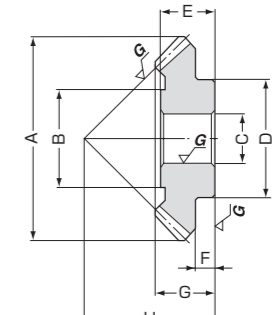
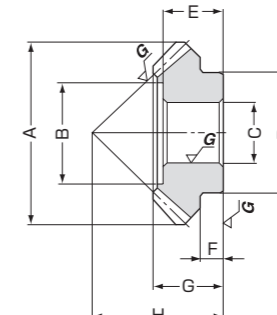
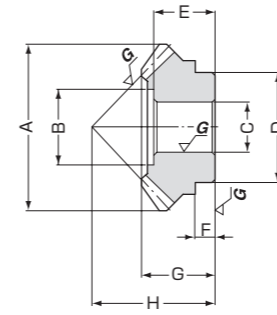
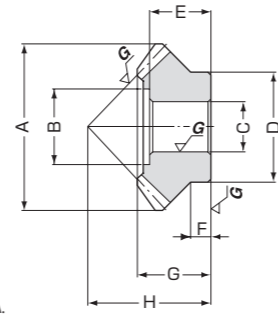




| Specifications | |
|-----------------|--------------------------------------|
| Precision grade | JIS B 1704 : 1978 grade 0 |
| Gear teeth | Gleason |
| Pressure angle | 20° |
| Helix angle | 35° |
| Material | SCM415 * |
| Heat treatment | Carburizing (bore & hubs are masked) |
| Tooth hardness | 60 ~ 63HRC * * |

* Module 3.5 and larger are made of SCM420.
 ** Tooth Hardness for module 1.5 and 2 is between 80 to 83 HRA.



