}$	$1\frac{3}{4}$	$\frac{5}{8}$	$\frac{5}{16}$
$1\frac{3}{16}$	60-12-0103	$5\frac{3}{4}$	2	$1\frac{1}{16}$	$\frac{3}{8}$
$1\frac{1}{4}$	60-12-0104	$5\frac{3}{4}$	2	$1\frac{1}{16}$	$\frac{3}{8}$
$1\frac{5}{16}$	60-12-0105	$6\frac{1}{2}$	$2\frac{1}{8}$	$1\frac{1}{16}$	$\frac{3}{8}$
$1\frac{3}{8}$	60-12-0106	$6\frac{1}{2}$	$2\frac{1}{8}$	$\frac{3}{4}$	$\frac{3}{8}$
$1\frac{7}{16}$	60-12-0107	$7\frac{3}{4}$	$2\frac{1}{4}$	$\frac{3}{4}$	$\frac{3}{8}$
$1\frac{1}{2}$	60-12-0108	$7\frac{1}{2}$	$2\frac{1}{4}$	$\frac{3}{4}$	$\frac{3}{8}$
$1\frac{9}{16}$	60-12-0109	$10\frac{3}{4}$	$2\frac{1}{2}$	$1\frac{3}{16}$	$\frac{3}{8}$
$1\frac{5}{8}$	60-12-0110	10	$2\frac{1}{2}$	$1\frac{3}{16}$	$\frac{3}{8}$
$1\frac{11}{16}$	60-12-0111	$9\frac{3}{4}$	$2\frac{1}{2}$	$1\frac{3}{16}$	$\frac{3}{8}$
$1\frac{3}{4}$	60-12-0112	$13\frac{1}{2}$	$2\frac{3}{4}$	$\frac{7}{8}$	$\frac{1}{2}$
$1\frac{13}{16}$	60-12-0113	13	$2\frac{3}{4}$	$\frac{7}{8}$	$\frac{1}{2}$
$1\frac{7}{8}$	60-12-0114	$12\frac{1}{4}$	$2\frac{3}{4}$	$\frac{7}{8}$	$\frac{1}{2}$
$1\frac{15}{16}$	60-12-0115	$16\frac{1}{4}$	3	$\frac{7}{8}$	$\frac{1}{2}$
2	60-12-0200	16	3	$\frac{7}{8}$	$\frac{1}{2}$
$2\frac{1}{8}$	60-12-0202	16	3	$\frac{7}{8}$	$\frac{1}{2}$
$2\frac{3}{16}$	60-12-0203	$18\frac{1}{2}$	$3\frac{1}{4}$	$1\frac{5}{16}$	$\frac{1}{2}$
$2\frac{1}{4}$	60-12-0204	$17\frac{1}{2}$	$3\frac{1}{4}$	$1\frac{5}{16}$	$\frac{1}{2}$
$2\frac{5}{16}$	60-12-0205	$17\frac{1}{4}$	$3\frac{1}{4}$	$1\frac{5}{16}$	$\frac{1}{2}$
$2\frac{3}{8}$	60-12-0206	17	$3\frac{1}{4}$	$1\frac{5}{16}$	$\frac{1}{2}$
$2\frac{7}{16}$	60-12-0207	$21\frac{3}{4}$	$3\frac{1}{2}$	1	$\frac{1}{2}$
$2\frac{1}{2}$	60-12-0208	$20\frac{3}{4}$	$3\frac{1}{2}$	1	$\frac{1}{2}$
$2\frac{9}{16}$	60-12-0209	30	$3\frac{3}{4}$	$1\frac{1}{8}$	$\frac{1}{2}$
$2\frac{11}{16}$	60-12-0211	35	4	$1\frac{1}{8}$	$\frac{1}{2}$
$2\frac{3}{4}$	60-12-0212	34	4	$1\frac{1}{8}$	$\frac{1}{2}$
$2\frac{15}{16}$	60-12-0215	38	$4\frac{1}{4}$	$1\frac{1}{8}$	$\frac{1}{2}$
3	60-12-0300	36	$4\frac{1}{4}$	$1\frac{1}{8}$	$\frac{1}{2}$

Solid Cast Iron Shaft Collars

Solid cast iron collars are the heavy-duty type and are available up to 8" shaft size. They are machined all over and fastened to the shaft with socket head screws.

