



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

MH18

金属密闭继电器
Metal sealed relay

MG 茂冠科技
MAOCROWN TECHNOLOGY



30 YEARS

特性 Features :

- 10A切换大容量 (10A switching capacity)
- 密封的金属外壳，适用于危险场所 Sealed metal case for use in dangerous places
- 真空干燥和干燥的氮气，去除污染物，为触点提供清洁干燥的环境
Vacuum drying and drying of nitrogen to remove contaminants and provide a clean dry environment for contacts
- 镀金触点型 Gold plated contact type
- 具有多种触点组合 (With multiple contact combinations)
- 环保产品 RoHS和REACH

性能参数 Coil parameter

触点型式 Contact type	二组转换/三组转换 (2C/3C/3A)	
接触电阻 Contact Resistance	≤50mΩ	
触点材料 Contact Material	AgCdO银镉 / AgSnO2银锡	
阻性负载 Resistive load	10A@30VDC 12A@120VAC	
马达负载 Motor load	/	
最大切换电压 Max. Switching Voltage	30VDC, 120VAC	
最大切换电流 Max. Switching Current	12A	
最大切换功率 Max. Switching Power	300W, 2440VA	
绝缘电阻 Insulation resistance	1000MΩ / 500VDC	
介质耐压 Dielectric strength	同极触点间 Between open contact	1000VAC, 1Min
	异极触点间 Between different pole	1500VAC, 1Min
	线圈触点间 Between contact and coil	1500VAC, 1Min
动作时间 Operate time	≤15ms	
释放时间 Release time	≤15ms	
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	-45°C ~ +50°C (AC) -45°C ~ +70°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	500,000 ops	
电气寿命 Electrical life	10,000 ops	

额定线圈功率 Rated coil power	直流 (DC) 1.3W 交流 (AC)2.75VA
重量 Weight	≤130g
体积Volume	36.1mm×40.9mm ×52.2mm
配套插座或连接器 Matching socket or connector	2P:PF-083A,PF-083AE,PF-08AN 3P:PF-113A,PF-113AE,PF-11AN
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	泰科TYCO:KR11/14 施耐德Schneider : 750H系列(750H series)

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

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(Ω) Coil sistance
DC	6VDC	≤80%	≥10%	110%	32±10%
	12VDC				120±10%
	24VDC				472±10%
	48VDC				1800±10%
	110VDC				10000±10%
	120VDC				10000±10%
AC	6VAC	≤85%	≥30%	110%	4.2±10%
	12VAC				18±10%
	24VAC				72±10%
	48VAC				280±10%
	110VAC				1500±10%
	120VAC				1700±10%
	220VAC/230VAC				6000±10%
	240VAC				7200±10%

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。

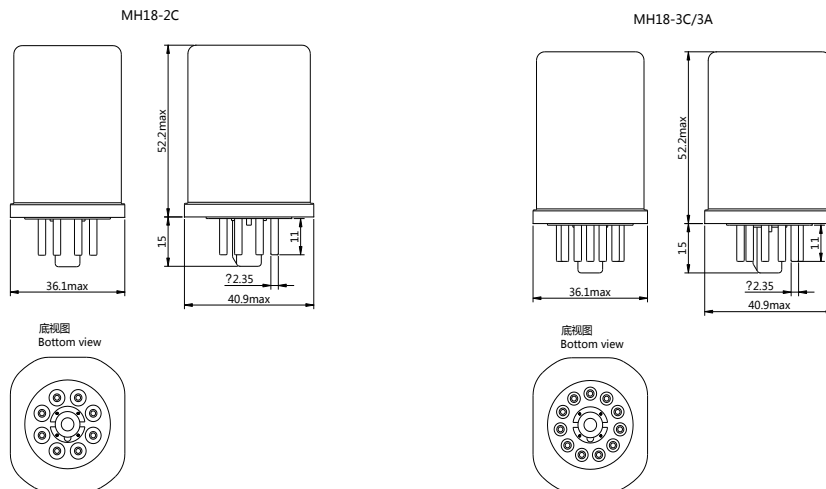
Note: The maximum voltage is the maximum that the relay can withstand in a short period of time.