| Catalog No. | Gear ratio | Module | No. of teeth | Direction of spiral | Pitch dia. | Face width | Shape | Outside dia. | Holding surface dia. | Bore | Hub dia. | Length of bore | |
|--------------------------------|------------|--------|--------------|---------------------|----------------|---------------|---------|--------------|----------------------|--------------|----------|----------------|----------|
| | | | | | | | | A | B | CH7 | D | E | |
| KKSP031001GUL KKSP031001GUR | 1 | m1.5 | 20 | L R | 30 | 7 | A | 30.5 | 16.5 | 10 | 22 | 13 | |
| KKSP040001GUL KKSP040001GUR | | m2 | 20 | L R | 40 | 9 | B | 40 | 22.5 | 12 | 31 | 14 | |
| KKSP053001GUL KKSP053001GUR | | m2.5 | 21 | L R | 52.5 | 12 | B | 53 | 31 | 14 | 38 | 20 | |
| KKSP066001GUL KKSP066001GUR | | m3 | 21 | L R | 63 | 15 | B | 65 | 33.5 | 16 | 47 | 25 | |
| KKSP078001GUL KKSP078001GUR | | m3.5 | 22 | L R | 77 | 18 | B | 78 | 43 | 20 | 54 | 27 | |
| KKSP092001GUL KKSP092001GUR | | m4 | 22 | L R | 88 | 21 | B | 91 | 49 | 22 | 63 | 32 | |
| KKSP105001GUL KKSP105001GUR | | m4.5 | 23 | L R | 103.5 | 25 | C | 105 | 50 | 26 | 70 | 35 | |
| KKSP132001GUL KKSP132001GUR | | m5 | 26 | L R | 130 | 29 | C | 132 | 64 | 30 | 82 | 41 | |
| KKSP157001GUL KKSP157001GUR | | m5.5 | 28 | L R | 154 | 34 | C | 157 | 76 | 32 | 92 | 47 | |
| KKSP184001GUL KKSP184001GUR | | m6 | 30 | L R | 180 | 38 | C | 184 | 84 | 40 | 101 | 51 | |
| KKSP0481.5GUP KKSP0481.5GUG | | 1.5 | m2 | 16 24 | L R | 32 48 | 9 | A' B | 34 48 | 17.5 30 | 10 12 | 24 30 | 13 17 |
| KKSP0611.5GUP KKSP0611.5GUG | | | m2.25 | 18 27 | L R | 40.5 60.75 | 12 | A' B | 42 61 | 22 36 | 12 14 | 30 40 | 17 20 |
| KKSP0741.5GUP KKSP0741.5GUG | m2.75 | | 18 27 | L R | 49.5 74.25 | 15 | A' B | 52 74 | 27 44.5 | 14 20 | 40 50 | 20 25 | |
| KKSP0901.5GUP KKSP0901.5GUG | m3 | | 20 30 | L R | 60 90 | 18 | B B | 63 90 | 34 54.5 | 16 20 | 44 56 | 24 29 | |
| KKSP1051.5GUP KKSP1051.5GUG | m3.5 | | 20 30 | L R | 70 105 | 21 | B C | 74 105 | 38 53 | 20 22 | 50 63 | 25 32 | |
| KKSP1241.5GUP KKSP1241.5GUG | m3.75 | | 22 33 | L R | 82.5 123.75 | 24 | B C | 87 124 | 46.5 64 | 20 26 | 56 69 | 29 35 | |
| KKSP1411.5GUP KKSP1411.5GUG | m4.25 | | 22 33 | L R | 93.5 140.25 | 28 | B C | 99 141 | 53 68 | 22 30 | 63 73 | 32 41 | |
| KKSP1631.5GUP KKSP1631.5GUG | m4.5 | | 24 36 | L R | 108 162 | 32 | B C | 113 163 | 64.5 76 | 26 32 | 69 82 | 35 47 | |
| KKSP1811.5GUP KKSP1811.5GUG | m5 | | 24 36 | L R | 120 180 | 35 | B C | 126 181 | 71.5 86 | 30 38 | 73 90 | 41 48 | |
| KKSP039002GUP KKSP039002GUG | 2 | | m1.5 | 13 26 | L R | 19.5 39 | 7 | A B | 21 38.5 | 10.2 24 | 8 10 | 16 24 | 14 13 |
| KKSP056002GUP KKSP056002GUG | | | m2 | 14 28 | L R | 28 56 | 10 | B B | 30 56 | 15.3 35.5 | 8 12 | 20 30 | 12 18 |
| KKSP075002GUP KKSP075002GUG | | | m2.5 | 15 30 | L R | 37.5 75 | 14 | A' C | 40 75 | 20 36 | 12 16 | 30 44 | 17 24 |
| KKSP096002GUP KKSP096002GUG | | m3 | 16 32 | L R | 48 96 | 18 | B C | 53 96 | 23.5 46 | 12 20 | 36 56 | 19 29 | |
| KKSP119002GUP KKSP119002GUG | | m3.5 | 17 34 | L R | 59.5 119 | 22 | A C | 65 119 | 34 54 | 16 26 | 44 63 | 25 34 | |
| KKSP145002GUP KKSP145002GUG | | m4 | 18 36 | L R | 72 144 | 27 | A C | 78 145 | 38 60 | 20 30 | 54 73 | 28 39 | |
| KKSP172002GUP KKSP172002GUG | | m4.5 | 19 38 | L R | 85.5 171 | 32 | A C | 93 172 | 48 70 | 26 36 | 69 79 | 34 46 | |

