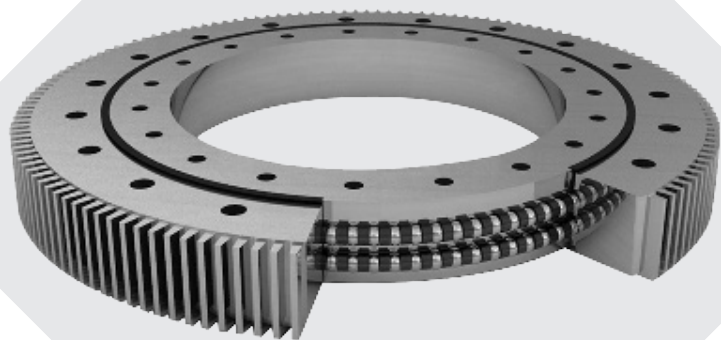


ЛГИРТАБ

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AERIAL LIFTS  
高空作业车



SATELLITE ANTENNA  
卫星天线



VACUUM TRUCK  
真空罐车



TRUCK MOUNTED CRANE  
随车起重机



ATTACHMENTS  
挖机属具



TRUCK MIXERS  
搅拌车



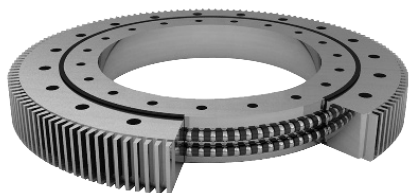
MODULAR VEHICAL  
模块车



MINING JUMBOS  
采矿台车

## CALCULATION FOR SLEWING RING

### 回转支承选型计算



### CALCULATION FOR SINGLE-ROW BALL SLEWING RING

单排球式回转支承的选型计算

1\_CAPACITY OF BEARING 计算额定静容量

$$C_0 = F \cdot D \cdot D$$

$C_0$  \_\_\_ CAPACITY OF BEARING, KN  
(额定静容量)

$F$  \_\_\_ CAPACITY FACTOR, 0.108KN/MM<sup>2</sup>  
(静容量系数)

$D$  \_\_\_ DIAMETER OF TRACK CENTER, MM  
(滚道中心直径)

$D$  \_\_\_ DIAMETER OF BALL, MM  
(钢球公称直径)

2\_LOADING CALCULATION

根据组合后的外载荷, 计算当量轴向载荷

$$C_P = F_A + 4370M/D + 3.44F_R$$

$C_P$  \_\_\_ LOADING CALCULATION, KN  
(当量轴向载荷)

$M$  \_\_\_ TOPPLING MOVEMENT, KN·M  
(倾覆力矩)

$F_A$  \_\_\_ AXIAL FORCE, KN  
(轴向力)

$F_R$  \_\_\_ RADIAL FORCE, KN  
(径向力)

