



Danmark

Marine Equipment Directive EC Type Examination Module B Certificate

This is to certify that TÜV SÜD DANMARK ApS did undertake the relevant type approval procedures for the equipment identified below, which was found to be in compliance with the Marine Equipment Directive (2014/90/EU) requirements, under the following Implementing Regulation for the listed types of equipment

Implementing Regulation	(EU)2025/1533
Certificate Holder and Manufacturer	Sperry Marine B.V. Haringbuisweg 33 3133 KP Vlaardingen The Netherlands
Product(s)	a) VisionMaster Net CAT1 Radar Systems b) VisionMaster Net CAT1 Chart Radar Systems c) VisionMaster Net CAT1H Radar Systems d) VisionMaster Net CAT1H Chart Radar Systems e) VisionMaster Net CAT2 Radar Systems f) VisionMaster Net CAT2 Chart Radar Systems g) VisionMaster Net CAT2H Radar Systems h) VisionMaster Net CAT2H Chart Radar Systems
Product Sector	Navigation Equipment
Product Type	MED/4.64 CAT 1 Radar Equipment MED/4.64 CAT 1H Radar Equipment MED/4.64 CAT 2 Radar Equipment MED/4.64 CAT 2H Radar Equipment

and on the basis of the Technical Data and information detailed in the Annex to this certificate.

Valid from: 04 December 2025

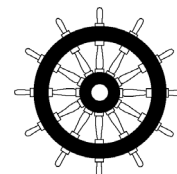

(Andy Little)

Expiry Date: 21 March 2030 ^{Note 7}

This certificate has been issued in accordance with the TÜV SÜD Testing, Certification Validation and Verification Regulations and constitutes page 1 of the combined Certificate and Annex.

The Conditions for the validity of this certificate are listed in the Annex.

For further details, related to this certification please contact BABT@tuvsud.com

**2443**

Issued by TÜV SÜD DANMARK ApS under document number: DK-MED000131 Issue 10

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TÜV SÜD DANMARK ApS • Johanne Møllers Passage 1, 3. sal • 1799 Copenhagen V • Denmark

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1 Equipment Description

CAT 1 and CAT 2 Radar Systems, with High Speed Craft (HSC) and Chart Radar options.

1.1.1 Processors and Displays

Model	Description
67026AA or 67026AB	26" Panel PC (CAT1 Radar)
67027AB	27" Panel PC (CAT1 Radar)
67027M	27" Monitor (CAT1 Radar)
67001AB	Processor
67024AB or 67019AB	24" or 19" Panel PC (CAT2 Radar)
67003AH or 67003KH	Radar Control Panel for Panel PC (integrated or kit)
65903AH and 65903KH	Radar Control Panel for Processor (integrated or kit)
32SDT001, 32SDT002, 32SDT005 or 32SDT006 ^{Note 1&2}	Security Device

1.1.2 Transceiver, Turning Units and Antenna

Model	Description
65604/A, 65606/A, 65608/A	X-Band Antenna (4ft, 6ft or 8ft)
67010WAR, 67010NAR, 67025WAR, 67025NAR	X-Band Turning Unit (Masthead) ^{Note 3}
65612A	S-Band Antenna (12ft)
67030MER, 67030MFR, 67030MGR, 67030MHR 67030NER, 67030NFR, 67030NGR or 67030NHR	S-Band Turning Unit (Masthead)
67030MMR, 67030MPR, 67030MSR, 67030NMR, 67030NPR or 67030NSR	S-Band Turning Unit (Masthead) HSC ^{Note 3}
65837AB, 65837AC, 65837AE, 65837AH, 65837AD or 65837AF	Scanner Control Unit (for S-Band use)

1.1.3 Interface Units

Model	Description
67004600	Serial Port Expander
4802181 and 65932739	Network Serial Interface and Network switch kit (EDS-G509)

1.1.4 Optional Components

Model	Description
65900AA or 65900AB	PCIO Interface Unit
65900685	Mains Distribution Unit
68001AA ^{Note 4}	Secure Maritime Gateway

1.2 Software ^{Note 5}

Identity	Version
VisionMaster Net	5.1.0
Radar Embedded Software	3.2.0
Baseline Operating System	Windows 10 IoT Enterprise LTSC, Version: 1809



