



Bore Diameter: d	Outer Diameter: D		Open Type Width: B		Seal/Shield Type Width: B1		Radius: rs(min)		Bearing References			Load Rating		Max. Speed		Cage Type	Ball Complement		Weight(Ref.)			
	mm	inch	mm	inch	mm	inch	mm	inch	Open	Shield	Seal	Cr (N)	Cor (N)	Grease	Oil		Qty.: Z	Size: Dw	Shield	Flange Shield	g	
<b>ET series</b>																						
15	0.5906	20	0.7874	3.5	0.1378	-	-	0.15	0.0059	ET2015	-	-	942	582	22	26	W	14	1.588	0.0625	2.10	-
		21	0.8268	3.5	0.1378	-	-	0.15	0.0059	ET2115	-	-	939	581	22	26	W	14	1.588	0.0625	2.43	-
16	0.6299	22	0.8661	4.0	0.1575	-	-	0.15	0.0059	ET2216	-	-	968	619	20	24	W	15	1.588	0.0625	3.04	-
		23	0.9055	4.5	0.1772	4.5	0.1772	0.15	0.0059	ET2316	ZZS	TTS	968	619	20	24	W	15	1.588	0.0625	4.03	5.48
18	0.7087	24	0.9445	4.0	0.1575	-	-	0.15	0.0059	ET2418	-	-	988	654	18	21	W	16	1.588	0.0625	4.25	-
20	0.7874	25	0.9843	4.0	0.1575	4.0	0.1575	0.15	0.0059	ET2520	ZZS	TTS	1011	691	17	20	W	17	1.588	0.0625	3.55	4.12
<b>ER series</b>																						
9.525	0.3750	15.875	0.6250	3.967	0.1562	3.967	0.1562	0.25	0.0098	ER1038	ZZS	TTS	856	435	30	35	W	11	1.588	0.0625	2.71	2.98
12.700	0.5000	19.050	0.7500	3.967	0.1562	3.967	0.1562	0.25	0.0098	ER1212	ZZS	TTS	918	542	24	28	W	13	1.588	0.0625	3.49	3.84
15.875	0.6250	22.225	0.8750	3.967	0.1562	3.967	0.1562	0.25	0.0098	ER1458	ZZS	TTS	968	619	20	24	W	15	1.588	0.0625	4.18	4.60
19.050	0.7500	25.400	1.0000	3.967	0.1562	3.967	0.1562	0.25	0.0098	ER1634	ZZS	TTS	1011	691	17	20	W	17	1.588	0.0625	5.02	5.52

1) Bearings also available with single shield or seal : suffix ZS or TS  
2) Bearings also available with stainless material : suffix S

