

EC-TYPE EXAMINATION CERTIFICATE (MODULE B)

Certificate no.:
MEDB0000941

Application of: Directive 2014/90/EU of 23 July 2014 on marine equipment (MED), issued as "Forskrift om Skipsutstyr" by the Norwegian Maritime Authority. This Certificate is issued by DNV AS under the authority of the Government of Norway.

This is to certify:

that the **Fixed fire detection and fire alarm systems components for control stations, service spaces, accommodation spaces, cabin balconies, machinery spaces and unattended machinery spaces:**
Short circuit isolators

with type designation(s)
Short circuit isolator for Interactive flame detectors

issued to

Autronica Fire and Security AS
Trondheim, Norway

is found to comply with the requirements in the following Regulations/Standards:

Regulation **(EU) 2023/1667**,

item No. MED/3.51g. SOLAS 74 as amended, Regulation II-2/7 & X/3, 1994 HSC Code 7, 2000 HSC Code 7, FSS Code 9, IGF Code 11 and IMO MSC.1/Circ.1242

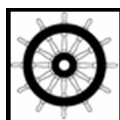
Further details of the equipment and conditions for certification are given overleaf.

This Certificate is valid until **2029-06-26**.

Issued at **Høvik** on **2024-06-27**

DNV local unit:
East & South Norway CMC

Approval Engineer:
Frode Nygård



Notified Body
No.: **0575**

for **DNV AS**

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Mydlak-Röder, Christine
Head of Notified Body



The mark of conformity may only be affixed to the above type approved equipment and a Manufacturer's Declaration of Conformity issued when the production-surveillance module (D, E or F) of Annex B of the MED is fully complied with and controlled by a written inspection agreement with a Notified Body. The product liability rests with the manufacturer or his representative in accordance with Directive 2014/90/EU.

This certificate is valid for equipment, which is conform to the approved type. The manufacturer shall inform DNV AS of any changes to the approved equipment. This certificate remains valid unless suspended, withdrawn, recalled or cancelled.

Should the specified regulations or standards be amended during the validity of this certificate, the product is to be re-approved before being placed on board a vessel to which the amended regulations or standards apply.

LEGAL DISCLAIMER: Unless otherwise stated in the applicable contract with the holder of this document, or following from mandatory law, the liability of DNV AS, its parent companies and their subsidiaries as well as their officers, directors and employees ("DNV") arising from or in connection with the services rendered for the purpose of the issuance of this document or reliance thereon, whether in contract or in tort (including negligence), shall be limited to direct losses and under any circumstance be limited to 300,000 USD.



Product description

Short circuit isolator for Interactive flame detectors designed according to EN54 for use with Autronica's interactive fire detection systems:

BG-201	Interactive IR flame detector with isolator
BG-301	Interactive IR3 flame detector with short circuit isolator
BG-301-EXIA	Interactive IR3 flame detector Ex ia version with short circuit isolator
BG-301-EXIC	Interactive IR3 flame detector Ex ic version with short circuit isolator

Application/Limitation

The equipment are found to comply with following location/application dependent requirements (for definition of each of the location classes, see below the table):

MODEL	TEMPERATURE	VIBRATION	EMC	ENCLOSURE
BG-201, BG-301, BG-301-EXIA, BG-301-EXIC	TEM-D	VIB-A	EMC-B	IP66/67

Definition of the location classes with reference to relevant standards:

Temperature: TEM-D: Open decks (-25°C-70°C)	(ref. IEC 60092-504:2016 table 1 item 6-7)
Vibration: VIB A: General applications (±1 mm / ±0.7 g)	(ref. IEC 60092-504:2016 table 1 item 10)
EMC: EMC B: Bridge and deck zone	(ref. IEC 60092-504:2016 table 1 item 13-20)
Enclosure: ENC C: Open decks (IP66/67 + salt mist test)	(ref. IEC 60092-504:2016 table 1 item 9 and 12)

Ex installations to be approved in each case according to the Rules and Ex-Certification/ Special Condition for Safe Use listed in valid Ex-certificate issued by a notified/recognized Certification Body.

Ex-certification is not covered by this certificate and the following paragraph is based on information received from the manufacturer.

Information on Ex-Certification received from manufacturer		
Equipment	Certified	Certificate No.
BG-301-EXIA	II 1G Ex ia IIC T4 Ga, Ta: -40°C up to 70°C	IECEx DNV 23.0068X Iss.0 DNV 23 ATEX 03418X Iss.0

Type Examination documentation

	Doc. No.	Rev. / Date	Description	DNV
Drawings:	Doc-1000335	1/2021-05-19	Autronica, Data Sheet BG21	4
	Doc-1000332	4/2024-03-18	Autronica, Data Sheet BG201	7
	Doc-1005449	3/2024-05-14	Autronica, Data Sheet BG-301, BG-301/EXIA, BG-301/EXIC	13
Manuals:	Doc-1000336	2/2021-05-19	Autronica, Mounting instructions BG21	5
	Doc-1000333	3/2021-05-19	Autronica, Mounting instructions BG201	8
	Doc-1000334	2/2022-01-13	Autronica, Instructions BG21	9
	Doc-1004286	2/2021-06-16	Autronica, Instructions BG201	11
	Doc-1005448	1/2023-09-06	Autronica, Technical-Handbook BG-301	14
	Test reports:	TE276617	-/2012-11-05	BRE Global Test Report, EN 54-10, EN 54-17, BG-21, BG-201
E12211		02/2017-02-15	Nemko Test Report, IEC60092-504, IEC60533, BG-201	1
E18217		00/2018-11-15	Nemko, Test report (supplementary)	18
TE276617-SW-A1		-/2012-10-11	BRE Global Test Report, EN 54-10, EN 54-17 (SW) BG-201	3
1381/BA/23		1/2024-02-22	CNBOP-PIB Test report, EN 54-10, EN 54-17, BG-301	10
DPL/003/039/24		-/2024-02-20	DPL OBR CTM S.A. Test report, IEC60092-504, IEC60533, BG-301	15

Tests carried out

Applicable tests according to:
 - EN 54-17:2005 incl. AC:2007
 - IEC 60092-504:2016
 - IEC 60533:2015



Job ID: **344.1-013592-1**
Certificate no.: **MEDB0000941**

Marking of product

For identification to this type examination certificate the products shall be marked with:

- Manufacturer's name or trade mark
- Type designation
- Mark of Conformity (wheel mark), followed by
 - identification number of the NoBo involved in production control (MED D)
 - the year the mark is affixed
 - Example: 0575/2024