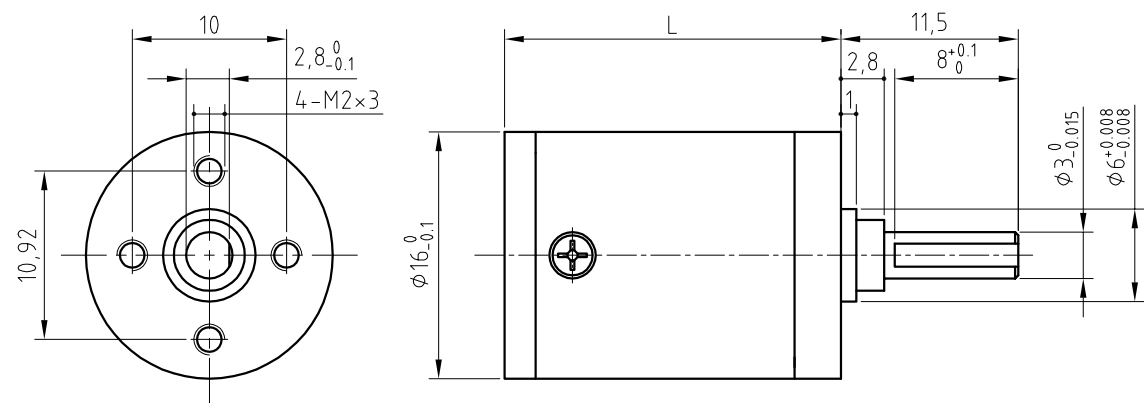


● 外形尺寸 APPEARANCE SIZE



外壳材料 Housing material	金属 steel
齿轮材料 Gearwhddl material	金属 steel ①
输出轴承型式 Bearing at output	滚动轴承 Ball bearings
径向负载 Radial load (10mm from flange)	≤10 Kgf
轴向负载 shaft axial load	≤4 Kgf
径向间隙 Radial play of shaft	≤0.04mm
轴向间隙 Thrust play of shaft	≤0.4mm
连续运行时最高允许输入转速 Max permissible input speed at continuous working	≤20000rpm

● 标准减速比型式 Gearboxes Specifications

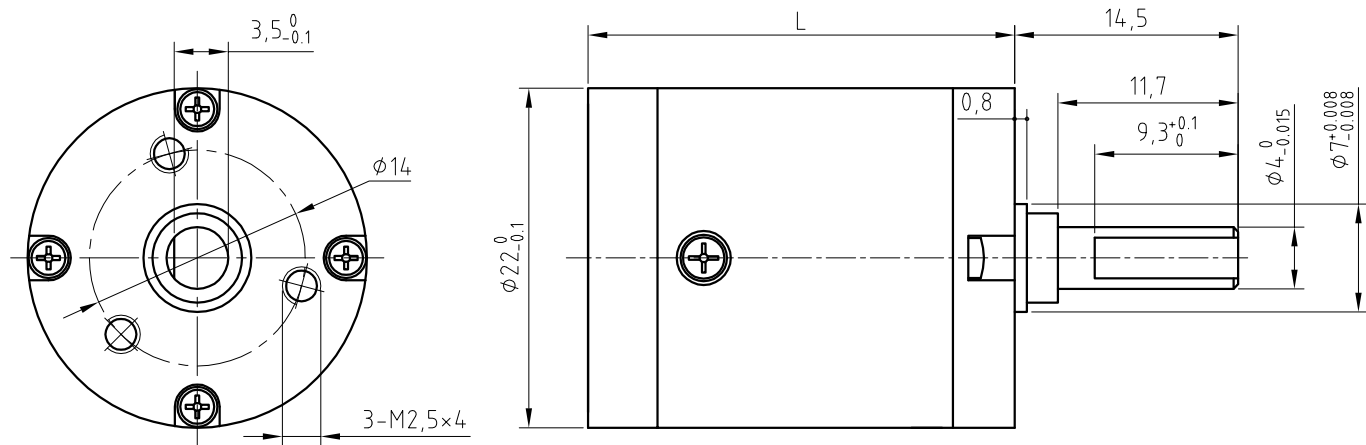
减速比 (部分) Reduction ratio (part)	额定允许负载 rated tolerance torque	瞬间允许负载 Max momentary tolerance torque	效率 Efficiency	L (mm)	背隙 (无负载时) Backlash,at no-load
3.75, 4.4, 5.4, 6.5	4.2Kgf-cm	12.6Kgf-cm	90%	17.9	≤ 5arcmin
14.1, 16.4, 19.2, 20.3, 23.7, 24.4,28.5, 29.2, 35.1, 42.3	6.0Kgf-cm	18.0Kgf-cm	81%	21.8	≤10arcmin
52.7, 61.7, 72.1, 84.3, 91.4, 103.8, 109.4, 125, 131.6, 154, 185.3, 228.15, 274.6	7.5Kgf-cm	22.5Kgf-cm	72%	25.7	≤15arcmin
197.8, 231.2, 284.8, 316.1, 333, 342.7, 389.3, 400.8, 455.2, 479.5, 493.6, 547.9 594.1, 674.8, 710.8, 812.3 855.6,1000, 1029.8, 1204 1483, 1785	9.0Kgf-cm	27Kgf-cm	65%	29.6	≤20arcmin
741.5, 867, 1013, 1067.9,1185 1248.6, 1386, 1502.9, 1620 1707, 1757, 1851, 1996,2055 2164, 2402, 2458,2530,2959 3027, 3644, 3728 ,4488,4592 5527, 6653, 8008, 9639,11602	9.0Kgf-cm	27Kgf-cm	60%	33.5	≤25arcmin

