SINGLE UV FLAME DETECTOR
Ultra-Violet Detection Technology

ref.: Tucano: EXBCR0012

- **Manual and automatic testing of optical surfaces—monitors internal electronics**

- **Compact and lightweight for ease of installation**

- **Fully adjustable swivel mount is included**

- **3 Year Electronics and 2 Year Sensor Warranty**

- **120 Degree Field of View!**

- **User programmable sensitivity and time delay settings minimizes false alarm events**

- **Operating Range of -50°C to +75°C**

- **CSA, FM, ANSI/UL, ATEX, GOST-R and INMETRO Certified**

Net Saf Single UV (Ultra-violet) flame detector delivers high performance detection designed to meet the strict industry performance requirements. A precisely tuned spectrum of radiation must be recognized and confirmed by our advanced UV sensor to initiate a fire condition, yet it is immune to incandescent or fluorescent lighting, heaters or sunlight — so false alarms are considerably reduced. The Single UV is designed for simple installation and lower maintenance costs while delivering superior safety performance.

Enclosed in a rugged, explosion-proof housing, the Single UV uses the latest in modular microprocessor and UV sensor technology — delivering accurate and reliable monitoring for hydrocarbon and metal-based fires. It's capable of stand-alone operation or can be connected to a variety of control devices to create a dependable fire monitoring system. The user can define sensitivity and time delay settings and the built-in testing routines ensure continous operation.

The Single UV has a Field of View of up to 120 degrees and is available with analog or analog/relay output configurations for 12 or 24 VDC systems — just let us know your requirements!

Net Saf has engineered a superior and affordable, UV flame detector that is simple to operate and maintain while delivering all the security and performance required for high-risk, industrial installations!

SINGLE UV FLAME DETECTOR
"S" Series Ultra-violet Flame Detection

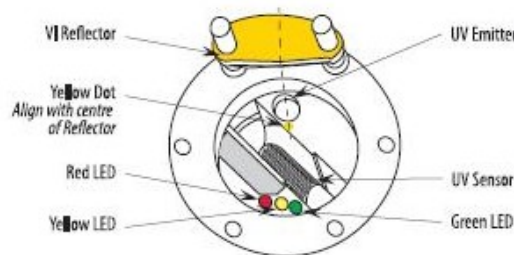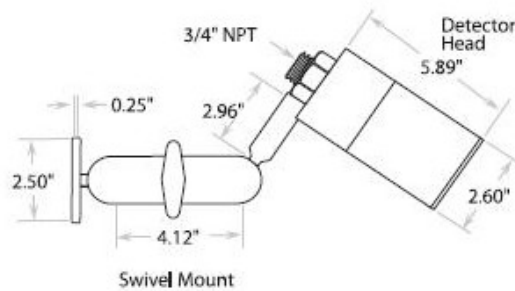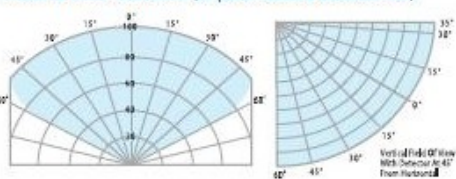| SPECIFICATIONS	"A" VERSION	"AR" VERSION
Operating Voltage Range	10 to 32 Vdc	
Power Consumption (at 24 Vdc)	Nominal 32 mA / 0.768 W | Maximum 64 mA / 1.54W	Nominal 51 mA / 1.23 W | Maximum 82 mA / 1.97W
Operating Temperature Range	Certified -40°C to +75°C (-40°F to +167°F) / Operational -50°C to +75°C (-58°F to +167°F)	
Field of View	120 degrees horizontal / 95 degrees vertical	
Spectral Range	UV Radiation 185 to 260 nanometres (1850 to 2600 angstroms)	
Time Delay	DIP switch selectable to 0, 3, 5, 7 seconds	
Sensitivity Settings	DIP switch selectable to 8, 16, 24 or 32 counts per second	
Typical Response Time	<4 seconds depending on fuel source, fire size and distance	
Enclosure Material	Red powdercoat with clear anodizing, copper-free aluminum (optional stainless steel), factory sealed housing	
Humidity Range	0 to 95% RH, non-condensing	
Weight (with swivel)	2.1 Kg/4.5 lb (Stainless Steel option 3.4 Kg/7.5 lb)	
Outputs	0 to 20 mA - Into a maximum loop impedance of 800 Ohms at 32 V dc or 150 Ohms at 11.0 V dc. Non-isolated loop supply	Form C contacts rated 1 Amp at 30 Vdc, 0.5 Amp at 125 Vac. Selectable energized/de-energized, latching/non-latching Fire relay. Fault relay factory set as energized/non-latching, cannot be modified
Certifications	CSA - Class I, Division 1, Groups B, C and D - Temperature code T5 - CANADA: Class 1, Zone 1, Ex d IIB + H2 T5 ANSI/UL - Class I, Division 1, Groups B, C and D - Temperature code T5 - UNITED STATES: Class 1, Zone 1, AEx d IIB + H2T5 ATEX - EEx d II B+H2 T5 GOST-R - 1Ex d II BT5/H2 INMETRO - BR-Ex d II B+H2 T5 Factory Mutual (FM) 3260 Performance Certification NEMA Type 4X • IP66 - Enclosure ratings	
Warranty	3 Years Electronics / 2 Years Sensors	

PERFORMANCE

Summary of Distances

Fuel	Fire Size	Typical Response
n-heptane	1' x 1'	< 9sec @ 150 ft.
gasoline	1' x 1'	< 3sec @ 120 ft.
methane	36" plume	< 4sec @ 120 ft.

Immunity False Alarm Stimuli

Stimuli	Immunity Range
Direct/indirect sunlight	total
1500W heater	10 ft
halogen, incandescent light	3 ft
florescent light	10 ft

Field of View - Methane (32° plume - distances indicated in feet)

Swivel Mount

ORDERING INFORMATION

UVS-A_____ 0 to 20 mA Analog output

UVS-AR_____ 0 to 20 mA Analog output with a Fire and Fault alarm relay (includes junction box)

OPTIONS -X (ATEX), H- (Heated Optics), -SS (Stainless Steel)

NOTE: Specify flammable source when ordering

ACCESSORIES

JB-MPS-A – Junction Box (NEMA 4, IP67) c/w connector board (MVI switch) (Stainless Steel model available - JB-MPS-SS)

JB-MPNS-A – Junction Box (NEMA 4, IP67) c/w connector board (No MVI switch) (Stainless Steel model available - JB-MPNS-SS)

TL-UV/IR-KIT – Test Lamp Kit

LAT-120 – Laser Alignment Tool.

AIR-SHIELD – Air Shield (device protects lens from dirt build-up)

SSK-4 – Sunshade Kit

Distributed by:

ISO 9001:2000

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