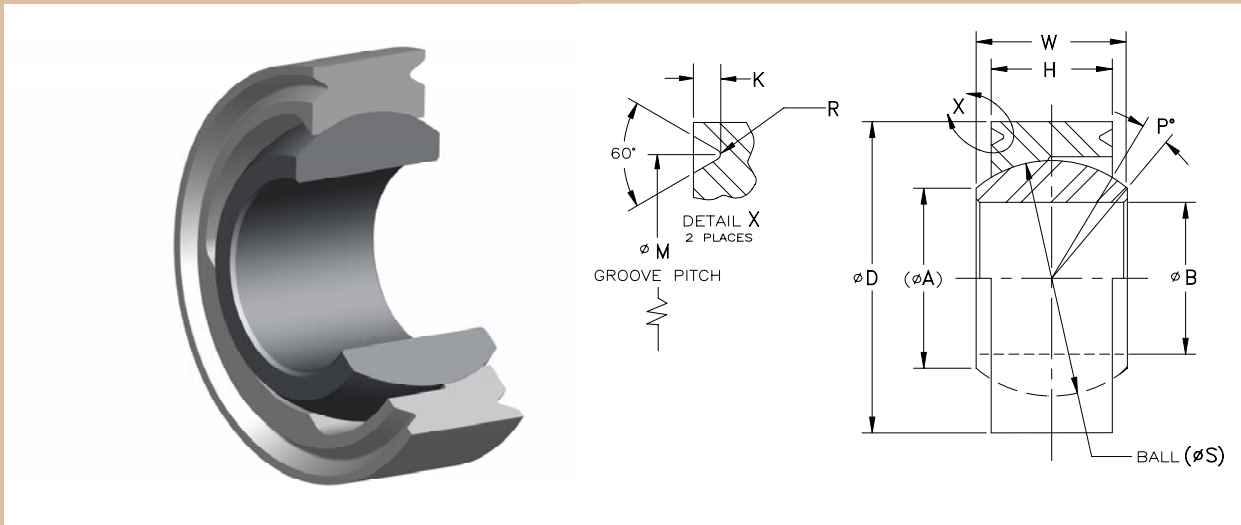




## P20000 SERIES NARROW, GROOVED, ANNULAR

Designed with staking groove on both sides for retention in housing  
Operating temperature -65°F to 450°F



Part Number	Ø B +.0000 -.0005	Ø D +.0000 -.0005	W +.000 -.002	H +.003 -.003	Ø A Ref.	P° Mis.	Ø M +.003 -.003	K +.006 -.006	R Ref.	Ø S Ball OD Ref.	Static Load (Pounds)		Weight in Pounds
											Limit Radial	Limit Axial	
P20000	.2500	.6562	.343	.250	.405	12	.588	.022	.008	.5300	6,300	2,400	.02
P20010	.3125	.7500	.375	.281	.420	11	.682	.022	.008	.5625	7,700	3,500	.04
P20020	.3750	.8125	.406	.312	.476	10	.714	.032	.008	.6250	10,000	4,500	.04
P20030	.4375	.9062	.437	.343	.530	9	.808	.032	.008	.6865	12,500	5,600	.06
P20040	.5000	1.0000	.500	.390	.641	9	.877	.052	.008	.8125	17,950	7,600	.07
P20050	.5625	1.0937	.562	.437	.671	9	.970	.052	.014	.8750	21,200	9,950	.09
P20060	.6250	1.1875	.625	.500	.740	9	1.064	.052	.014	.9680	26,500	13,000	.11
P20070	.7500	1.4375	.750	.593	.921	9	1.314	.052	.014	1.1870	40,500	20,000	.17
P20080	.8750	1.5625	.875	.703	.978	9	1.439	.052	.014	1.3120	51,000	27,500	.22
P20090	1.0000	1.7500	1.000	.797	1.119	9	1.627	.052	.014	1.5000	67,500	37,000	.28

.002 INCH MAX INTERNAL CLEARANCE (CONTACT PSI ENGINEERING FOR REDUCED CLEARANCE DESIGN)

