

Omnidirectional Tilt & Tip-Over Switches (MI-TS Series)

Mechanical Ball & Optical Photoelectric Tilt Switches (30° / 45° Tip-Over Protection)

Product Overview

Misensor MI-TS Series tilt switches detect horizontal inclination or accidental tip-over in 360° omnidirectional axes. Available in gold-plated mechanical ball types (zero standby power) and photoelectric optical types (bounce-free, long life), with optional high-current power relay boards.

Key Features

- 360° omnidirectional tip-over detection at 30° or ...
- Mercury-free, RoHS & REACH compliant construction
- Gold-plated contact balls prevent oxidation and en...
- MI-TS-3030-45-P photoelectric optical sensor with ...
- MI-TS-3150-30QY heavy-duty 16A/250VAC direct load ...

Typical Applications

- Space heaters, patio heaters, oil radiators & elec...
- EV charging piles, street light poles & telecom ca...
- Fitness equipment, appliances, smart locks & anti-...

Technical Specifications & Model Selection

| Model           | Sensing Principle     | Trip Angle | Electrical Rating      | Mounting Type         | Operating Temp |
|-----------------|-----------------------|------------|------------------------|-----------------------|----------------|
| MI-TS-108H-45   | Gold-Plated Ball      | 45° ± 10°  | 5-24V DC, 1mA-20mA     | PCB Through-Hole      | -25°C to +85°C |
| MI-TS-1210-45   | Mechanical Tilt       | 45° ± 10°  | 12V/24V DC, 50mA       | Radial PCB Lead       | -25°C to +85°C |
| MI-TS-2529-30   | Omnidirectional Ball  | 30° ± 8°   | 24V DC / 125V AC, 0.1A | Bracket / Lead Wire   | -25°C to +85°C |
| MI-TS-3030-45-P | Photoelectric Optical | 45° ± 5°   | 5V DC Logic Output     | 3-Pin Connector / PCB | -25°C to +85°C |
| MI-TS-3150-30QY | Tilt + Power Relay    | 30° ± 5°   | 220V-250V AC, 16A Max  | Flange Screw Mount    | -20°C to +80°C |