## FM series with raceway

Bearing Reference e	Inner Ring Bore Dia.		Outer Ring Outer Dia.		Outer Ring Bore Dia.		Inner Ring Outer Dia.		Radius		Height		Load Rating		Max Speed (x1000rpm)		Cage Type	Ball Complement		Weight (Ref.) g	
	d	D	d1	D1	rs(min)	H	Ca(N)	Coa(N)	Grease	Oil	Qty.: Z	Size: Dw									
F3-8M	3	0.1181	8	0.3150	3.2	0.1260	7.8	0.3071	0.15	0.0059	3.5	0.1378	993	590	19	28	TP	6	1.588	0.0625	0.9
F4-9M	4	0.1575	9	0.3543	4.2	0.1654	8.8	0.3465	0.15	0.0059	4.0	0.1575	944	640	17	25	TP	6	1.588	0.0625	1.2
F4-10M	4	0.1575	10	0.3937	4.2	0.1654	9.8	0.3858	0.15	0.0059	4.0	0.1575	925	661	16	24	TP	6	1.588	0.0625	1.5
F5-12M	5	0.1969	12	0.4724	5.2	0.2047	11.8	0.4646	0.20	0.0079	4.0	0.1575	1056	942	14	22	TP	8	1.588	0.0625	2.1
F6-12M	6	0.2362	12	0.4724	6.2	0.2441	11.8	0.4646	0.20	0.0079	4.5	0.1772	1819	1588	14	20	TP	9	2.000	0.0787	2.2
F6-14M	6	0.2362	14	0.5512	6.25	0.2461	13.8	0.5433	0.20	0.0079	5.0	0.1969	2155	1701	12	18	TP	7	2.381	0.0937	3.5
F7-13M	7	0.2756	13	0.5118	7.2	0.2835	16.8	0.6614	0.20	0.0079	4.5	0.1772	1767	1645	13	20	TP	9	2.000	0.0787	2.6
F7-17M	7	0.2756	17	0.6693	7.2	0.2835	16.8	0.6614	0.30	0.0118	6.0	0.2362	3086	2675	10	15	TP	8	2.778	0.1094	6.5
F8-16M	8	0.3150	16	0.6299	8.2	0.3228	15.8	0.6220	0.30	0.0118	5.0	0.1969	3917	3394	11	17	TP	9	3.000	0.1181	4.5
F8-19M	8	0.3150	19	0.7480	8.2	0.3228	18.8	0.7402	0.30	0.0118	7.0	0.2756	3939	3476	9	13	TP	8	3.175	0.1250	9.1
F9-20M	9	0.3543	20	0.7874	9.2	0.3622	19.8	0.7795	0.30	0.0118	7.0	0.2756	3855	3571	8	13	TP	8	3.175	0.1250	9.9
F10-18M	10	0.3937	18	0.7087	10.2	0.4016	17.8	0.7008	0.30	0.0118	5.5	0.2165	2470	2721	10	15	TP	10	2.381	0.0937	5.4

1) Bearings also available with stainless material : suffix H

## F series without raceway

Bearing Reference	Inner Ring Bore Dia.		Outer Ring Outer Dia.		Outer Ring Bore Dia.		Inner Ring Outer Dia.		Radius		Height		Load Rating		Cage Type	Ball Complement		Weight (Ref.) g	
	d	D	d1	D1	rs(min)	H	Ca(N)	Coa(N)	Qty.: Z	Size: Dw									
F2-6	2.0	0.0787	6	0.2362	2.0	0.0787	6	0.2362	0.10	0.0039	3.0	0.1181	117	83	TD	6	1.000	0.0394	0.6
F2X-7	2.5	0.0984	7	0.2756	2.5	0.0984	7	0.2756	0.10	0.0039	3.5	0.1378	156	117	TD	6	1.200	0.0472	0.9
F3-8	3.0	0.1181	8	0.3150	3.0	0.1181	8	0.3150	0.10	0.0039	3.5	0.1378	166	137	TD	7	1.200	0.0472	0.6
F4-9	4.0	0.1575	9	0.3543	4.0	0.1575	9	0.3543	0.15	0.0059	4.0	0.1575	166	156	TD	8	1.200	0.0472	1.5
F4-10	4.0	0.1575	10	0.3937	4.0	0.1575	10	0.3937	0.15	0.0059	4.5	0.1772	274	245	TD	7	1.588	0.0625	2.0
F5-11	5.0	0.1969	11	0.4331	5.0	0.1969	11	0.4331	0.15	0.0059	4.5	0.1772	284	284	TD	7	1.588	0.0625	2.4
F6-12	6.0	0.2362	12	0.4724	6.0	0.2362	12	0.4724	0.15	0.0059	4.5	0.1772	274	284	TD	9	1.588	0.0625	2.5
F7-15	7.0	0.2756	15	0.5906	7.0	0.2756	15	0.5906	0.20	0.0079	5.0	0.1969	558	548	TD	8	2.381	0.0937	4.4
F8-16	8.0	0.3150	16	0.6299	8.0	0.3150	16	0.6299	0.20	0.0079	5.0	0.1969	597	627	TD	8	2.000	0.0787	5.0
F9-17	9.0	0.3543	17	0.6693	9.0	0.3543	17	0.6693	0.20	0.0079	5.0	0.1969	437	542	TD	9	2.000	0.0787	5.1
F10-18	10.0	0.3937	18	0.7087	10.0	0.3937	18	0.7087	0.20	0.0079	5.5	0.2165	617	705	TD	9	2.381	0.0937	6.0

1) Bearings also available with stainless material : suffix H (Cage material : Brass)