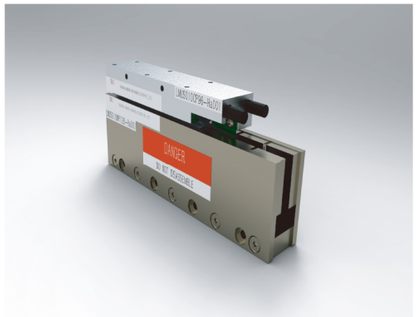
LINEAR MOTOR LMUS010



标准规格/Standard Specifications

绝缘耐压/Insulation Capacity	: AC1500V 1min
周围温度/Operating Range	: 0~25°C
冷却方式/Cooling Method	: Self-cool
绝缘电阻/Insulation Resistance	: DC500V 100MΩ or more
周围湿度/Operating range (in controlled environment)	: 20~80%(No condensation)
最大温度/Maximum temperature	: 125°C

详细规格/Specification

参数 Parameter	单位 Unit	LMUS010-CP36	LMUS010-CP76	LMUS010-CP100
性能指标 Performance Specifications				
额定推力 Continuous Force	N	9.5	21	31
峰值推力 Peak Force	N	66.5	147	217
电气性能 Electrical Specifications				
线间感应电压常数 BEMF Constant(line-line,peak)	V/(m/s)	3.90	9.21	12.90
额定电流 Continuous Current	Arms	1.98	1.86	1.96
峰值电流 Peak Current,Stall	Arms	13.90	13.00	13.70
推力常数 Force Constant	N/Arms	4.27	10.77	14.95
马达常数 Motor Constant	N/√W	2.50	3.55	4.20
线间电阻，25°C Resistance,25°C (line-line)	Ω	2.2	5.5	7.7
线间电感 Inductance,(line-line)	mH	0.22	0.55	0.84
放热常数 Thermal Resistance	°C/W	6.5	2.8	1.8
最大电压 Maximum Bus Voltage	V_{DC}	340	340	340
机械性能 Machanical Specifications				
动子重量 Coil Weight	kg	0.035	0.088	0.11
动子长度 Coil Length	mm	33	69	93
磁轨重量 Magnet Track Weight	kg/m	1.8		
磁极间距（NN) Magnetic Pole Pitch (NN)	mm	24		

注/Notes:

1.Performance is dependent upon heat sink configuration, system cooling conditions,and ambient temperature.

1.性能取决于散热器配置、系统冷却条件和环境温度。

2.Values shown @ 100°C rise above a 25°C ambient temperature,with motor mounted to the specified aluminum heat sink.

2.在高于25℃至100℃的环境温度时，电机需安装在指定的铝制散热器上。

3.Peak force assumes correct rms current;consult SMJ.

3.峰值扭矩下设置正确的电流值，请咨询SMJ。

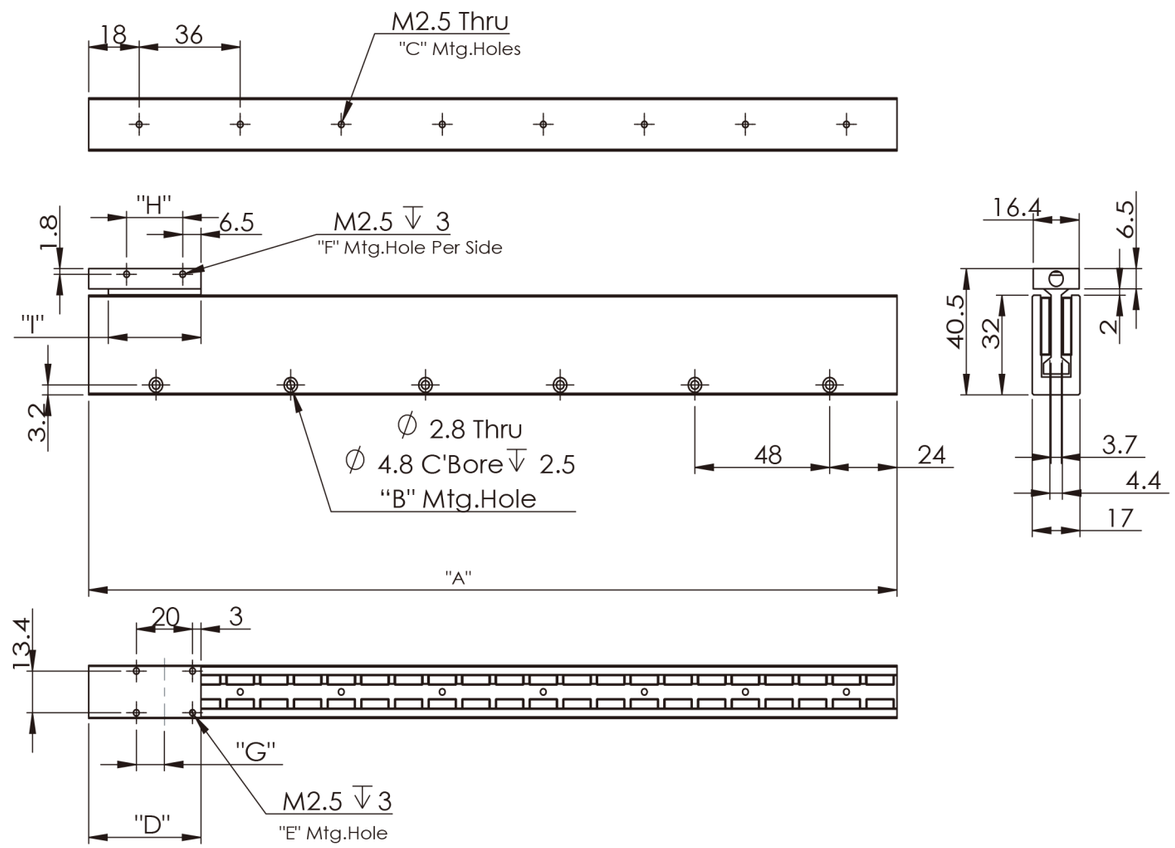
4.Force constant and motor constant specified at stall.

4.失速时规定的力常数和电机常数

5.All performance and electrical specifications±10%.

5.所有性能和电气规格偏差±10%

Dimensions(mm)



Magnet Plate

Model No.	A	B	C
LMUS010-MP96	96	2	3
LMUS010-MP288	288	6	8

Coil Plate

Model No.	D	E	F	G	H	I
LMUS010-CP36	40	4	4	10	20	33
LMUS010-CP76	76	8	8	10	20	69
LMUS010-CP100	100	10	10	10	20	93