3\_SAFETY FACTOR CALCULATION 计算安全系数

$$F_s = C_0 / C_P$$

SEE THE FOLLOWING TABLE

### CALCULATION FOR THREE-ROW-ROLLER SLEWING RING BEARING

三排滚柱式回转支承的选型计算

1\_CAPACITY OF BEARING 计算额定静容量

$$C_0 = F \cdot D \cdot D$$

$C_0$  \_\_\_ CAPACITY OF BEARING, N  
额定静容量

$F$  \_\_\_ CAPACITY FACTOR, 0.172KN/MM<sup>2</sup>  
容量系数

$D$  \_\_\_ DIAMETER OF TRACK CENTER, MM  
滚道中心直径

$D$  \_\_\_ UPPER ROW ROLLER DIAMETER, MM  
上排滚柱直径

2\_LOADING CALCULATION

根据组合后的外载荷, 计算当量轴向载荷

$$C_P = F_A + 4500M/D$$

$C_P$  \_\_\_ LOADING CALCULATION, KN  
当量轴向载荷

$M$  \_\_\_ TOPPLING MOVEMENT, KN·M  
倾覆力矩,

$F_A$  \_\_\_ AXIAL FORCE, KN  
轴向力

3\_SAFETY FACTOR CALCULATION 计算安全系数

$$F_s = C_0 / C_P$$

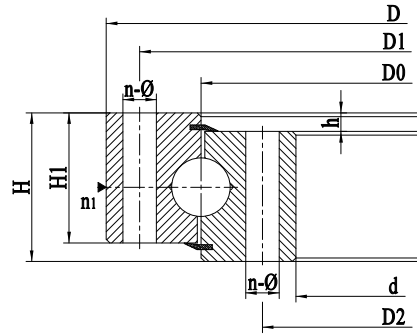
SEE THE FOLLOWING TABLE

TYPE OF WORK 工作类型	WORK CHARACTERISTICS 工作特性	MACHINERY FOR 机械举例	$f_s$
LIGHT DUTY 轻型	NOT OFTEN FULL LOAD, STEADY ROTATION AND SMALL IMPACT 不经常满负荷, 回转平稳冲击小	STACKER AND RECLAIMER, TRUCK CRANE, NON-PORT WHEELED CRANE 堆取料机, 汽车起重机, 非港口用轮式起重机	1.00~1.15
MIDDLE DUTY 中型	NOT ALWAYS FULL LOAD, TURN FAST, HAVE IMPACT 不经常满负荷, 回转较快, 有冲击	TOWER CRANE, MARINE CRANE CRAWLER CRANE 塔式起重机, 船用起重机履带起重机	1.15~1.30
HEAVY DUTY 重型	OFTEN FULL LOAD, FAST ROTATION IMPACT 经常满负荷, 回转快冲击大	GRAB CRANE, PORT CRANE, SINGLE BUCKET EXCAVATOR, CONTAINER CRANE 抓斗起重机, 港口起重机, 单斗挖掘机, 集装箱起重机	1.30~1.45
EXTREMELY HEAVY DUTY 特重型	FULL LOAD, HIGH IMPACT OR POOR WORKPLACE CONDITIONS 满负荷, 冲击大或工作场所条件恶劣	BUCKET EXCAVATOR, TUNNEL BORING MACHINE, METALLURGICAL CRANE, OFFSHORE PLATFORM CRANE 斗轮式挖掘机, 隧道掘进机, 冶金起重机, 海上作业平台起重机	1.45~1.70

# TYPE OF SLEW BEARING



• NO  
TEETH



VERSATILE BEARING SOLUTIONS FEATURING EXTERNAL, INTERNAL, AND ABSENT TEETH OPTIONS EQUIPPED TO SUIT EVERY SLEWING APPLICATION.

• SEVERAL MATERIAL OPTIONS WITH DESIGN FLEXIBILITY AND CUSTOMIZATION OPTIONS.

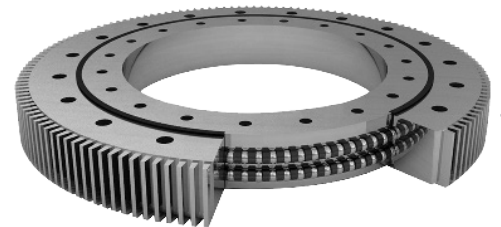
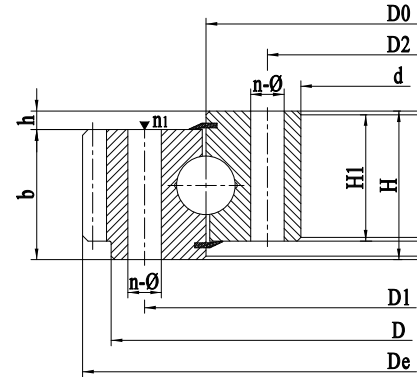
• STANDARD SEALING AND GREASE FILL

• 4-POINT CONTACT BEARINGS

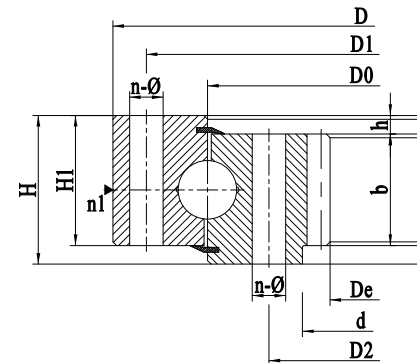
• 28 DISTINCT SIZES, UP TO 39" BEARING DIAMETER