#### MATERIAL:

BALL: COBALT ALLOY PER AMS 5387, HRC 37 MINIMUM  
RACE: 15-5PH PER AMS 5659, COND H-1025  
(17-4PH PER AMS 5643 OPTIONAL)

#### SURFACE TREATMENT:

BALL O.D.: SOLID FILM LUBRICANT  
RACE I.D.: NITRIDED

LOADS BASED ON OPTIMUM LOAD DIRECTION

CONTACT PSI ENGINEERING FOR LOADS TOWARDS SLOT AND ALTERNATE MATERIAL

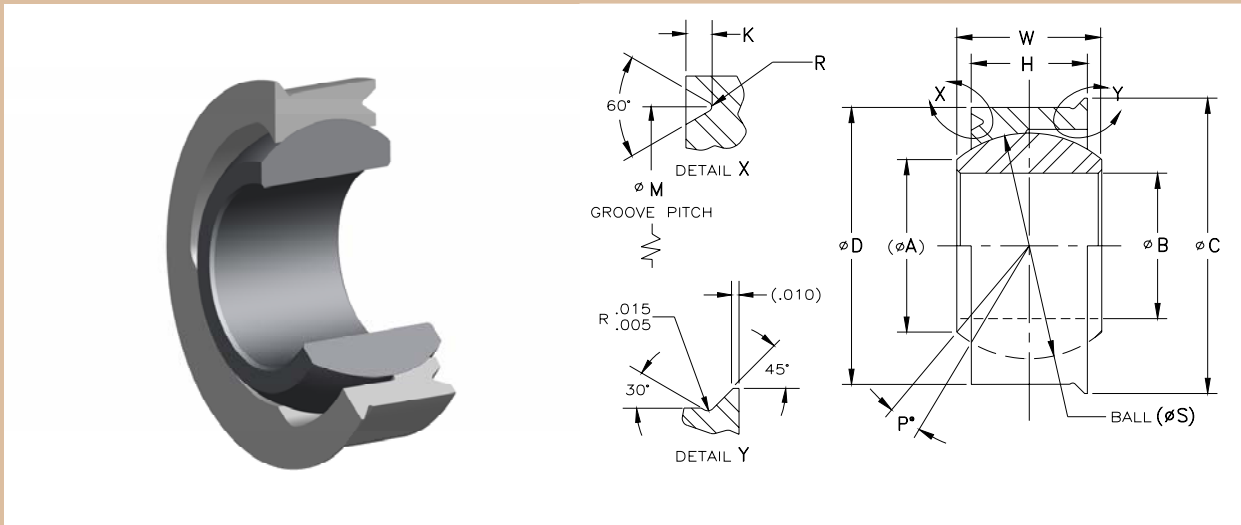
DIMENSIONALLY INTERCHANGEABLE WITH AS14101 SERIES





# P25000 SERIES NARROW, PRE-SWAGED, ANNULAR

Designed for high thrust loads and for applications where swaging/staking both sides is difficult.  
Operating temperature -65°F to 600°F



Part Number	Ø B +.0000 -.0005	Ø D +.0000 -.0005	Ø C +.002 -.002	W +.000 -.002	H +.003 -.003	Ø A Ref.	P° Mis.	Ø M +.003 -.003	K +.006 -.006	R Ref.	Ø S Ball OD Ref.	Static Load (Pounds)		Approx. Weight Pounds
												Limit Radial	Limit Axial	
P25000	.2500	.6562	.676	.343	.250	.405	12	.588	.022	.008	.5300	6,300	2,400	.02
P25010	.3125	.7500	.770	.375	.281	.420	11	.682	.022	.008	.5625	7,700	3,500	.04
P25020	.3750	.8125	.852	.406	.312	.476	10	.714	.032	.008	.6250	10,000	4,500	.04
P25030	.4375	.9062	.946	.437	.343	.530	9	.808	.032	.008	.6865	12,500	5,600	.06
P25040	.5000	1.0000	1.080	.500	.390	.641	9	.877	.052	.008	.8125	17,950	7,600	.07
P25050	.5625	1.0937	1.174	.562	.437	.671	9	.970	.052	.014	.8750	21,200	9,950	.09
P25060	.6250	1.1875	1.267	.625	.500	.740	9	1.064	.052	.014	.9680	26,500	13,000	.11
P25070	.7500	1.4375	1.517	.750	.593	.921	9	1.314	.052	.014	1.1870	40,500	20,000	.17
P25080	.8750	1.5625	1.642	.875	.703	.978	9	1.439	.052	.014	1.3120	51,000	27,500	.22
P25090	1.0000	1.7500	1.830	1.000	.797	1.119	9	1.627	.052	.014	1.5000	67,500	37,000	.28