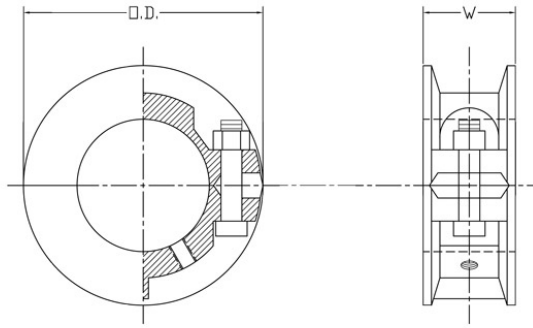


Shaft Size	Part Number	Wt.	Outside Diameter	Width
1 15/16 2	60-10-0115 60-10-0200	1 3/4	3 3/8	1 3/8
2 7/16 2 1/2	60-10-0207 60-10-0208	3	4 1/4	1 1/2
2 15/16 3	60-10-0215 60-10-0300	5	5	1 3/8
3 3/16 3 1/4	60-10-0303 60-10-0304	7	5 1/2	1 3/8
3 7/16 3 1/2	60-10-0307 60-10-0308	8	5 3/4	1 3/4
3 11/16	60-10-0311	9	6 1/4	1 3/4
3 15/16 4	60-10-0315 60-10-0400	10 1/2	6 1/2	1 7/8
4 3/16	60-10-0403	11	7	1 7/8
4 7/16	60-10-0407	13 1/2	7 1/4	2
4 15/16	60-10-0415	17	8	2 1/8
5 7/16	60-10-0507	20	8 3/4	2 1/8
5 15/16 6	60-10-0515 60-10-0600	22	9 1/4	2 1/4
6 1/2	60-10-0608	25	10	2 1/4
7	60-10-0700	30	10 1/2	2 3/8
7 1/2	60-10-0708	35	11 3/8	2 1/2
8	60-10-0800	45	12 1/8	2 7/8

All product weights are listed in pounds (Lbs.) unless otherwise noted.

Split Cast Iron Shaft Collars

Split cast iron collars are used when the removable feature is desirable. They are available from 1" shaft size to 8". Their dimensions are the largest of the three types. Some clamping action is present due to the split style, but the primary positioning force is the socket head set screw.



Shaft Size	Part Number	Wt.	Outside Diameter	Width
1	60-11-0100	1	2 1/16	1 1/16
1 3/16 1 1/4	60-11-0103 60-11-0104	1 1/4	3 1/8	1 1/4
1 5/16 1 7/16 1 1/2	60-11-0105 60-11-0107 60-11-0108	1 1/2	4 1/16	1 7/16
1 13/16 1 3/4	60-11-0111 60-11-0112	2 1/4	3 3/4	1 9/16
1 7/8 1 15/16 2	60-11-0114 60-11-0115 60-11-0200	2 3/4	4 1/16	1 3/4
2 3/16 2 1/4	60-11-0203 60-11-0204	3	4 1/2	1 7/8
2 7/16 2 1/2	60-11-0207 60-11-0208	4	4 7/8	2
2 11/16 2 3/4	60-11-0211 60-11-0212	5	5 5/16	2 1/16
2 15/16 3	60-11-0215 60-11-0300	5 3/4	5 5/8	2 5/16
3 3/16 3 1/4	60-11-0303 60-11-0304	8 1/2	6 1/16	2 3/8
3 7/16 3 1/2	60-11-0307 60-11-0308	9 3/4	6 7/8	2 9/16
3 11/16	60-11-0311	10	6 13/16	2 5/8
3 15/16 4	60-11-0315 60-11-0400	11	7 3/16	2 3/4
4 3/16	60-11-0403	15 3/4	7 3/4	3
4 7/16 4 1/2	60-11-0407 60-11-0408	16 1/2	8 1/8	3 5/16
4 15/16 5	60-11-0415 60-11-0500	20 1/2	8 3/4	3 1/2
5 7/16	60-11-0507	28	9 5/8	3 3/4
5 15/16 6	60-11-0515 60-11-0600	30	10 1/8	4 1/16
6 1/2	60-11-0608	41	11	4 1/4
7	60-11-0700	46	12	4 1/2
7 1/2	60-11-0708	56	12 15/16	4 11/16
8	60-11-0800	69	13 5/8	5 1/16

Sizes not listed - Metric Bores - Made to Order - Price upon request. All product weights are listed in pounds (Lbs.) unless otherwise noted.

