

Searchpoint Optima Plus SPECIFICATIONS



| Searchpoint Optima Plus Specification | | |
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| Use | Searchpoint Optima Plus is an advanced, Point-Infrared, flammable gas detector certified for use in potentially explosive atmospheres | |
| Measuring Range | 0-100% LEL, wide selection of Hydrocarbon gas and vapor calibrations. Different measuring ranges and solvent calibrations available for specialist applications | |
| Signal Output | 4-20mA autosensing sink or source | |
| Inhibit | 1-3mA (Default 2mA) | |
| Warning | 0-6mA (Default 3mA *) | |
| Fault | 0mA (HART® units adjustable to 1mA) | |
| Over Range | 20-21.5mA (Default 21mA) | |
| Digital Output | Optional Multidrop Modbus RS485 (via DX100(M)), Optional HART® over 4-20mA output (HART® version 7) | |
| Material | 316 stainless steel | |
| Weight | 1.6kg | |
| Accuracy | | |
| Optima Plus (Hydrocarbon) | Baseline < ±1% FSD, 50% FSD <±2% FSD | |
| Optima Plus (Ethylene) | Baseline < ±2% FSD, 50% FSD <±3% FSD | |
| Repeatability | < ±2% FSD at 50% FSD | |
| Linearity | < 5% FSD | |
| Response Time | T50 < 3 seconds, T90 < 4 seconds (methane) | |
| Operational and Certified | -40°C to +65°C temperature range | |
| Long Term Stability (as defined in EN 60079-29-1) | Baseline | Methane 100 %LEL Range: ≤ ± 2 %FSD Ethylene 100 %LEL Range: ≤ ± 4 %FSD |
| | 50 %FSD | Methane 100 %LEL Range: ≤ ± 4 %FSD Ethylene 100 %LEL Range: ≤ ± 5 %FSD |
| Drift Over Temperature Range (-40 °C to 65 °C) | Baseline | ≤ ± 2 %FSD |
| | 50 %FSD | Methane 100 %LEL Range: ≤ ± 0.131 %FSD per °C Ethylene 100 %LEL Range: ≤ ± 0.078 %FSD per °C |
| Variation with Pressure | 0.1% (of reading) per mbar | |
| Power Supply | 18-32Vdc (24Vdc nom), < 4.5W max | |
| Environmental Protection | IP 66 / 67 | |
| Diagnostics (and Re-calibration) | Via certified Hand-held Interrogator, or optional HART® communications | |
| Safety Approvals | UL / CSA: Class 1, Div 1, groups B, C, and D (-40°C to +65°C) IECEX: Ex d IIC tb IIIC T86°C (T _{amb} -40°C to +55°C) or T96°C (T _{amb} -40°C to +65°C) IP66/67 ATEX: BAS99ATEX2259X II 2 GD Ex d IIC Gb Ex tb IIIC Db T96°C (T _{amb} -40°C to +65°C) T86°C (T _{amb} -40°C to +55°C) IP 66/67 | |
| Performance Approvals Functional Safety | CSA C22.2 152., FM ANSI/ISA-12.13.01., EN 60079-29-1 (BVS 03 ATEX G 016 X) IEC61508 Safety Integrity Level 2 | |
| EMC Compliance Software | EN 50270:2006 EN 50271:2010 | |

* Note for ATEX compliance the warning value should not be set between 3 and 5mA

Please Note:

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