



Ministero delle infrastrutture e della mobilità sostenibili
Ministry of sustainable infrastructures and mobility

Comando generale del Corpo delle Capitanerie di porto
Italian Coast Guard Headquarters

**CERTIFICATO DI APPROVAZIONE DEL PROTOTIPO DEL SISTEMA DI CONTROLLO,
TRATTAMENTO E GESTIONE DELL'ACQUA DI ZAVORRA**

TYPE APPROVAL CERTIFICATE OF BALLAST WATER MANAGEMENT SYSTEM

Si certifica che il sistema di controllo e gestione dell'acqua di zavorra descritto di seguito è stato esaminato e provato in accordo ai requisiti delle specifiche contenute nel Codice per l'approvazione dei sistemi di controllo, trattamento e gestione dell'acqua di zavorra di cui alla Risoluzione MEPC.300(72). Il presente certificato ha validità solo per il sistema di controllo e gestione dell'acqua di zavorra sotto riferito.

This is to certify that the ballast water management system listed below has been examined and tested in accordance with the requirements of the specifications contained in the Code for Approval of Ballast Water Management Systems (IMO Resolution MEPC.300(72). This certificate is valid only for the Ballast Water Management System referred to below.

Nome del sistema di controllo e gestione dell'acqua di zavorra:
Name of Ballast Water Management System:

MIURA BMWS

Costruttore del sistema di controllo e gestione dell'acqua di zavorra:
Ballast Water Management System manufactured by:

MIURA CO.LTD.
7 Horie, Matsuyama, Ehime
799-2696 Japan

Designazione del tipo e modello e incorporanti:
Under type and model designation and incorporating:

SYSTEM MODEL	TREATMENT RATED CAPACITY[m ³ /h]	FILTER UNIT	UV UNIT
HK-200(E)	200	200F(E)A	06U,06UE,06UY,200U,200UE
HK-300(E)	300	300F(E)/300F(E)A	08U,08UE,08UY,300U,300UE
HK-400(E)~6000(E)	400~6000	200F(E)A 300F(E)/300F(E)A 450F(E)/450F(E)A 600F(E)/600F(E)A 900F/900F(E)A Achieved by units which maintain filtration area of TRC x 0.004m ² or more	06U,06UE,06UY,200U,200UE 08U,08UE,08UY,300U,300UE Achieved by using multiple units in parallel or series depend on treatment capacity

Altri equipaggiamenti prodotti da:
Other equipment manufactured by:

vedasi appendice al Certificato N. 17-2 rilasciato il 30/03/2021.
see appendix attached to Certificate No. 17-2 dated on 30/03/2021.

Apparecchiatura/disegno di vista d'assieme n.:
To equipment/assembly drawing No.:

LIST NO.	DOCUMENTS	DATE
E-01-200-300	BWMS Manufacturing Specifications	21 May 2020
E-02-200-300	BWMS Operation Manual	March 2020
E-04-200	Drawing for performance, configuration, and structure of sampling and condensation equipment	22 December 2011
M-01-200-300	Manufacturing Facilities	16 January 2014
A-01-200-300	Information related to Ballast Water Management Plan	14 February 2014
T-01-200	Environmental Testing Plan	13 September 2013
T-02-200	Land based Testing Plan	22 February 2013
T-02-300	Land based Testing Plan (TRC300m ³ /h)	1 May 2013
T-03-200-300	Shipboard Testing Plan	30 July 2013
T-05-200	Additional Land based Test Plan	2 October 2015
T-06-300	Additional Land based Test Plan (revised filter size)	12 February 2016
T-07-300	Additional Land based Test Plan (revised filter mesh size)	18 March 2016
T-08-001	Test/Quality Assurance Plan (BWMS Code)	21 February 2020
R-01-200	Report of Environmental Testing	17 March 2021
R-02-200	Report of Land based testing	1 May 2013
R-02-300	Report of Land based testing TRC300m ³ /h	30 July 2013
R-03-200-300	Report of Shipboard Testing	28 February 2014
R-05-200	Report of Additional Land based Test	4 November 2015
R-06-300	Report of Additional Land based Test (revised filter size)	11 March 2016
R-07-300	Report of Additional Land based Test (revised filter mesh size)	18 March 2016
R-08-001	Report of Temperature Test (BWMS Code)	21 February 2020
R-08-002	Report of Regrowth Test (BWMS Code)	21 February 2020
R-08-003	Report of the Land based Test for the BWMS Code	21 February 2020
R-08-004	Report of Verification test for the concentrated effect on the aquatic organisms (BWMS Code)	21 February 2020
R-08-005	Report of Additional Land based Test 2 (BWMS Code)	21 February 2020
D-01-200	Quality management plan (QMP) and quality assurance project plan (QAPP) of the approval testing process	22 December 2011
D-02-200	Land based testing facility	22 December 2011
D-03-200-300	Shipboard testing facility	13 September 2013

