

Xgard IR

Infrared Gas Detector

- Fail safe technology
- Low cost of ownership
- Fast response
- Highly versatile



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Xgard IR is an explosion-proof gas detector which uses a dual-wavelength infrared sensor to provide highly dependable detection of hazardous gases and vapours. Based on Crowcon's hugely successful Xgard design, Xgard IR offers the many advantages of infrared sensor technology in a rugged and versatile package including; fail safe sensor technology, immune to poisoning, no damage by over-gasing, fast response and suitable for use in inert atmospheres.

Gases and ranges

| Gas | LTEL LEL (% vol) | STEL UEL (% vol) | Ranges available |
|---|------------------|------------------|------------------|
| Butane (C ₄ H ₁₀) | 1.8 (1.4) | 9 (9.3) | 0-100% LEL |
| Butene (C ₄ H ₈) | 1.6 | - | 0-100% LEL |
| Carbon Dioxide (CO ₂) | 0.5% vol. | 1.5% vol. | 0-2 or 0-5% |
| Ethanol (C ₂ H ₆ O) | 3.3 (3.1) | 19 (19) | 0-100% LEL |
| Ethylene (C ₂ H ₄) | 2.7 (2.3) | 36 (36) | 0-100% LEL |
| Hexane (C ₆ H ₁₄) | 1.2 (1) | 7.4 (8.4) | 0-100% LEL |
| LPG | 2 | 10 | 0-100% LEL |
| Methane (CH ₄) | 5 (4.4) | 15 (17) | 0-100% LEL |
| Methanol (CH ₃ OH) | 6.0 | - | 0-100% LEL |
| Pentane (C ₅ H ₁₂) | 1.5 (1.4) | 8 (7.8) | 0-100% LEL |
| Propane (C ₃ H ₈) | 2.2 (1.7) | 10 (10.9) | 0-100% LEL |

Specification

| | | |
|-----------------------|--|--|
| Size | H156 x W166 x D111mm (6.1 x 6.5 x 4.3 inches) | |
| Weight | 1kg (2.2lbs) Aluminium; 3.1kg (6.8lbs) Stainless Steel | |
| Enclosure material | Corrosion resistant Aluminium or 316 Stainless Steel | |
| Ingress protection | IP65 | |
| Cable entries | 1 x M20 or 1/2"NPT on right side. | |
| Power | 14-32Vdc. < 4W | |
| Operating temperature | -20°C to +55°C (-4°F to 131°F) | |
| Humidity | 0 to 95% RH non-condensing | |
| Electrical output | 3-wire 4-20mA (current sink or source) | |
| Terminals | Suitable up to 2.5mm ² cable | |
| Sensor type | Infrared | |
| Repeatability | +/- 2% FSD | |
| Zero drift | +/- 2% FSD per year maximum | |
| Response time | T90 <30 secs | |
| Hazardous area zones | Zone 1 and Zone 2, Zone 21 and 22 | |
| Approvals | Baseefa04ATEX0024X Ex II 2GD Ex d IIC T6 Gb Ex tb IIIC T80°C Db (-40°C ≤ Tamb ≤ + 50°C) Ex d IIC T4 Gb Ex tb IIIC T110°C Db (-40°C ≤ Tamb ≤ + 80°C) IECEx BAS 05.0043X Ex d IIC T6 Gb Ex tb IIIC T80°C Db (-40°C ≤ Tamb ≤ + 50°C) Ex d IIC T4 Gb Ex tb IIIC T110°C Db (-40°C ≤ Tamb ≤ + 80°C) UL Class 1 Div 1, Groups B, C, D | |
| EMC compliance | EN 50270 FCC Part 15 ICES-003 | |
| Performance | EN60079-29-1 | |

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