表中*指速比数值。 *—Reduction ratio

①—— 根据受力，行星轮可选用塑料。 Planet gears can be plasticaccording to torque.

精密型行星齿轮箱 PLANETARY GEAR HEAD 22P

● 外形尺寸 APPEARANCE SIZE



外壳材料 Housing material	金属 steel
齿轮材料 Gearwhddl material	金属 steel ①
输出轴承型式 Bearing at output	滚动轴承 Ball bearings
径向负载 Radial load (10mm from flange)	≤10 Kgf
轴向负载 shaft axial load	≤5 Kgf
径向间隙 Radial play of shaft	≤0.04mm
轴向间隙 Thrust play of shaft	≤0.4mm
连续运行时最高允许输入转速 Max permissible input speed at continuous working	≤20000rpm

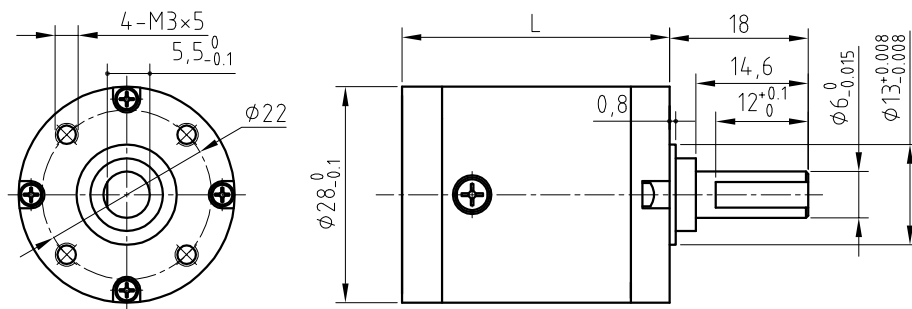
● 标准减速比型式 Gearboxes Specifications

减速比(部分) Reduction ratio (part)	额定允许负载 rated tolerance torque	瞬间允许负载 Max momentary tolerance torque	效率 Efficiency	L (mm)	背隙(无负载时) Backlash,at no-load
3.75, 4.4, 5.4, 6.5	7.2Kgf-cm	21.6Kgf-cm	90%	22.6	≤ 5arcmin
14.1, 16.4, 19.2, 20.3, 23.7, 24.4,28.5, 29.2, 35.1, 42.3	9.6Kgf-cm	28.8Kgf-cm	81%	27.6	≤10arcmin
52.7, 61.7, 72.1, 84.3, 91.4, 103.8, 109.4, 125, 131.6, 154, 185.3, 228.15, 274.6	12Kgf-cm	36Kgf-cm	72%	32.7	≤15arcmin
197.8, 231.2, 284.8, 316.1, 333, 342.7, 389.3, 400.8, 455.2, 479.5, 493.6, 547.9 594.1, 674.8, 710.8, 812.3 855.6,1000, 1029.8, 1204 1483, 1785	14.5Kgf-cm	43.5Kgf-cm	65%	37.7	≤20arcmin
741.5, 867, 1013, 1067.9,1185 1248.6, 1386, 1502.9, 1620 1707, 1757, 1851, 1996,2055 2164, 2402, 2458,2530,2959 3027, 3644, 3728 ,4488,4592 5527, 6653, 8008, 9639,11602	14.5Kgf-cm	43.5Kgf-cm	60%	42.8	≤25arcmin

表中*指速比数值。 *—Reduction ratio

①—— 根据受力，行星轮可选用塑料。 Planet gears can be plastic according to torque.

