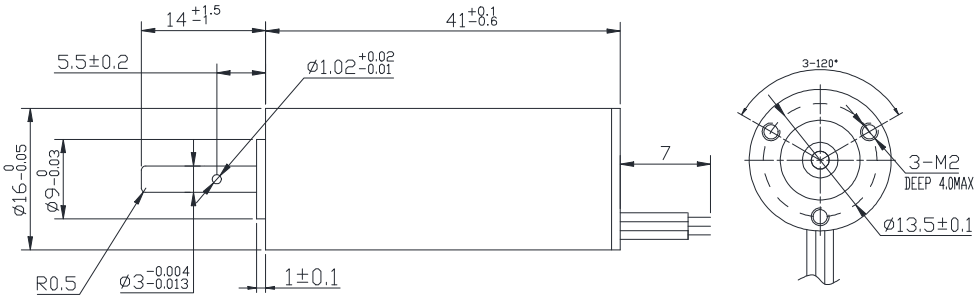
FL16SBL Series

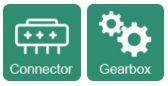
无齿无槽电机
Slotless BLDC Motor

FULLING MOTOR

● 机械尺寸 (Dimensions)



选件 Options



接插件 齿轮箱

A4

● 特性概要 (General Specifications)

绕组连接方式 (Winding Type)	星形 (Star connection)
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
径向间隙 (Radial Play)	0.02mm@4N
轴向间隙 (Axial Play)	0.3mm@4N
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)	5N

● 接线说明 (Electric Connection)

线型号 Type	线颜色 Color	功能 Functions
UL1430 AWG26	黄色(Yellow)	U相 (Phase U)
	红色(Red)	V相 (Phase V)
	黑色(Black)	W相 (Phase W)

● 电性能 (Electrical Specifications)

	单 位 (Unit)	FL16SBL40-32V-400-21A-5	FL16SBL40-6V-12000-X
极数 (Number of poles)		2	2
相数 (Number of phases)		3	3
额定电压 (Rated voltage)	VDC	32	6
空载转速 (No load speed)	RPM	40000	12000
空载电流 (No load current)	A	0.2	0.2
额定转矩 (Rated torque)	mN.m	6	2.5
额定电流 (Rated current)	A	1	0.5
额定速度 (Rated speed)	RPM	35000	10000
额定功率 (Rated power)	W	22	2.6
额定效率 (Rated efficiency)	%	80	75
峰值转矩 (Peak torque)	mN.m	18	7.5
峰值电流 (Peak current)	A	2.4	1.5
线电阻 (Line to line resistance)	ohms@20°C	2.25	1.4
线电感 (Line to line inductance)	mH	0.13	0.07
转矩常数 (Torque constant)	mNm/A	7.43	4.7
反电势 (Back EMF)	Vrms/Krpm	0.55	0.35
外壳-环境热阻(Housing - Ambient thermal resistance)	K/W	8.4	7.2
电机热时间常数(Motor thermal time constant)	S	762	930
绕组最高允许温度(Max temperature of winding)	°C	155	155
电气时间常数(Electrical time constant)	ms	0.057	0.05

该款电机可以根据客户需求定制。The motor can be designed & manufactured with customized request.