



TELEDYNE GAS AND FLAME DETECTION Everywhereyoulook™



TLU Wireless (IR)
Hand-held Terminal

DF-TV7-T

Multi-spectrum IR Flame Detector

Presentation

The MultiFlame DF-TV7-T is a multi-spectrum infrared flame detector using three wavelengths. The MultiFlame DF-TV7-T responds to hydrocarbon fires and is the right choice for operation in dirty environments or for detection of smoky fires.

The MultiFlame DF-TV7-T is designed to respond to unwanted hydrocarbon fires, whilst maintaining a high degree of false alarm immunity.

The device offers a wide range of output options, as standard and is certified for use in SIL 3 applications. The unit may be interfaced directly with a wide range of fire panels, controllers and PLC's etc.

The unit is fully configurable using a wireless hand-held terminal (TLU600) or optionally via HART (TM) giving true flexibility to the installer. Time delays, sensitivity and output configuration are all set up via the TLU; a hazardous area approved hand-held unit. Wireless testing of the optical and output circuits are also possible using the TLU for a guaranteed ease of maintenance.

Characteristics

- Continuous auto-check of optical lens
- Relays, 4-20mA, 0-22mA, Hart outputs
- Long range up to 80m, 260 ft deep
- Wide field of view 120°



DF-TV7-T

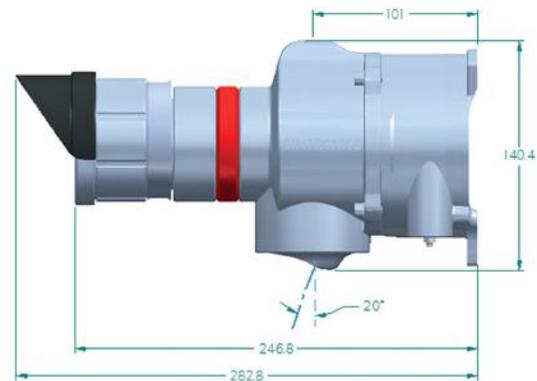
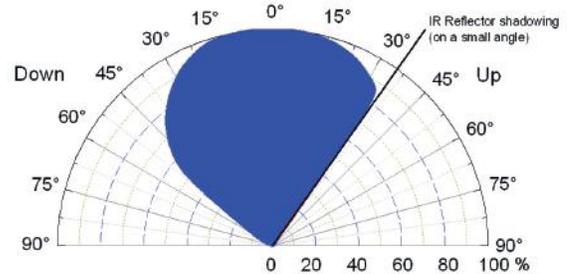
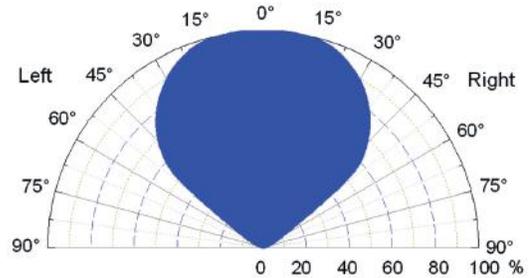
Multi-spectrum IR Flame Detector

Technical data

General	
Technology	Technology Multi-spectrum Infrared, 3IR
Fire Types	Hydrocarbon fires
Range, n-heptane	80m (260ft) 0.3x0.3m (1 sq ft)
Range, gasoline	65m (210ft) 0.3x0.3m (1 sq ft)
Field of view	Maximum horizontal angle 1 20° Horizontal angle @ 50% 1 04° Vertical angle @ 50% 82°
Response time	adjustable from 3 to 20 seconds (typical 6s.)
Warranty	3 years, back to factory
Output signal	
Standard	4-20mA or 0-22mA (configurable by the user) max. load impedance 700M (Std.) HART Protocol 7th edition (option) Lonworks for Syntel (option)
Alarms	2 x configurable Relays max 1 A / 30Vcc
Visual	Normal Operating, alarm, fault
Electrical	
Power supply	24 Vdc, range (18 - 28 Vdc)
Power consumption	2W normal; 4W during test
Connection	0.3 mm2 (22 AWG) - 1.5 mm2 (16 AWG) Shielded cable recommended
Environmental	
Storage:	-40°C to +70°C (-40°F to 158°F)
Operation	-40°C to +65°C (-40°F to 149°F)
Option	Sunshade, max. temp. 85°C (185°F)
Humidity	99% RH (non-condensing)
Ingress	IP66
RFI /EMI	Complies with EN50130-4
Explosion proof housing	
TLU600	316 L STAINLESS STEEL
Weight	5KG (10 LBS)
Dimensions	246.8 x 140.4 x 115 mm (L, H, W) 9.8 x 5.5 x 4.5 inches

Approvals

SIL	SIL3 without redundancy according to IEC 61508-1 to 7
ATEX	II 2 G Ex d IIC T6 Gb (de -40°C à +65°C)
IECEX	IEC 60079-0 / IEC 60079-1
CE DPC	According to EN 54-10:2002 + A1:200



Accessories

TLU600	Infrared remote control unit, ATEX certified : II 1 G Ex ia IIC T4
LT15	Test lamp, ATEX certified : II 2 G Ex d IIC T6-T5
AS048-X	SS316 swivel bracket (with 2" or 2.5" pipe mounting)
AS056-450	Sun shade
AS040	Long type visor (vertical upper angle reduction)
AS041	Long type visor (horizontal and vertical angle reduction)
AS045	Air shield
AS215	Tag plate