



## Marine Equipment Directive Module B Type Examination Certificate

This is to certify that TÜV SÜD BABT did undertake the relevant type approval procedures for the equipment identified below which was found to be in compliance with the Navigation requirements of Marine Equipment Directive 96/98/EC as amended by Commission Directive 2013/52/EU and that the equipment of

***Japan Radio Co., Ltd***

of  
1-1, Shimorenjaku 5-Chome  
Mitaka-Shi  
Tokyo 181-8510  
Japan

known as


**JFE-680**

conforms to the relevant requirements for the following equipment as listed in  
Marine Equipment Directive Annex A.1:

### Annex A.1/4.6 Echo-sounding equipment

as defined in Commission Directive 2013/52/EU

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

Signed: 

Issue Date: 04 December 2014

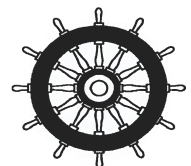
On Behalf of TÜV SÜD BABT

Number: BABT-MED001017 Issue: 01

This certificate has been issued in accordance with the Certification Regulations of TÜV SÜD BABT (Notified Body Number 0168) and constitutes page 1 of the combined Certificate and Annex

This certificate is valid from 04 December 2014 until not later than 03 December 2019

The Conditions for the validity of this certificate are listed in the Annex.  
For further details related to this certification please contact [BABT@TUV-SUD.co.uk](mailto:BABT@TUV-SUD.co.uk)



**0168**



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### Description of Equipment

Echo-sounder

**Model:** JFE-680

**System Components:**

Main Electronics and Display unit	JFE-680
50 kHz Transducer and mounting with Matching/Junction Box for 50kHz	NKF-345 <sup>Note 1&amp;2</sup> AW-154F-50 <sup>Note 3</sup>
or	
200 kHz Transducer and mounting with Matching/Junction Box for 200kHz	NKF-341 or NKF-392C <sup>Note 1&amp;2</sup> AW-154F <sup>Note 3</sup>

**Software**<sup>Note 4</sup>:

Main Electronics unit (JFE-680 Firmware) V01.00<sup>Note 4</sup>

### Compliance Matrix For MED Item A.1/4.6

IMO Resolutions	International Testing Standards	
Resolution A.224(VII) Resolution MSC.74(69), Annex 4	ISO 9875:2001 inc ISO Tech Corr.1 (2006)	Ships and marine technology — Marine echo-sounding Equipment
Resolution MSC.191(79)	IEC 62288:2008	Presentation of navigation-related information
Resolution A694(17)	IEC 60945:2002	General Requirements for Marine Navigation Equipment (Inc. Corr 1:2008)
	IEC 61162-1:2010	Digital Interfaces – Part 1: single talker

### Manufacturer:

**Name:** As Applicant

**Address:** As Applicant

### Relevant Technical Documentation

**User Guide:** JFE-680 Echo-Sounder Instruction Manual 7ZPNA2012A, Edition 5, 2012-05-11



**Test report numbers:** ISO 9875 (2001) inc: RM615529/02, 2006-12-13  
Tech. Corr. 1  
IEC 60945 (2002) RM615529/02, 2006-12-13  
(inc. Corr.1) RM900340B, 2000-03-21  
RM900340C, 2000-08-31  
YN0608002-2, 2006-11-17  
RIME 06-377(E), 2006-12-14  
IEC 62288 (2008) NA14ZZ1124A, 2014-11-24  
IEC 61162-1(2010) RM615529/02, 2006-12-13  
NA14AS1124A, 2014-11-24

**Approved Hardware :** Circuit Diagrams:  
CBD-1811 power, 2011-12-13  
CCK-963 control panel, 2011-12-09  
CDJ-2338A main unit, 2011-12-09  
CMN-720 TXRX unit, 2011-12-07  
CQD-2083 interface, 2011-12-07  
JFE-680 inter connection, 2011-12-07

**NOTES:**

- 1- This echo sounder can display information from 1 or 2 transducers (Bow and Stern) each of which may be either 50kHz or 200kHz operating frequency.
- 2- The NKF-345 assembly contains the UT50MD transducer (50 kHz). The NKF-341 and NKF-392C assemblies contain the UT200ND transducer (200 kHz).
- 3- The appropriate matching /junction box for 50 or 200 kHz should be used with matching Transducer.
- 4- This approval remains valid for equipment including subsequent minor software amendments (Maintenance No.3.02 or later) which have been formally accepted in accordance with the Certification Regulations of TÜV SÜD BABT.

**U.S. Coast Guard Number :**

This product has been assigned U.S. Coast Guard Module B number  
165.107/EC0168

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" signed February 27<sup>th</sup>, 2004



## Conditions of Validity


This issue of the Annex to the referenced Marine Equipment Module B Certificate relates to Issue 01 of the Certificate.

The assessed equipment is also in compliance with Directive 96/98/EC, as amended by Commission Directive 2014/93/EU, this Module B Certificate is also valid under that amendment.

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

Should the specified regulations or standards be amended during the validity of this certificate, the product(s) is/are to be reapproved prior to it/them being placed on board vessels to which the amended regulations or standards apply.

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 ANNEX B of the Directive is fully complied with and controlled by a written inspection agreement with a notified body."

Signed:..... on behalf of TÜV SÜD BABT		Date:..... 4th December 2014.
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