

Bearing selection

Products Series

AISI 440C

AISI 304

AISI 630

Pure Titanium

Ceramic

Heat Resistance

Grease Free

Low Torque

Solid Grease

Set Screw

Alignment Function

Flange Unit

Guide Wheel

6800
6900

SS5200
5200

5800

Customization

Examples of Use

LF Series Special Low Torque Lubricant Bearings



Corrosion resistance



Clean



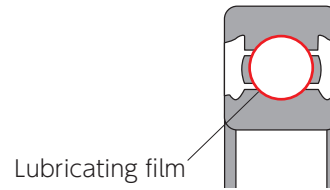
Non-grease

A very low torque rotation is achieved because grease is not used. Ideal when you want to reduce rotational resistance in an application such as "free spinning rollers".



Features

1. Low torque compared to conventional bearings
2. By applying a lubricating film to the inside of the bearing, it can be used where oil leakage is not desired.
3. Low dust generation
4. The operating temperature is up to 50°C/122°F.
5. Used for light loads

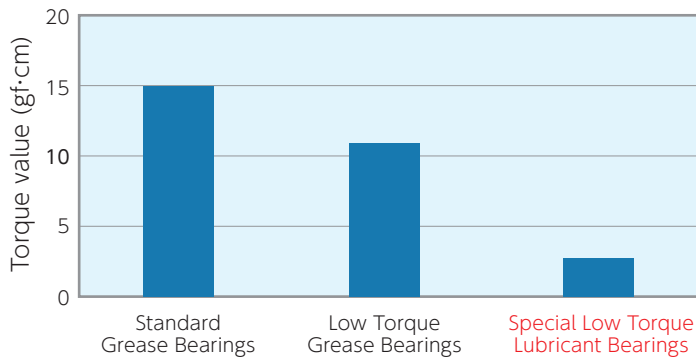


Product Specifications

Standard Specifications	
Inner and Outer rings	AISI 440C
Balls	AISI 440C
Retainer	AISI 304
Shield	AISI 304
Lubricant	Lubricating film

Performance

Measured results at the start of rotation



©Measurement conditions
Bearings: SS 6004 ZZ

*The above performance values are our company measurement results and are not guaranteed.

Applications

Free spinning rollers, film transfer rollers, clean room rollers, LCD and semiconductor manufacturing equipment

Precautions

- Do not use in areas exposed to water, steam, chemicals, or oils.
- Do not use this product in a dusty environment as it is more likely to be damaged than regular products if foreign substances enter.

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Composition of bearing number

