



MG RELAY CO.,LTD.
www.mgrelay.com

ML22

磁保持继电器
Magnetic holding relay



特性 Features :

- 30A切换大容量 (30A switching capacity)
- 永久磁铁保持继电器Permanent magnet holding relay
- 2mm触点间隙 , 满足国际需求
- 2mm contact gap to meet international requirements
- 双线圈保持Double Coil hold
- 自我保持的设置和重置线圈, 在没有电源的情况下, 保持最后的位置
- Self-hold settings and reset the coil, in the absence of power, to maintain the last position
- 镀金触点型Gold plated contact type
- 环保产品RoHS和REACH

性能参数 Coil parameter

触点型式Contact type	一组转换 /二组转换 (2C , 1Z)	
接触电阻 Contact Resistance	≤50mΩ	
触点材料 Contact Material	AgSnO2 glod plating 银锡镀金	
阻性负载 Resistive load	30A @28VDC/300VAC	
马达负载 Motor load	2hp @240VAC,1hp@120VAC	
最大切换电压 Max. Switching Voltage	28VDC,300VAC	
最大切换电流 Max. Switching Current	30A	
最大切换功率 Max. Switching Power	840W/9000VA	
绝缘电阻 Insulation resistance	500MΩ@500VDC	
介质耐压 Dielectric strength	同极触点间 Between open contact	2500VAC,1Min
	异极触点间 Between different pole	4000VAC,1Min
	线圈触点间 Between contact and coil	4000VAC,1Min
动作时间 Operate time	AC≤20ms,DC≤20ms	
释放时间 Release time	AC≤20ms,DC≤20ms	
冲击稳定性 Stability of shock resistance	98m/s ²	
冲击强度 Shock strength	980m/s ²	

环境温度 Ambient temperature	\$-30^{\circ}\text{C} \sim +50^{\circ}\text{C}\$ (AC) \$-30^{\circ}\text{C} \sim +65^{\circ}\text{C}\$ (DC)(无结冰、无结露 No ICE, no dew)
环境湿度 Ambient Humidity	5%RH ~ 85%RH
振动 Vibration	10Hz ~ 55Hz, Double amplitude 1.0mm
机械寿命 Mechanical life	5,000,000ops
电气寿命 Electrical life	10,000 ops
额定线圈功率 Rated coil power	直流 (DC) : 2W , 交流 (AC) : 3.4VA
重量 Weight	\$\leq 96\text{g}\$
体积 Volume	38mm \$\times\$ 35mm \$\times\$ 47.8mm
配套插座或连接器 Matching socket or connector	/
产品应用领域 Product application area	机床、工业控制设备、电梯电控设备、安防控制领域、电源控制等 Machine tool、Industrial Control Equipment、Elevator control equipment、Field of security control、Power Control
产品应用场合 Applications	电源、焊接设备、自动贩卖机、通信设备、防灾设备、测量仪器、娱乐机器、Power supply、Welding equipment、Vending machine、Communication equipment、Disaster Prevention equipment、Measuring Instrument、Entertainment Machine
同行参考 Peer Reference	MAG : 303系列(303 series)

线圈规格表 Coil Versions (环境温度+ 23°C The ambient temperature is 23°C)

额定电压 (V) Rated oltage		工作电压 (V) Operate voltage	释放电压 (V) Release voltage	最大电压(V) MAX.voltage	线圈电阻(\$\Omega\$) Coil sistance
双线圈 DC Dual wound , 1Z	12VDC	\$ \leq 75\%\$	\$ \leq 75\%\$	110%	70/70 \$\pm 10\%\$
单线圈 Single wound , 2A/2C	12VDC				75 \$\pm 10\%\$
	24VDC				300 \$\pm 10\%\$
	120VAC				\$ \leq 80\%\$

