

## Miniature 10 Amps • 4PDT To MIL-PRF-83536 DC Suppressed Coils

### SPECIFICATIONS

#### GENERAL

**Contact Arrangement** ..... 4PDT (4 Form C)

**Weight** ..... 3.0 oz approx.

Designed to meet the requirements of MIL-PRF-83536

#### PERFORMANCE

**Contact Rating** (Note 1):

Resistive ..... 10 Amps @ 28 VDC or  
115/208V 400 Hz  
(Case Grounded)

Inductive ..... 8 Amps @ 28 VDC or  
115/208V 400 Hz  
(Case Grounded)  
2.5 Amps @ 115/208V 60 Hz  
(Case Grounded)

Motor ..... 4 Amps @ 28 VDC or  
115/208V 400 Hz  
(Case Grounded)  
2 Amps @ 115/208V 60 Hz  
(Case Grounded)

Lamp ..... 2 Amps @ 28 VDC or  
115/208V 400 Hz  
(Case Grounded)  
1.5 Amps @ 115/208V 60 Hz  
(Case Grounded)

**Life** ..... 100,000 operations minimum @ rated  
resistive load, 125°C

**Pull In Power** ..... 500 mw approx.

**Operate/Release Time:**

**DC Coil**

15 ms max

Excluding bounce time at nominal coil voltage

**Contact Bounce Time** ..... 1 ms max

@ rated contact load, 28 VDC

**Contact Voltage Drop:**

Before Life ..... 150 mv max @ 10 Amps  
and 6 VDC

After Life ..... 175 mv max @ 10 Amps  
and 6 VDC

#### ENVIRONMENTAL

**Temperature Range** ..... -70°C to +125°C

**Vibration** (Note 2) ..... 0.12" DA 10 - 70 Hz  
30 G's 70 - 3,000 Hz

**Shock (Operating)**(Note 2) ..... 200 G's 6 ms

#### ELECTRICAL CHARACTERISTICS

**Duty Cycle** ..... Continuous

**Insulation Resistance** ..... 100 megohms  
@ 500V 25°C

**Dielectric Strength:**

Sea Level:

Contact to Case ..... 1,250 VRMS

Contact to Coil ..... 1,250 VRMS

Coil to Case ..... 1,000 VRMS

Across Open Contacts ..... 1,250 VRMS

80,000 Feet:

All Points ..... 350 VRMS

### MIL-PRF-83536/16 QUALIFIED to ER level M

Notes:

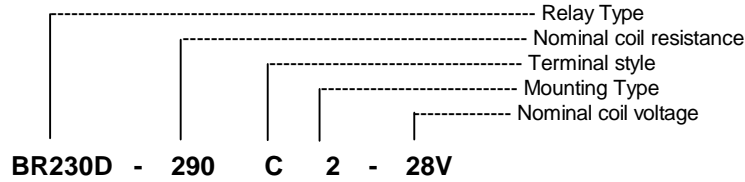
1. For other ratings consult the factory.

3. AC coil line frequency 50 to 400 Hz.

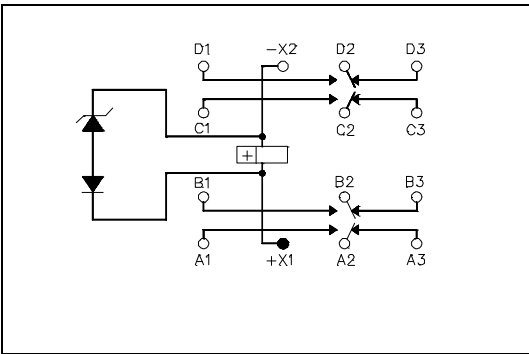
2. For applications requiring higher shock and vibration, consult the factory.

