

FL36CBL-IE Series

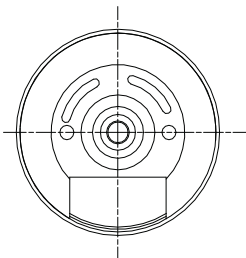
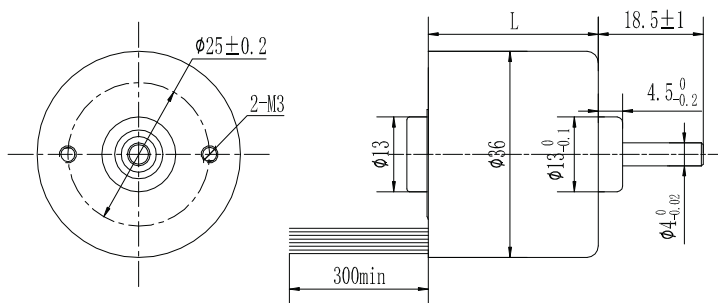
一体化无刷电机
BLDC Motor with Integrated Driver



FULLING MOTOR

机械尺寸

(Dimensions)



选件 Options



接插件



齿轮箱

特性概要

(General Specifications)

绕组连接方式 (Winding Type)	星形 (Star connection)
霍尔分布角度 (Hall Effect Angle)	120度电角度 (Electrical Angle of 120 degree)
径向间隙 (Radial Play)	0.02mm@450g
轴向间隙 (Axial Play)	0.08mm@450g
最大径向负载 (Max radial force)	15N 距法兰10mm (10mm From the flange)
最大轴向负载 (Max axial force)	10N
介电强度 (Dielectric Strength)	600VAC/1S
绝缘电阻 (Insulation Resistance)	100MΩ, 500VDC
环境温度 (Ambient Temperature)	-20°C ~ +50°C
绝缘等级 (Insulation Class)	Class B

接线说明

(Electric Connection)

引出线型号 Type	引出线颜色 Color	功能 Functions
红色 Red \ 黑色 Black, UL1430 AWG24; others UL1430 AWG26	红色 (Red)	电源正 (Vcc)
	黑色 (Black)	电源负 (GND)
	蓝色 (Blue)	转向控制 (Rotating Direction) CW/CCW
	绿色 (Green)	PWM调速 (Speed Control)
	黄色 (Yellow)	转速信号反馈 (Tacho out)
	白色 (White)	刹车 (Break)

电性能

(Electrical Specifications)

	单位 (Unit)	FL36CBL30- 24V-488A-IE-02	FL36CBL40- 24V-4818A-IE-02	FL36CBL50- 24V-4828A-IE	FL36CBL57- 24V-4533A-IE	FL36CBL60- 24V-4840A-IE-01	FL36CBL65- 24V-4845A-IE
极数 (Number of poles)		8					
相数 (Number of phases)		3					
额定电压 (Rated voltage)	VDC	24					
额定转矩 (Rated torque)	mN.m	15	35	55	70	80	90
连续运行转矩 (Continuous stall torque)	mN.m	18	42	66	84	96	108
额定速度 (Rated speed)	RPM	4800	4800	4800	4500	4800	4800
额定功率 (Rated power)	W	8	18	28	33	40	45
峰值转矩 (Peak torque)	mN.m	45	105	110	110	110	110
峰值电流 (Peak current)	A	1.3	3	3	3	3	3
线电阻 (Line to line resistance)	ohms@20°C	5.2	2	1.2	1.05	0.95	0.88
线电感 (Line to line inductance)	mH	3.3	1.9	1.2	1	0.85	0.8
转矩常数 (Torque constant)	mN.m/A	36	40	39	40	40	40
反电势 (Back EMF)	Vrms/KRPM	2.7	3	2.9	3	3	3
转动惯量 (Rotor inertia)	g.cm ²	6	12	22	27	30	32
机身长度 (Motor length) L	mm	30	40	50	57	60	65
重量 (Weight)	Kg	0.12	0.16	0.23	0.25	0.27	0.28