.002 INCH MAX INTERNAL CLEARANCE (CONTACT PSI ENGINEERING FOR REDUCED CLEARANCE DESIGN)

**MATERIAL:**

BALL: COBALT ALLOY PER AMS 5387, HRC 37 MINIMUM  
RACE: 15-5PH PER AMS 5659, COND H-1025  
(17-4PH PER AMS 5643 OPTIONAL)

**SURFACE TREATMENT:**

BALL O.D.: SOLID FILM LUBRICANT  
RACE I.D.: NITRIDED

LOADS BASED ON OPTIMUM LOAD DIRECTION

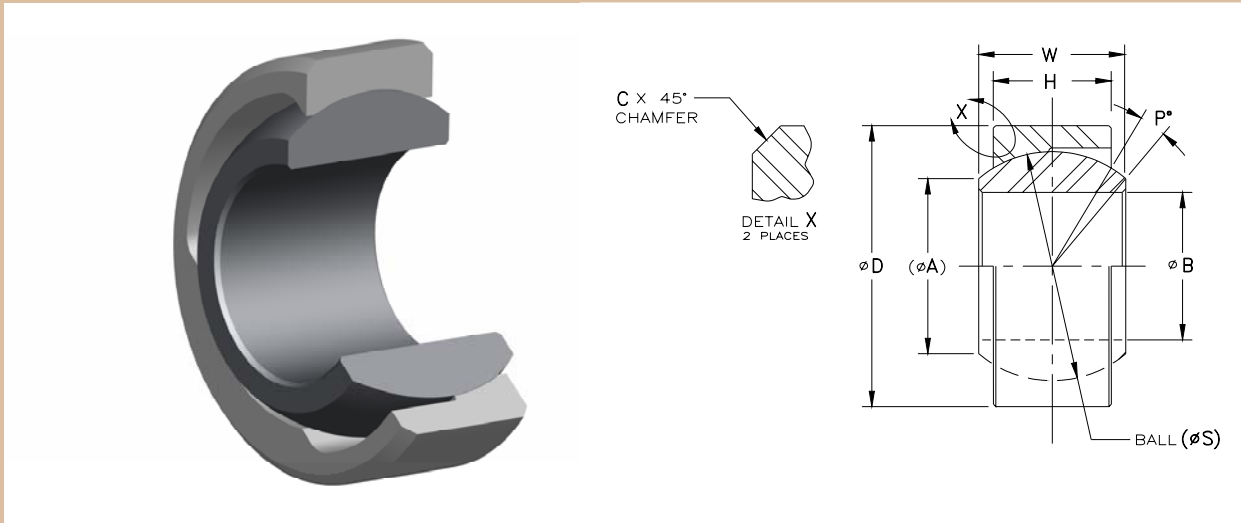
CONTACT PSI ENGINEERING FOR LOADS TOWARDS SLOT AND ALTERNATE MATERIAL

DIMENSIONALLY INTERCHANGEABLE WITH AS14101 SERIES



## P20100 SERIES NARROW, CHAMFERED, ANNULAR

Designed for applications where the bearing is retained by the housing.  
Operating temperature -65°F to 450°F