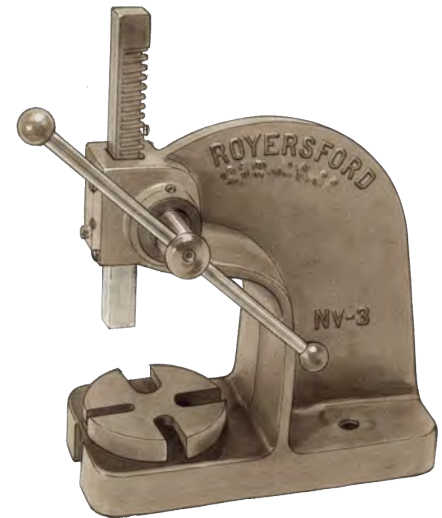


EXCELSIOR ARBOR PRESSES

Royersford-Excelsior Arbor Presses

Royersford Arbor Presses are built to withstand repeated heavy-duty use in demanding shop and industrial environments. Designed with rugged cast iron frames and precision steel components, these presses deliver dependable performance, long service life, and consistent alignment.

All Arbor Presses are made to order.



Key Benefits:

- Designed for repeated heavy usage
- High-strength cast iron frames for rigidity and durability
- Carbon steel ram and pinion for long service life
- Large gear teeth provide smooth operation and dependable force transmission
- Simple, reliable design
- Floor stands are available at an additional cost

Materials & Construction

- Frames manufactured from high-strength cast iron
- Ram and pinion are constructed from carbon steel
- Oversized gear teeth improve durability and load handling
- Adjustable ram allows precision alignment during operation
- Simple ratchet-type operation
- Equipped with a hand lock to hold the ram in any desired position
- Smooth, controlled pressing action

Common Industry Applications & Equipment Uses

(include but are not limited to)

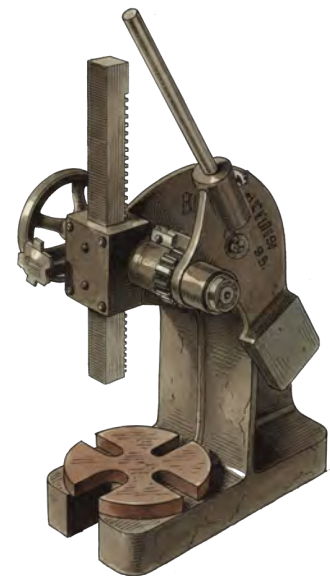
- Pressing bearings, bushings, and sleeves
- Assembly and light forming operations
- Staking, riveting, and broaching
- Straightening shafts or small components
- Installing or removing pins, studs, and fasteners
- Shops, maintenance, and tool room applications
- General manufacturing and light industrial use

Royersford-Excelsior Arbor Presses



Plain Lever Type

Press No.	Part Number	Shipping Wt.	Diameter of Work	Capacity over Table	Capacity over Plate	Size of Ram	Leverage Ratio	App. Tons Press.	Height of Press	Largest Arbor (inches)	Base Dimensions
0	54-01-0010	25	7	4 ½	4	¾ x ¾ x 7 ½	20-1	½	9 ¾	1 ½	4 x 9
1	54-01-0020	45	8 ½	5 ¾	4 ¾	1 x 1 x 9 ½	25-1	¾	11 ¾	1 ¾	5 x 10 ¾
2	54-01-0030	96	13 ½	8 ¾	7 ¾	1 ¼ x 1 ¼ x 13 ¾	35-1	2	16 ¾	1 ¾	6 ¾ x 16 ¾
3	54-01-0040	220	15 ¾	12 ¾	11 ¾	1 ½ x 1 ½ x 18	50-1	3	21 ¾	2 ½	8 x 18
3 ½	54-01-0060	300	18	17 ½	16	1 ¾ x 1 ¾ x 23 ¾	60-1	4	28 ¾	3 ½	9 x 22



Simple Ratchet Type

Press No.	Part Number	Shipping Wt.	Diameter of Work	Capacity over Table	Capacity over Plate	Size of Ram	Leverage Ratio	App. Tons Press.	Height of Press	Largest Arbor (inches)	Base Dimensions
3R	54-01-0050	230	15 ¾	12 ¾	11 ¾	1 ½ x 1 ½ x 18	60-1	4	21 ¾	2 ½	8 x 18
3 ½R	54-01-0070	335	18	17 ½	16	1 ¾ x 1 ¾ x 23 ¾	70-1	5	28 ¾	3 ½	9 x 22

All product weights are listed in pounds (Lbs.) unless otherwise noted.

