

# High Sensitivity PCB Power Relay, 16A



#### **DESCRIPTION**

High Sensitivity Power Relays. These high sensitivity, single pole, through hole mounting relays are designed for switching control signals within circuits.

#### **DISTINCTIVE FEATURES**

- Fully Sealed Construction
- SPST-NO or SPDT Contact Configuration
- Contact Form: 1 Form A and 1 Form C
- PCB Mounting

#### **APPLICATIONS**

These relays are suitable for a wide range of applications including automotive electronics, automation control, audio amplification, and industrial equipment.

16A







30V DC





## **ELECTRICAL SPECIFICATION**

Contact Form	A - 1 Form A, C - 1 Form C (See Part Number Table)			
Contact Rating	Resistive	16A 250VAC/30VDC		
	TV Rating:	TV-8 125VAC		
	Inductive	8A 250VAC/30VDC (COSΦ=0.4,L/R=7ms)		
Contact Resistance	Maximum	100mΩ (6VDC 1A)		
Insulation Resistance	Minimum	1000MΩ 500VDC		
Load	Maximum Switching Voltage	250VAC/30VDC		
	Maximum Switching Current	16A		
	Maximum Switching Power	4,000VA, 480W		
	Minimum Switching Load	5VDC, 100mA		
Dielectric Strength	Between open contacts	1,000VAC, 1min		
	Between coil and contacts	4,000VAC, 1min		

## Coil Data Ambient Temperature: 23°C

Part number	Nominal Voltage VDC	Coil Resistance Ω+/-10%	Operate Voltage ≤VDC	Release Voltage ≥VDC	Coil Power mW	Contact Form
61-6300	24	1067	18.0	2.4		A - 1 form A
61-6301	24	1067	18.0	2.4	540	C - 1 Form C
61-6306	12	267	9.0	1.2		C - 1 Form C



# **GENERAL SPECIFICATION**

Series	High Sensitivity Signal Relays	
Mounting Type	PCB mounting	
RoHS	Yes	



# **MATERIALS**

Contact Material	Ag Alloy
Outer Case Material	PBT Plastic sealed





## **CERTIFICATION AND STANDARDS**

File Number	Contact Form	Power Consumption	Coil Voltage	Contact rating	Remarks
CSA 1063015 (LR 106040)	A/C	0.72W/0.54W	3 - 48VDC	16A 120VAC	_
TUV 50116140-001	А	0.72W/0.54W	3 - 48VDC	16A 120VAC	Ambient Temperature: 85°C
107 50116140-001	С	0.72W/0.54W	3 - 48VDC	NO/NC: 16A/10A 250VAC	Ambient Temperature: 85°C
UL E164730	A/C	0.72W/0.54W	3 - 48VDC	16A 120VAC	Ambient Temperature: 40°C
CQC09002035018	А	0.72W/0.54W	3 - 48VDC	16A 120VAC	Ambient Temperature: 85°C
(GB/T 21711.1-2008)	С	0.72W/0.54W	3 - 48VDC	NO/NC: 16A/10A 250VAC	Ambient Temperature: 85°C

#### ISO9001, ISO/TS16949, ISO14001 Approved

Specifications subject to change without notice.



## **ENVIRONMENTAL/OPERATING SPECIFICATION**

1.16	Electrical	100,000 operations		
Life	Mechanical	10,000,000 operations		
Operate Time	Maximum 15ms			
Release Time	Maximum 8ms			
Operating Temperature	-30~+70°C (540mW)			
Humidity	35~95%RH,+40°C			
Charle Daniston as	Endurance	1,000m/s <sup>2</sup>		
Shock Resistance	Misoperation	100m/s <sup>2</sup>		
Vihyatian Dagistanaa	Endurance	10~55Hz, 1.5mm double amplitude		
Vibration Resistance	Misoperation 10~55Hz, 1.5mm double amplitude			



## **TERMINALS**

Terminal Type	Solder pins
Terminal Dimensions	See drawing on pages 4 and 5



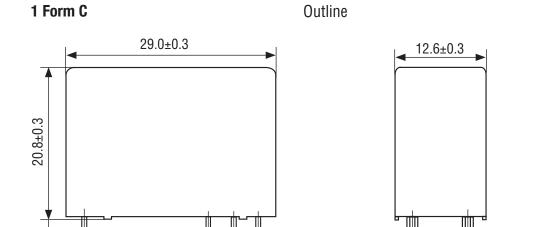


## **DIMENSIONS/DRAWINGS**

Units	mm - unless stated otherwise
Dimensions (Summary)	29.0 x 12.6 x 20.8
Length	29.0
Width	12.6
Height (Excluding pins)	20.8
Weight	13g (approx.)