Part Number	Ø B +.0000 -.0005	Ø D +.0000 -.0005	W +.000 -.002	H +.003 -.003	Ø A Ref.	P° Mis.	C +.005 -.005	Ø S Ball OD Ref.	Static Load (Pounds)		Approx. Weight Pounds
									Limit Radial	Limit Axial	
P20100	.2500	.6562	.343	.250	.405	12	.020	.5300	6,300	2,400	.02
P20110	.3125	.7500	.375	.281	.420	11	.020	.5625	7,700	3,500	.04
P20120	.3750	.8125	.406	.312	.476	10	.025	.6250	10,000	4,500	.04
P20130	.4375	.9062	.437	.343	.530	9	.025	.6865	12,500	5,600	.06
P20140	.5000	1.0000	.500	.390	.641	9	.030	.8125	17,950	7,600	.07
P20150	.5625	1.0937	.562	.437	.671	9	.030	.8750	21,200	9,950	.09
P20160	.6250	1.1875	.625	.500	.740	9	.030	.9680	26,500	13,000	.11
P20170	.7500	1.4375	.750	.593	.921	9	.030	1.1870	40,500	20,000	.17
P20180	.8750	1.5625	.875	.703	.978	9	.030	1.3120	51,000	27,500	.22
P20190	1.0000	1.7500	1.000	.797	1.119	9	.030	1.5000	67,500	37,000	.28

.002 INCH MAX INTERNAL CLEARANCE (CONTACT PSI ENGINEERING FOR REDUCED CLEARANCE DESIGN)

**MATERIAL:**

BALL: COBALT ALLOY PER AMS 5387, HRC 37 MINIMUM  
RACE: 15-5PH PER AMS 5659, COND H-1025  
(17-4PH PER AMS 5643 OPTIONAL)

**SURFACE TREATMENT:**

BALL O.D.: SOLID FILM LUBRICANT  
RACE I.D.: NITRIDED

LOADS BASED ON OPTIMUM LOAD DIRECTION

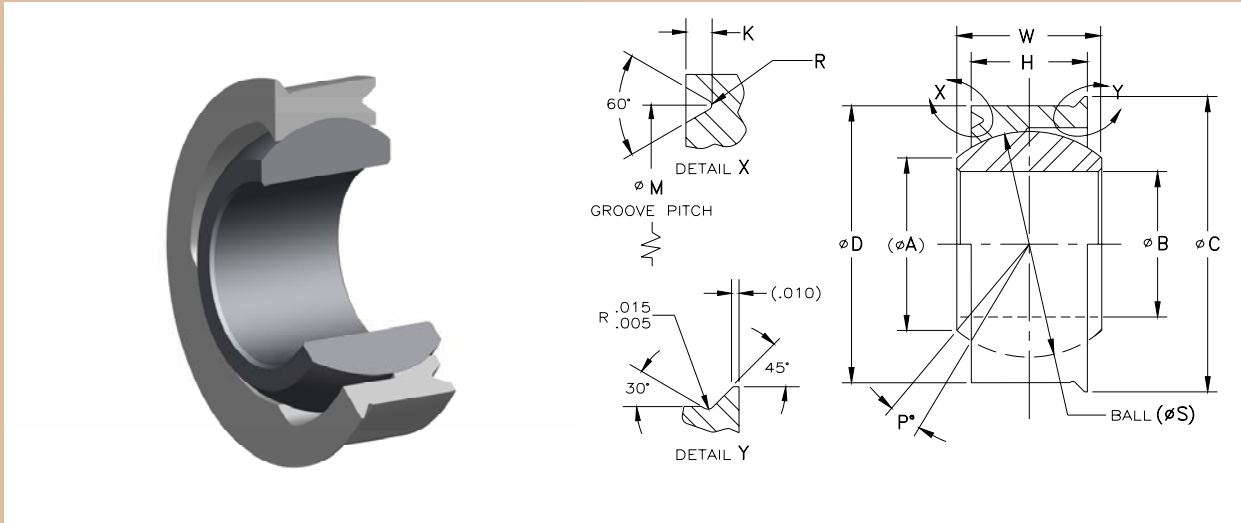
CONTACT PSI ENGINEERING FOR LOADS TOWARDS SLOT AND ALTERNATE MATERIAL

DIMENSIONALLY INTERCHANGEABLE WITH AS14104 SERIES



# P22100 SERIES WIDE, PRE-SWAGED, ANNULAR

Designed for high thrust loads and for applications where swaging/staking both sides is difficult.  
Operating temperature -65°F to 450°F