*All standard units include -501

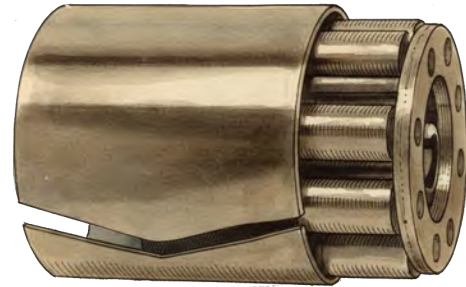
**Additional suffixes (5XX) will be used to designate modified or special assemblies



COMMERCIAL ROLLER BEARINGS

Commercial Roller Bearings

Royersford Commercial Roller Bearings provide a flexible, dependable solution for a wide range of industrial applications that require smooth, reliable rolling support and serviceability. These bearings are offered as complete units with a split outer race or as roller assemblies only, allowing customers to tailor them for new installations, repairs, or retrofits.



All Commercial Roller Bearings are made to order.

Key Benefits:

- Split outer race design allows easy installation and maintenance
- Simple, durable construction for dependable service
- Designed for light to moderate-duty industrial use
- Can sustain high temperatures and heavy loads for long periods of time

Common Industry Applications & Equipment Uses

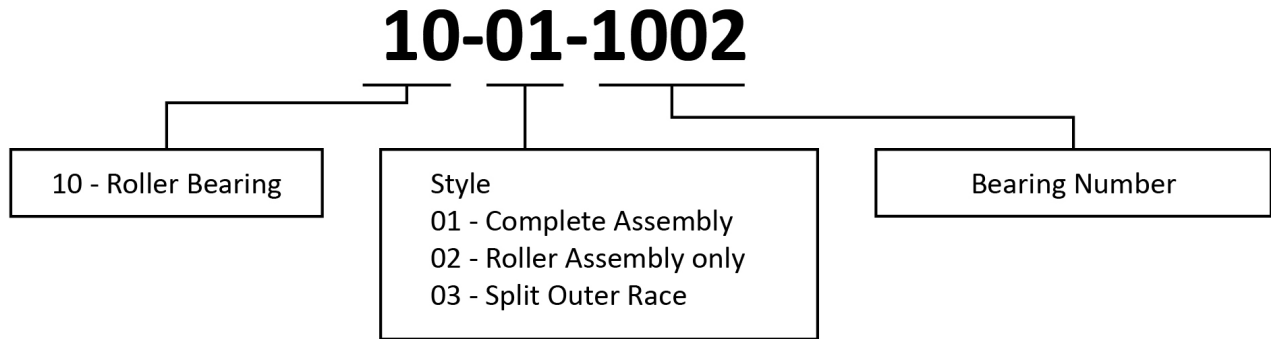
(include but are not limited to)

- Conveyor Rollers & Idlers
- Agricultural & Farm Equipment
- Mining & Aggregate Machinery
- Custom-Built or Legacy Industrial Equipment

