

# RE-428 Series

## Optical Beam Detector



### Product Overview

The RE-428 Series beam smoke detector is designed for smoke detection at the start of a fire. It is especially suitable for protection of indoor spaces, in which the appearance of smoke is likely during ignition of a fire, and where, due to a large space area, installation of a greater number of point smoke detectors would be necessary. The RE-428 Series beam smoke detector and the prism reflector or reflector panel are installed on opposite walls of a room.



Special adjusting screws are provided at the detector and the reflector panel for precise alignment of the detector and the reflector/s in the optical path. A special laser target viewfinder is actuated at the moment when the optical beam path is aligned.

The RE-428 Series detector consists of an infrared (IR) light transmitter and a receiver located in a single housing and an interoperating prism reflector.

Operation of the beam smoke detector is based on an analysis of air optical transparency in the space between the detector and the prism reflector or the prism reflector panel. If certain defined content of aerosol (smoke) is found in the air reducing optical transparency, then the detector, according to a pre-set sensitivity threshold will evoke an alarm mode.

Complete interruption of the radiation beam is signalled as a fault mode because even the largest smoke concentration in the air does not cause complete interruption of the detector optical beam path. If the air is clear, the detector is in a quiescent mode.

The RE-428 series beam smoke detector is equipped with a built-in automatic compensation systems for monitoring of dirt build-up on its optical system and compensation for environ impact conditions ensuring that the detector maintains constant sensitivity and fire detection ability for a long time. At a certain level of dirt build-up, the detector signals a fault mode denoting the necessity to undertake servicing and cleaning works.

## Features:

- User Friendly Installation
- In built laser light for easy alignment
- Supports 5 to100 meter range
- Option for Remote Indication
- Adjusting Screws at detector for precise alignment
- Infrared transmitter & receiver located in a single housing
- In built drift compensation for monitoring dirt build up on the optical system
- Sensitivity Threshold :- 18% ,30%, 50%

## Specification:

- Operating voltage : 24V
- Quiescent current : 20 mA
- Alarm current : 60 mA
- Current at radiation beam interruption : < 0.3 mA
- Operating distance range for RE-428FR reflector : 5 to 50 m
- Operating distance range for RE-428HR reflector : 50 to 100 m
- Sensitivity thresholds (optional) : 18%, 30%, 50%
- Power supply of laser target viewfinder (during alignment) : 9 V (6F22) battery
- Operating temperature range : -25°C to 55°C
- Relative humidity : up to 95% at 40°C
- Dimensions : 128 x 79 x 84 mm
- Mass : 0.35 kg

## NOTE:

RE-428 Series Beam detector can be used for both conventional and addressable Fire Alarm System. In case of addressable system suitable RE-717ZM (Zone Interface Module) to be incorporated for each detector.

## Ordering Information:

Model	Description
RE-428FR	Up to 50meter
RE-428HR	Up to 100meter

### India:

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