

# MODEL SERIES 2TC SF<sub>6</sub> Gas Density Switch

- Temperature range -60°F to 180°F
- NEMA 4 or NEMA 1 housing
- Up to four SPDT contacts
- Intrinsic design
- Optional integral gauge available\*



# **GENERAL DESCRIPTION**

- Designed to measure SF6 gas density in all highvoltage circuit breaker applications
- Cast-aluminum housing
- Intrinsic design for enhanced temperature and density measurement accuracy
- · Compact footprint for flexible mounting
- Low-maintenance
- Accommodates a wide temperature range
- Phosphor bronze bellows
- Available with optional integral gauge, which features clear, visual indication of the gas density

# **SPECIFICATIONS**

#### **Switching**

2, 3, or 4 S.P.D.T. snap acting switches

#### **Electrical Connection**

Screw terminal block (3mm / #6 ring terminal)

#### **Switch Contact Ratings**

2A; 125, 250 VAC

#### **Setpoint Adjustment**

Factory set per customer specifications

#### Temperature Range

-60°F to 180°F Ambient

#### Accuracy

± 1.5 PSI at 70°F

± 2 PSI at temperature extremes 180°F to -60°F

#### **Deadband (Switch Differential)**

Fixed; 1-6 PSI

#### **Pressure Sensing Element**

Phosphor Bronze Bellows - 100% leak inspected with Helium mass spectrometry to 6 X 10<sup>-8</sup> cc/sec.

#### **Pressure Adjustment Range**

5-100 psi

Maximum pressure 150 psi

#### **Pressure Port**

<sup>1</sup>/<sub>4</sub> NPTF and <sup>7</sup>/<sub>16</sub> -20 SAE are standard options, others can be incorporated upon request

#### **Enclosure (Optional)**

Diecast aluminum

#### Weight

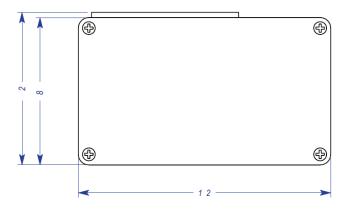
Approximately 2 lb. (0.9 kg).

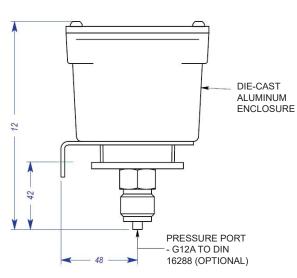
## **SWITCH DIMENSIONS**

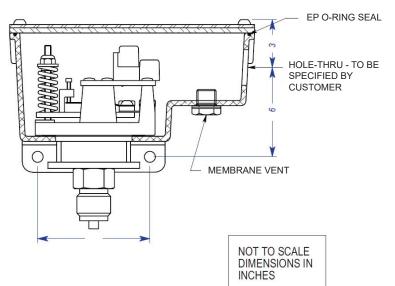
# MODEL SERIES 2TC SF<sub>6</sub> Gas Density Switch

#### WIRING SCHEMATIC

WINING GOLIEMATIO		
SWITCH 3 - SET AT XX ± X.X PSI DEC. AT 68F	NC- NO-	SWITCH 4 - SET AT XX ± X.X PSI DEC. AT 68F
SWITCH 2 - SET AT XX ± X.X PSI DEC. AT 68F	NC - NO -	SWITCH 1 - SET AT XX ± X.X PSI DEC. AT 68F







# **SPECIFYING A SWITCH**

- 1. Specify the set points for each switch. Set points should be given at room temperature (68F) and at either of the temperature extremes.
- 2. Designate the pressure port fitting.
- 3. Choose the type of electrical connection.
- 4. Indicate NEMA 4 or NEMA 1 housing.
- 5. Describe other requirements such as special testing, labeling, tagging, packaging, etc.
- 6. Once a switch is specified and an order is placed, Solon Mfg. Co. will assign a "slant number" (2TC/XXX) to the switch. This ensures that the fit, form, and function of the device will not change.

### **INSTALLATION NOTES**

**Orientation** - The 2TC will operate satisfactorily in any position.

Wiring - Factory pre-wiring available.

**Adjustment** - Factory setting to customer specifications is standard. Unit is not field adjustable.

