



**The FD Series Single UV flame detector reacts to ultraviolet radiation in hydrocarbon and metal-based fires, delivering accurate and reliable fire monitoring**

# FD Series Single UV



## Reliable Operation

- Does not react to incandescent or fluorescent lighting, heaters or sunlight
- False alarms are virtually eliminated
- Wide coverage per detector
- 120° field of view

## Cost Effective

- Reduces maintenance tasks

## Easy to Use

- Simplified installation and alignment
- Flexible installation
- User programmable sensitivity and time delay settings
- Adjustable, no-tool swivel mount

## Durable Housing

- Tolerant to high temperatures and humidity levels

## Versatile Design

- Connect indoors or out, directly or up to 2000 feet away
- Multiple output configurations available
- Suitable for hazardous locations
- Adapt to different locations, conditions and activities
- Connect to a wide variety of equipment

**Considerably reduce false alarms with the FD Series Single UV flame detector. A precisely tuned spectrum of radiation must be recognized and confirmed by the advanced UV sensor to initiate a fire condition, yet it is immune to incandescent or fluorescent lighting, heaters or sunlight.**



The FD Series Single UV (ultra-violet) flame detector delivers high performance detection designed to meet the strict industry performance requirements. The FD Series Single UV is designed for simple installation and lower maintenance costs while delivering superior safety performance.

Enclosed in a rugged, explosion-proof housing, the FD Series Single UV uses the latest in microprocessor and UV sensor technology. Versatile configurations and user-defined settings make the FD Series Single UV flame detector ideal for a wide variety of applications. Built-in testing routines ensure continuous, round the clock protection for facilities.

# General Specifications



## Standard Specifications for "S" Series Ultraviolet Flame Detection

<b>Operating Voltage Range</b>	10 to 32 V <sub>dc</sub>
<b>Power Consumption (at 24 V<sub>dc</sub>)</b>	A Version: Nominal 32 mA / 0.768 W   Maximum 64 mA / 1.54W AR Version: Nominal 51 mA / 1.23 W   Maximum 82 mA / 1.97W
<b>Temperature Range</b>	Certified: -40°C to +75°C (-40°F to +167°F) Operational: -50°C to +75°C (-58°F to +167°F)
<b>Field View</b>	120° horizontal / 95° vertical
<b>Spectral Range</b>	UV Radiation 185 to 260 nanometres (1850 to 2600 angstroms)
<b>Time Delay</b>	DIP switch selectable to 3, 4, 5, 7 seconds
<b>Sensitivity Settings</b>	DIP switch selectable to 8, 16, 24 or 32 counts per second
<b>Typical Response Time</b>	<4 seconds depending on fuel source, fire size and distance
<b>Enclosure Material</b>	Yellow powdercoat with clear anodizing, copper-free aluminum (optional stainless steel), factory sealed housing
<b>Humidity Range</b>	0 to 95% RH, non-condensing
<b>Weight (with swivel)</b>	2.1 kg / 4.5 lb. Stainless steel option: 3.4 kg / 7.5 lb.
<b>Outputs</b>	A Version: 0 to 20 mA - Into a maximum loop impedance of 800 Ohms at 32 V <sub>dc</sub> or 150 Ohms at 11.0 V <sub>dc</sub> Non-isolated loop supply AR Version: Form C contacts rated 1 Amp at 30 V <sub>dc</sub> , 0.5 Amp at 125 V <sub>ac</sub> Selectable energized/de-energized, latching/non-latching fire relay Fault relay factory set as energized/non-latching, cannot be modified
<b>Certifications</b>	CSA - Class I, Division 1, Groups B, C and D - Temperature code T4 - CANADA: Class 1, Zone 1, Ex d IIB + H2 T4 ANSI/UL - Class I, Division 1, Groups B, C and D - Temperature code T4 - UNITED STATES: Class 1, Zone 1, AEx d IIB + H2 T5 NEMA Type 4X • IP67 - Enclosure ratings
<b>Warranty</b>	3 years for electronics 2 years for sensors