Materials & Construction

- Hardened steel rollers with high-strength steel split outer races

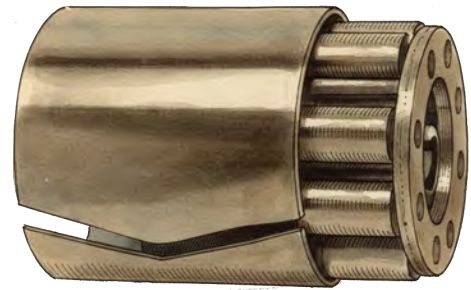
Commercial Roller Bearings Nomenclature



*All standard units include suffix -501

**Additional suffixes (5XX) will be used to designate modified or special assemblies

Commercial Roller Bearings



Brg. No.	I.D.	O.D.	Length	Size of Rolls	No. of Rolls	Split Outer Race	App. Wt.
1001	1	1 1/16	2	3/8	8	3/32	1
1002			3				1 1/4
1003			4				1 3/4
1005	1 1/8	2 3/16	2	7/16	8	3/32	1 1/4
1006			3				1 1/2
1007			4				2
1009	1 3/16	2 3/8	2	1/2	8	3/32	1 1/4
1010			3				1 3/4
1003			4				2 1/4
1013	1 1/4	2 7/16	2	1/2	8	3/32	1 1/4
1014			3				1 3/4
1015			4				2 1/4
1016			5				3 1/4
1018	1 3/8	2 3/16	2	1/2	9	3/32	1 3/4
1019			3				2
1020			4				2 3/4
1021			5				3 1/4
1023	1 7/16	2 3/4	2	9/16	9	3/32	1 1/2
1024			3				2 1/4
1025			4				3
1026			5				4
1028	1 1/2	2 15/16	2	9/16	9	3/32	1 1/2
1029			3				2 1/2
1030			4				3 1/4
1031			5				4
1032	1 5/8	2 15/16	2	9/16	9	3/32	1 3/4
1033			3				2 1/2
1034			4				3 1/2
1035			5				4
1036	1 15/16	3	2	9/16	10	3/32	1 1/2
1037			3				2 3/4
1038			4				3 3/4
1039			5				4 1/2
1040			6				5 3/4
1041	1 3/4	3 3/16	2	9/16	10	3/32	1 1/2
1042			3				2 1/2
1043			4				3 3/4
1044			5				4 3/4
1045			6				5 3/4
1046	1 7/8	3 3/16	2	9/16	10	3/32	2
1047			3				2 3/4
1048			4				3 1/4
1049			5				4 1/4
1050			6				5 3/4
1051	1 15/16	3 7/16	2	5/8	10	1/8	2 1/2
1052			3				3 1/4
1053			4				4 3/4
1054			5				6 1/4
1055			6				7
1056	2	3 1/2	2	5/8	10	1/8	2
1057			3				3 3/4
1058			4				4 1/4
1059			5				6
1060			6				7

Brg. No.	I.D.	O.D.	Length	Size of Rolls	No. of Rolls	Split Outer Race	App. Wt.
1061	2 3/16	3 15/16	2	5/8	10	1/8	3 3/4
1062			3				5
1063			4				6 1/2
1064			5				7 1/4
1065	2 1/4	3 3/4	3	5/8	11	1/8	4
1066			4				5
1067			5				6 1/2
1068			6				7 3/4
1069	2 7/16	4 1/16	3	1 1/16	11	1/8	4 3/4
1070			4				6 1/2
1071			5				8
1072			6				9 3/4
1073	7	11					
1074	2 1/2	4 3/8	3	1 1/16	11	1/8	4 3/4
1075			4				6 1/4
1076			5				7 3/4
1077			6				9 3/4
1078	7	11 3/4					
1079	2 15/16	4 3/16	3	1 1/16	12	1/8	5 1/4
1080			4				7
1081			5				8
1082			6				9 3/4
1083	7	12					
1084	2 3/4	4 3/8	3	1 1/16	12	1/8	5 3/4
1085			4				7
1086			5				9
1087			6				10 3/4
1088	7	12					
1089	2 15/16	4 15/16	3	3/4	12	1/8	6
1090			4				8
1091			5				10
1092			6				13
1093	7	14 3/4					
1094	3	4 3/4	3	3/4	12	1/8	6 3/4
1095			4				8 1/4
1096			5				10
1097			6				12
1098	7	14 1/4					
1099	3 1/2	5 1/2	3	7/8	12	1/8	8
1100			4				10
1101			5				12
1102			6				16
1103	7	15					
1201	1	2 3/16	2	1/2	8	3/32	1 1/4
1202			3				2
1203			4				2 3/4
1205	1 1/8	2 3/16	2	1/2	8	3/32	1 1/2
1206			3				2
1207			4				2 1/2
1209	1 3/16	2 3/8	2	5/8	8	3/32	2
1210			3				3
1211			4				4

Sizes not listed - Metric Bores - Made to Order - Price upon request.
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COMMERCIAL ROLLER BEARINGS

