# AZ850\_

## MICROMINIATURE POLARIZED RELAY

## FEATURES

- Microminiature size: Height: .197 inches (5 mm); Length: .551 inches (14 mm); Width: .354 inches (9 mm)
- High sensitivity, 79 mW pickup
- Monostable and bistable (latching) single coil and two coil versions available
- Meets FCC Part 68.302 1500 V lightning surge
- DIP terminal layout, fits 10 pin IC socket
- Epoxy sealed
- UL, CUR file E43203

### CONTACTS

Arrangement	DPDT (2 Form C) Bifurcated crossbar contacts		
Ratings	Resistive load:		
	Max. switched power: 30 W or 62.5 VA Max. switched current: 1 A Max. switched voltage: 220 VDC* or 250 VAC Max. carry current: 2 A * Note: If switching voltage is greater than 30 VDC, special precautions must be taken. Please contact the factory.		
Rated Load UL, CUR	1 A at 30 VDC resistive 0.5 A at 125 VAC resistive		
Material	Silver palladium; gold clad		
Resistance	< 50 milliohms initially		

## COIL (Polarized)

Power At Pickup Voltage (typical)	Single side stable: 79–169 mW Bistable (latching) single coil: 56–84 mW Bistable (latching) two coil: 113–169 mW		
Max. Continuous Dissipation	875 mW at 20°C (68°F) ambient		
Temperature Rise	18°C (32°F) at nominal coil voltage		
Temperature	Max. 105°C (221°F)		

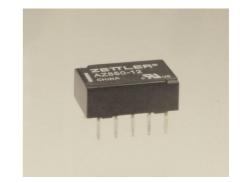
#### NOTES

- 1. All values at 20°C (68°F).
- 2. Relay has fixed coil polarity.
- 3. Relay may pull in with less than "Must Operate" value.
- 4. Relay adjustment may be affected if undue pressure is exerted on relay case.
- 5. For complete isolation between the relay's magnetic fields, it is recommended that a .197" (5.0 mm) space be provided between adjacent relays.
- 6. Specifications subject to change without notice.

## ZETTLER electronics GmbH

Junkersstrasse 3, D-82178 Puchheim, Germany

Tel. +49 89 800 97 0 Fax +49 89 800 97 200 office@ZETTLERelectronics.com www.ZETTLERelectronics.com



## GENERAL DATA

Life Expectancy Mechanical Electrical	Minimum operations $1 \times 10^8$ $2 \times 10^5$ at 1 A, 30 VDC, resistive $1 \times 10^5$ at 0.5 A, 125VAC, resistive		
Operate Time (typical)	2 ms at nominal coil voltage		
Release Time (typical)	1 ms at nominal coil voltage (with no coil suppression)		
Set Time (bistable versions)	2 ms at nominal coil voltage (typical) Recommended coil pulse: 20 ms		
Reset Time (bistable versions)	2 ms at nominal coil voltage (typical) Recommended coil pulse: 20 ms		
Dropout	Greater than 10% of nominal coil voltage		
Capacitance	Contact to contact: 0.4 pF Contact set to contact set: 0.2 pF Contact to coil: 0.9 pF		
Dielectric Strength (at sea level)	1000 Vrms between contact sets 1000 Vrms across contacts 1000 Vrms contact to coil Meets FCC part 68.302 1500 V lightning surge		
Insulation Resistance	1000 megohms min. at 25°C, 500 VDC, 50% RH		
Ambient Temperature Operating Storage	At nominal coil voltage -40°C (-40°F) to 70°C (158°F) -40°C (-40°F) to 105°C (221°F)		
Vibration	.130" (3.3 mm) DA at 10–55 Hz		
Shock	50 g		
Enclosure	LCP		
Terminals	Tinned copper alloy, P.C.		
Max. Solder Temp.	250°C (482°F)		
Max. Solder Time	5 seconds		
Max. Solvent Temp.	80°C (176°F)		
Max. Immersion Time	30 seconds		
Weight	1.5 grams		
Packing unit in pcs	25 per plastic tube / 1000 per carton box		

## AZ850.

## RELAY ORDERING DATA

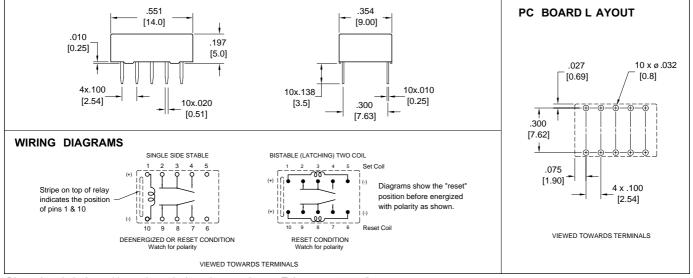
COIL SPECIFICATIONS tandard Coil: Monostable				
3	2.25	7.5	64.3	AZ850–3
4.5	3.4	11.25	145.2	AZ850-4.5
5	3.75	12.5	178	AZ850–5
6	4.5	15.0	257	AZ850–6
9	6.75	22.5	579	AZ850–9
12	9.0	30.0	1,028	AZ850–12
24	18.0	48.0	2,880	AZ850–24
48	36.0	80.0	7,680	AZ850-48 *

\* Not UL Approved

stable (Latching): 1 Coil				
Nominal Coil VDC	Set-/Reset VDC	Max. Continuous VDC	Coil Resistance Ohm ± 10%	ORDER NUMBER
3	2.25	8.7	90	AZ850P1-3
4.5	3.4	13.0	203	AZ850P1-4.5
5	3.75	14.5	250	AZ850P1-5
6	4.5	17.4	360	AZ850P1-6
9	6.75	26.1	810	AZ850P1-9
12	9.0	34.8	1,440	AZ850P1-12
24	18.0	57.6	3,840	AZ850P1-24

Bistable (Latching): 2 Coils				
Nominal Coil VDC	Set-/Reset VDC	Max. Continuous VDC	Coil Resistance Ohm ± 10%	ORDER NUMBER
3	2.25	6.0	45	AZ850P2-3
4.5	3.4	13.0	102	AZ850P2-4.5
5	3.75	10.0	125	AZ850P2-5
6	4.5	12.0	180	AZ850P2-6
9	6.75	18.0	405	AZ850P2-9
12	9.0	24.0	720	AZ850P2-12
24	18.0	40.0	1,920	AZ850P2-24

#### MECHANICAL DATA



Dimensions in inches with metric equivalents in parentheses. Tolerance:  $\pm 0.010"$ 

## ZETTLER electronics GmbH

Junkersstrasse 3, D-82178 Puchheim, Germany

Tel. +49 89 800 97 0 Fax +49 89 800 97 200 office@ZETTLERelectronics.com www.ZETTLERelectronics.com