

Marine & Offshore

Certificate number: 31828/B0 MED

File number: NAV0/2107/1 Item number: MED/4.57

This certificate is not valid when presented without the full

attached schedule composed of 7 sections

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Notified Body 2690 - MARINE EQUIPMENT DIRECTIVE 2014/90/EU

EC TYPE EXAMINATION CERTIFICATE

as per Module B of Directive 2014/90/EU of the European Parliament and of the Council of 23 July 2014 as transposed in the French Regulations and Commission Implementing Regulation (EU) 2017/306 of 06 Feb. 2017

This certificate is issued to:

MARINELEC TECHNOLOGIES

Quimper - FRANCE

for the type of product

BRIDGE NAVIGATIONAL WATCH ALARM SYSTEM (BNWAS)

BRIDGE NAVIGATIONAL WATCH ALARM SYSTEM (BNWAS) LYNX V3+

Requirements:

SOLAS 74 Convention as amended, Regulations V/18, V/19 IMO Res. A.694(17) IMO Res. MSC.128(75), MSC.191(79), MSC.302(87), A.1021(26) MSC.1/Circ.1474 IEC 60945 (2002) + /Corr. 1 (2008), IEC 61162-1 ed4.0 (2010-11) - IEC 61162-2 ed1.0 (1998-09) IEC 62288 Ed. 2.0 (2014-07), IEC 62616(2010) + /Corr. 1 (2012).

This certificate is issued on behalf of the French Maritime Authorities to attest that Bureau Veritas Marine & Offshore did undertake the relevant type-examination procedures for the product identified above which was found to comply with the relevant requirements of the Directive 2014/90/EU of the European Parliament and of the Council of 23 July 2014 as transposed in the French Regulations.

This certificate will expire on: 13 Dec 2022

For Bureau Veritas Marine & Offshore Notified Body 2690,

At BV SAINT-NAZAIRE, on 13 Dec 2017, François Lopinot





This certificate does not allow to issue the Declaration of Conformity and to affix the mark of conformity (wheelmark ①) to the products corresponding to this type. To this end, the production-control phase module (D, E or F) of Annex II of the Directive is to be complied with and controlled by a written inspection agreement with a notified body.

inspection agreement with a notified body.

This certificate remains valid until the date stated above, unless cancelled or revoked, provided the conditions indicated in the subsequent page(s) are complied with and the product remains satisfactory in service. This certificate will not be valid if the applicant makes any changes or modifications to the approved product, which have not been notified to, and agreed in writing with Bureau Veritas Marine & Offshore. Should the specified regulations or standards be amended during the validity of this certificate, the product(s) is/are to be re-approved prior to it/they being placed on board vessels to which the amended regulations or standards apply. Bureau Veritas Marine & Offshore is designated by the French Maritime Authority as a "notified body" under the terms of the French Regulations Division 140 Chapter 140-2. This certificate is issued within the scope of the General Conditions of Bureau Veritas Marine & Offshore available on the internet site www.veristar.com. Any Person not a party to the contract pursuant to which this document is delivered may not assert a claim against Bureau Veritas Marine & Offshore for any liability arising out of errors or or omissions which may be contained in said document, or for errors of judgement, fault or negligence committed by personnel of the Society or of its Agents in establishment or issuance of this document, and in connection with any activities for which it may provide.

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THE SCHEDULE OF APPROVAL

1. PRODUCT DESCRIPTION:

BRIDGE NAVIGATIONAL WATCH ALARM SYSTEM (BNWAS)

Type: LYNX V3+

1.1 Main specifications:

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Hor	icino
1100	101115

Material	ABS
Ingress Protection	IP 22
Wiring	pluggable connectors (10 and 18 terminals)