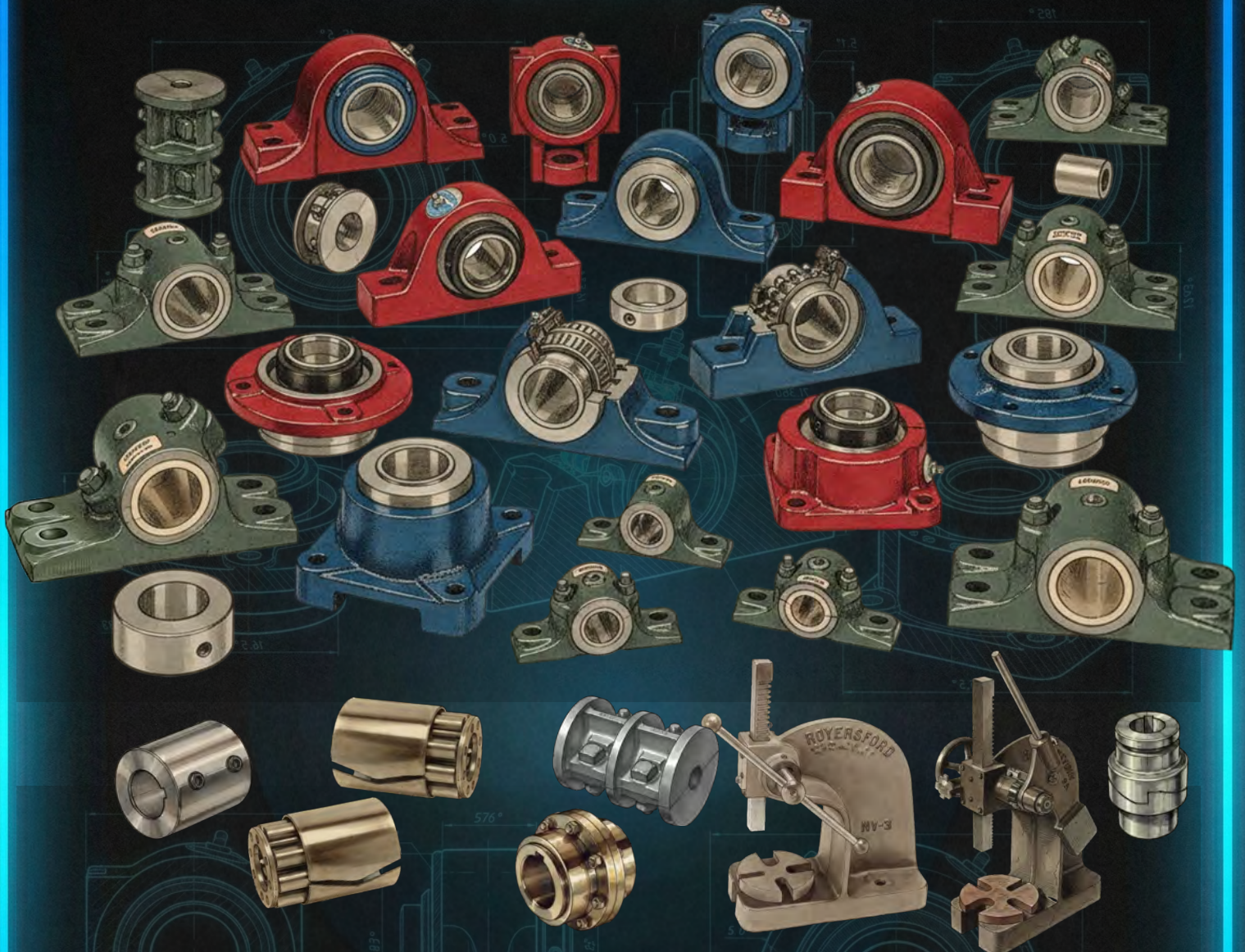


Brg. No.	I.D.	O.D.	Length	Size of Rolls	No. of Rolls	Split Outer Race	App. Wt.
1213	1 ¼	2 11/16	2	5/8	8	3/32	2
1214			3				2 ¾
1215			4				3 ¾
1216			5				4 ¾
1218	1 3/8	2 13/16	2	5/8	9	3/32	3
1219			3				3 ¼
1220			4				3 ¾
1221			5				6
1223	1 7/16	3 3/8	2	3/4	8	3/32	2 ¾
1224			3				3 ¾
1225			4				5
1226			5				6
1228	1 ½	3 3/16	2	3/4	8	3/32	2 ½
1229			3				4
1230			4				5
1231			5				6 ¼
1233	1 5/8	3 3/16	3	11/16	9	3/32	4
1234			4				4 ¾
1235			5				6
1237	1 11/16	3 3/8	3	3/4	9	3/32	4 ¼
1238			4				6
1239			5				7
1240			6				8 ¾
1242	1 ¾	3 7/16	3	3/4	9	3/32	4
1243			4				5 ¼
1244			5				7
1245			6				8
1247	1 7/8	3 3/16	3	3/4	9	3/32	4 ¼
1248			4				5 ¼
1249			5				6 ¼
1250			6				8
1252	1 15/16	3 15/16	3	7/8	9	1/8	6
1253			4				6
1254			5				9 ¼
1255			6				10
1256	2	4	2	7/8	9	1/8	4
1257			3				6
1258			4				7 ¾
1259			5				10
1260			6				11
1261	2 3/16	4 3/16	3	7/8	10	1/8	6
1262			4				8
1263			5				11
1264			6				12
1265	2 ¼	4 ¼	3	7/8	10	1/8	6 ¼
1266			4				8
1267			5				11
1268			6				12
1269	2 7/16	4 3/16	3	15/16	10	1/8	7
1270			4				10
1271			5				11 ¼
1272			6				13 ¾
1273			7				17
1274	2 ½	4 3/8	3	15/16	10	1/8	7
1275			4				9 ¾
1276			5				11 ¼
1277			6				14
1278			7				17
1279	2 11/16	4 13/16	3	15/16	10	1/8	7 ¾
1280			4				10
1281			5				14
1282			6				15
1283			7				18
1284	2 ¾	4 7/8	3	15/16	11	1/8	8
1285			4				11
1286			5				13 ¼
1287			6				16
1288			7				19

Brg. No.	I.D.	O.D.	Length	Size of Rolls	No. of Rolls	Split Outer Race	App. Wt.
1289	2 15/16	5 3/16	3	1	11	1/8	9 ¼