订货标记示例 Order mark example

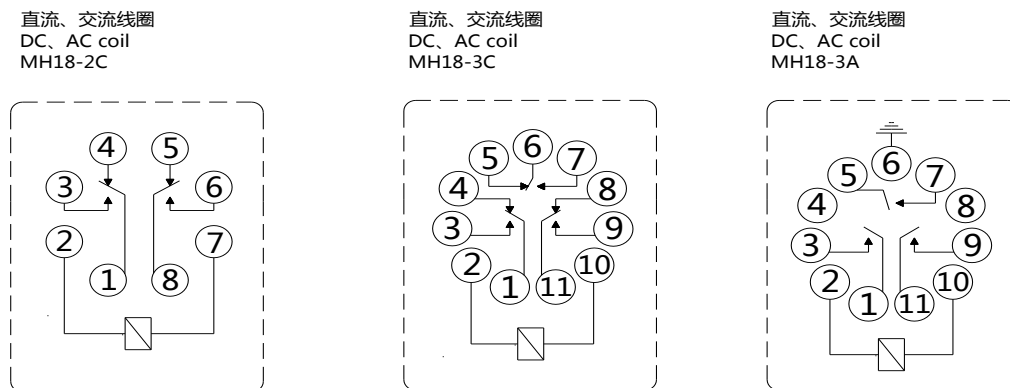
编号说明	MH18	-2C	()	()	-C	-120VAC
系列Series MH18						
触点形式Contact form 2C:DPDT 3C:DPDT 3A:APDT						
触点负载Contact rating 空白Blank: 10A 12:12A						
引出端形式Terminal style 空白Blank: 八进制插头8PIN/11PIN Octal plug 8PIN / 11PIN						
外壳样式Cover style C:标准型普通外壳Standard case						
线圈电压Coil voltage A: AC交流 DC: DC直流						

外形尺寸图 Dimension drawing

标准型 (Standard type)





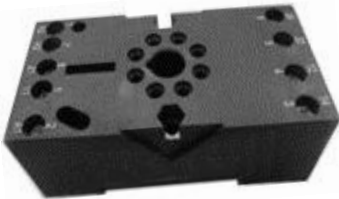
内部接线图 Wiring diagrams



注: 1, 对于DC规格, 请在确认线圈级性后正确接线。

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

继电器配套插座:Relay socket (另售Resell)

插座型號 Socket type	連接繼電器型號 Type of connecting relay	型狀 SHAPE	安裝方式 Installation mode	材質 Material Quality
PF-083A	MH18		1. 兩側螺絲孔安裝; 2. 導軌安裝	PC
PF-083B	MH18		1. 兩側螺絲孔安裝; 2. 導軌安裝	PA
PF-083AE	MH18		1. 兩側螺絲孔安裝; 2. 導軌安裝	PC
PF-083AF	MH18		1. 兩側螺絲孔安裝; 2. 導軌安裝	PA
PF-08AN	MH18		1. 兩側螺絲孔安裝; 2. 導軌安裝	PA

插座性能Socket performance

插座型號 Socket type	負載電流Load current	負載電壓 Load voltage	介質耐壓Dielectric strength		外連接導線External connecting conductor		螺釘扭矩Screw Torque	防護等級 Protection level
			線圈及觸點間 Between Coil and contact	觸點間 Contact Point	AWG	mm ²		
			V/S	V/S				
PF-083A	10A	240VAC	2000	2000	20-16	0.5-1.5	0.8Nm	/
PF-083B	16A	277VAC	2000	2000	20-16	0.5-1.5	0.8Nm	/
PF-083AE	10A	240VAC	2000	2000	20-16	0.5-1.5	0.7Nm	IP20防觸摸
PF-083AF	16A	277VAC	2000	2000	20-16	0.5-1.5	0.7Nm	IP20防觸摸
PF-08AN	16A	277VAC	2000	2000	20-16	0.5-1.5	0.7Nm	IP20防觸摸

注意事項Points to note

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.