

# 80 AMP MINI-ISO AUTOMOTIVE RELAY

# FEATURES

- PCB terminals
- 80 Amp contact rating
- High momentary carry current
- High operating temperature (85°C)
- SPST N.O. (1 Form A), SPDT (1 Form C), SPST N.C. (1 Form B)
- ISO/TS 16949, ISO14001
- Tested in accordance with SAE J2544
- Epoxy sealed version available

### CONTACTS

Arrangement	SPST (N.O.) (1 Form A) SPDT (1 Form C), SPST (N.C.) (1 Form B)				
Ratings	Resistive load:				
	Max. switched power: 1120 W (SPST) Form A 840 W (N.O.) Form C 840 W (N.C.) Form C, Form B				
	Max. switched current: 80 A (SPST) Form A 60 A (N.O.) Form C 60 A (N.C.) Form C, Form B				
	Max. switched voltage: 75 VDC				
Material	Silver tin oxide				
Resistance	< 50 milliohms initially (24 V, 1 A voltage drop method)				

#### COIL

Power			
At Pickup Voltage (typical)	0.76 W		
Max. Continuous Dissipation	3.0 W at 20°C (68°F)		
Temperature Rise	68°C (122°F) at nominal coil voltage		
Temperature	Max.155°C (311°F)		

# NOTES

- 1. All values at 20°C (68°F).
- 2. Relay may pull in with less than "Must Operate" value.
- 3. Specifications subject to change without notice.



# **GENERAL DATA**

Life Expectancy Mechanical Electrical	Minimum operations 1 x 10 <sup>7</sup> 1 x 10 <sup>5</sup> at 80 A 14 VDC Res.		
Operate Time (typical)	7 ms at nominal coil voltage		
Release Time (typical)	5 ms at nominal coil voltage (with no coil suppression)		
Dielectric Strength (at sea level for 1 min.)	500 Vrms coil to contact 500 Vrms contact to contact		
Insulation Resistance	100 megohms min. at 500 VDC, 20°C 50% RH		
Dropout	Greater than 10% of nominal coil voltage		
Ambient Temperature Operating Storage	-40°C (-40°F) to 85°C (185°F) -40°C (-40°F) to 105°C (221°F)		
Vibration	0.062" DA at 10-55 Hz		
Shock	10 g		
Enclosure	PA (UL94: V-0)		
Terminals	Copper alloy PCB		
Max Solder Temp.	270°C (518°F)		
Max Solder Time	5 seconds		
Max Solvent Temp.	80°C (176°F)		
Max Immersion Time	30 seconds		
Weight	40 grams		



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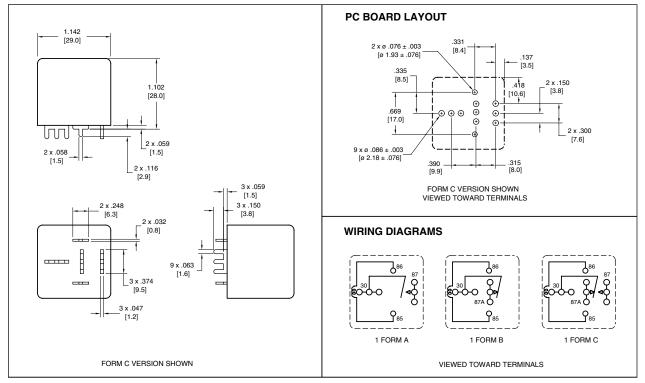
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# **RELAY ORDERING DATA**

COIL SPECIFICATIONS				ORDER NUMBER*	
Nominal Coil VDC	Must Operate VDC	Max. Continuous VDC	Coil Resistance ± 10%	SPST (N.O.)	SPDT
6	3.9	7.8	20	AZ983–1A–6D	AZ983–1C–6D
12	7.8	15.6	80	AZ983–1A–12D	AZ983-1C-12D
24	15.6	31.2	320	AZ983–1A–24D	AZ983–1C–24D

\*For SPST (N.C.) (1 Form B) relay, substitute "-1B" for "-1A". Add suffix "R" for resistor in parallel with coil. Resistor values: 6V: 180 ohms, 12V: 680 ohms, 24V: 2700 ohms. Add suffix "D" for diode across coil option ("+" pole of power supply at terminal #86). Add Suffix "E for epoxy sealed version.

### **MECHANICAL DATA**



Dimensions in inches with metric equivalents in parentheses. Tolerance: ± .010"





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