● 外形尺寸 APPEARANCE SIZE



外壳材料 Housing material	金属 steel
齿轮材料 Gearwheel material	金属 steel ①
输出轴承型式 Bearing at output	滚动轴承 Ball bearings
径向负载 Radial load (10mm from flange)	≤10 Kgf
轴向负载 shaft axial load	≤6 Kgf
径向间隙 Radial play of shaft	≤0.04mm
轴向间隙 Thrust play of shaft	≤0.4mm
连续运行时最高允许输入转速 Max permissible input speed at continuous working	≤18000rpm

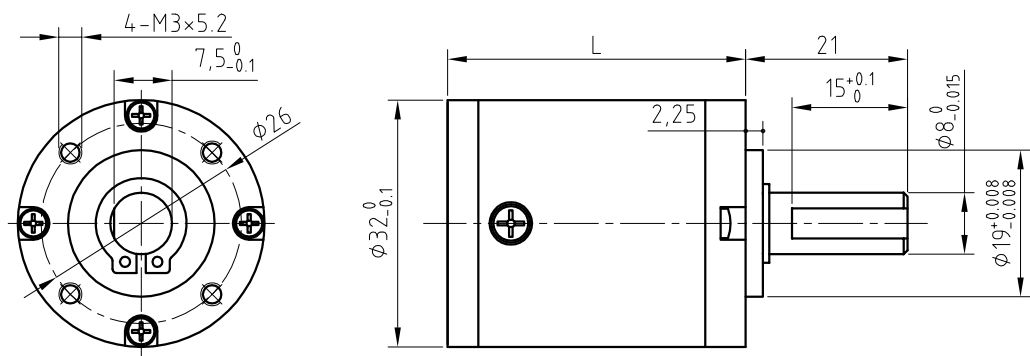
● 标准减速比型式 Gearboxes Specifications

減速比(部分) Reduction ratio (part)	额定允许负载 rated tolerance torque	瞬间允许负载 Max momentary tolerance torque	效率 Efficiency	L (mm)	背隙(无负载时) Backlash,at no-load
4.4, 5.25, 6.7, 8.3	15.5Kgf-cm	46.5Kgf-cm	90%	28.4	≤ 5arcmin
15.1, 16.9, 18, 19.4, 20.1, 23.1 25.6, 27.6, 29.3, 31.8, 35, 36.5 43.5, 55.2, 68.7	21Kgf-cm	63Kgf-cm	81%	34.7	≤10arcmin
61.7, 77.1, 87.6, 100.6, 109, 120 125, 129, 134.1, 139.8, 144.7, 149.1, 154, 160.4, 166.8, 183.8 191.4, 211.7, 228.4, 233.3, 243 264.5, 290, 296.3, 368.2	26Kgf-cm	78Kgf-cm	72%	41	≤15arcmin
335.9, 344.8, 373.4, 375.5 385.5, 411.4, 417.4, 428.5, 431 447.2, 460, 466.7, 479.2, 494.8 511.3, 528, 535.7, 567.9, 571.7 590.3, 630, 639.2, 656.2, 677.6 705.8, 733.7, 749.6, 759.7, 800 811.7, 833.3, 842.1, 860.4, 894.4 931.7, 964.7, 994.3, 1005, 1027 1036,1069,1112,1136,1158,1199 1236,1276,1304,1329, 1382,1523 1556,1586,1755,1892,1933,1975 2014,2403,2455,3051,3792,4713	31Kgf-cm	93Kgf-cm	65%	47.3	≤20arcmin

表中*指速比数值。 *—Reduction ratio

①——根据受力，行星轮可选用塑料。 Planet gears can be plastic according to torque.