Manuals for MIURA BWTS:

Manuale n. E-02-200-300 datato Marzo 2020.
Manual No. E-02-200-300 dated March 2020.

Capacità nominale di trattamento – TRC (m³/h):

Da 200 a 6000 m³/h.
From 200 to 6000 m³/h.

Copia del presente certificato di Tipo Approvato deve essere sempre mantenuta a bordo di ogni nave dotata del sistema di controllo e gestione dell'acqua di zavorra descritto.

A copy of this Type Approval Certificate shall be carried on board of each ship fitted with this Ballast Water Management System at all times.

La documentazione relativa al riferimento al protocollo di prova ed una copia dei risultati dei test di prova devono essere disponibili a bordo ai fini ispettivi.

Documentation related to the test protocol and copy of the test results shall be available for inspection on board the ship.

Il presente Certificato di Tipo Approvato è emesso sulla base dell'approvazione originariamente rilasciata dal Ministero dell'Ambiente, Infrastrutture, Trasporti e Turismo del Giappone (riferimento: Certificato n. 17-2 in data 30/03/2021).

This Type Approval Certificate is issued based on approval by Ministry of Land, Infrastructure, Transport and Tourism of Japan (reference: Certificate No. 17-2 dated on 30/03/2021).

Limitazioni imposte alle condizioni operative:

Limiting operating conditions imposed:

Temperatura acqua/ Water temperature:

0-50°C/0-50 °C

Salinità/Salinity:

No limitazioni/No limitations

Come descritte nell'Appendice al Certificato n. 17-2 rilasciato in data 30/03/2021 dal Ministero dell'Ambiente, Infrastrutture, Trasporti e Turismo del Giappone.

As described in the Appendix to the Type Approval Certificate No. 17-2 issued on 30/03/2021 by Ministry of Land, Infrastructure, Transport and Tourism of Japan.

Altre restrizioni imposte:

Other restrictions imposed including the following:

Vedasi Certificato n. 17-2 rilasciato in data 30/03/2021 dal Ministero dell'Ambiente, Infrastrutture, Trasporti e Turismo del Giappone.

See Type Approval Certificate No. 17-2 issued on 30/03/2021 by Ministry of Land, Infrastructure, Transport and Tourism of Japan.

Rilasciato il 14/06/2022

Issued on

Valido fino al 21/06/2025

Valid until

**IL CAPO REPARTO
SICUREZZA DELLA NAVIGAZIONE E MARITTIMA**

Amm. Isp. (CP) Luigi GIARDINO

*The Head of Safety of Navigation
and Maritime Security Department
Rear Admiral UH (ITCG) Luigi GIARDINO*

Allegati:

Attachments:

Certificato di Tipo Approvato n. 17-2 rilasciato in data 30/03/2021 dal Ministero dell'Ambiente, Infrastrutture, Trasporti e Turismo del Giappone e risultati dei test originali.

Type Approval Certificate No. 17-2 issued on 30/03/2021 by Ministry of Land, Infrastructure, Transport and Tourism of Japan and original test results.

