

## **MINERVA®**

### 601F & 601FEx Conventional InfraRed Flame Detectors

#### Features:

- Solar Blind for false alarm free operation
- Intrinsically safe or standard versions
- Fast response to flame
- Detect a 0.1m<sup>2</sup> fire at a range of 20m
- Automatic health check feature
- Discrete ultra low profile design
- Fits a standard MX detector base or functional base
- Integral alarm LED with 360° angle of view
- Use T110 infrared test source (With separate adaptor)



# Standard or Intrinsically safe ATEX approved

The 601F and 601FEx point type flame detectors form part of the 600 series of conventional detectors. The range includes heat, optical, ionisation and carbon monoxide detection technologies and with the addition of the 601F and 601Fex now encompasses infrared flame detection.

Both the 601F and the 601FEx are full featured solar blind flame detectors for indoor use and boast a high degree of false alarm immunity. The standard unit is the 601F and it is designed for connection to a conventional zone of point type fire detectors that may include any mix of detection technologies. The 601FEx is an intrinsically safe version intended for use in hazardous atmospheres and must be connected via a suitable isolator or shunt diode safety barrier in a certified Intrinsically Safe system.

#### Ordering Information:

Stockcode	Description
516.600.006	601F Conventional Flame
	Detector
516.600.066	601FEX Conventional Flame
	Detector Intrinsically Safe
517.050.017	5B 5" Universal Base
517.050.600	5BD 5" Conventional Diode
	Continuity Base
517.050.610	MUBEx Base For
	600/800Ex
517.001.244	MTL5061 2 Channel
	Galvanic Isolator
517.001.247	DX170 MTL5/7000
	Enclosure
592.001.012	T110 IR Test Source
592.001.018	T110 Test Source Adapter



#### Mechanical

Detector Material: FR110 'BAYBLEND'
Dimensions: 108mm x 21.2mm

Weight: -601F 74g -601FEX 108g

#### Electrical

Supply Voltage: 601F 18 – 32Vdc

601FEx 18 - 28 Vdc

Quiescent current: Typical 300 micro Amp

Alarm current: 8-30 mA

#### Intrinsic Safety Rating

Maximum Voltage for Safety (Ui): 28V

Maximum Current for Safety (Ii): 93mA

Maximum Power Input (Pi): 650mW

Equivalent Inductance (Li): 0

Equivalent Capacitance (Ci): 0

#### Hazardous Area

ATEX code: II 1 G EEx ia IIC T4

#### Environmental

Operating temperature: -20°C to +70°C

Operation below 0°C is not recommended unless steps are taken to eliminate condensation and hence ice formation on the detector.

Storage Temperature: -40°C to +80°C

Relative Humidity: 90% RH continuous (non-

condensing) and up to 99% RH intermittent (non-condensing)

#### Performance

Range: 0.1m<sup>2</sup> n-heptane at 20m

0.4m<sup>2</sup> n-heptane at 50m

Field of View: 100°

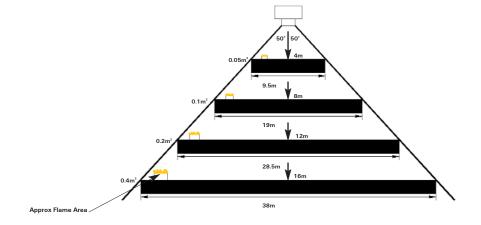
#### Mounting Base

5B: 5" Universal Base5BD: 5" Universal Diode Base

Connections: L-VE IN/OUT

L1 +VE IN L2 +VE OUT

R Remote LED Drive -VE



Note 1: If necessary the detector can be mounted securely using a suitably fabricated bracket at an angle or on a vertical surface to view the risk.

Note 2: Diagram not to scale



The right is reserved to modify or withdraw any product or service without notice

Technical Information Sheet PSF132U Issue 1