● 外形尺寸 APPEARANCE SIZE



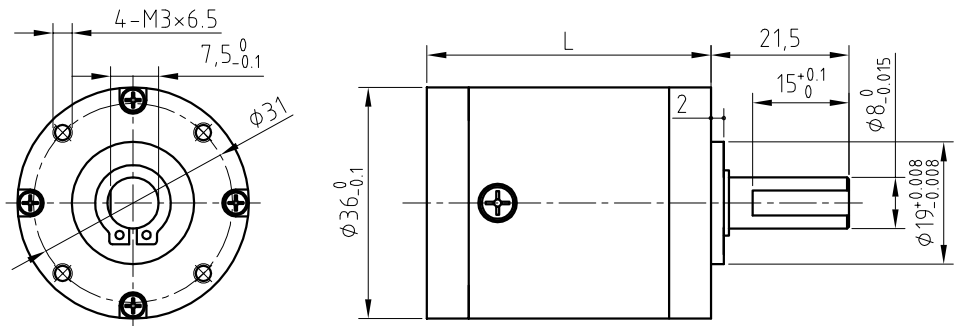
外壳材料 Housing material	金属 steel
齿轮材料	金属 steel ①
输出轴承型式 Bearing at output	滚动轴承 Ball bearings
径向负载 Radial load (10mm from flange)	≤20 Kgf
轴向负载 shaft axial load	≤12 Kgf
径向间隙 Radial play of shaft	≤0.04mm
轴向间隙 Thrust play of shaft	≤0.4mm
连续运行时最高允许输入转速 Max permissible input speed at continuous working	≤15000rpm

● 标准减速比型式 Gearboxes Specifications

减速比(部分) Reduction ratio (part)	额定允许负载 rated tolerance torque	瞬间允许负载 Max momentary tolerance torque	效率 Efficiency	L (mm)	背隙(无负载时) Backlash,at no-load
4.4, 5.25, 6.7, 8.3	23.4Kgf-cm	70.2Kgf-cm	90%	31.2	≤ 5arcmin
15.1, 16.9, 18, 19.4, 20.1, 23.1 25.6, 27.6, 29.3, 31.8, 35, 36.5 43.5, 55.2, 68.7	31.0Kgf-cm	93.0Kgf-cm	81%	38.7	≤10arcmin
61.7, 77.1, 87.6, 100.6, 109, 120 125, 129, 134.1, 139.8, 144.7, 149.1, 154, 160.4, 166.8, 183.8 191.4, 211.7, 228.4, 233.3, 243 264.5, 290, 368.2, 457.7, 568.8	38.8Kgf-cm	116.4Kgf-cm	72%	46.2	≤15arcmin
335.9, 344.8, 373.4, 375.5 385.5, 411.4, 417.4, 428.5, 431 447.2, 460, 466.7, 479.2, 494.8 511.3, 528, 535.7, 567.9, 571.7 590.3, 630, 639.2, 656.2, 677.6 705.8, 733.7, 749.6, 759.7, 800 811.7, 833.3, 842.1, 860.4, 894.4 931.7, 964.7, 994.3, 1005, 1027 1036,1069,1112,1136,1158,1199 1236,1276,1304,1329, 1382,1523 1556,1586,1755,1892,1933,1975 2014,2403,2455,3051,3792,4713	46.5Kgf-cm	139.5Kgf-cm	65%	53.7	≤20arcmin

①—— 根据受力，行星轮可选用塑料。 Planet gears can be plastic according to torque.

● 外形尺寸 APPEARANCE SIZE



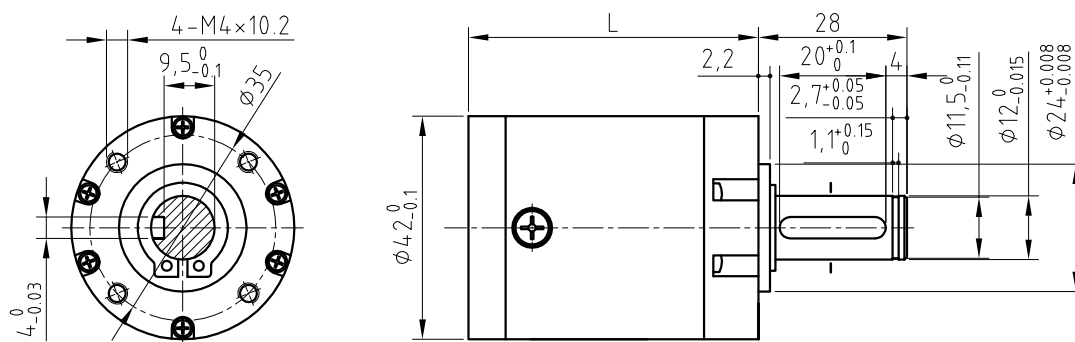
外壳材料 Housing material	金属 steel
齿轮材料 Gearxheel material	金属 steel ①
输出轴承型式 Bearing at output	滚动轴承 Ball bearings
径向负载 Radial load (10mm from flange)	≤20 Kgf
轴向负载 shaft axial load	≤12 Kgf
径向间隙 Radial play of shaft	≤0.04mm
轴向间隙 Thrust play of shaft	≤0.4mm
连续运行时最高允许输入转速 Max permissible input speed at continuous working	≤15000rpm