| Hub width | Total length | Mounting distance | Keyway | Allowable torque (kgf-m) | Backlash (mm) | Weight (kg) | Catalog No. |
|-----------|--------------|-------------------|----------|--------------------------|---------------|--------------|--------------------------------|
| F | G | H | | | | | |
| 6 | 15 | 25 | 12 | 0.61 | 0 ~0.05 | 0.04 | KKSP031001GUL KKSP031001GUR |
| 7 | 16.5 | 30 | 16 | 1.59 | 0 ~0.05 | 0.09 | KKSP040001GUL KKSP040001GUR |
| 8 | 22.8 | 40 | 22 | 3.63 | 0.05~0.10 | 0.21 | KKSP053001GUL KKSP053001GUR |
| 13 | 29.5 | 50 | 25 | 6.26 | 0.05~0.10 | 0.39 | KKSP066001GUL KKSP066001GUR |
| 12 | 32 | 57 | 32 | 9.74 | 0.05~0.10 | 0.59 | KKSP078001GUL KKSP078001GUR |
| 14 | 38 | 66 | 38 | 15.1 | 0.05~0.10 | 0.96 | KKSP092001GUL KKSP092001GUR |
| 14 | 39 | 72 | 40 | 23.9 | 0.05~0.10 | 1.33 | KKSP105001GUL KKSP105001GUR |
| 14 | 45 | 88 | 48 | 38.4 | 0.05~0.10 | 2.49 | KKSP132001GUL KKSP132001GUR |
| 20 | 53.5 | 105 | 55 | 60.1 | 0.05~0.10 | 3.90 | KKSP157001GUL KKSP157001GUR |
| 17 | 56.5 | 118 | 62 | 85.8 | 0.05~0.10 | 5.79 | KKSP184001GUL KKSP184001GUR |
| 4.5 7 | 14.5 19 | 31 30 | — 20 | 2.02 | 0 ~0.05 | 0.05 0.14 | KKSP0481.5GUP KKSP0481.5GUG |
| 5.5 10 | 19 23.5 | 39 37 | 16 27 | 4.12 | 0.05~0.10 | 0.10 0.28 | KKSP0611.5GUP KKSP0611.5GUG |
| 6 12 | 22 29 | 46 45 | 20 35 | 7.15 | 0.05~0.10 | 0.20 0.49 | KKSP0741.5GUP KKSP0741.5GUG |
| 8 13 | 26.5 33 | 56 53 | 25 42 | 11.9 | 0.05~0.10 | 0.34 0.84 | KKSP0901.5GUP KKSP0901.5GUG |
| 7 13 | 28.5 34 | 63 57 | 28 42 | 17.8 | 0.05~0.10 | 0.47 1.18 | KKSP1051.5GUP KKSP1051.5GUG |
| 7 14 | 33 36.5 | 74 64 | 36 48 | 26.0 | 0.05~0.10 | 0.80 1.71 | KKSP1241.5GUP KKSP1241.5GUG |
| 7 17 | 36 43.5 | 82 74 | 42 50 | 39.2 | 0.05~0.10 | 1.15 2.46 | KKSP1411.5GUP KKSP1411.5GUG |
| 7 19 | 38.5 49.5 | 92 85 | 48 55 | 56.5 | 0.05~0.10 | 1.64 3.84 | KKSP1631.5GUP KKSP1631.5GUG |
| 10 19 | 45.5 50.5 | 105 90 | 55 60 | 72.4 | 0.05~0.10 | 2.21 4.85 | KKSP1811.5GUP KKSP1811.5GUG |
| 7.6 7 | 14.5 15 | 28 22 | — 20 | 0.89 | 0 ~0.05 | 0.02 0.07 | KKSP039002GUP KKSP039002GUG |
| 2.5 8 | 13 20.5 | 32 30 | 10 20 | 2.65 | 0 ~0.05 | 0.04 0.19 | KKSP056002GUP KKSP056002GUG |
| 4.5 11 | 19.5 25.5 | 44 38 | 14 25 | 6.43 | 0.05~0.10 | 0.10 0.44 | KKSP075002GUP KKSP075002GUG |
| 2.5 12 | 21.5 31 | 53 47 | 19 32 | 12.5 | 0.05~0.10 | 0.20 0.91 | KKSP096002GUP KKSP096002GUG |
| 3.6 15 | 27.5 35.5 | 67 55 | 25 40 | 22.2 | 0.05~0.10 | 0.36 1.45 | KKSP119002GUP KKSP119002GUG |
| 3.5 16 | 33 40.5 | 80 64 | 30 42 | 36.3 | 0.05~0.10 | 0.65 2.44 | KKSP145002GUP KKSP145002GUG |
| 4.4 20 | 38 47 | 94 75 | 38 50 | 59.9 | 0.05~0.10 | 0.97 3.80 | KKSP172002GUP KKSP172002GUG |

[Caution on Product Characteristics] ① The allowable torque is calculated by converting the output torque (600 rpm) on Page 337 to kgf/m, according to assumed usage conditions.
 ② These gears produce axial thrust forces. See Page 274 for more details.

[Caution on Secondary Operations] ① Please read "Caution on Performing Secondary Operations" (Page 304) when performing modifications and/or secondary operations for safety concerns.