• INNER  
TEETH



• OUTER  
TEETH



## SINGLE-ROW BALL SLEWING RING (STANDARD SERIES 01)

单排球式回转支承 (01 系列)



### NUMBER OF SLEWING RING

编码方法

1\_STANDARD SERIES 01 01 系列



A:——TYPE OF SLEWING RING 回转支承结构型式代号

01:SINGLE-ROW BALL 单排球式

B:——CODE OF GEAR DRIVEN TYPE 传动型式代号

0:NO TEETH 无齿式

1:NORMAL, OUTER GEAR 小模数外齿式

2:BIGGER MODULE, INNER GEAR 大模数外齿式

3NORMAL INNER GEAR 小模数内齿式

4BIGGER MODULE, INNER GEAR 大模数内齿式

C:——DIA.OF ROLLER BALL MM 滚动体直径

D:——MM DIA.OF TRACK CENTER 滚道中心直径

E:——CODE OF INSTALLATION FITTINGTYPE

安装配合型式代号

0:NO FITTING CIRCLE 标准型无止口

1:WITH FITTING CIRCLE 标准型有止口

2:SPECIAL TYPE 特殊型

F:——CODE OF INSTALLATION HOLE TYPE

安装孔型式代号

0:BOTH RINGS WITH INSTALLATION BOLT HOLES

内、外圈安装孔均为通孔

1:BOTH RINGS WITH INSTALLATION SCREW HOLES

内外圈安装孔均为螺孔

2:OUTER RING WITH INSTALLATION BOLT HOLES, INNER RING WITH INSTALLATION SCREW HOLES

外圈安装孔为通孔, 内圈为螺孔

3:OUTER RING WITH INSTALLATION SCREW HOLES, INNER RING WITH INSTALLATION BOLT HOLES

外圈安装孔为螺孔, 内圈为通孔

FOR EXAMPLE

SINGLE-ROW BALL, BIGGER MODULE, INNER GEAR,

DIA.OF BALL 40MM, DIA.OF TRACK CENTER 1120MM, WITH FITTING CIRCLE. BOTH RINGS WITH INSTALLATION BOLT HOLES REFER TO THE FOLLOWING:

SLEWING RING 014.40.1120.10

型号标记示例:

单排球式。大模数内齿, 滚动体直径 40mm, 滚道中心直径 1120mm, 标准型有止口, 内外圈安装孔, 均为通孔连接, 产品型号标记如下:

