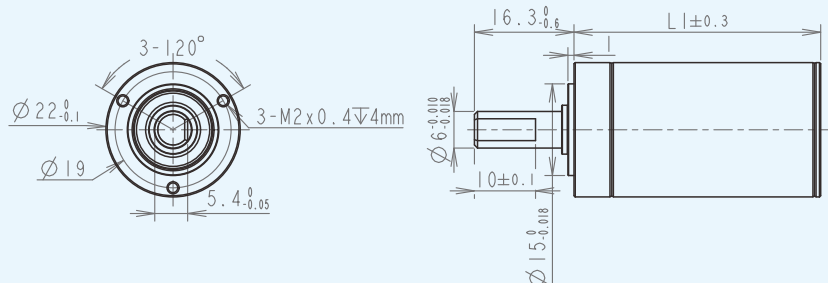


ZWSMD022022

Φ22mm Planetary Gearbox



Gearbox Technical Data

Number of stages	1	2	3	4	5
Max. continuous torque (Nm)	1	2.9	4.3	5.5	5.2
Max. intermittent torque (Nm)	1.25	3.6	5.3	6.5	6.5
Reduction Ratio	3.71	9.7, 14	43, 66	94, 112, 134, 159, 190, 246	415, 592, 989, 1526
Outer Diameter (mm)	22	22	22	22	22
Gearbox Length L1(mm)	24.3	32.8	40.4	46.5	52.6
Max. efficiency (%)	96	92	90	87	83
Recommended temperature range (°C)	-30~+85	-30~+85	-30~+85	-30~+85	-30~+85
Max. Weight (G)	53	65	76	88	102
Max. continuous transmittable power (W)	66	36	20	11	6
Max. intermittent transmittable power (W)	82.5	45	25	14	7
Average backlash no load (°)	0.5	0.5	0.5	0.5	0.5
Max. axial load (dynamic) (N)	80	80	80	80	80
Max. radial load (4mm from flange) (N)	100	145	150	150	150
Bearing at output	ball bearing	ball bearing	ball bearing	ball bearing	ball bearing
Axial play (mm)	0~0.1	0~0.1	0~0.1	0~0.1	0~0.1

* Note: Data above does not include the motor. Specifications can be customized per customer requirements.

Modular assembly

Integrated Product	Part No.	Number of stages				
		1	2	3	4	5
		Length(mm)				
DC Motor	MP1931 Φ19mm graphite brush	56.1	64.6	72.2	78.3	84.4
	MP2238 Φ22mm graphite brush	62.5	71	78.6	84.7	90.8
Brushless Motor	MO1925 Φ19mm outer rotor brushless motor	49.3	57.8	65.4	71.5	77.6
	MC2232 Φ22mm corelss brushless motor	56.3	64.8	72.4	78.5	84.6
	MC2250 Φ22mm corelss brushless motor	74.3	82.8	90.4	96.5	102.6
Encoder	CB-ST-16	Magnetic Encoder				

Product Specifications

PART NO.	Rated Voltage (V)	No-Load Data		Load Data			Overall Length (mm)	Gearbox Rated Allowable Torque (NM)	Gearbox Intermittent Allowable Torque (NM)	Reduction Ratio	Gearbox Length L1(mm)
		No-Load Speed (rpm)	No-Load Current (mA max)	Load Speed (rpm)	Load Current (A Max)	Torque (N.m)					
ZWSMD022022-3.71	24	1914	150	1482	1	0.06	56.3	1	1.25	3.71	24.3
ZWSMD022022-9.7	24	732	200	567	1.2	0.14	64.8	2.9	3.6	9.7	32.8
ZWSMD022022-14	24	507	200	393	1.2	0.20				14	
ZWSMD022022-43	24	165	250	128	1.5	0.60	72.4	4.3	5.3	43	40.4
ZWSMD022022-66	24	108	250	83	1.5	0.92				66	
ZWSMD022022-94	24	76	300	59	1.8	1.27	78.5	5.5	6.5	94	46.5
ZWSMD022022-112	24	63	300	49	1.8	1.51				112	
ZWSMD022022-134	24	53	300	41	1.8	1.81				134	
ZWSMD022022-159	24	45	300	35	1.8	2.14				159	
ZWSMD022022-190	24	37	300	29	1.8	2.56				190	
ZWSMD022022-246	24	29	300	22	1.8	3.32				246	
ZWSMD022022-415	24	17	350	13	2.2	5.34	84.6	5.2	6.5	415	52.6
ZWSMD022022-592	24	12	350	9	2.2	7.62				592	
ZWSMD022022-989	24	7	350	6	2.2	12.72				989	
ZWSMD022022-1526	24	5	350	4	2.2	19.63				1526	