1290			4				12
1291			5				16
1292			6				18 ¼
1293			7				22
1294	3	5 ¼	3	1	11	1/8	10
1295			4				12 ¼
1296			5				15
1297			6				17
1298			7				22
1299	4 ½	6 3/8	3	1 1/8	12	3/16	12
1300			4				17
1301			5				21 ½
1302			6				27
1304	7	30					
1305	4	6 3/8	3	1 1/8	12	3/16	13 ½
1306			4				18
1307			5				22
1308			6				26 ½
1309	7	31 ½					
1310	4 ½	7 3/8	3	1 ¼	11	3/16	17
1311			4				21
1312			5				25
1313			6				34
1314			7				36
1315	5	7 7/8	3	1 ¼	12	3/16	19
1316			4				22
1317			5				28
1318			6				34
1319			7				35
1320	5 ¾	8 3/8	3	1 ¼	15	3/16	24 ½
1321			4				27
1322			5				34
1323			6				41 ¼
1324			7				45
1325	6	8 7/8	3	1 ¼	15	3/16	26
1326			4				28
1327			5				35
1329			6				41
1330			7				48
1340	7	10 1/8	7	1 3/8	15	3/16	57

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- R2000 Mounted Spherical Bearings with SKF Inserts (2 & 4-Bolt Pillow Blocks, Square Flanges, Piloted Flanges & Take-Ups)
- Type E Mounted Bearings with Timken Inserts (2 & 4-Bolt Pillow Blocks, Square Flanges, Piloted Flanges & Take-Ups)
- Babbitt & Bronze Sleeved Journal Bearings (Solid, 2-Bolt Split, 4-Bolt Rigid Split, 4-Bolt Rigid Split - Gibbed Joint & 40 Deg Split Angle) Other lining materials available upon request
- Custom Bearing Manufacturing
- Rigid Shaft Couplings (Clamp, Flanged & Sleeve)
- Solid Steel & Solid Cast Iron Collars
- Split Cast Iron Collars
- Commercial Roller Bearings
- Custom Precision Components
- Most items are available in inch & metric sizes (metric items are made to order)



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