回转支承 014.40.1120.10

# SINGLE-ROW BALL SLEW BEARING

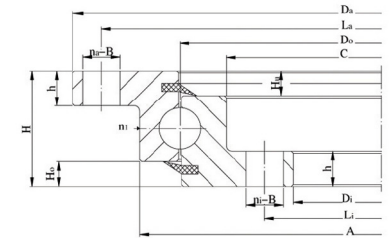
NO. 序号	TYPE 型号			CONFIGURATION & STRUCTURAL DIMENSION 外形及结构尺寸								MOUNTING ROLE DIMENSION 安装孔尺寸						GEAR PARAMETER 齿轮参数					
	010	011.012	013.014	D	d	H	H1	h	D3	d1	n1	D1	D2	n	TYPE □ ○型		b	m	011(012)		013(014)		
															φ	M			T	z	da	z	da
STEEL BALL SPEC.DL (钢球规格, DL)																							
1	010.20.200	011.20.200	/	280	120	60	50	10	201	199	2	248	152	12	φ16	M14	28	40	3	98	300	/	/
2	010.20.224	011.20.224	/	304	144	60	50	10	225	223	2	272	176	12	φ16	M14	28	40	3	105	321	/	/
3	010.20.250	011.20.250	/	330	170	60	50	10	251	249	2	298	202	18	φ16	M14	28	40	4	86	352	/	/
4	010.22.280	011.22.280	/	360	200	60	50	10	281	279	2	328	232	18	φ16	M14	28	40	4	94	384	/	/
5	010.25.315	011.25.315	013.25.315	408	222	70	60	10	316	314	2	372	258	20	φ18	M16	32	50	5	85	435	40	190
6	010.25.355	011.25.355	013.25.355	448	262	70	60	10	356	354	2	412	298	20	φ18	M16	32	50	5	93	475	49	235
7	010.25.400	011.25.400	013.25.400	493	307	70	60	10	401	399	2	457	343	24	φ18	M16	32	50	6	86	528	48	276
8	010.25.450	011.25.450	013.25.450	543	357	70	60	10	451	449	2	507	393	24	φ18	M16	32	50	6	94	576	56	324
9	010.30(25).500	011.30(25).500	013.30(25).500	602	398	80	70	10	501	498	4	566	434	20	φ18	M16	32	60	5	123	629	74	367
		012.30(25).500	014.30(25).500																6	102	628.8	62	368.4
10	010.30(25).560	011.30(25).560	013.30(25).560	662	458	80	70	10	561	558	4	626	494	20	φ18	M16	32	60	5	135	689	86	427
		012.30(25).560	014.30(25).560																6	112	688.8	72	428.4
11	010.30(25).630	011.30(25).630	013.30(25).630	732	528	80	70	10	631	628	4	696	564	24	φ18	M16	32	60	6	126	772.8	83	494.4
		012.30(25).630	014.30(25).630																8	94	774.4	62	491.2
12	010.30(25).710	011.30(25).710	013.30(25).710	812	608	80	70	10	711	708	4	776	644	24	φ18	M16	32	60	6	139	850.8	96	572.4
		012.30(25).710	014.30(25).710																8	104	854.4	72	571.2
13	010.40(30).800	011.40(30).800	013.40(30).800	922	678	100	90	10	801	798	6	878	722	30	φ24	M20	40	80	8	118	966.4	80	635.2
		012.40(30).800	014.40(30).800																10	94	968	64	634

# SINGLE-ROW BALL SLEW BEARING

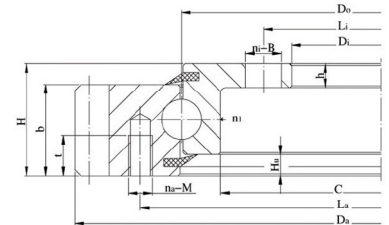
NO. 序号	TYPE 型号			CONFIGURATION & STRUCTURAL DIMENSION 外形及结构尺寸									MOUNTING HOLE DIMENSION 安装孔尺寸					GEAR PARAMETER 齿轮参数					
	010	011.012	013.014	D	d	H	H1	h	D3	d1	n1	D1	D2	n	TYPE □ ○型		b	m	011(012)		013(014)		
															TYPE 1.2.3 1.2.3型	φ			M	T	z	da	z
	STEEL BALL SPEC.DL (钢球规格, DL)																						
14	010.40(30).900	011.40(30).900	013.40(30).900	1022	778	100	90	10	901	898	6	978	822	30	φ22	M20	40	80	8	130	1062.4	93	739.2
		012.40(30).900	014.40(30).900																10	104	1068	74	734
15	010.40(30).1000	011.40(30).1000	013.40(30).1000	1122	878	100	90	10	1001	998	6	1078	922	36	φ22	M20	40	80	10	116	1188	83	824
		012.40(30).1000	014.40(30).1000																12	96	1185.6	69	820.8
16	010.40(30).1120	011.40(30).1120	013.40(30).1120	1242	998	100	90	10	1121	1118	6	1198	1042	36	φ22	M20	40	80	10	127	1298	95	944
		012.40(30).1120	014.40(30).1120																12	106	1305.6	79	940.8
17	010.45(35).1250	011.45(35).1250	013.45(35).1250	1390	1110	110	100	10	1252	1248	5	1337	1163	40	φ26	M24	48	90	12	118	1449.6	88	1048.8
		012.45(35).1250	014.45(35).1250																14	101	1453.2	75	1041.6
18	010.45(35).1400	011.45(35).1400	013.45(35).1400	1540	1250	110	100	10	1402	1398	5	1487	1313	40	φ26	M24	48	90	12	131	1605.6	100	1192.8
		012.45(35).1400	014.45(35).1400																14	112	1607.2	86	1195.6
19	010.45(35).1600	011.45(35).1600	013.45(35).1600	1740	1460	110	100	10	1602	1598	5	1687	1513	45	φ26	M24	48	90	14	127	1817.2	100	1391.6
		012.45(35).1600	014.45(35).1600																16	111	1820.8	87	1382.4
20	010.45(35).1800	011.45(35).1800	013.45(35).1800	1940	1660	110	100	10	1802	1798	5	1887	1713	45	φ26	M24	48	90	14	141	2013.2	113	1573.6
		012.45(35).1800	014.45(35).1800																16	123	2012.8	99	1574.4
21	010.60(40).2000	011.60(40).2000	013.60(40).2000	2178	1825	144	132	12	2002	1998	8	2110	1891	48	φ33	M30	60	120	16	139	2258.8	109	1734.4
		012.60(40).2000	014.60(40).2000																18	123	2264.4	97	1735.2

