



## Visibility S8832

- 16 km (10 mile) visibility range
- Proven 42° forward scatter angle
  - Flexible output options
- Ice-resistant “look down” geometry
  - Compact, lightweight

This Visibility sensor measures atmospheric visibility (meteorological optical range) by determining the amount of light scattered by particles (smoke, dust, haze, fog, rain, & snow) in the air that passes through the sample volume. A 42° forward scatter angle is used to ensure performance over a wide range of particle sizes.

An integrated, one-piece housing design keeps all cabling internal to the sensor for ultimate protection against the elements. The sensor housing is made from anodized aluminum and the enclosures are rugged, UV-resistant fiberglass. Based on the proven experience of the NWS (National Weather Service) and the FAA (Federal Aviation Association), the sensor uses a “look down” geometry to reduce window contamination and clogging from blowing snow.

The windows use continuous duty anti-dew heaters. Thermostatically controlled external hood heaters are offered for protection in extreme environments. All power and signal lines to the sensor are protected with surge and EMI filtering to help guarantee uninterrupted service for the life of the sensor.

Installation and maintenance efforts are minimal for the power and signal connections are made through waterproof cable glands to terminal boards in the Signal Processing Box.





## Technical Specifications

**S8832**

Range:	10 m to 16 km (other ranges available)
Accuracy:	+/- 10%
Time Constant:	60 sec
Scatter Angle:	42° nominal
Source:	880 nm LED
Outputs:	0 - 10 VDC (standard) 0 - 5 VDC (optional) 4 - 20 mA current loop (optional) Control relay (2) (optional) RS-232 (optional)
Power	
AC Version:	100 - 240 VAC, 14 VA; 70 VA with hood heaters
DC Version:	10 - 36 VDC, 6 VA; 18 VA with hood heaters
Temperature:	-40°C to +60°C
Humidity:	0 - 100%
Protection:	IP66 (NEMA-4X)

### PHYSICAL

Dimensions:	889 mm (W) x 292 mm (H) x 305 mm (D) (35 in. x 11.5 in. x 12 in.)
Weight:	8 kg (18 lbs)
Mounting:	Nominal 40 mm pipe, 48.3 mm OD max (1 ½ inch IPS pipe, 1.9 inch OD max)