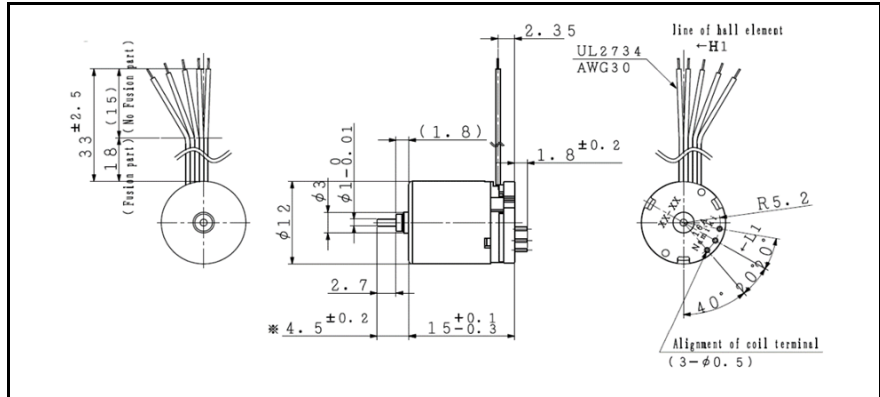
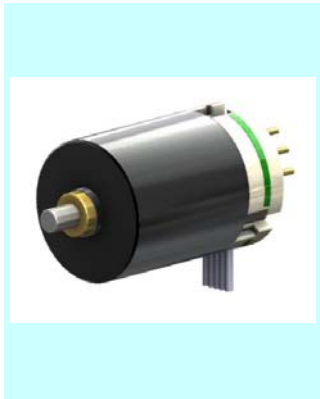


BMS 12-15

φ 12 , 0.45 mNm

with Hall sensors



For combination with gearhead: SSG12, SPG12

Dimension in mm

Ordering number	BMS12-1503	BMS12-1506	
1 Nominal voltage	7.4	12.0	V
2 Rated torque	0.93	0.92	mNm
3 Rated speed	28200	30300	rpm
4 Rated current	572	376	mA
5 No load speed	33700	36200	rpm
6 No load current	112	74	mA
7 Stall torque	5.66	5.55	mNm
8 Stall current	2.92	1.90	A
9 Output power	5.0	5.3	W
10 Max. efficiency	65	64	%
11 Terminal resistance	2.53	6.31	Ω
12 Friction torque	0.23	0.23	mNm
13 Back-EMF constant	0.211	0.318	mV/rpm
14 Torque constant	2.01	3.04	mNm/A
15 Slope of N-T curve	5960	6530	rpm/mNm
16 Mechanical time constant	5.53	6.06	ms
17 Rotor inertia	0.08	0.08	gcm ²
18 Max. torque	2.83	2.77	mNm

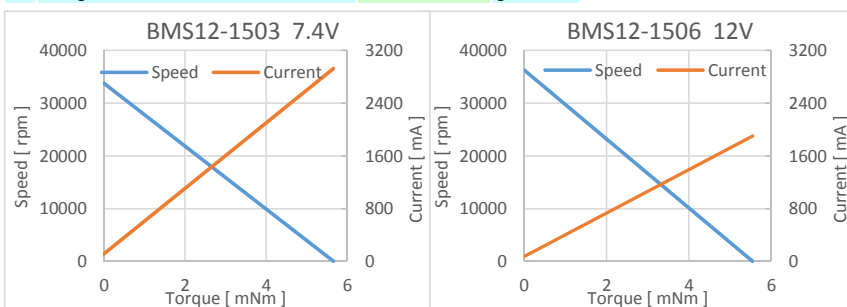
Mechanical data		
19 Shaft radial play	0.015	mm
20 Shaft axial play	0.23	mm
21 Max. shaft radial load	0.27 (3.7 mm)	N
22 Max. shaft axial load	0.1	N
23 Max. shaft axial load at standstill	10	N

Electrical connections		
H1	Hu	Hall sensor output U
H2	Hv	Hall sensor output V
H3	Hw	Hall sensor output W
H4	Gnd	GND
H5	Vdd	Input voltage 3.0~5.0V
L1	Lu	Motor winding U
L2	Lv	Motor winding V
L3	Lw	Motor winding W

Environmental specifications		
24 Operating temperature	-20 ~ 80	°C
25 Max. coil temperature	90	°C

Other specifications		
26 Weight	7.5	g

*The characteristics are measured with our test driver.



V01