Main and Emergency Power supplies

Voltage range	24 VCC, -25% +30%
Alarms	low voltage
Protections	fuse + diode

Input/Output Channels Specifications

Input/Output Channels Specifications	
Capacity	2 "external reset" normally open dry contact inputs 3 "alarm" digital outputs 1 "visible indication" digital output 1 "access key" digital input 1 output 24VDC
Bus Output	RS485 for LYNX MSI (connection to IR motion detectors LYNX MS-IR or LYNX MS-HF), LYNX REB BUS (1st stage alarm & reset), LYNX B BUS (2nd or 3rd stage alarm), LYNX EC BUS (2nd stage alarm & emergency call)
Output NMEA	RS485, protocole NMEA 183 for Voyage Data Recorder
Cable to be used	Marine type approved cables, 0.5 mm² min for Input/Output Marine type approved cables, 0.75 mm² min for power supply Marine type approved screened twisted pair cables, 0.5 mm² min for serial communication
<u>Divers</u>	
Display	LCD Display

1.2 List of equipment:

" Software" version

Reference	Designation
LYNXV3+	main panel
LYNX KI	password inhibition key-switch panel
LYNX KM	countdown enabling key-switch panel
LYNX MSI	NMEA and motion sensors interface
LYNX RI	relay outputs interface
NMEA MUX	NMEA multiplexer
LYNX RE	reset panel
LYNX REB	reset and buzzer panel
LYNX REB WT	watertight reset and buzzer panel
MS-IR / MS-HF	infrared / infrared + hyperfrequency motion sensor
LYNX REB BUS	RS485 bus reset panel
LYNX REB BUS_F	RS485 bus reset panel, flush mounting
SR	2nd and 3rd stage alarm siren
FL	2nd and 3rd stage alarm red flashing light
SR FL	2nd and 3rd stage alarm combined siren and red flashing light
LYNX B BUS	RS485 bus 2nd and 3rd stage remote alarm panel
LYNX B BUS F	RS485 bus 2nd and 3rd stage remote alarm panel, flush mounting
LYNX EC BUS	RS485 emergency call panel
DIMMER24VDC	Dimming panel

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2. DOCUMENTS AND DRAWINGS:

Manual for installation and use: "LYNX_V3+_MANU_FR_rev. 0, dated 20/09/2011

For modification A1 version:

- IEC 62288 Ed.1.0 (2008) applicability, dated 21/09/2012
- Lynx V3+ Operating Manual Rev.0, dated 16/09/2011
- Lynx V3+ Gap Analysis 2011 to 2013 Amendment, dated 05/02/2015

3. TEST REPORTS:

- 3.1 EMC Type Test Report N° 106553-611313Cr2011-10-11 dated 14/11/2011 issued by LCIE
- 3.2 Environmental Type Test Report N° 106553-611313 dated 05/12/2011 issued by LCIE
- 3.2 Performance Test Report LYNX V3+ FUNCTIONNAL TESTS rev.0 dated 12/09/2011 issued by MARINELEC.

4. APPLICATION / LIMITATION:

- 4.1 As per requirements stated on first page.
- 4.2 The following component(s) shall comply with the requirements of MED2014/90/EU, as amended, and be wheelmarked:
- BRIDGE NAVIGATIONAL WATCH ALARM SYSTEM LYNX V3+

5. PRODUCTION SURVEY REQUIREMENTS:

- 5.1 This certificate alone does not allow the applicant to issue the Declaration of Conformity and to affix the mark of conformity (wheelmark) to the products corresponding to this type. To this end, the production-control phase module D "Production Quality Assurance" or E "Product Quality Assurance" or F "Product Verification" of Annex II of the Directive is to be complied with and controlled by a written inspection agreement with a Notified Body.
- 5.2 For information concerning the production phase modules, **MARINELEC TECHNOLOGIES** has declared the following manufacturing site(s):

13 Rue Alfred Le Bars 29000 Quimper FRANCE

6. MARKING OF PRODUCT:

Reference is made to MED 2014/90/EU chapter 2.

In particular Article 10.3 specifies that the wheelmark shall be followed by the identification number of the Notified Body involved in the production control phase (module D, E or F) and by the year in which the mark is affixed (4 digits or last 2 digits).

7. OTHERS:

- 7.1 It is **MARINELEC TECHNOLOGIES**'s responsibility to inform shipbuilders or their sub-contractors of the proper methods of fitting, use and general maintenance of the approved equipment and the conditions of this approval.
- 7.2 This certificate supersedes the Type Approval Certificate No. 31828/A1 EC BV issued on 19/05/2015 by the Society.

*** END OF CERTIFICATE ***