Part Number	Ø B +.0000 -.0005	Ø D +.0000 -.0005	Ø C +.002 -.002	W +.000 -.002	H +.003 -.003	Ø A Ref.	P° Mis.	Ø M +.003 -.003	K +.006 -.006	R Ref.	Ø S Ball OD Ref.	Static Load (Pounds)		Approx. Weight Pounds
												Limit Radial	Limit Axial	
P22100	.2500	.6250	.645	.437	.327	.301	16	.557	.022	.008	.5300	6,200	4,000	.02
P22110	.3125	.6875	.707	.437	.317	.402	14	.619	.022	.008	.5930	8,500	4,150	.03
P22120	.3750	.8125	.852	.500	.406	.471	10	.714	.032	.008	.6865	12,000	7,500	.05
P22130	.4375	.9375	.977	.562	.442	.587	10	.839	.032	.008	.8125	17,800	9,450	.07
P22140	.5000	1.0000	1.080	.625	.505	.613	9	.877	.052	.008	.8750	21,000	12,700	.08
P22150	.5625	1.1250	1.205	.687	.536	.727	10	1.002	.052	.014	1.0000	28,000	14,900	.12
P22160	.6250	1.1875	1.267	.750	.567	.753	12	1.064	.052	.014	1.0620	31,000	17,000	.14
P22170	.7500	1.3750	1.455	.875	.630	.893	13	1.252	.052	.014	1.2500	42,000	21,400	.20
P22180	.8750	1.6250	1.705	.875	.755	1.061	6	1.502	.052	.014	1.3750	57,700	31,600	.30
P22190	1.0000	2.1250	2.205	1.375	1.005	1.275	14	2.002	.052	.014	1.8750	99,200	58,700	.90

.002 INCH MAX INTERNAL CLEARANCE (CONTACT PSI ENGINEERING FOR REDUCED CLEARANCE DESIGN)

**MATERIAL:**

BALL: COBALT ALLOY PER AMS 5387, HRC 37 MINIMUM  
RACE: 15-5PH PER AMS 5659, COND H-1025  
(17-4PH PER AMS 5643 OPTIONAL)

