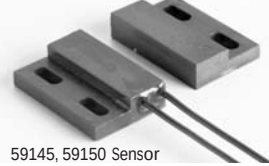


## File E61760(N)

59145, 59150 Actuator



59145, 59150 Sensor

## 59145 and 59150 Flange Mount Features and Benefits

### Features

- 2 part magnetically operated proximity sensor
- Flying leads can exit either left or right hand side of the housing
- Case design allows screw down or adhesive mounting
- Customer defined sensitivity
- Choice of cable length and connector

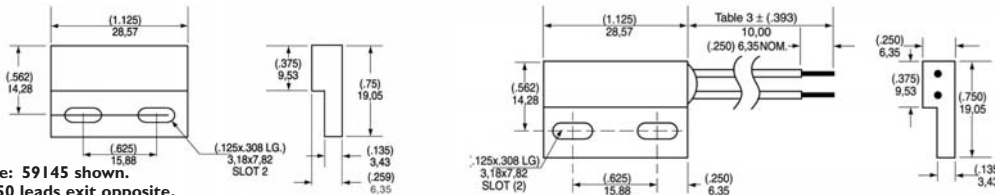
### Benefits

- No standby power requirement
- Operates through non-ferrous materials such as wood, plastic or aluminium
- Hermetically sealed, magnetically operated contacts continue to operate long after optical and other technologies fail due to contamination

### Applications

- Position and limit sensing
- Security system switch
- Linear actuators
- Door switch

## DIMENSIONS (in) mm



Note: 59145 shown.  
59150 leads exit opposite.

| SCHEMATICS | Switch Type |
|------------|-------------|
|            | 1 & 2       |
|            | 3           |
|            | 4           |

## CUSTOMER OPTIONS - Switching Specifications

| TABLE 1<br>Contact Type |                  |             | Normally Open    | Normally Open High Voltage | Change Over     | Normally Closed |
|-------------------------|------------------|-------------|------------------|----------------------------|-----------------|-----------------|
| Switch Type             |                  |             | 1                | 2                          | 3               | 4               |
| Power                   | Power            | Watt - max. | 10               | 10                         | 5               | 5               |
|                         | Switching        | Vdc - max.  | 200              | 300                        | 175             | 175             |
| Voltage                 | Breakdown        | Vdc - min.  | 250              | 450                        | 200             | 200             |
|                         | Switching        | A - max.    | 0.5              | 0.5                        | 0.25            | 0.25            |
| Current                 | Carry            | A - max.    | 1.2              | 1.5                        | 1.5             | 1.5             |
|                         | Contact, Initial | Ω - max.    | 0.2              | 0.2                        | 0.2             | 0.2             |
| Resistance              | Insulation       | Ω - min.    | 10 <sup>10</sup> | 10 <sup>10</sup>           | 10 <sup>9</sup> | 10 <sup>9</sup> |
|                         | Contact          | pF - typ.   | 0.3              | 0.2                        | 0.3             | 0.3             |
| Capacitance             | Operating        | °C          | -40 to +105      | -20 to +105                | -40 to +105     | -40 to +105     |
|                         | Storage          | °C          | -65 to +105      | -65 to +105                | -65 to +105     | -65 to +105     |
| Temperature             | Operate          | ms - max.   | 1.0              | 1.0                        | 3.0             | 3.0             |
|                         | Release          | ms - max.   | 1.0              | 1.0                        | 3.0             | 3.0             |
| Shock                   | 11ms 1/2 sine    | G - max.    | 100              | 100                        | 50              | 50              |
| Vibration               | 50-2000 Hz       | G - max.    | 30               | 30                         | 30              | 30              |

## CUSTOMER OPTIONS - Sensitivity, Cable Length and Termination Specification

| TABLE 2<br>Sensitivity Options:-<br>Activate Distances are approximate using Hamlin 57145/57150 actuator as illustrated<br>Switch AT before modification |                  |                             |                  |                             |                  |                             | TABLE 3<br>Cable Type:-<br>24 AWG 7/32 PVC 105°C<br>UL1430/UL1569 |                      | TABLE 4<br>Termination Options:- |                                           |
|----------------------------------------------------------------------------------------------------------------------------------------------------------|------------------|-----------------------------|------------------|-----------------------------|------------------|-----------------------------|-------------------------------------------------------------------|----------------------|----------------------------------|-------------------------------------------|
| Select Option                                                                                                                                            | S                | T                           | U                | V                           | W                | X                           | Standard Lengths                                                  | CABLE LENGTH (in) mm | SELECT OPTION                    | DESCRIPTION (2 WIRE VERSIONS ILLUSTRATED) |
| Switch Type                                                                                                                                              | Pull In AT Range | Activate Distance d (in) mm | Pull In AT Range | Activate Distance d (in) mm | Pull In AT Range | Activate Distance d (in) mm |                                                                   |                      | A or F                           | Tinned or untinned leads                  |
| 1 Normally Open                                                                                                                                          | 12-18            | (.531)                      | 17-23            | (.453)                      | 22-28            | (.394)                      | 02                                                                | (11,81) 300          |                                  |                                           |
| 2 High Voltage                                                                                                                                           | 13-15            | (.513)                      | 11-15            | (.433)                      | 10-10            | (.354)                      | 05                                                                | (39,37) 1,000        | C                                | 6.35mm fastons                            |
| 3 Change Over                                                                                                                                            | 15-20            | (.433)                      | 20-25            | (.354)                      | 25-30            | (.335)                      | 03                                                                | (19,69) 500          | D                                | AMP MTE 2.54mm pitch                      |
| 4 Normally Closed                                                                                                                                        | 11-10            | (.433)                      | 9-10             | (.354)                      | 8-5              | (.354)                      | 04                                                                | (29,53) 750          | E                                | JST XHP 2.5mm pitch                       |
|                                                                                                                                                          |                  |                             |                  |                             |                  |                             | 05                                                                | (39,37) 1000         |                                  |                                           |

## ORDERING INFORMATION

N.B. 57145/57150 actuator sold separately

59145/59150 - X - X - XX - X

Series 59145/59150

Switch Type

Sensitivity

Cable Length

Termination

Table 1

Table 2

Table 3

Table 4

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