# SINGLE-ROW BALL SLEW BEARING

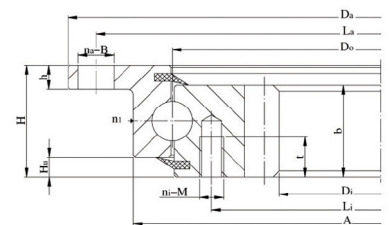
	NO. 序号	BASIC SIZE 基本型号	CONFIGURATION SIZE 外形尺寸			MOUNTING SIZE 安装尺寸						STRUCTURAL SIZE 结构尺寸						GEAR DATA 齿轮参数				WEIGHT Kg 参考重量	
			Da	Di	H	La	Li	na	B/M	ni	B/M	t	nl	h	A	C	Hu	Ho	m	z	k		b
			mm			mm			mm	mm	mm	mm	mm						mm				
NO TEETH 无齿式	1	LU414.20	518	304	56	490	332	8	18	12	18	-	4	12	453	375	10	10	-	-	-	-	24
	2	LU544.20	648	434	56	620	462	10	18	14	18	-	4	12	583	505	10	10	-	-	-	-	31
	3	LU644.20	748	534	56	720	562	12	18	16	18	-	4	12	683	605	10	10	-	-	-	-	37
	4	LU744.20	848	634	56	820	662	12	18	16	18	-	4	12	783	705	10	10	-	-	-	-	43
	5	LU844.20	948	734	56	920	762	14	18	18	18	-	4	12	883	805	10	10	-	-	-	-	48
	6	LU944.20	1048	834	56	1020	862	16	18	20	18	-	4	12	983	905	10	10	-	-	-	-	53
	7	LU1094.20	1198	984	56	1170	1012	16	18	20	18	-	4	12	1133	1055	10	10	-	-	-	-	62
	8	LU955.32	1100	805	90	1060	845	30	22	30	22	-	6	21	1017	893	19	19	-	-	-	-	131
	9	LU1055.32	1200	905	90	1160	945	30	22	30	22	-	6	21	1117	993	19	19	-	-	-	-	145
	10	LU1155.32	1300	1005	90	1260	1045	36	22	36	22	-	6	21	1217	1093	19	19	-	-	-	-	159
	11	LU1255.32	1400	1105	90	1360	1145	42	22	42	22	-	6	21	1317	1193	19	19	-	-	-	-	172
	12	LU1355.32	1500	1205	90	1460	1245	42	22	42	22	-	6	21	1417	1293	19	19	-	-	-	-	186
	13	LU1455.32	1600	1305	90	1560	1345	48	22	48	22	-	6	21	1517	1393	19	19	-	-	-	-	200
OUTER TEETH 外齿式	1	LW414.20	504	304	56	455	332	10	M12	12	18	20	4	12	-	375	10	-	5	99	-0.1	46	29
	2	LW544.20	640.8	434	56	585	462	14	M12	14	18	20	4	12	-	505	10	-	6	105	-0.1	46	40
	3	LW644.20	742.8	534	56	685	562	16	M12	16	18	20	4	12	-	605	10	-	6	122	-0.1	46	48
	4	LW744.20	838.8	634	56	785	662	18	M12	18	18	20	4	12	-	705	10	-	6	138	-0.1	46	54
	5	LW844.20	950.4	734	56	885	762	18	M12	18	18	20	4	12	-	805	10	-	8	117	-0.1	46	65
	6	LW944.20	1046.4	834	56	985	862	20	M12	20	18	20	4	12	-	905	10	-	8	129	-0.1	46	70