# OUTLINE, WIRING DIAGRAM, MOUNTING HOLE LAYOUT (UNIT: mm)



5.08±0.3

5.08±0.3

2-0.5±0.1



6-0.4±0.1

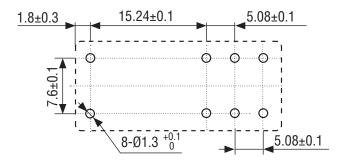
-0.5±0.1

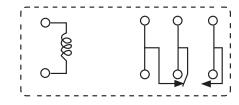
15.24±0.3

Wiring Diagram (Bottom View)

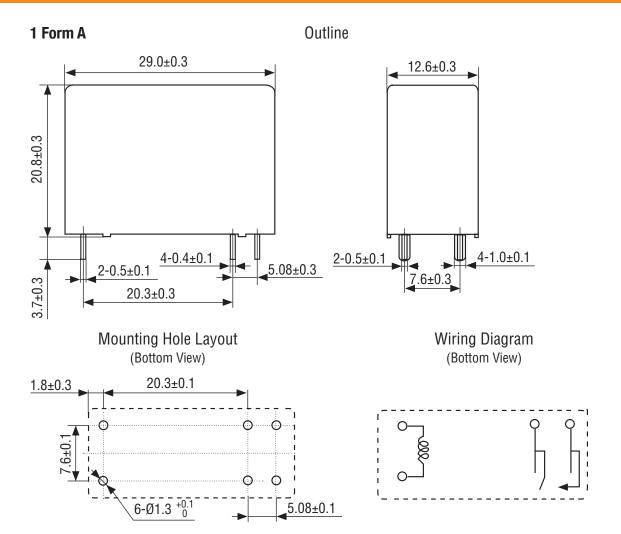
7.6±0.3

6-1.0±0.1





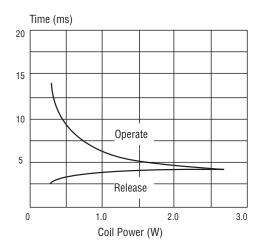




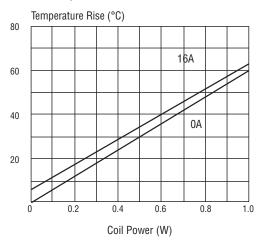


## REFERENCE DATA

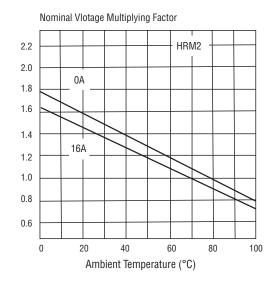
## Time Curve



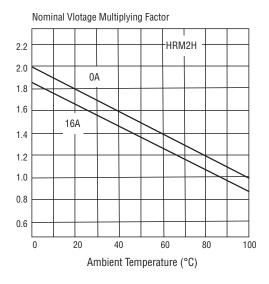
# Coil Temperature Rise



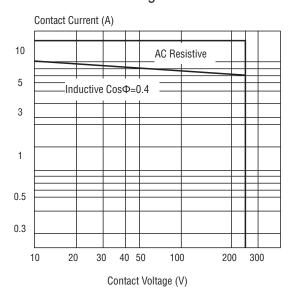
# **Operating Range**



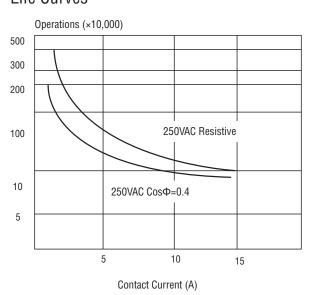
# **Operating Range**



# Maximum Switching Power



## Life Curves





#### **OPTIONS** (MOQ may apply)

Coil Voltage	3, 5, 6, 9, 12, 24 & 48V
Coil Sensitivity	Standard (720mW)
Contact Form	1 Form A, 1 Form C
Contact Configuration	SPST-NO, SPDT



#### **PART NUMBER TABLE**

Part number	Nominal Coil Voltage	Contact Form	Enclosure	Coil Sensitivity	UNSPSC	EAN	Country of Origin
61-6300	24 VDC	1 Form A	Sealed	High (540mW)	39122325	5053556018796	China
61-6301	24 VDC	1 Form C	Sealed	High (540mW)	39122325	5053556018802	China
61-6306	12V DC	1 Form C	Sealed	High (540mW)	39122325	5053556018857	China

For further information on pricing, delivery, and long-term stock agreements please contact your local business development person, telephone our main office on **01206 838000** or email **Sales@Rapidonline.com**.



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