SS 6000 ZZ L-F1

1 2 3 4

1 SS : Material AISI 440C

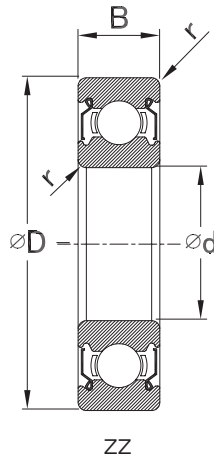
2 Basic number

3 ZZ : Double steel plate shields

4 L-F1 : Lubricating film

Table of Dimensions

Bearing Numbers	d	D	B	r min.	Limiting Radial Load	Limiting Speed	Mass
	mm	mm	mm	mm	N	min ⁻¹	g
SS 6800 ZZ L-F1	10	19	5	0.3	180	2120	5
SS 6900 ZZ L-F1	10	22	6	0.3	230	1930	9
SS 6000 ZZ L-F1	10	26	8	0.3	390	1750	18
SS 6200 ZZ L-F1	10	30	9	0.6	430	1500	31
SS 6300 ZZ L-F1	10	35	11	0.6	685	1370	52
SS 6801 ZZ L-F1	12	21	5	0.3	160	1870	6
SS 6901 ZZ L-F1	12	24	6	0.3	245	1750	10
SS 6001 ZZ L-F1	12	28	8	0.3	430	1500	20
SS 6201 ZZ L-F1	12	32	10	0.6	575	1430	36
SS 6301 ZZ L-F1	12	37	12	1.0	825	1250	59
SS 6802 ZZ L-F1	15	24	5	0.3	175	1620	7
SS 6902 ZZ L-F1	15	28	7	0.3	365	1430	16
SS 6002 ZZ L-F1	15	32	9	0.3	475	1310	30
SS 6202 ZZ L-F1	15	35	11	0.6	650	1250	45
SS 6302 ZZ L-F1	15	42	13	1.0	970	1060	81
SS 6803 ZZ L-F1	17	26	5	0.3	220	1430	7
SS 6903 ZZ L-F1	17	30	7	0.3	390	1310	17
SS 6003 ZZ L-F1	17	35	10	0.3	510	1180	39
SS 6203 ZZ L-F1	17	40	12	0.6	815	1060	63
SS 6303 ZZ L-F1	17	47	14	1.0	1155	930	110
SS 6804 ZZ L-F1	20	32	7	0.3	340	1250	17
SS 6904 ZZ L-F1	20	37	9	0.3	545	1120	36
SS 6004 ZZ L-F1	20	42	12	0.6	800	1000	65
SS 6204 ZZ L-F1	20	47	14	1.0	1085	870	101
SS 6304 ZZ L-F1	20	52	15	1.1	1350	870	142
SS 6805 ZZ L-F1	25	37	7	0.3	365	1000	21
SS 6905 ZZ L-F1	25	42	9	0.3	595	930	42
SS 6005 ZZ L-F1	25	47	12	0.6	860	870	77
SS 6205 ZZ L-F1	25	52	15	1.0	1190	810	127
SS 6305 ZZ L-F1	25	62	17	1.1	1750	680	225
SS 6806 ZZ L-F1	30	42	7	0.3	385	870	24
SS 6906 ZZ L-F1	30	47	9	0.3	615	810	49
SS 6006 ZZ L-F1	30	55	13	1.0	1120	750	114
SS 6206 ZZ L-F1	30	62	16	1.0	1660	680	192
SS 6306 ZZ L-F1	30	72	19	1.1	2270	600	342
SS 6807 ZZ L-F1	35	47	7	0.3	400	750	27
SS 6907 ZZ L-F1	35	55	10	0.6	885	680	74
SS 6007 ZZ L-F1	35	62	14	1.0	1360	620	148
SS 6207 ZZ L-F1	35	72	17	1.1	2185	570	276
SS 6307 ZZ L-F1	35	80	21	1.5	2830	530	446



Bearing Numbers	d	D	B	r min.	Limiting Radial Load	Limiting Speed	Mass
	mm	mm	mm	mm	N	min ⁻¹	g
SS 6808 ZZ L-F1	40	52	7	0.3	420	680	30
SS 6908 ZZ L-F1	40	62	12	0.6	1165	610	109
SS 6008 ZZ L-F1	40	68	15	1.0	1430	570	186
SS 6208 ZZ L-F1	40	80	18	1.1	2475	510	364
SS 6308 ZZ L-F1	40	90	23	1.5	3460	480	616
SS 6909 ZZ L-F1	45	68	12	0.6	1200	550	128
SS 6009 ZZ L-F1	45	75	16	1.0	1785	510	237
SS 6209 ZZ L-F1	45	85	19	1.1	2780	480	401
SS 6309 ZZ L-F1	45	100	25	1.5	4510	420	811
SS 6910 ZZ L-F1	50	72	12	0.6	1230	510	130
SS 6010 ZZ L-F1	50	80	16	1.0	1855	470	254
SS 6210 ZZ L-F1	50	90	20	1.1	2985	440	452
SS 6310 ZZ L-F1	50	110	27	2.0	5275	380	1044
SS 6911 ZZ L-F1	55	80	13	1.0	1410	460	184
SS 6011 ZZ L-F1	55	90	18	1.1	2405	430	376
SS 6211 ZZ L-F1	55	100	21	1.5	3690	390	584
SS 6311 ZZ L-F1	55	120	29	2.0	6090	350	1336
SS 6912 ZZ L-F1	60	85	13	1.0	1715	420	192
SS 6012 ZZ L-F1	60	95	18	1.1	2500	400	405
SS 6212 ZZ L-F1	60	110	22	1.5	4460	360	764
SS 6312 ZZ L-F1	60	130	31	2.1	6960	320	1676
SS 6913 ZZ L-F1	65	90	13	1.0	1480	400	209
SS 6013 ZZ L-F1	65	100	18	1.1	2595	380	428
SS 6213 ZZ L-F1	65	120	23	1.5	4865	330	975
SS 6914 ZZ L-F1	70	100	16	1.0	2015	360	334
SS 6014 ZZ L-F1	70	110	20	1.1	3230	350	596
SS 6214 ZZ L-F1	70	125	24	1.5	5290	310	1049
SS 6915 ZZ L-F1	75	105	16	1.0	2065	350	351
SS 6015 ZZ L-F1	75	115	20	1.1	3360	330	622
SS 6916 ZZ L-F1	80	110	16	1.0	2125	330	369
SS 6016 ZZ L-F1	80	125	22	1.1	4060	300	833

* Limiting radial load is estimated to have a total rotation speed of 1 million revolutions.

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