## Standard Specifications for "U" Series Ultraviolet Flame Detection (Hydrogen)

<b>Operating Voltage Range</b>	10.5 to 32 V <sub>dc</sub>
<b>Power Consumption (at 24 V<sub>dc</sub>)</b>	A Version: Nominal 80 mA / 1.92 W   Maximum 100 mA / 2.4W AR Version: Nominal 100 mA / 2.4 W   Maximum 120 mA / 2.9W
<b>Temperature Range</b>	Certified: -40°C to +85°C (-40°F to +185°F) Operational: -55°C to +125°C (-65°F to +257°F)
<b>Field View</b>	120° horizontal / 95° vertical
<b>Spectral Range</b>	UV Radiation 185 to 260 nanometres (1850 to 2600 angstroms)
<b>Time Delay</b>	DIP switch selectable to 3, 4, 5, 7 seconds
<b>Sensitivity Settings</b>	DIP switch selectable to 8, 16, 24 or 32 counts per second
<b>Typical Response Time</b>	<4 seconds depending on fuel source, fire size and distance
<b>Enclosure Material</b>	Yellow powdercoat with clear anodizing, copper-free aluminum (optional stainless steel), factory sealed housing
<b>Humidity Range</b>	0 to 95% RH, non-condensing
<b>Weight (with swivel)</b>	2.1 kg / 4.5 lb. Stainless steel option: 3.4 kg / 7.5 lb.
<b>Outputs</b>	A Version: 0 to 20 mA - Into a maximum loop impedance of 800 Ohms at 32 V <sub>dc</sub> or 150 Ohms at 11.0 V <sub>dc</sub> Non-isolated loop supply AR Version: Form C contacts rated 1 Amp at 30 V <sub>dc</sub> , 0.5 Amp at 125 V <sub>ac</sub> Selectable energized/de-energized, latching/non-latching Fire relay Fault relay factory set as energized/non-latching, cannot be modified
<b>Certifications</b>	CSA - Class I, Division 1, Groups B, C and D - Temperature code T4 - CANADA: Class 1, Zone 1, Ex d IIB + H2 T4 ANSI/UL - Class I, Division 1, Groups B, C and D - Temperature code T4 - UNITED STATES: Class 1, Zone 1, AEx d IIB + H2 T5 NEMA Type 4X • IP67 - Enclosure ratings
<b>Warranty</b>	3 years for electronics 2 years for sensors



# Honeywell Analytics Lines of Business



## Commercial

Vulcain-brand gas detection from stand-alone units to fully engineered, multi-point systems, all offering cost-effective regulatory compliance

- » Applications: parking structures, chillers, mechanical rooms, office towers, commercial buildings, shopping centers, swimming pools, golf courses, schools and universities, laboratories

## Industrial

Renowned Sieger and Manning gas detection systems with advanced electrochemical, infrared and open path sensing technologies

- » Applications: oil and gas, cold storage, water/wastewater treatment, chemicals, engine rooms, plastics and fibers, agriculture, printing and light industrial

## Portables

Single or multi-gas Lumidor and other premium detectors with compact, lightweight designs ranging from simple alarm only units to advanced, fully configurable and serviceable instruments

- » Applications: underground utility and electricity ducts, boiler rooms, post-fire sites, sewers, industrial plants, industrial hygiene, first responder teams, remote fleets



### Find out more

[www.honeywellanalytics.com](http://www.honeywellanalytics.com)

### Contact Honeywell Analytics:

#### Americas

Honeywell Analytics Inc.  
405 Barclay Blvd.  
Lincolnshire, IL 60069  
USA  
Tel: +1 847 955 8200  
Toll free: +1 800 538 0363  
Fax: +1 847 955 8210  
[detectgas@honeywell.com](mailto:detectgas@honeywell.com)

#### Technical Services

[ha.us.service@honeywell.com](mailto:ha.us.service@honeywell.com)

[www.honeywell.com](http://www.honeywell.com)

## High Tech/Government

A complete portfolio of gas and chemical detection instrumentation including infrared spectroscopy (MST) with no cross interference, to Chemcassette paper-based solutions (MDA Scientific) offering detection down to parts per billion

- » Applications: semiconductor manufacturing and nanotechnology, aerospace propulsion and safety, specialty chemicals industry, research laboratories, emergency response

#### Europe, Middle East, Africa

Life Safety Distribution AG  
Wilstrasse 11-U31  
CH-8610 Uster  
Switzerland  
Tel: +41 (0)44 943 4300  
Fax: +41 (0)44 943 4398  
[gasdetection@honeywell.com](mailto:gasdetection@honeywell.com)

## Technical Services

24/7 global network includes post-sales service and Systems Integration teams

- » Emergency call out, service contracts, on/off-site repair, training and commissioning
- » Complete range of spares, consumables and accessories

#### Asia Pacific

Honeywell Analytics Asia Pacific  
#508, Kolon Science Valley (I)  
187-10 Guro-Dong, Guro-Gu  
Seoul, 152-050  
Korea  
Tel: +82 (0)2 2025 0307  
Fax: +82 (0)2 2025 0329  
[analytics.ap@honeywell.com](mailto:analytics.ap@honeywell.com)

#### Please Note:

While every effort has been made to ensure accuracy in this publication, no responsibility can be accepted for errors or omissions. Data may change, as well as legislation, and you are strongly advised to obtain copies of the most recently issued regulations, standards, and guidelines. This publication is not intended to form the basis of a contract.