# **AUTROFLAME IR FLAME DETECTOR BG-201**

Interactive fire detection systems Product Datasheet

#### **Features**

- Interactive
- · Different sensitivity settings possible
- Short circuit isolator in each detector
- Comprises a built-in alarm indicator (LED)
- Automatic addressing
- Solar resistant
- · Very fast fire detection
- Not blinded by oil film on window
- High degree of immunity to false alarm sources
- EN54-10, EN54-17 approved
- Designed to meet the requirement of the major maritime classification societies



BG-201 is a point flame detector for detection of fires involving combustion of carbonaceous materials.

The detector has a high IP rating making it suitable for the harshest environments.

Performance class can be configured by the AutroSafe/Autroprime system according to table 1.

The advanced signal processing and DYFI+ intelligence ensure that the detector has a high immunity to any nuisance alarm source combined with fast detection of real fires. This makes the BG-201 detector the obvious choice for demanding applications such as a ship's engine room.

#### Note:

Accumulation of water, ice, snow or other pollution on the sensor window may affect the sensitivity of the detector. In order to maintain the detection range (table 1) the glass must be cleaned regularly.

### **Principle**

Two infrared sensors detect the infrared spectrum from a fire. The sensors evaluate different parts of the infrared spectrum using this information to verify that the signals correspond to the characteristics of a real flame.





Technical specifications		
Weight	210 g	
Materials	Polycarbonate, sapphire glass	
Colour	Transparent / light grey	
Sensitivity	Ref. Table 1	
Field of view	Horizontal=+/-45°, Vertical=+30°/ -45° (see the Field of view diagram below for additional EN 54-10 information)	
Voltage	Supplied from detector loop	
Current consumption: Stand by Current consumption: Alarm LED on	90 μA 2,1 mA	
CPD certificate	0832-CPD-1999	
Degree of protection	IP66 and 67	
Working temperature	-40 to +70°C	
Storage temperature	-50 to +70°C	
Humidity	0-96 % rh, can withstand 100% condensing humidity for short periods of time	
Maintenance	Cleaning of window	
Service	Replace if faulty	
Cable size	Maximum cable 2,5 mm2 / AWG14	
Approvals	See website	

Table 1 - Performance classes (EN 54/10)		
Performance class	Range	
Class 1	Up to 25 m	
Class 2*	Up to 17 m	
Class 3	Up to 12 m	

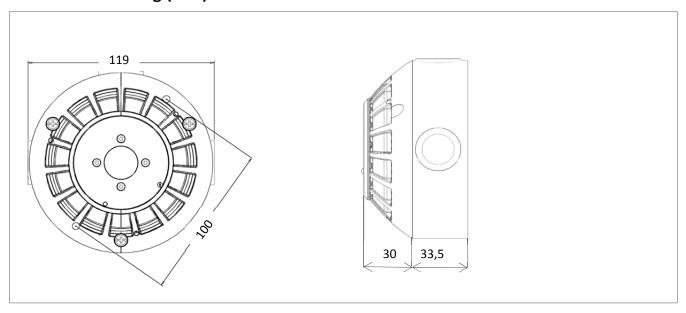
<sup>\*</sup>In Legacy mode only class 2 is available

Table 2 – Mode selection	
Mode selection, cutting of jumper J4 on PCB	J4
STANDARD: AutroSafe / Autroprime mode	<b>+</b>
LEGACY: FDI compatible mode	

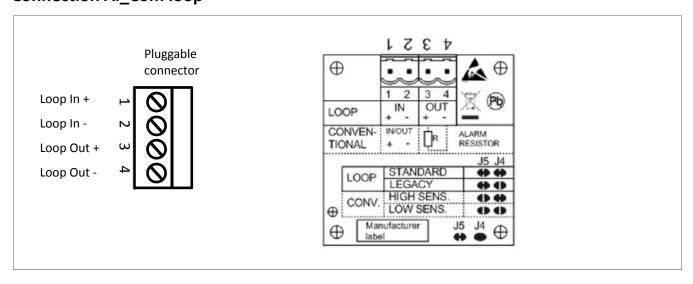
Autronica Fire and Security AS Tel.: +47 90 90 55 00 E-mail: info@autronicafire.no www.autronicafire.com Page 2

Product Name	Part number	Description
BG-201	116-BG-201	AutroFlame IR flame detector
BG-201F	116-KITD-BG-201F	Facade security BG-201

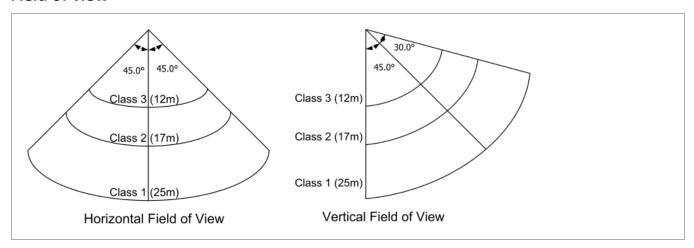
# **Dimension Drawing (mm)**



## Connection Al\_Com loop



### Field of view



To comply with the directional dependence requirements for EN 54-10:2002 an angle of  $\pm 30^{\circ}$  from  $0^{\circ}$  ( $0^{\circ}$  = Orientation of detector in same axes as flame source) should not be exceeded, based on lab testing at a distance of approximately 5.0 ft (1.5 m).