	7	LW1094.20	1198.4	984	56	1135	1012	22	M12	22	18	20	4	12	-	1055	10	-	8	148	-0.1	46	83
	8	LW955.32	1096.2	805	90	1016	845	30	M20	30	22	40	6	21	-	893	19	-	9	120	-0.1	71	165
	9	LW1055.32	1198	905	90	1116	945	30	M20	30	22	40	6	21	-	993	19	-	10	118	-0.1	71	183
	10	LW1155.32	1298	1005	90	1216	1045	36	M20	36	22	40	6	21	-	1093	19	-	10	128	-0.1	71	200
	11	LW1255.32	1398	1105	90	1316	1145	42	M20	42	22	40	6	21	-	1193	19	-	10	138	-0.1	71	216
	12	LW1355.32	1498	1205	90	1416	1245	42	M20	42	22	40	6	21	-	1293	19	-	10	148	-0.1	71	234
	13	LW1455.32	1598	1305	90	1516	1345	48	M20	48	22	40	6	21	-	1393	19	-	10	158	-0.1	71	250
INNER TEETH 内齿式	1	LN414.20	518	326.5	56	490	375	8	18	12	M12	20	4	12	453	-	10	-	5	67	-0.15	46	27
	2	LN544.20	648	445.2	56	620	505	10	18	16	M12	20	4	12	583	-	10	-	6	76	-0.1	46	37
	3	LN644.20	748	547.2	56	720	605	12	18	18	M12	20	4	12	683	-	10	-	6	93	-0.1	46	44
	4	LN744.20	848	649.2	56	820	705	12	18	20	M12	20	4	12	783	-	10	-	6	110	-0.1	46	51
	5	LN844.20	948	737.6	56	920	805	14	18	20	M12	20	4	12	883	-	10	-	8	94	-0.1	46	62
	6	LN944.20	1048	841.6	56	1020	905	16	18	22	M12	20	4	12	983	-	10	-	8	107	-0.1	46	66
	7	LN1094.20	1198	985.6	56	1170	1055	16	18	24	M12	20	4	12	1133	-	10	-	8	125	-0.1	46	81
	8	LN955.32	1100	812	90	1060	894	30	22	30	M20	40	6	21	1017	-	19	-	9	83	-0.1	71	159
	9	LN1055.32	1200	912	90	1160	994	30	22	30	M20	40	6	21	1117	-	19	-	10	93	-0.1	71	176
	10	LN1155.32	1300	1012	90	1260	1094	36	22	36	M20	40	6	21	1217	-	19	-	10	103	-0.1	71	192
	11	LN1255.32	1400	1112	90	1360	1194	42	22	42	M20	40	6	21	1317	-	19	-	10	113	-0.1	71	208
	12	LN1355.32	1500	1212	90	1460	1294	42	22	42	M20	40	6	21	1417	-	19	-	10	123	-0.1	71	226
	13	LUN1455.32	1600	1310	90	1560	1394	48	22	48	M20	40	6	21	1517	-	19	-	10	133	-	71	243



无齿式 (No teeth)



外齿式 (Outer teeth)



内齿式 (Inner teeth)