## COIL DATA:

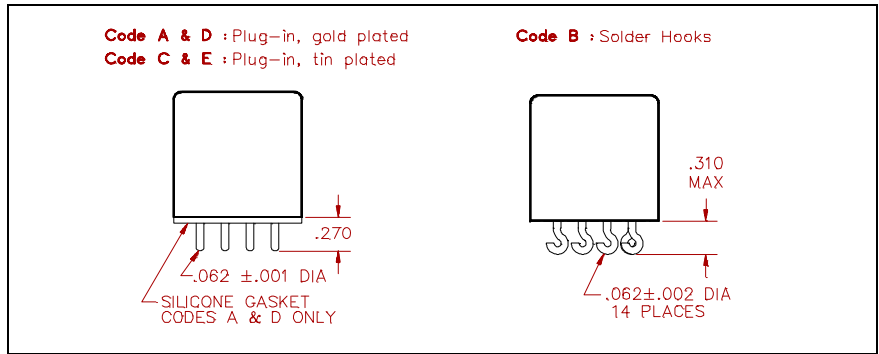
MODEL BR230D PART NUMBER	BR230D-20() -6V	BR230D-78() -12V	BR230D-290() -28V	BR230D-890() -48V
NOMINAL COIL VOLTAGE	6 VDC	12 VDC	28 VDC	48 VDC
MAXIMUM COIL VOLTAGE	8 VDC	15 VDC	29 VDC	59 VDC
PULL IN VOLTAGE (MAX @ +125°C)	4.5 VDC	9 VDC	18 VDC	36 VDC
DROP OUT VOLTAGE (MAX)	1.8 VDC	3.5 VDC	5.1 VDC	11 VDC
MAXIMUM BACK EMF	9 VDC	18 VDC	42 VDC	72 VDC
COIL RESISTANCE ± 10% @ 25°C	20 OHMS	78 OHMS	290 OHMS	890 OHMS



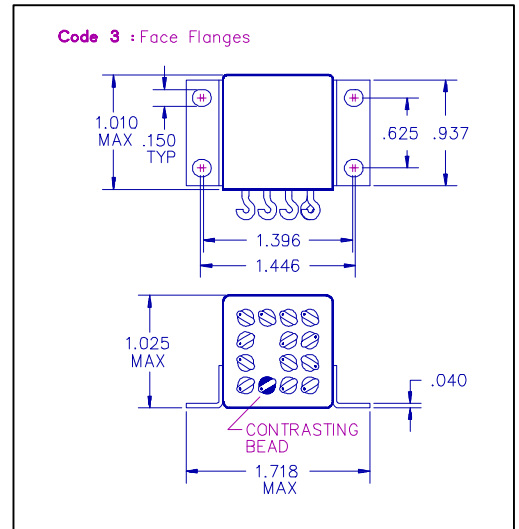
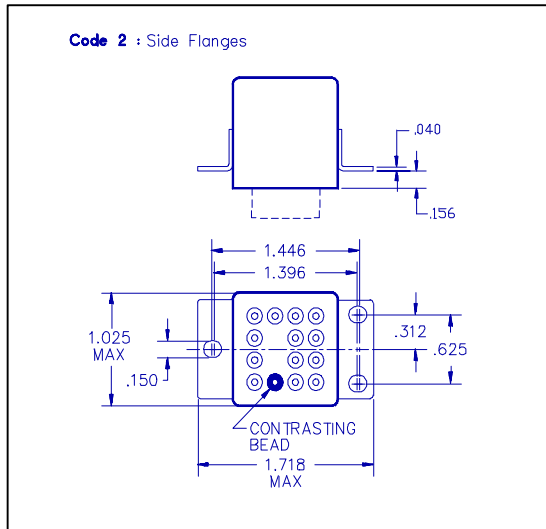
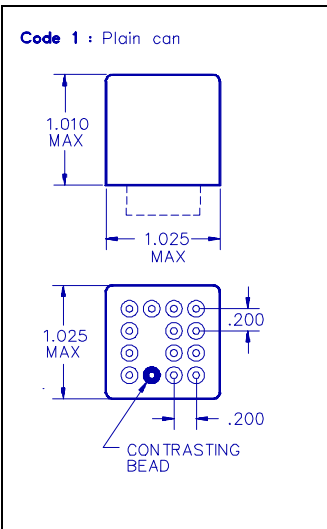
## SCHEMATIC TERMINAL VIEW



## TERMINAL STYLES



## MOUNTING CODES



## GENERAL NOTES

- Unless otherwise specified, all tests made at nominal coil voltages, @ 25°C.
- For special coil variations, switching configurations, terminals styles and mounting types, consult the factory.
- Unless otherwise specified, tolerances on decimal dimensions are ± .010".
- Specifications contained herein are subject to change without notice.