**SURFACE TREATMENT:**

BALL O.D.: SOLID FILM LUBRICANT  
RACE I.D.: NITRIDED

LOADS BASED ON OPTIMUM LOAD DIRECTION

CONTACT PSI ENGINEERING FOR LOADS TOWARDS SLOT AND ALTERNATE MATERIAL

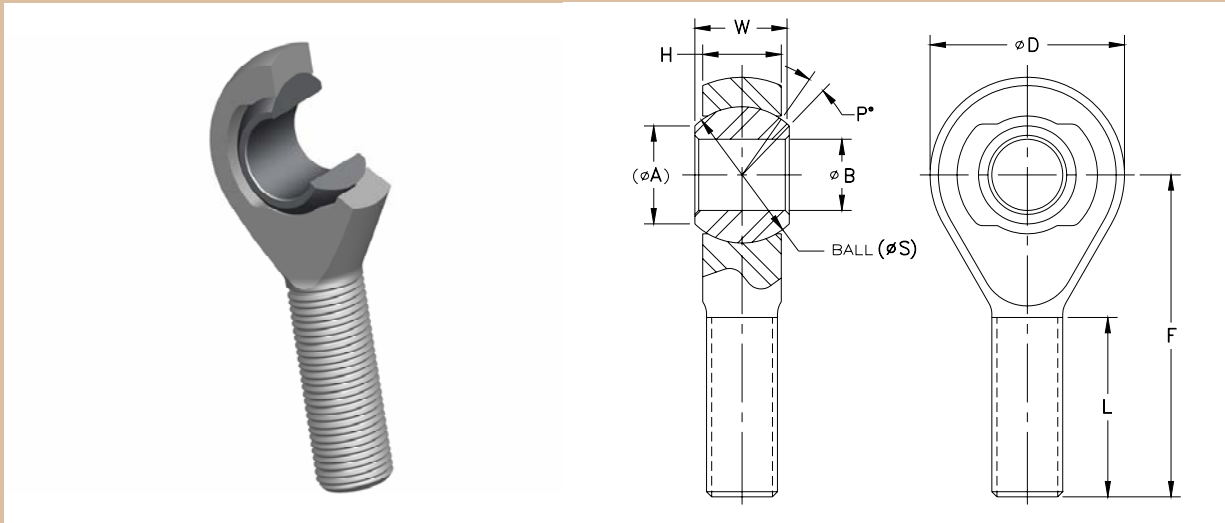
DIMENSIONALLY INTERCHANGEABLE WITH AS14102 SERIES





# P30000 SERIES WIDE PROFILE, MALE ROD END

Operating temperature -65°F to 450°F



Part Number	Ø B +.0000 -.0005	Ø D +.010 -.010	W +.000 -.002	H +.000 -.020	Ø A Ref.	P° Mis.	Ø S Ball OD Ref.	F +.010 -.010	L +.030 -.030	Thread Size UNJF-3A	Load in (Pounds)		Approx. Weight Pounds
											Static Radial Limit	Dynamic	
P30000	.1900	.805	.437	.350	.355	15	.5625	1.562	.968	.3125-24	1,500	900	.08
P30010	.2500	.805	.437	.350	.355	15	.5625	1.562	.968	.3125-24	4,000	900	.08
P30020	.3125	.900	.437	.340	.402	14	.5930	1.875	1.187	.3125-24	5,400	1,250	.09
P30030	.3750	1.030	.500	.430	.516	8	.7180	1.938	1.187	.3750-24	8,400	2,050	.14
P30040	.4375	1.150	.562	.460	.543	10	.7810	2.125	1.281	.4375-20	11,300	2,300	.20
P30050	.5000	1.337	.625	.525	.613	9	.8750	2.438	1.468	.5000-20	15,400	3,000	.30
P30060	.6250	1.525	.750	.585	.753	12	1.0620	2.625	1.562	.6250-18	18,850	4,400	.44
P30070	.7500	1.775	.875	.650	.873	13	1.2350	2.875	1.687	.7500-16	25,800	6,000	.66
P30080	.8750	2.025	.875	.775	1.061	6	1.3750	3.375	2.000	.8750-14	36,500	8,350	1.00
P30090	1.0000	2.775	1.375	1.025	1.181	12	1.8120	4.125	2.343	1.2500-12	56,000	12,650	2.58

.002 INCH MAX INTERNAL CLEARANCE (CONTACT PSI ENGINEERING FOR REDUCED CLEARANCE DESIGN)

**MATERIAL:**

BALL: COBALT ALLOY PER AMS 5387, HRC 37 MINIMUM  
 ROD END BODY: 15-5PH PER AMS 5659, COND H-1025  
 (17-4PH PER AMS 5643 OPTIONAL)

**SURFACE TREATMENT:**

BALL O.D.: SOLID FILM LUBRICANT  
 ROD END BODY I.D.: NITRIDED

STATIC RADIAL LOADS BASED ON 15-5PH MATERIAL  
 DYNAMIC LOADS BASED ON 12,000 PSI AND ± 25° OSCILLATION  
 CONTACT PSI ENGINEERING FOR FATIGUE LOADS AND ALTERNATE MATERIAL

