

# GEN<sup>2</sup>

# OTIS

## OI-6000-IR-152-X-X-O Sensor Assembly

### Explosion Proof Ambient Air Combustible Gas Detector

The Otis Instruments OI-6000 Series Ambient Air Combustible Gas Detector is a versatile assembly that uses an infrared sensor element to detect combustible gases in ambient air. Wired powered (12 to 35 VDC) with 4-20 mA analog and RS-485 Modbus outputs standard. Magnetic switches allow for non-intrusive calibration while in the field as well as full system settings and diagnostics while remaining Class I, Division 1, Groups C & D Certified.

| Gas Type | Range               | T <sub>50</sub> | T <sub>90</sub> | Warranty  |
|----------|---------------------|-----------------|-----------------|-----------|
| IR-LEL   | 0-100% (0-5 % vol.) | <10 sec.        | < 30 sec.       | 24 months |



### Product Features

- Infrared Sensor Element
- Wired Powered (3-Wire) with a 12 to 35 VDC Operating Voltage
- Operating Temperature Range of -40°C to +54°C
- Graphical LCD with LED Backlight
- 3 Push-Button Interface (ADD, MENU, SUB) with 3 Corresponding Magnetic, Non-Intrusive Switches
- Optional OI-6800 Remote Mount Control Unit
- 2 Individually Configurable Alarm Set-Points: 2 Front Panel LED Indicators (Amber and Red); Optional 2 Dry-Contact Relays
- Output Options: 4-20 mA (3-Wire) Analog, RS-485 Modbus
- Sensor Element Warranty Subject to Otis Verification
- 1-Year Limited Hardware Warranty



301 S. Texas Avenue  
Bryan, Texas 77803  
P: 979-776-7700

[sales@otisinstruments.com](mailto:sales@otisinstruments.com)

### OI-6000-IR-152-X-X-O Product Specifications

| Product Specifications                                  |   |
|---|---|
| Sensor Type   | Infrared Sensor Element   |
| Operating Voltage                                       | Wired Powered (3-Wire) 12 to 35 VDC   |
| Current Draw  | 1 Amp Maximum   |
| Protection  | Power Eletromagnetic Interference (EMI) Filter<br>4-20 mA Surge Suppression<br>RS-485 Surge Suppression   |
| Display Screen  | 102x64 Resolution Graphical LCD Screen<br>Transflective (Sunlight Readable) with White LED Backlight  |
| Interface   | 3 Push-Buttons (MENU, ADD and SUB)<br>3 Magnetic, Non-Intrusive Switches for Calibration  |
| Customizable Settings                                   | 2 Individually-Configurable Alarm LED/Relay Set-Points  |
| T <sub>amb</sub> Temperature Range                      | -40°C to +54°C  |
| Output (Digital)  | RS-485 Modbus   |
| Wired (Analog) Output                                   | 4-20 mA (3-Wire)<br>Fault Terminal<br>Optional 2 Dry-Contact Relays with Replaceable 4 Amp Fuses  |
| Remote Mount Control Unit (Optional Additional Feature) | OI-6800 Remote Control Unit <ul style="list-style-type: none"> <li>• Allows Full Operational Control of the Remotely Connected OI-6000-IR-152-X-X-O</li> <li>• Available in Explosion Proof and Non-Explosion Proof Enclosure Option</li> <li>• Ability to Include an Additional 2 Dry-Contact Relays</li> <li>• Ability to Add a GEN II 900 MHz or 2.4 GHz Radio for WireFree Signal Reporting to other Otis Monitors</li> </ul> |
| Product Dimensions                                      | 5.5 in. T x 6 in. W x 7 in. H (8 in. W x 17 in. H Max. with Attachments)  |
| Total Weight  | 5.75 lbs.   |
| Hazardous Location Certifications and Approvals         | Class I, Division 1, Groups C & D<br>Ex db ia IIB T4 Gb<br>Class I, Zone 1, AEx db ia IIB T4 Gb<br>T <sub>amb</sub> -40 C to +54 C<br>CSA 22.2 No. 152<br>ANSI/ISA 12.13.01-2013  |
| Hardware Warranty                                       | 1-Year, Limited   |
| Sensor Element Warranty                                 | 24 Months (Subject to Otis Verification of Element Condition)   |
| Part Number Formula                                     | OI-6000-IR-152-X-X-O (No Relays Installed)<br>OI-6000-IR-152-X-R-O (2 Dry-Contact Relays Installed)   |