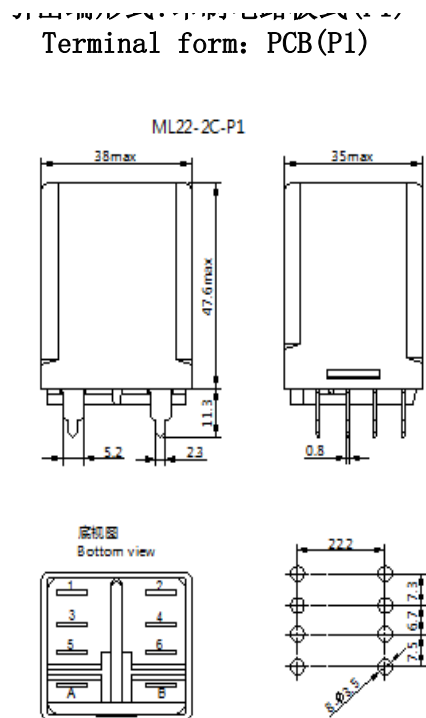
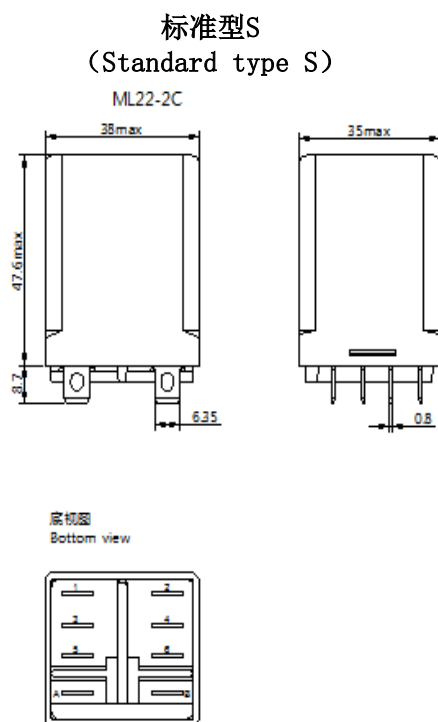
备注：最大电压是指继电器在短时间内能够承受的最大电压值。

Note: The maximum voltage is the maximum that the relay can withstand in a short period of time.

订货标记示例 Order mark example

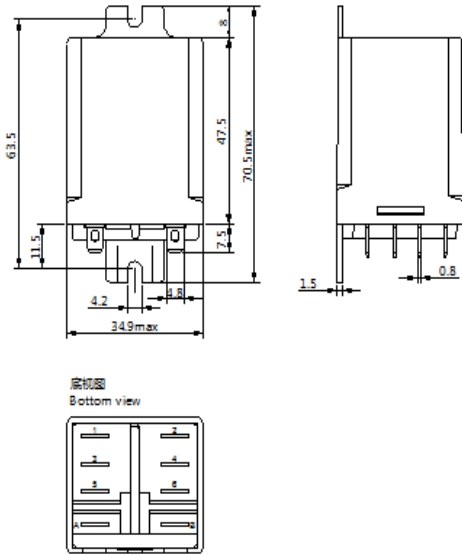
编号说明	MRL22	-2C	()	-S	-C	LMBS	-120VAC-F
系列Series ML22							
触点形式Contact form 2C/1Z							
触点负载Contact rating 空白Blank: 30A							
引出端形式Terminal style 标准型 Standard type S:6.35*0.8mm PC型 : P1:2.3*0.8mm							
外壳样式Cover style C:标准型普通外壳Standard case C1:侧面法兰外壳Side flange housing C2:有螺纹孔和防转卡With threaded holes and anti-rotation cards C3:顶端法兰外壳Top flange housing C4:卡轨外壳Rail housing							
选配Options M: 手动按钮 Manual Push Button, DC 蓝色 Blue, AC 红色 Red L: 单向红色 Single-Polar Red LED(for AC), 双向绿色 Bi-Polar Green LED (for DC) B: 磁铁灭弧 (仅对直流负载) Arc Suppression by Magnet (only DC load) S : S单线圈 S Single Coil D:双线圈 D: Double Coil							
线圈电压Coil voltage A: AC交流 120VAC DC: 直流 24VDC/12VDC F:F级155°C F Class 155 °C (未选B级130°C Not B, 130 °C)							

外形尺寸图 Dimension drawing



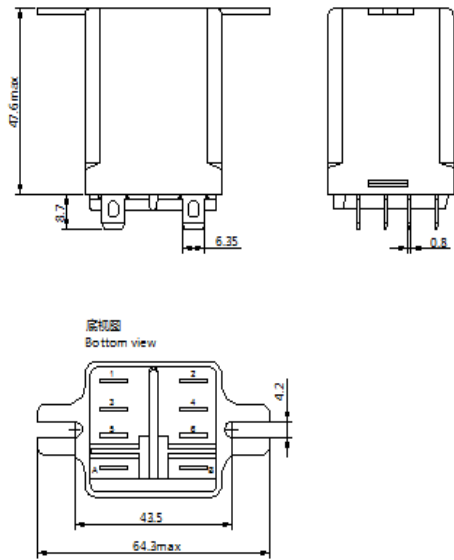
侧面附耳外壳(C1)
Side flange cover(C1)