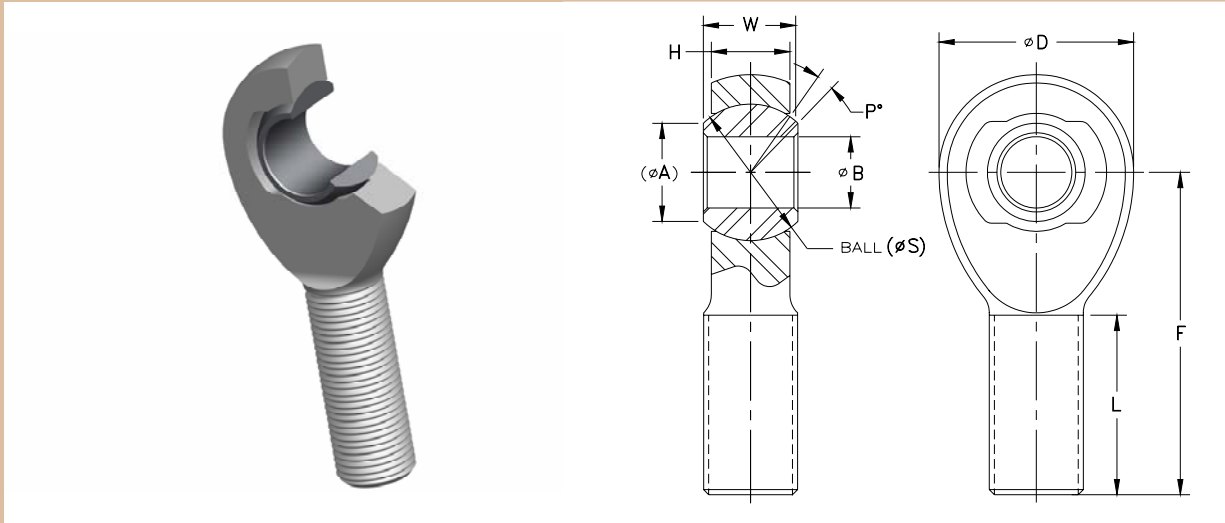
DIMENSIONALLY INTERCHANGEABLE WITH AS81935/1 SERIES





# PSI P37300 SERIES NARROW PROFILE, BALANCED DESIGN, MALE ROD END

Designed for high fatigue load applications  
Operating temperature -65°F to 600°F



Part Number	Ø B +.0000 -.0005	Ø D +.010 -.010	W +.000 -.002	H +.000 -.020	Ø A Ref.	P° Mis.	Ø S Ball OD Ref.	F +.010 -.010	L +.030 -.030	Thread Size UNJF-3A	Load in (Pounds)		Approx. Weight Pounds
											Static Radial Limit	Dynamic	
P37300	.1900	.850	.343	.260	.405	12	.5300	1.656	.968	.3125-24	3,200	900	.06
P37310	.2500	.850	.343	.260	.405	12	.5300	1.656	.968	.3125-24	5,400	900	.06
P37320	.3125	.900	.375	.290	.420	12	.5625	1.906	1.187	.3125-24	5,400	1,050	.07
P37330	.3750	1.000	.406	.322	.476	11	.6250	2.000	1.187	.3750-24	8,400	1,300	.09
P37340	.4375	1.095	.437	.353	.530	10	.6865	2.125	1.280	.4375-20	11,300	1,700	.12
P37350	.5000	1.332	.500	.405	.641	9	.8125	2.560	1.468	.5000-20	15,400	2,450	.20
P37360	.6250	1.535	.625	.515	.740	9	.9680	2.780	1.560	.6250-18	23,600	3,650	.34
P37370	.7500	1.890	.750	.610	.921	9	1.1870	3.062	1.687	.7500-16	35,000	5,550	.62
P37380	.8750	2.210	.875	.718	.978	9	1.3120	3.560	2.000	.8750-14	49,000	6,950	.95
P37390	1.0000	2.625	1.000	.817	1.119	9	1.5000	4.125	2.343	1.2500-12	66,000	9,150	1.50

.002 INCH MAX INTERNAL CLEARANCE (CONTACT PSI ENGINEERING FOR REDUCED CLEARANCE DESIGN)

**MATERIAL:**

BALL: COBALT ALLOY PER AMS 5387, HRC 37 MINIMUM  
ROD END BODY: 15-5PH PER AMS 5659, COND H-1025  
(17-4PH PER AMS 5643 OPTIONAL)

