

# 24V & 48V DC Smoke Detector with Alarm

Communication Power Solutions, Inc. (CPS) offers the **OSD223 Smoke Detector** assembled and modified for use in +24VDC & -48VDC telecommunications applications.

The OSD223 Series self-diagnostic, four-wire smoke detectors continually monitor their own sensitivity and operational status, and provide a visual trouble indication if they drift out of sensitivity range or fail internal diagnostics. This unique, ESL patented technology meets NFPA 72 field sensitivity testing requirements without the need for external meters.

Diagnostic testing is activated by applying a magnet near the detector's integral reed switch. This initiates a self-diagnostic routine and provides visual indication of sensitivity level, or if service is required.

A confirmed alarm causes the normally flashing power indicator LED to light continuously and the alarm relay to operate. A trouble indication is automatically displayed by flashing the LED every second. This meets NFPA 72 field sensitivity testing requirements. An internal 85 dB horn emits a temporal 3 when the detector alarms and a steady tone when power polarity is reversed.

## Features:

- ◆ Intelligent, self-diagnostics
- ◆ On-site maintenance alert
- ◆ Field replaceable optical chamber
- ◆ Low-profile design
- ◆ Plug-in terminal block
- ◆ Advanced false alarm immunity.
- ◆ Alarm relay for connection to system alarms.



## Specifications:

- ◆ California State Fire Marshal Approved
- ◆ MEA (New York City) Approved
- ◆ Sensitivity 3.1 - 1.0%/ft. (max.)  
3.1 + 0.50%/ft. (min)
- ◆ Operating temp. range 32°F to 120°F  
(0°C to 50°C)
- ◆ Operating humidity range 0 to 95% RH
- ◆ Minimum voltage 11.5V
- ◆ Maximum voltage 63.0V
- ◆ Typical average standby current 70μA
- ◆ Typical alarm current - CSRT 31mA

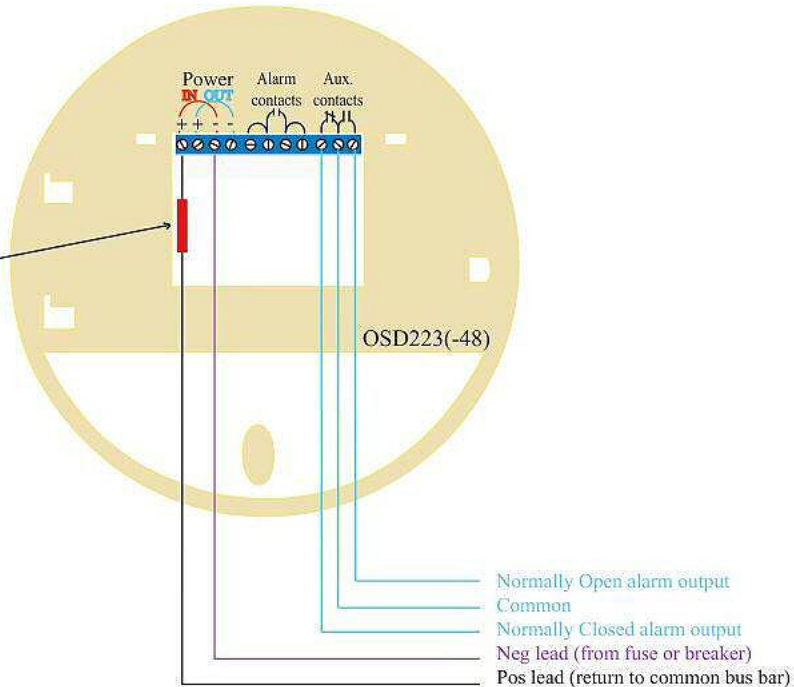
## Models:

- ◆ OSD223-24
- ◆ OSD223-48

Model OSD223(-48) Smoke  
Detector wiring for -48 volt DC  
operation.

(Single smoke detector)

Voltage adapter needed  
for -48V input



Model OSD223(-48) Smoke Detector wiring for -48 volt DC operation. (Multiple smoke detectors chained together)

