## 60 AMP LATCHING POWER RELAY

## FEATURES

- Low cost
- 60 Amp switching
- Heavy loads to 15000 VA
- 4 kV dielectric
- Epoxy sealed construction available
- UL, CUR file E43203


## CONTACTS

| Arrangement | SPST (1 Form A) |
| :--- | :--- |
| Ratings | Resistive load: <br> Max. switched power: 15000 VA <br> Max. switched current: 60 A <br> Max. switched voltage: 400 VAC |
| Rated Load <br> UL, CUR | 60 A at 250 VAC, 6 k cycles, General Use <br> 50 A at 250 VAC, 10k cycles, General Use <br> 40 A at 250 VAC, 100k cycles, General Use |
| Material | Silver cadmium oxide or silver tin oxide |
| Resistance | $<50$ milliohms initially <br> $(24 \mathrm{~V}, 1 \mathrm{~A}$ voltage drop method) $)$ |

## COIL

| Power <br> At Pickup Voltage <br> (typical) | 666 mW single coil |
| :--- | :--- |
| Temperature | Max. $105^{\circ} \mathrm{C}\left(221^{\circ} \mathrm{F}\right)$ |

## NOTES

1. All values at $20^{\circ} \mathrm{C}\left(68^{\circ} \mathrm{F}\right)$.
2. Relay may pull in with less than "Must Operate" value.
3. Specifications subject to change without notice.
4. Allow suitable slack on leads when wiring, and do not subject the terminals to excessive force.

## GENERAL DATA

| Life Expectancy Mechanical Electrical | Minimum operations $\begin{aligned} & 1 \times 10^{6} \\ & 1 \times 10^{5} \text { at } 40 \text { A } 250 \text { VAC Res. } \end{aligned}$ |
| :---: | :---: |
| Set and Reset Pulse Duration | 50 ms minimum |
| Set Time (typical) | 20 ms at nominal coil voltage |
| Reset Time (typical) | 20 ms at nominal coil voltage |
| Dielectric Strength (at sea level for 1 min .) | 4000 Vrms coil to contact <br> 1500 Vrms between open contacts |
| Insulation Resistance | 1000 megohms min. at $20^{\circ} \mathrm{C}, 500 \mathrm{VDC}$, $50 \%$ RH |
| Creepage Distance | 8 mm |
| Ambient Temperature Operating Storage | At nominal coil voltage $\begin{aligned} & -40^{\circ} \mathrm{C}\left(-40^{\circ} \mathrm{F}\right) \text { to } 70^{\circ} \mathrm{C}\left(158^{\circ} \mathrm{F}\right) \\ & -40^{\circ} \mathrm{C}\left(-40^{\circ} \mathrm{F}\right) \text { to } 105^{\circ} \mathrm{C}\left(221^{\circ} \mathrm{F}\right) \end{aligned}$ |
| Vibration | 0.062" DA at $10-55 \mathrm{~Hz}$ |
| Shock <br> Operating Non-Operating | $20 \mathrm{~g}, 11 \mathrm{~ms}, 1 / 2$ sine (no false operation) $100 \mathrm{~g}, 11 \mathrm{~ms}, 1 / 2$ sine (no damage) |
| Enclosure | P.B.T. polyester |
| Terminals | Tinned copper alloy P.C. (coil), heavy tabs (power) |
| Max. Solder Temp. | $270^{\circ} \mathrm{C}\left(518^{\circ} \mathrm{F}\right)$ |
| Max. Solder Time | 5 seconds |
| Weight | 33 grams |

RELAY ORDERING DATA

| COIL SPECIFICATIONS -Standard Single Coil - Termination Style 1 |  |  |  | ORDER NUMBER** |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Nominal Coil <br> VDC | Must Operate <br> VDC | Max. Continuous <br> VDC $[1]$ | Coil Resistance <br> $\pm 10 \%$ | Unsealed | Sealed |
| 5 | 4.0 | 6.5 | 24 | AZ2500P1-1A-5D | AZ2500P1--1A-5DE |
| 6 | 4.8 | 7.8 | 35 | AZ2500P1-1A-6D | AZ2500P1--1A-6DE |
| 9 | 7.2 | 11.7 | 80 | AZ2500P1-1A-9D | AZ2500P1--1A-9DE |
| 12 | 9.6 | 15.6 | 145 | AZ2500P1-1A-12D | AZ2500P1--1A-12DE |
| 24 | 19.2 | 31.2 | 575 | AZ2500P1-1A-24D | AZ2500P1--1A-24DE |
| 48 | 38.4 | 62.4 | 2270 | AZ2500P1-1A-48D | AZ2500P1--1A-48DE |

* Add suffix "K" for Coil Termination Style 2. For silver tin oxide contacts change "1A" to "1AE."

| COIL SPECIFICATIONS -Standard Dual Coil |  |  | ORDER NUMBER* |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Nominal Coil <br> VDC | Must Operate <br> VDC | Max. Continuous <br> VDC $[1]$ | Coil Resistance <br> $\pm 10 \%$ | Unsealed | Sealed |
| 5 | 4.0 | 6.5 | 12 | AZ2500P2-1A-5D | AZ2500P2--1A-5DE |
| 6 | 4.8 | 7.8 | 17.5 | AZ2500P2-1A-6D | AZ2500P2--1A-6DE |
| 9 | 7.2 | 11.7 | 40 | AZ2500P2-1A-9D | AZ2500P2--1A-9DE |
| 12 | 9.6 | 15.6 | 72 | AZ2500P2-1A-12D | AZ2500P2--1A-12DE |
| 24 | 19.2 | 31.2 | 285 | AZ2500P2-1A-24D | AZ2500P2-1A-24DE |
| 48 | 38.4 | 62.4 | 1135 | AZ2500P2-1A-48D | AZ2500P2-1A-48DE |

NOTE: Relays may be ordered with twisted copper wire terminations (Styles A-K) as shown below. Contact factory for ordering information.
[1] max. continuous voltage should not be applied for more than 30 seconds.

* For silver tin oxide contacts change " 1 A " to " 1 AE ."


## MECHANICAL DATA



Dimensions in inches with metric equivalents in parentheses. Tolerance: $\pm .010^{\prime \prime}$

Weld style of twisted copper wire (A to K)


