

# MHG 585

## Flame Detector

The MHG 585 Flame Detector is intended for the automatic fire alarm signalling as a flame detector in the Fire Detection and Fire Alarm System LITES.



To be used at locations of anticipated flame occurrence. It works on the principle of detection of scattered infrared radiation of a flaming fire.

The MHG 585 Detector is meant for cooperation with control panels MHU 106 (by the help of the JSM-5 loop module), MHU 108 and MHU 113. Through the use of the Addressing Unit MHY 409 it is also possible to connect the detector to the addressable control panel MHU 109 and to the analogue control panels MHU 110/111, and via Addressing Unit MHY 419 also to control panels MHU 115 and MHU 116/117. To the line of a fire loop the detector is to connect by means of the MHY 703 Mounting Base, eventually in not potentially explosive atmosphere by the help of the MHY 713 Mounting Base. As parallel signalling the Signal Indicators MHS 409, MHS 408 (MHS 407, MHS 405) can be used. The detector can also work autonomously when connected to Evaluating Unit MHY 441.

The detector may work:

- in zone 1 and 2 of a space with gas burst hazard according to ČSN EN 60079-14
- in zone 22 of a combustible dust space according to ČSN EN 50281-1-2
- in space V1, V2, V3 with fire or explosion of explosives hazard according to ČSN 33 2340

The detector is produced in a voltage (MHG 585.078) and a current (MHG 585.081) version.

For its use in the Electric Fire Detection and Alarm System the detector is liable to the compliance examination according to law No. 22/1997 Sb., in wording law No. 71/2000 Sb. and the relevant orders of the government. For the use in potentially explosive atmosphere the detectors are liable to the homologation of the FTZÚ Ostrava - Radvanice A0 210. The detectors comply with the standard specifications EN 54-10.

### Technical specifications

Supply voltage	16 ÷ 24 Vss
Rated supply voltage	21,5 Vss
Maximum permissible voltage	30 Vss
Steady state current	max. 200 µA
Current at fire alarm MHG 585.078 MHG 585.081	max. 100 mA restricted by the control panel 20 <sup>+1</sup> · <sub>5</sub> mA
Voltage at fire alarm MHG 585.078	6 ÷ 8 V at 10 mA
Optical signalling in the detector	a red LED
Parallel signalling	type LITES
Flame sensitivity according to the methodics EN 54-10	2/17m class
Vision angle	90° (50° according to EN 54-10)
Detector sensitivity wavelength	4,3 µm
Flaming sensitivity frequency	2 ÷ 10 Hz
Construction according to ČSN EN 50014	Ex e II 85°C (T6)
Testing procedure	by the Test Bar MHY 533

Protection according to ČSN EN 60529	IP 65 (with the MHY 703 Mounting Base) IP 54 (with the MHY 713 Mounting Base)
Radioscreening degree according to ČSN EN 55 022	B-class equipment
Dimensions	∅147 × 45 mm
Weight	c. 650 g
Safety requirements	Product intended for a plant with safety arrangement in terms of ČSN EN 60950

### Working conditions

The MHG 585 Flame Detector is intended for the interior of objects without occurrence of aggressive substances, and for places where its protection and climatic immunity conform, and where sudden temperature changes leading to dew and ice accretion don't occur.	
Working temperature range	-25°C ÷ +70°C
Relative humidity	permanent ≤ 75% 3 × 21 days in a year 95% at +40°C

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