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2 Assessed Requirements

2.1 Implementing Regulation (EU)2025/1533

2.2 Compliance Requirements for MED/4.64 Row 1 of 2 Note 6 and 7

Type approval requirements	Carriage and Performance Requirements
SOLAS 74 Reg V/18 SOLAS 74 Reg. X/3 IMO Res.MSC.36(63)-(1994 HSC Code) 13 IMO Res.MSC.97(73)-(2000 HSC Code) 13	SOLAS 74 Reg. V/19 IMO Res. A.278(VIII) IMO Res. A.694(17) IMO Res. MSC.36(63)-(1994 HSC Code) 13 IMO Res. MSC.97(73)-(2000 HSC Code) 13 IMO Res. MSC.191(79) IMO Res. MSC.192(79) IMO Res. MSC.302(87) IMO MSC.1/Circ.1349 ITU-R M.1177-4 (04/11)
Assessed Testing Standards	
IEC 62388:2013 incl. IEC 62388 Corr.1:2014	IEC 62288:2021
IEC 60945:2002 incl. IEC 60945 Corr. 1:2008	IEC 61162-1:2016
IEC 61162-2:1998	IEC 61162-450:2018 Note 8
IEC 62923-1:2018	IEC 62923-2:2018

3 Technical Documentation

3.1 Declaration of Conformity

DOC088-MED VMNet Series

3.2 User Guide

VisionMaster Net Chart Radar User Guide Part No. 67000010 Rev.8
VisionMaster Net Ships Manual Vol 1 Part No.67000011V1 Rev.9
VisionMaster Net Ships Manual Vol 2 Part No. 67000011V2 Rev.9
TotalCommand Installation, Operation and Service Manual, Part No. 67000007 Rev.1

3.3 Test Reports

IEC 60945:2002 Incl. Corr.1:2008	75913301 Report 10 Issue 1, 2020-03-17	JTUV008, 2020-01-27
	JTUV009, 2020-01-22	75947558 Report 01 Issue 01, 2020-01-09
	P19-0070, 2019-04-24	P19-0152-1, 2019-09-03
	5P03620 Rev1, 2015-10-16	P18-055-1, 2018-12-04
	P21-0035-2, 2021-06-24	5P05962 rev 1, 2015-12-16
	P20-0136, 2020-10-07	E13184.00, 2013-08-20
	20053, 2013-11-19	RFI/EMCB1/RP39412ETF01A, 1999-08-27
	75962197-01 Issue 01, 2024-10-15	P22-0126 Rev 1, 2022-11-01
	75962197-02 Issue 01, 2024-10-15	JTUV030 Rev 1A, 2023-02-23
	105950162LHD-001, 2024-09-27	JTUV042, 2024-12-09
	105981793LHD-001, 2024-11-21	QINETIQ/TEG/TECS/TSTR1000308, 2010-10-22
	P24-0117-2, 2024-11-04	75943301 Report 10 Issue 1, 2020-03-17
	P24-0058, 2024-06-14	TR-V4.1.0-VMNet-161 Issue: 1, 2024-10-29
	P24-0062, 2024-11-17	JTUV043, 2025-01-07
	073650.091.23 V1.0, 2023-04-26	23-18343, 2023-11-21
	1137, 2024-01-25	DCU32 Corrosion Waiver, 2025-02-14
	P19-0173, 2019-10-25	75964846-01 Issue 01, 2025-07-22
	106228228LHD-001, 2025-07-11	106225660LHD-001, 2025-07-02

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Test Reports - continued

IEC 62388:2013 Incl. Corr.1:2014	75913301 Report 05 Issue 1, 2020-02-27	JTUV011, 2020-03-04
	TR-V1.1.0-VMNet-071, 2021-08-13	TR-V1.1.0-VMNet-079-TC, 2021-08-17
	TR-V3.0.0-VMNet-104, 2022-12-07	TR-V3.0.0-VMNet-107, 2022-12-20
	75956857 Report 01 Issue 1, 2022-12-16	75960547-01 Issue 01, 2024-05-03
	75962197-02 Issue 01, 2024-10-15	REP063829, 2024-11-14
	REP037154, 2024-09-04	TR-V5.0.0-VMNet-165 Issue 2, 2024-12-09
	QINETIQ/TEG/TECS/CR1100320, 2011-03-14	JTUV040 Issue 2, 2024-05-16
	75964846-01 Issue 01, 2025-07-22	75964295-01 Issue 01, 2025-07-22
IEC 62288:2021	TR-V5.0.0-VMNet-178 Issue: 1, 2025-07-22	TR-V5.0.0-VMNet-179 Issue 1, 2025-08-18
	75913301 Report 04 Issue 1, 2020-02-27	TR-V3.0.0-VMNet-103, 2023-01-23
	TR-V1.1.0-VMNet-079-TC, 2021-08-17	75956857 Report 01 Issue 1, 2022-12-16
	TR-V3.0.0-VMNet-107, 2022-12-20	409514r00, 2020-11-12
	TR-V3.0.0-VMNet-105, 2022-11-30	346060r02, 2020-11-25
	TR-V3.0.0-VMNet-102, 2022-11-30	TR-V4.0.0-VMNet-139, 2023-11-16
	75959442 Report 01 Issue 1, 2023-11-15	REP063829, 2024-11-14
	TR-V4.1.0-VMNet-146, 2024-05-03	TR-V5.0.0-VMNet-163 Issue 2, 2024-12-09
IEC 61162 Series	REP037154, 2024-09-04	-
	75943301 Report 06 Issue 1, 2020-03-04	75943301 Report 07 Issue 2, 2020-03-05
	75943301 Report 08 Issue 1, 2020-03-09	TR-V1.1.0-VMNet-076, 2021-08-09
	TR-V1.1.0-VMNet-077, 2021-08-09	TR-V1.1.0-VMNet-078, 2021-08-11
	75952849 Report 02 Issue 01, 2021-12-06	TR-V5.0.0-VMNet-162 Issue 1, 2024-12-03
IEC 62923-1:2018 IEC 62923-2:2018	TR-V5.1.0-VMNet-181 Issue 1, 2025-11-03	TR-V5.1.0-VMNet-182 Issue 1, 2025-11-10
	TR-V3.0.0-VMNet-107, 2022-12-20	75952849 Report 01 Issue 01, 2021-12-16
	75952849 Report 01 Issue 02, 2022-05-16	TR-V4.0.0-VMNet-135, 2023-11-14
	TR-V5.0.0-VMNet-169 Issue 1, 2025-01-24	TR-V5.0.0-VMNet-172 Issue 1, 2025-01-24

