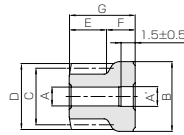




Specifications	
Precision grade	JIS grade N8 (JIS B1702-1:1998) * JIS grade 4 (JIS B1702:1976)
Gear teeth	Standard full depth
Pressure angle	20°
Material	SMF5040(Equivalent to S45C)
Heat treatment	—
Tooth hardness	(70 ~ 95HRB)

\* The precision grade of products with a module of less than 0.8 is equivalent to the value shown in the table.



S3

Catalog No.	Module	No. of teeth	Shape	Bore		Hub dia.	Pitch dia.	Outside dia.	Face width	Hub width	Total length	Web thickness
				A <sub>-0.008 -0.003</sub>	A <sub>±0.1</sub>							
<b>LS0.5-12</b>	<b>m0.5</b>	12	S3	2	2.1	7.4	6	7	4	3	7	—
<b>LS0.5-16</b>		16	S3	2	2.1	9.4	8	9	4	3	7	—
<b>LS0.5-20</b>		20	S3	3	3.1	11.4	10	11	4	4	8	—
<b>LS0.5-30</b>		30	S1	3	3.1	9	15	16	3	4	7	—
<b>LS0.5-50</b>	<b>m0.5</b>	50	S9	4	4.1	12	25	26	3	5	8	1.5
<b>LS0.5-60</b>		60	S9	4	4.1	12	30	31	3	5	8	1.5
<b>LS0.5-70</b>		70	S9	4	4.1	12	35	36	3	5	8	1.5
<b>LS0.5-80</b>		80	S9	4	4.1	12	40	41	3	5	8	1.5
<b>LS0.8-12</b>	<b>m0.8</b>	12	S3	3	3.1	11.6	9.6	11.2	5	4	9	—
<b>LS0.8-16</b>		16	S1	3	3.1	8	12.8	14.4	4	4	8	—
<b>LS0.8-20</b>		20	S1	3	3.1	9	16	17.6	4	4	8	—
<b>LS0.8-30</b>		30	S1	4	4.1	12	24	25.6	4	5	9	—
<b>LS0.8-50</b>	<b>m0.8</b>	50	S9	4	4.1	12	40	41.6	4	5	9	2

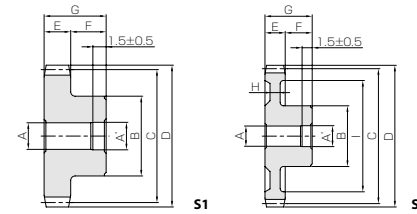
[Caution on Product Characteristics]

- Although the sintering process allows for the inclusion of oil to maintain lubricity, these gears have not been oil impregnated.
- The allowable torques shown in the table are calculated values according to the assumed usage conditions. Please see Page 31 for more details.
- The backlash values shown in the table are the theoretical values for the backlash in the normal direction of a pair of identical gears in mesh.
- Since the bore is finished with a minus tolerance, you can use a shaft with a force fit

### Characteristics of LS Sintered Steel Spur gears

- Cost is minimized due to the elimination of machining and reduction in waste material.
- Reliable, high precision sintered products (JIS N8 Class) maintain precision.
- Being porous by oil-impregnated sintering, lubrication is maintained.

\* For products not categorized in our KHK Stock Gear series, custom gear production services with **short lead times** is available. For details see Page 8.



S1

S9

Web O.D.	Allowable torque (N·m)		Allowable torque (kgf·m)		Backlash (mm)	Weight (g)	Catalog No.
	I	Bending strength	Surface durability	Bending strength			
—	0.11	0.0078	0.011	0.0008	0.06~0.16	1.61	<b>LS0.5-12</b>
—	0.23	0.015	0.023	0.0015	0.06~0.16	2.84	<b>LS0.5-16</b>
—	0.32	0.023	0.032	0.0024	0.06~0.16	4.89	<b>LS0.5-20</b>
—	0.42	0.040	0.043	0.0040	0.10~0.20	5.40	<b>LS0.5-30</b>
21.5	0.81	0.11	0.082	0.012	0.12~0.24	11.5	<b>LS0.5-50</b>
26.5	1.00	0.17	0.10	0.017	0.12~0.24	14.2	<b>LS0.5-60</b>
31.5	1.20	0.23	0.12	0.024	0.12~0.24	17.3	<b>LS0.5-70</b>
36.5	1.41	0.31	0.14	0.032	0.12~0.24	20.8	<b>LS0.5-80</b>
—	0.36	0.026	0.037	0.0027	0.06~0.16	5.29	<b>LS0.8-12</b>
—	0.58	0.038	0.059	0.0039	0.06~0.16	4.84	<b>LS0.8-16</b>
—	0.81	0.060	0.083	0.0061	0.06~0.16	7.36	<b>LS0.8-20</b>
—	1.43	0.14	0.15	0.014	0.10~0.20	16.6	<b>LS0.8-30</b>
34.4	2.75	0.41	0.28	0.042	0.12~0.24	28.3	<b>LS0.8-50</b>

[Caution on Secondary Operations]

- Please read "Caution on Performing Secondary Operations" (Page 32) when performing modifications and/or secondary operations for safety concerns. KHK Quick-Mod Gears, the KHK's system for quick modification of KHK stock gears is also available.
- Avoid performing secondary operations that narrow the tooth width as it affects precision and strength.
- The rust prevention process involves treating the gears with steam (in effect, creating surface oxidation). A black oxide treatment cannot be done on these gears.