**SURFACE TREATMENT:**

BALL O.D.: SOLID FILM LUBRICANT  
ROD END BODY I.D.: NITRIDED

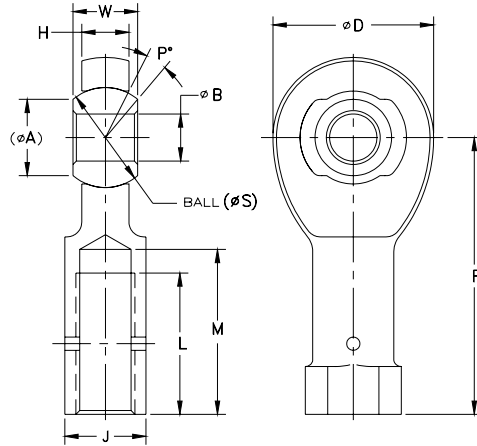
STATIC RADIAL LOADS BASED ON 15-5PH MATERIAL  
DYNAMIC LOADS BASED ON 12,000 PSI AND ± 25° OSCILLATION  
CONTACT PSI ENGINEERING FOR FATIGUE LOADS AND ALTERNATE MATERIAL





# PSI P38700 SERIES NARROW PROFILE, BALANCED DESIGN, FEMALE ROD END

Designed for high fatigue load applications  
Operating temperature -65°F to 600°F



Part Number	Ø B +.0000 -.0005	Ø D +.010 -.010	W +.000 -.002	H +.000 -.020	Ø A Ref.	P° Mis.	Ø S Ball OD Ref.	F +.010 -.010	L Min.	M Max.	J Wrench Flats +.000 -.015	Thread Size UNJF-3B	Load in (Pounds)		Approx. Weight Pounds
													Static Radial Limit	Dynamic	
P38700	.1875	.850	.343	.260	.404	12	.5300	1.375	.750	.875	.437	.3125-24	3,200	900	.07
P38710	.2500	.850	.343	.260	.404	12	.5300	1.469	.750	.875	.437	.3125-24	6,000	900	.07
P38720	.3125	.900	.375	.290	.419	12	.5625	1.625	.875	1.000	.500	.3750-24	7,400	1,050	.09
P38730	.3750	1.000	.406	.322	.475	11	.6250	1.812	1.000	1.125	.562	.3750-24	9,500	1,300	.13
P38740	.4375	1.095	.437	.353	.529	10	.6865	2.000	1.125	1.250	.625	.4375-20	11,500	1,700	.16
P38750	.5000	1.332	.500	.405	.640	9	.8125	2.250	1.250	1.375	.750	.5000-20	16,500	2,450	.28
P38760	.6250	1.535	.625	.515	.740	9	.9680	2.500	1.375	1.500	.875	.6250-18	23,500	3,650	.41
P38770	.7500	1.890	.750	.610	.920	9	1.1870	2.875	1.625	1.750	1.000	.7500-16	33,000	5,550	.66
P38780	.8750	2.210	.875	.718	.978	9	1.3120	3.375	1.875	2.062	1.125	.8750-14	39,610	6,950	1.00
P38790	1.0000	2.625	1.000	.817	1.118	9	1.5000	4.125	2.125	2.312	1.750	1.2500-12	66,000	9,150	2.31

.002 INCH MAX INTERNAL CLEARANCE (CONTACT PSI ENGINEERING FOR REDUCED CLEARANCE DESIGN)

**MATERIAL:**

BALL: COBALT ALLOY PER AMS 5387, HRC 37 MINIMUM  
ROD END BODY: 15-5PH PER AMS 5659, COND H-1025  
(17-4PH PER AMS 5643 OPTIONAL)

**SURFACE TREATMENT:**

BALL O.D.: SOLID FILM LUBRICANT  
ROD END BODY I.D.: NITRIDED

STATIC RADIAL LOADS BASED ON 15-5PH MATERIAL  
DYNAMIC LOADS BASED ON 12,000 PSI AND ± 25° OSCILLATION  
CONTACT PSI ENGINEERING FOR FATIGUE LOADS AND ALTERNATE MATERIAL

