DNV·GL

Certificate No:
TAE00002SF

TYPE APPROVAL CERTIFICATE

This is to certify:

That the Electrical Equipment

with type designation(s)
Combi MAR XXXX

Issued to
WISKA Hoppmann GmbH
Kaltenkirchen, Germany

is found to comply with
DNV GL rules for classification – Ships, offshore units, and high speed and light craft

Application :

Product(s) approved by this certificate is/are accepted for installation on all vessels classed by DNV GL.

Temperature	**B**
Humidity	**B**
Vibration	**A**

Issued at **Hamburg** on **2018-05-08**
This Certificate is valid until **2019-09-03**.
DNV GL local station: **Hamburg**

Approval Engineer: **Uwe Supke**

for **DNV GL**

Arne Schaarmann
Head of Section

This Certificate is subject to terms and conditions overleaf. Any significant change in design or construction may render this Certificate invalid.
The validity date relates to the Type Approval Certificate and not to the approval of equipment/systems installed.

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Job Id: **262.1-025459-1**
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Product description

Junction Boxes:	Combi MAR 108	76 x 76 x 51 mm
	Combi MAR 308	85 x 85 x 51 mm
	Combi MAR 607	110 x 110 x 66 mm
	Combi MAR 1010	140 x 140 x 81 mm
	Combi MAR 1210	160 x 140 x 81 mm
Material:	thermoplast polypropylene, thermoplastic elastomere UL94, V0	
Ingress protection:	IP66 / IP67	
Voltage:	400V/ 690V	

Application/Remarks

Installation instruction of the manufacturer to be followed.

Type Approval documentation

Tests carried out

Applicable tests according to GL Guidelines for the Performance of Type Approvals, Chapter 2- Test Requirements for Electrical / Electronic Equipment and Systems (VI-7-2), Edition 2012
IEC 60670-1:2002, IEC60670-22:2003

Marking of product

The products to be marked with:

- Manufacturer name
- Model name
- Power supply ratings
- Degree of protection

Periodical assessment

The scope of the periodical assessment is to verify that the conditions stipulated for the Type approval are complied with and that no alterations are made to the product design or choice of materials.
The main elements of the assessment are:

- Inspection on factory samples, selected at random from the production line (where practicable)
- Results from Routine Tests (RT) checked (if not available tests according to RT to be carried out)
- Review of type approval documentation
- Review of possible change in design, materials and performance
- Ensuring traceability between manufacturer's product type marking and Type Approval Certificate.

Periodical assessment is to be performed after 2 years and after 3.5 years. A renewal assessment will be performed at renewal of the certificate.

END OF CERTIFICATE