● 标准减速比型式 Gearboxes Specifications

减速比 (部分) Reduction ratio (part)	额定允许负载 rated tolerance torque	瞬间允许负载 Max momentary tolerance torque	效率 Efficiency	L (mm)	背隙 (无负载时) Backlash,at no-load
4.3, 5.1, 6.3, 7.6	32.4Kgf-cm	97.2Kgf-cm	90%	35.6	≤ 5arcmin
14.7, 16.3, 17.3, 18.6, 19.2, 21.9 23.9, 25.8, 27.2, 28.9, 32, 32.9 38.7, 39.7, 48, 58.1	43.2Kgf-cm	129.6Kgf-cm	81%	44.2	≤10arcmin
65.6, 74.6, 81.4, 90.5, 92.6, 98.5 109, 112.1, 117.2, 124.6, 132, 138 141.8, 146.7, 150.4, 162.4, 166.9 171.2, 182, 196.5, 201.5, 207.1 220.3, 243.9, 250.7,295.2, 302.6 366.2, 443.2	54.0Kgf-cm	162Kgf-cm	72%	52.8	≤15arcmin
277.4, 315.8, 335.8, 342.8, 351 373.3, 382.2, 399.4, 413.2, 424.8 450, 459.3, 472.2, 483.4, 500.1 512.7, 537.4, 555.9, 569.1, 583.5 611.5, 620.6, 632.6, 648, 670 686.9, 706.2, 719.9, 744.7, 751.1 763.6, 785, 824.4, 831.4, 847.6 854.7, 869, 893.4, 924.2, 950.1 997.8, 1006, 1023, 1052, 1078 1081, 1119, 1147, 1238, 1269, 1272 1305, 1388, 1499, 1536,1580, 1680 1860,1907,2251,2307,2793,3380	64.8Kgf-cm	194.4Kgf-cm	65%	61.4	≤20arcmin

①—— 根据受力，行星轮可选用塑料。 Planet gears can be plastic according to torque.

● 外形尺寸 APPEARANCE SIZE



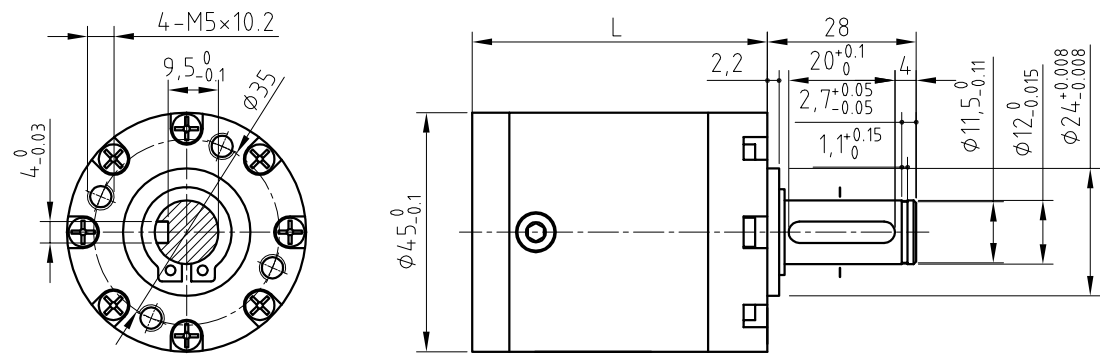
外壳材料 Housing material	金属 steel
齿轮材料 Gearwheel material	金属 steel ①
输出轴承型式 Bearing at output	滚动轴承 Ball bearings
径向负载 Radial load (10mm from flange)	≤25 Kgf
轴向负载 shaft axial load	≤15 Kgf
径向间隙 Radial play of shaft	≤0.04mm
轴向间隙 Thrust play of shaft	≤0.4mm
连续运行时最高允许输入转速 Max permissible input speed at continuous working	≤12000rpm

