## DESCRIPTION

MK18 sensors are magnetically operated Reed proximity switches in a cylindrical module, fitted with interconnect cable. The sensor should be mounted on a fixed surface with the actuating magnet on the moving surface. Introduction or removal of the magnetic field determines the closing and opening of the Reed Switch.

## FEATURES

- Flat side indicates maximum sensitivity
- Small size
- Other cables, connectors and colors available
- Three operate sensitivities available
- A choice of cable terminations and lengths are available



## APPLICATIONS

- Position and limit switch

Pneumatic or hydraulic actuator position Indication and end travel limit switch

- Door and window contacts Security system applications
- Level sensor

Use with magnetic floats for water level detection in coffee makers, washing machines or dishwashers

## DIMENSIONS

All dimensions in mm [inches]


## ORDER INFORMATION

| SERIES | MAGNETIC <br> SENSITIVITY | CABLE <br> LENGTH <br> $(\mathrm{mm})$ | TERMINATION |
| :---: | :---: | :---: | :---: |
| MK18 - | $\mathrm{X}-$ | XXX | X |
| OPTIONS | B, C, D | $100^{*}$ | $\mathrm{~W}, \mathrm{X}, \mathrm{Y}$ |
| * Other cable lengths available. |  |  |  |

Part Number Example
MK18-C-100 W
C is the magnetic sensitivity 100 is the cable length ( mm ) $\mathbf{W}$ is the termination

## MAGNETIC SENSITIVITY

| SENSITIVITY <br> CLASS | PULL IN <br> AT RANGE |
| :---: | :---: |
| B | $10-15$ |
| C | $15-20$ |
| D | $20-25$ |

## TERMINATION

For wire and termination details please consult factory.

| W | The cable cut length includes: <br> 5 mm of wire stripped and tinned |  |
| :--- | :--- | :--- |
| Y |  | The cable cut length includes: <br> individual crimped terminals |
|  |  | The cable cut length includes: <br> individual spade terminals |

## CONTACT DATA

| All data at $20^{\circ} \mathrm{C}$ | Contact Form --> | Form A |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Contact Ratings | Conditions | Min. | Typ. | Max. | Units |
| Contact Rating | Any DC combination of $V$ \& $A$ not to exceed their individual max.'s |  |  | 10 | W |
| Switching Voltage | DC or peak AC |  |  | 200 | V |
| Switching Current | DC or peak AC |  |  | 0.5 | A |
| Carry Current | DC or peak AC |  |  | 0.5 | A |
| Static Contact Resistance | $\mathrm{w} / 0.5 \mathrm{~V}$ \& 10 mA |  |  | 150 | $\mathrm{m} \Omega$ |
| Dynamic Contact Resistance | Measured w/ 0.5V \& 50mA 1.5 ms after closure |  |  | 200 | $\mathrm{m} \Omega$ |
| Insulation Resistance across Contacts | 100 Volts applied | $10^{9}$ |  |  | $\Omega$ |
| Breakdown Voltage across Contacts | Voltage applied for $60 \mathrm{sec} . \mathrm{min}$. | 230 |  |  | VDC |
| Operate Time, incl. Bounce | Measured w/ 50\% overdrive |  |  | 0.6 | ms |
| Release Time | Measured w/ no coil suppression |  |  | 0.1 | ms |
| Capacitance | @ 10kHz across contact |  | 0.2 |  | pF |
| Contact Operation* |  |  |  |  |  |
| Must Operate Condition | Steady state field | 10 |  | 25 | AT |
| Must Release Condition | Steady state field | 4 |  | 22 | AT |
| Environmental Data |  |  |  |  |  |
| Shock Resistance | $1 / 2$ sine wave duration 11 ms |  |  | 30 | g |
| Vibration Resistance | From 10-2000 Hz |  |  | 20 | g |
| Ambient Temperature | $10^{\circ} \mathrm{C} /$ minute max. allowable | -20 |  | 70 | ${ }^{\circ} \mathrm{C}$ |
| Storage Temperature | $10^{\circ} \mathrm{C} /$ minute max. allowable | -20 |  | 70 | ${ }^{\circ} \mathrm{C}$ |
| Soldering Temperature | $5 \mathrm{sec} . \mathrm{dwell}$ |  |  | 260 | ${ }^{\circ} \mathrm{C}$ |
| Please note: The indicated electrical data are maximum values and can vary downwards when using a more sensitive switch. <br> *These ranges refer to the uncut / unmodified Reed Switches described in our Reed Switch section. Consult factory if more detail is required. |  |  |  |  |  |

