D355PL(A)/DNRW InnovairFlex
Intelligent Non-Relay Photoelectric
Duct Smoke Detector

General

The Fire•Lite InnovairFlex® D355PL(A) intelligent non-relay photoelectric duct smoke detector and DNRW watertight non-relay photoelectric duct smoke detector feature a pivoting housing that fits both square and rectangular footprints capable of mounting to a round or rectangular duct.

DNRW duct smoke detector, with its NEMA-4 rating, is listed as a watertight, UV resistant enclosure providing protection against falling dirt, rain, and windblown dust, splashing and hose directed water, allowing operators to use the detector in the most extreme environments.

These units sense smoke in the most challenging conditions, operating in airflow speeds of 100 to 4,000 feet per minute (0.5 to 20.32 m/s), temperatures of -4°F to 158°F (-20°C to 70°C), and a humidity range of 0 to 95 percent (non-condensing.)

An improved cover design isolates the sensor head, which allows for ease of maintenance. A cover tamper feature indicates a trouble signal for a removed or improperly installed sensor cover. The Fire•Lite InnovairFlex housing provides a 3/4-inch conduit knockout and ample space to facilitate easy wiring and mounting of a relay module.

The Fire•Lite InnovairFlex duct smoke detector can be customized to meet local codes and specifications without additional wiring. The new InnovairFlex product line is compatible with all previous Innovair models, including remote test accessories.

Features

• Photoelectric, integrated low-flow technology.
• Air velocity rating from 100 ft/min to 4,000 ft/min (0.5 m/s to 20.32 m/s).
• Versatile mounting options: square or rectangular configuration.
• Broad ranges for operating temperature (-4°F to 158°F, -20°C to 70°C) and humidity (0% to 95% non-condensing).
• Patented sampling tube installs from front or back of the detector with no tools required.
• Cover tamper signal.
• Increased wiring space with a newly added 3/4" conduit knockout.
• Available space within housing to accommodate mounting of a relay module.
• Easily accessible code wheels on sensor head (sold separately).
• Clear cover for convenient visual inspection.
• Remote testing capability.
• Requires com line power only.
• Accommodates the installation of an addressable relay module, sold separately, (CRF-300) for applications requiring a Form-C relay.

Specifications

Size: (Rectangle) 14.38 in (37 cm) Length; 5 in (12.7 cm) Width, 2.5 in (6.6 cm) Depth.
Size: (Square) 7.75 in (19.7 cm) Length; 9 in (22.9 cm) Width; 2.5 in (6.35 cm) Depth.
Weight: 1.6 lb (0.73 kg).
Operating Temperature Range: -4°F to 158°F (-20°C to 70°C).
Storage Temperature Range: -22°F to 158°F (-30°C to 70°C).
Operating Humidity Range: 0% to 95% relative humidity (non-condensing).
Air Duct Velocity: 100 to 4,000 ft/min (0.5 to 20.32 m/s).

Accessories

Fire•Lite provides system flexibility with a variety of accessories, including two remote test stations and different means of visible and audible system annunciation. As with our duct smoke detectors, all duct smoke detectors accessories are UL listed.

D355PLs and DNRWs with a date code of 0013 or higher do not require external 24VDC for remote test applications when used with a remote-test-capable detector.

ACCESSORY CURRENT LOADS AT 24 VDC

<table>
<thead>
<tr>
<th>Device</th>
<th>Standby</th>
<th>Alarm</th>
</tr>
</thead>
<tbody>
<tr>
<td>RA100Z</td>
<td>0mA</td>
<td>12 mA Max</td>
</tr>
<tr>
<td>RTS151/RTS151KEY</td>
<td>0mA</td>
<td>12mA Max</td>
</tr>
</tbody>
</table>

Agency Listings and Approvals

Consult product manual for lists of compatible UL-Listed devices. In some cases, certain modules may not be listed by certain approval agencies, or listing may be in process. Consult factory for latest listing status.

• UL: S1059.
• ULC: S1059
• CSFM: 3242-1653:0209.
• FM approved.

**Product Line Information**

**D355PL:** Intelligent non-relay photoelectric low flow smoke detector housing. Includes SD355R Detector.

**DNRW:** Watertight intelligent non-relay photoelectric low flow duct smoke detector housing. Does not include detector head.

**SD355R(A):** Remote test capable addressable low-profile photoelectric smoke detector.

**SD355(A):** Addressable low-profile photoelectric smoke detector.

**DCOIL:** Remote test coil. Required for older DNR(W) duct detector housing.

**DST1:** Metal sampling tube duct width up to 1 ft (0.3m).

**DST1.5:** Metal sampling tube duct widths up to 1 ft to 2 ft (0.3 to 0.6 m).

**DST3:** Metal sampling tube duct widths up to 2 ft to 4 ft (0.6 to 1.2 m).

**DST5:** Metal sampling tube duct widths up to 4 ft to 8 ft (1.2 to 2.4 m).

**DST10:** Metal sampling tube duct widths up to 8 ft to 12 ft (2.4 to 3.7 m).

**DH400OE-1:** Weatherproof enclosure.

**ETX:** Metal exhaust tube duct, width 1 ft (0.3 m).

**M02-04-00:** Test magnet.

**P48-21-00:** End cap for metal sampling tubes.

**RA100Z:** Remote annunciator alarm LED.

**RTS151:** Remote test station.

**RTS151KEY:** Remote test station with key lock.

**Important Note**

- DNRW duct detector housings with a date code of 0013 or higher do not require a DCOIL or auxiliary 24 VDC for remote test applications when used with a remote test capable detector.
- DNRW duct detector housings with a date code of 0012 or earlier require a DCOIL and auxiliary 24 VDC power for remote test applications.