AZ946

MINIATURE
PC BOARD RELAY

FEATURES

- Subminiature size
- High sensitivity, 288 mW pick up
- Coils to 24 VDC
- Epoxy sealed for automatic wave soldering
- Contacts rated at 1 or 5 Amps
- Life expectancy to 20 million operations
- Extremely low cost
- UL, CUR file E43203

CONTACTS

Arrangement	2 Form C (DPDT)
Max. Ratings	Noninductive load:
Light Duty	Max. switched power: 30 W or 277 VA Max. switched current: 1 A Max. switched voltage: 150* VDC or 300 VAC **UL Rating:** 1 A at 30 VDC resistive 1 A at 277 VAC general use (100k cycles)
Medium Duty	Max. switched power: 150 W or 1385 VA Max. switched current: 5 A Max. switched voltage: 150* VDC or 300 VAC **UL Rating:** 5 A at 30 VDC resistive 5 A at 277 VAC general use (100k cycles) * If switching voltage is greater than 30 VDC special precautions must be taken. Please contact the factory
Material	Light Duty: Silver, gold plated Medium Duty: Silver Cadmium Oxide, gold plated
Resistance	Light Duty: 100 milliohms max. initially Medium Duty: 100 milliohms max. (6 V 1 A method)

COIL

Power	
At Pickup Voltage (typical)	384 mW standard 288 mW sensitive
Max. Continuous Dissipation	1.2 W at 20°C (68°F)
Temperature Rise	35°C (63°F) standard 30°C (54°F) sensitive
Max. Temperature	105°C (221°F)

GENERAL DATA

Life Expectancy **Mechanical** **Electrical**	Minimum operations 2 x 10^7 1 x 10^5 (at rated load)
Operate Time (typical)	5 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.)**	1000 Vrms coil to contact 750 Vrms between open contacts 1000 Vrms contact set to contact set
Insulation Resistance	100 megohms min. at 20°C, 500 VDC, 50% RH
Dropout	Greater than 10% of nominal coil voltage
Ambient Temperature **Operating** **Storage**	At nominal coil voltage -10°C (14°F) to 60°C (140°F) standard -10°C (14°F) to 70°C (158°F) sensitive -10°C (14°F) to 105°C (221°F)
Vibration	0.062" (1.5 mm) DA at 5–55 Hz
Shock	10 g
Enclosure	P.B.T. polyester
Terminals	Tinned copper alloy, P.C.
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	12 grams

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.
4. Unsealed relays should not be dipped cleaned

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RELAY ORDERING DATA

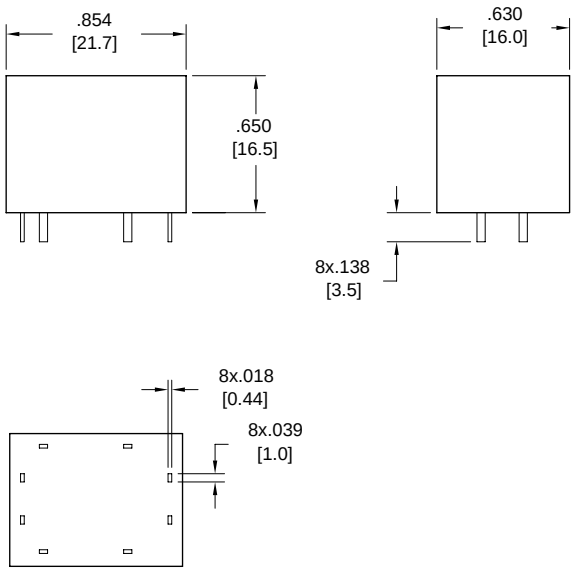
COIL SPECIFICATIONS - Medium Duty (5 Amp Contact)					
Nominal Coil VDC	Must Operate VDC	Max. Continuous VDC	Coil Resistance ±10%	ORDER NUMBER	
				Unsealed	Sealed
3	2.4	4.2	15	AZ946–2CH–3D	AZ946–2CH–3DE
5	4.0	7.1	42	AZ946–2CH–5D	AZ946–2CH–5DE
6	4.8	8.4	60	AZ946–2CH–6D	AZ946–2CH–6DE
9	7.2	12.7	135	AZ946–2CH–9D	AZ946–2CH–9DE
12	9.6	16.9	240	AZ946–2CH–12D	AZ946–2CH–12DE
24	19.2	33.9	960	AZ946–2CH–24D	AZ946–2CH–24DE

RELAY ORDERING DATA

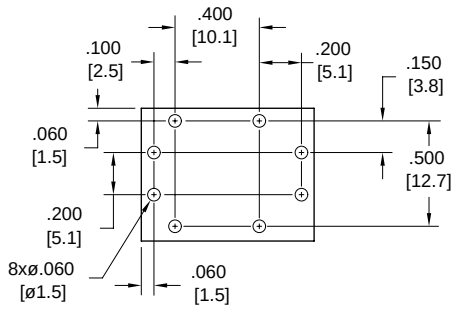
COIL SPECIFICATIONS - Light Duty (1 Amp Contact)					
Nominal Coil VDC	Must Operate VDC	Max. Continuous VDC	Coil Resistance ±10%	ORDER NUMBER	
				Unsealed	Sealed
3	2.4	4.9	20	AZ946–2C–3DS	AZ946–2C–3DSE
5	4.0	8.2	56	AZ946–2C–5DS	AZ946–2C–5DSE
6	4.8	9.8	80	AZ946–2C–6DS	AZ946–2C–6DSE
9	7.2	14.7	180	AZ946–2C–9DS	AZ946–2C–9DSE
12	9.6	19.6	320	AZ946–2C–12DS	AZ946–2C–12DSE
24	19.2	39.0	1280	AZ946–2C–24DS	AZ946–2C–24DSE

MECHANICAL DATA

Outline Dimensions

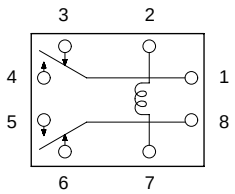


PC Board Layout



VIEWED TOWARD TERMINALS

Wiring Diagram



VIEWED TOWARD TERMINALS

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

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