3.4 Build Status

3.4.1 Hardware

VisionMaster Net Technical File VMNetTFRPRT Issue 8A

3.5 Notes

- Note 1 The 32SDT005 Multi-node security device allows operation of an integrated multi display ships bridge. A security string defines the product type on all the nodes for a particular vessel's bridge operating plan. The product type must be set to CAT1 Radar, CAT1C Chart Radar, CAT2 Radar, CAT2C Chart Radar or Total Watch as appropriate.
- Note 2 A Total Watch product enables operation as a Multi-Function workstation and allows the operator to switch between Chart Radar, ECDIS and conning display. This certificate only applies when the mode is set to Chart Radar for a Total Watch System.
- Note 3 The CAT1H/CAT2H radar system approval applies when a suitable X-Band or S-Band Turning Unit is fitted and configured in accordance with the Ship's Manual.
- Note 4 The 68001AA Secure Maritime Gateway is compliant with IEC 60945 (2002) requirements. This Type Approval does not cover any application or function on the external network that uses data exchanged via the Secure Maritime Gateway.
- Note 5 This approval remains valid for equipment including subsequent minor software amendments which have been formally accepted in accordance with the TÜV SÜD Testing, Certification, Validation and Verification Regulations.
- Note 6 The product(s) listed meet(s) the requirements of IEC 62923-1 for EUT function types P, R and S.
- Note 7 Implementing Regulation (EU)2025/1533 gives a last placing on board date of 23/09/2028 for equipment approved against the test standards listed above. See Conditions of Validity.
- Note 8 Image transfer to a Voyage Data Recorder via IEC 61162-450 Interface.
- Note 9 The VisionMaster Net system may include the TotalCommand option which engages third party hardware outside of the scope of this Type Approval. Operation of the TotalCommand functionality is compliant with the User Configured Presentation requirements of IEC 62288. Commissioning and installation of the TotalCommand option should follow the TotalCommand Installation, Operation and Service Manual.



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4 U.S. Coast Guard Number

This product has been assigned U.S. Coast Guard Module B number

165.115/EC2443 (Radar Equipment CAT 1)
165.216/EC2443 (Radar Equipment CAT 1H)
165.116/EC2443 (Radar Equipment CAT 2)
165.217/EC2443 (Radar Equipment CAT 2H)

To note type approval to Module B only as it pertains to obtaining US Coastguard approval as allowed by the "Agreement between the European Community and the United States of America on Mutual Recognition of Certificates of Conformity for Marine Equipment", Decision No. 1/2023 signed May 26th, 2023.

5 Conditions of Validity

This certificate ceases to be valid if the manufacturer makes any changes or modifications to the approved type of equipment, which have not been notified to, and agreed with TÜV SÜD DANMARK ApS or a person appointed by TÜV SÜD DANMARK ApS to perform that role.

During the period of validity of this certificate the applicable regulations (international conventions and relevant resolutions and circulars of the IMO) and testing standards of the Commission Implementing Regulation may change, therefore the product conformity may need to be re-assessed by TÜV SÜD DANMARK ApS.

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-control phase module (D, E, or F) of the directive is fully complied with and controlled by a written inspection agreement with a notified body.

Signature:

(Andy Little)

Date:

04/12/2025

On behalf of TÜV SÜD DANMARK ApS