Brushless DC Motor

86BLF Series

General Specifications

Winding Type Star

Hall Effect Angle 120°C Electrical Angle

Insulation Class

Ambient Temperature Range -20°C ~ +50°C Insulation Resistance 100 M Ω Min. 500 VDC Dielectric Strength 750 VAC 1 minute

Customized solutions on request.

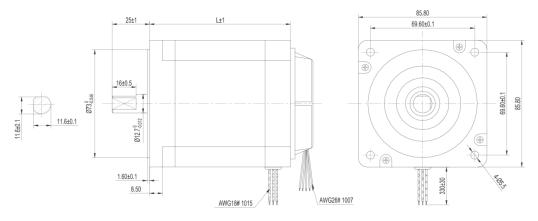


Electrical Specifications

Model		86BLF01	86BLF02	86BLF03	86BLF04	86BLF06	86BLF07
Number of Poles		8	8	8	8	8	8
Number of Phases		3	3	3	3	3	3
Rated Voltage	VDC	48	48	48	48	48	48
Rated speed	RPM	3000	3000	3000	3000	3000	3000
Rated Torque	Nm	1.4	1.05	0.7	0.35	1.8	2.1
Rated Current	Α	14	9.6	6.6	3.9	18	22
Output Power	W	440	330	220	110	550	660
Peak Torque	Nm	4.2	3.2	2.1	1.05	5.4	6.3
Peak Current	Α	38.0	29.0	19.8	10.8	46	55
Torque constant	Nm/A	0.115	0.115	0.112	0.11	0.115	0.116
Back EMF	V/KRPM	12.0	12.0	11.8	11.5	12.0	12.2
Rotor inertia	gcm²	1250	950	650	350	1550	1850
Body Length	mm	94	81	67	57	109	124
Mass	kg	2.75	2.2	1.75	1.1	2.75	2.75

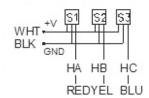
Caution: Peak Torque is provided for the purpose of performance calculations only. Operating near, or at this condition can result in motor damage.

Mechanical Dimensions



Connection diagram

Hall Sensor Cable



Note: Hall Sensor Power Supply voltage +5 to +20 VDC

Wiring Cable