ML22-2C-C1



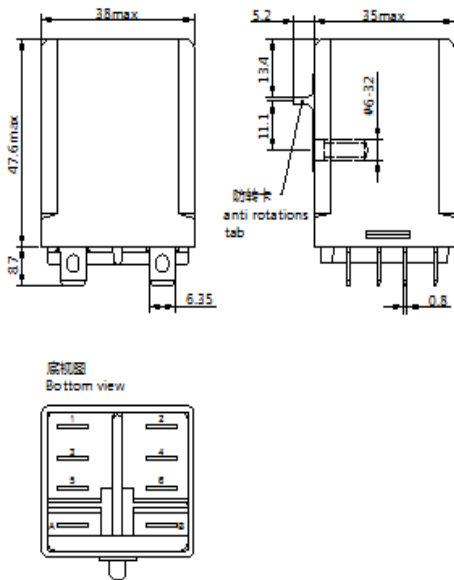
顶端附耳外壳(C3)
Top flange cover(C3)

ML22-2C-C3



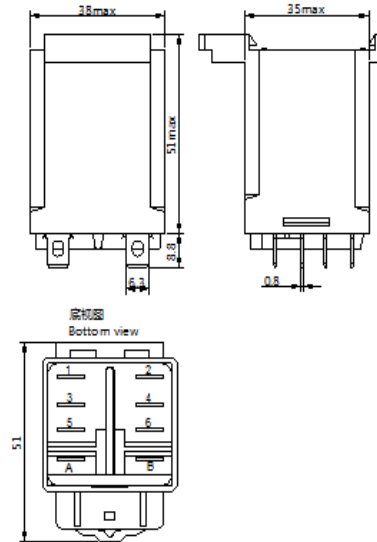
有螺纹孔和防转卡(C2)
Optional 6-32 side stud or tapped
hole with anti rotations tab(C2)

ML22-2C-C2



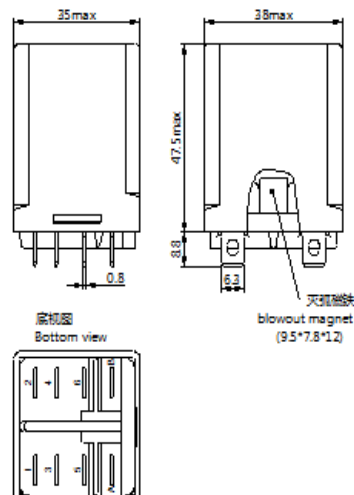
卡轨外壳(C4)
Din rail cover(C4)

ML22-2C-C4



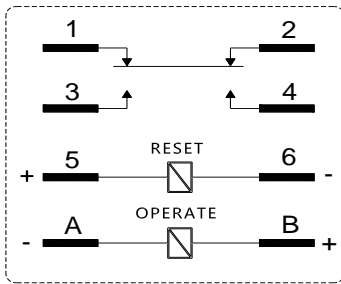
带灭弧磁铁(B)
Blowout magnet(B)

ML22-2C-B

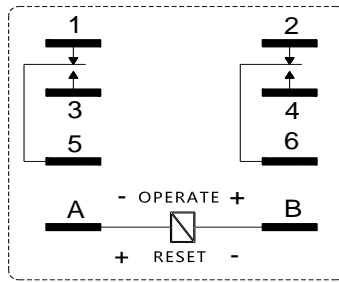


内部接线图 Wiring diagrams

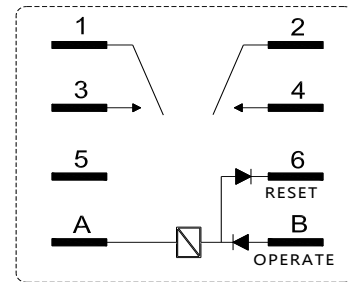
直流双线圈
DC Dual wound



直流单线圈
DC Single wound



交流单线圈
AC Single wound



注：1，对于DC规格，请在确认线圈极性后正确接线。

For DC specifications, please connect correctly after confirming coil-level performance.

2，动作指示灯显示线圈通电情况，并非根据触点动作进行显示

the action indicator shows the current status of the coil, not according to the action of the contact

注意事项 Points to note

关于使用： About using

对于动作指示灯内置型，请在确认线圈极性后正确接线（DC操作）

For Action Indicator built-in type, please connect correctly after confirming coil polarity (DC operation)

关于安装： About installation

无安装方向限制，请尽量避免接点移动方向易受振动、冲击的安装方式

No installation direction limit, please try to avoid contact moving direction susceptible to vibration, impact of the installation

关于继电器的更换： ON REPLACEMENT OF RELAYS:

因维护等原因更换继电器时，为防止继电器的误动作及触电事故，请务必切断负载侧和继电器线圈的电源。

When changing the relay for maintenance and other reasons, please cut off the power supply of the load side and the relay coil in order to prevent misoperation and electric shock of the relay.