



VESDA VFT-15 detectors are multi-channel microbore air-sampling systems with an alarm sensitivity range from 0.001% to 20% obscuration/m (0.0003% to 6.10% obscuration/ft). These detectors are classified as Very Early Warning Smoke Detectors and can reliably detect fire at an early stage, and low to high concentrations of smoke. As a multi-channel system, the VFT detector is able to divide a protected space into sampling sectors, enabling the localization of a fire for faster incident response.

The detectors are configurable for a variety of environments, providing ideal fire detection solutions for cabinets, Electronic Data Processing (EDP) rooms, prisons, historic houses, custody suites, museums and art galleries.

### How it works

The VFT detector draws a combined air sample from a network of microbore flexible tubing from all sectors in the protected area, then filters and analyzes the sample in a laser detection chamber. When smoke particles are detected and the smoke level reaches a TRACE alarm threshold, the system will sequentially scan the sectors via the rotary valve to identify the sector, or sectors, with the smoke condition. Alarm states (Alert, Action, Fire 1 and Fire 2) are shown on the display and communicated to a host fire alarm control panel.

### Product Features

#### Programming and Configuration

Four independent alarm levels are available for each channel. The smoke thresholds for each of these alarms can be individually programmed per sector. VFT detectors provide a comprehensive display that includes an LED array to show the measured smoke level for the currently selected microbore tube, and an on-board programmer for local configuration.

RS232, RS485 and TCP/IP communication interfaces are provided as standard to connect to Xtralis Configuration and Fire System Management software packages: Xtralis VSC and Xtralis VSM4. RS485 interfaces also allow connections to programming devices and remote displays, and the TCP/IP Ethernet interface can provide access to an email messaging service.

#### Inputs and Outputs

VFT detectors support a number of additional modules. These provide the detector with programmable output relay interfaces and 4 to 20 mA analog outputs. A Remote Display panel can also be connected at a distance of up to 1 km away from the main VFT detector.

### Features

- 15 tube addressable air sampling
- 0.001% to 20% obscuration/m (0.0003% to 6.10% obscuration/ft)
- 4 Alarms - Alert, Action, Fire 1, Fire 2
- 15 x 50 m (15 x 164 ft) microbore sampling tube
- Reliable linear pump technology
- Ethernet TCP/IP
- RS232 and RS485 Modbus
- 5 relay outputs and expandable
- Optional relay module and 4 to 20 mA analog output modules
- Area coverage of up to 1500 m<sup>2</sup> (16 150 ft<sup>2</sup>)
- Event Log

### Listings/Approvals

- UL
- ULC
- FM
- VdS
- CE - EMC, LVD and CPD
- EN54-20
  - Class A: 0.1% obs/m (0.03% obs/ft)
  - Class B: 0.1% obs/m (0.03% obs/ft)
  - Class C: 1.0% obs/m (0.3% obs/ft)

*VFT-15 detectors have one sampling hole per microbore tube.*

Regional approvals listings and regulatory compliance vary between VESDA models.

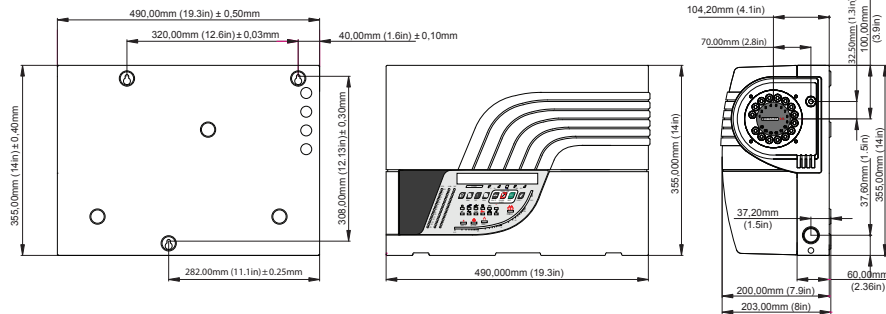
# VESDA VFT

VFT-15

## Aspiration and Flow Sensing

The aspirator is a linear vacuum pump, which provides superior detection times over long tube lengths and reliable detection in high air flow environments. Airflow in each tube is monitored by a differential pressure sensor, with airflow faults indicated on the display and to monitoring equipment.

## Dimensions



## Ordering Information

24 VDC, Display/Programmer, TCP/IP, 15 inlets, Class A/B/C, 0.001 to 20% obs/m (0.0003 to 6.1% obs/ft)

VFT-15

24 VDC, Display/Programmer, TCP/IP, 15 inlets, Class C, 1 to 20% obs/m (0.3 to 6.1% obs/ft)<sup>1</sup>

VFT-15-C

4-Channel Relay Module<sup>2</sup>

01-E606-01

8-Channel 4-20 mA Re-Transmission Module<sup>2</sup>

01-E624-00

VFT-15 Remote Display<sup>2</sup>

01-V921-15

### Notes:

1. The VFT-15-C is not available in all regions. Please consult your nearest Xtralis office before placing an order.
2. Please contact your nearest Xtralis office for approvals status.

## Specifications

### Supply Voltage:

Nominal 24 VDC

### Supply Current at 24 VDC:

|         | Quiescent | Scanning |
|---------|-----------|----------|
| Power   | 31.2 W    | 32.0 W   |
| Current | 1.30 A    | 1.33 A   |

### Aspirator:

Linear vacuum pump

### Dimensions (WHD):

490 mm x 355 mm x 200 mm (19.3 in. x 14.0 in. x 7.9 in.)

### Operating Conditions: \*

Tested to:

-10 to 55 °C (14 to 131 °F)

Recommended Detector Ambient:

0 to 39 °C (32 to 103 °F)

Sampled Air:

-20 to 60 °C (4 to 140 °F)

Humidity:

10 to 95% RH (non-condensing)

*Please consult your Xtralis office for operation outside these parameters or where sampled air is continually above 0.05% obs/m (0.015% obs/ft) under normal operating conditions.*

### Microbore Tube Size:

Outer Diameter: 6 mm (0.24 in.)

Inner Diameter: 4 mm (0.16 in.)

### Microbore Tube Length:

15 x 50m (15 x 164 ft)

Pipe Length: 50 m (164 ft)

### Alarm Sensitivity Range:

0.001 to 20 % obs/m

(0.0003 to 6.10 % obs/ft)

### Alarm Settings:

Alarm levels: Alert, Action, Fire 1 and Fire 2

*Individually programmable for each level*

### IP Rating:

IP30

### Cable Access:

7 x 25mm (1") cable entries

### Cable Termination:

Screw Terminal blocks 0.2–2.5 mm<sup>2</sup> (30–12 AWG)

### Filtration:

Field exchangeable dual stage filter

### Flow Monitoring:

Differential pressure sensor

### Relay Outputs:

4 alarm relays, 1 fault relay

Rated 2 A @ 30 VDC NO/NC Contacts

### Communication:

Modbus over RS232, RS485 and

TCP/IP

### Event Log:

Up to 20,000 events stored

\* Product UL listed for use from 0 °C to 38 °C (32 °F to 100 °F)

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