● 标准减速比型式 Gearboxes Specifications

减速比(部分) Reduction ratio (part)	额定允许负载 rated tolerance torque	瞬间允许负载 Max momentary tolerance torque	效率 Efficiency	L (mm)	背隙(无负载时) Backlash, at no-load
4.3, 5.1, 6.3, 7.6	65Kgf-cm	195Kgf-cm	90%	44.8	≤ 5arcmin
14.7, 16.3, 17.3, 18.6, 19.2, 21.9 23.9, 25.8, 27.2, 28.9, 32, 32.9 38.7, 39.7, 48, 58.1	86Kgf-cm	258Kgf-cm	81%	55.6	≤10arcmin
65.6, 74.6, 81.4, 90.5, 92.6, 98.5 109, 112.1, 117.2, 124.6, 132, 138 141.8, 146.7, 150.4, 162.4, 166.9 171.2, 182, 196.5, 201.5, 207.1 220.3, 243.9, 250.7, 295.2, 302.6 366.2, 443.2	108Kgf-cm	324Kgf-cm	72%	66.4	≤15arcmin
277.4, 315.8, 335.8, 342.8, 351 373.3, 382.2, 399.4, 413.2, 424.8 450, 459.3, 472.2, 483.4, 500.1 512.7, 537.4, 555.9, 569.1, 583.5 611.5, 620.6, 632.6, 648, 670 686.9, 706.2, 719.9, 744.7, 751.1 763.6, 785, 824.4, 831.4, 847.6 854.7, 869, 893.4, 924.2, 950.1 997.8, 1006, 1023, 1052, 1078 1081, 1119, 1147, 1238, 1269, 1272 1305, 1388, 1499, 1536, 1580, 1680 1860, 1907, 2251, 2307, 2793, 3380	130Kgf-cm	390Kgf-cm	65%	77.2	≤20arcmin

①—— 根据受力，行星轮可选用塑料。 Planet gears can be plastic according to torque.

● 外形尺寸 APPEARANCE SIZE



外壳材料 Housing material	金属 steel
齿轮材料 Gearwheel material	金属 steel ①
输出轴承型式 Bearing at output	滚动轴承 Ball bearings
径向负载 Radial load (10mm from flange)	≤25 Kgf
轴向负载 shaft axial load	≤15 Kgf
径向间隙 Radial play of shaft	≤0.04mm
轴向间隙 Thrust play of shaft	≤0.4mm
连续运行时最高允许输入转速 Max permissible input speed at continuous working	≤12000rpm

● 标准减速比型式 Gearboxes Specifications

减速比(部分) Reduction ratio (part)	额定允许负载 rated tolerance torque	瞬间允许负载 Max momentary tolerance torque	效率 Efficiency	L (mm)	背隙(无负载时) Backlash,at no-load
4.3, 5.1, 6.3, 7.6	65Kgf-cm	195Kgf-cm	90%	44.8	≤ 5arcmin
14.7, 16.3, 17.3, 18.6, 19.2, 21.9 23.9, 25.8, 27.2, 28.9, 32, 32.9 38.7, 39.7, 48, 58.1	86Kgf-cm	258Kgf-cm	81%	55.6	≤10arcmin
65.6, 74.6, 81.4, 90.5, 92.6, 98.5 109, 112.1, 117.2, 124.6, 132, 138 141.8, 146.7, 150.4, 162.4, 166.9 171.2, 182, 196.5, 201.5, 207.1 220.3, 243.9, 250.7,295.2, 302.6 366.2, 443.2	108Kgf-cm	324Kgf-cm	72%	66.4	≤15arcmin
277.4, 315.8, 335.8, 342.8, 351 373.3, 382.2, 399.4, 413.2, 424.8 450, 459.3, 472.2, 483.4, 500.1 512.7, 537.4, 555.9, 569.1, 583.5 611.5, 620.6, 632.6, 648, 670 686.9, 706.2, 719.9, 744.7, 751.1 763.6, 785, 824.4, 831.4, 847.6 854.7, 869, 893.4, 924.2, 950.1 997.8, 1006, 1023, 1052, 1078 1081, 1119, 1147, 1238, 1269, 1272 1305, 1388, 1499, 1536,1580, 1680 1860,1907,2251,2307,2793,3380	130Kgf-cm	390Kgf-cm	65%	77.2	≤20arcmin

①—— 根据受力，行星轮可选用塑料。 Planet gears can be plastic according to torque.