

Type Approval Certificate

This is to certify that the undernoted product(s) has/have been tested with satisfactory results in accordance with the relevant requirements of the Lloyd's Register Type Approval System.

This certificate supersedes certificate number 16/20052 issued on 03.06.2016 which is hereby cancelled.

This certificate is issued to:

PRODUCER Böning Automationstechnologie GmbH & Co. KG

Am Steenöver 4 27777 Ganderkesee

Germany

DESCRIPTION IAMC serves as a control and display platform for processing and

visualizing

AHD 1310 F (3)

TYPE AHD-IAMCS

Designation

AHD 1110 F (3)

AHD 1110 G (3)

AHD 1115 F

AHD 1115 G

AHD 1119 F

AHD 1119 G

AHD 1119 G

AHD 1200(3)

Device description

10" Display with foil front

15" Display with foil front

15" Display with glass front

19" Display with foil front

19" Display with glass front

AHD 1200⁽³⁾ Embedded PC

AHD 1215 F 15" Panel PCs with foil front

AHD 1215 G 15" Panel PCs with glass front

AHD 1219 F 19" Panel PCs with foil front

AHD 1219 G 19" Panel PCs with glass front

AHD 1224 G 24" Panel PCs with glass front

AHD-DPU9 (3) Data processing station

Certificate No. 16/20052 (E1)

Issue Date 06 June 2018

Expiry Date 02 June 2021

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Thorsten Wolff
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R031.1.2013.12

10" Panel PC with foil front

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TYPE continued

Designation Device description

AHD 1310 G⁽³⁾ 10" Panel PC with glass front

AHD 406-2 (3) Cabin duty alarm
AHD 570 5,7" LCD colour display
AHD 651 (2) 6,5" Operating panel

AHD 880 E⁽²⁾ 8,8" Operating panel with engine

monitoring

AHD 880 G⁽²⁾ 8,8" Operating panel with glass front AHD 880 TC ⁽²⁾ 8,8" Operating panel with foil front

AHD 882⁽¹⁾ Central unit

AHD-DPS 02 A07 (3), (4) Extension module for navigation and signal

light control and monitoring

AHD-DPS 02 BS (3) Operation and indicator module for

console

AHD-DPS 02 E07 ⁽⁴⁾ Emergency switch units with 7 switches
AHD-DPS 02 E14 ⁽⁴⁾ Emergency switch units with 14 switches
AHD-DPS 02 G14 ^{(3), (4)} Basic module for navigation and signal

light control and monitoring

AHD-PS 15⁽¹⁾ Data station for 15 binary inputs

AHD-PS 15B⁽¹⁾ Data station with duty selection function

AHD-PS 30⁽¹⁾ Data station for 30 binary inputs AHD-PS 47⁽¹⁾ Data station for 47 binary inputs

AHD R $101^{(1),(3)}$ Microprocessor controlled relay station AHD-SAS 15 M12^{(1),(3)} Data station for analog and binary sensors

AHD-UCC⁽³⁾ Repeater

AHD-UIC Compact protocol converter AHD-WAOP K Personnel alarm system

AHD-WAOP BNWAS

AHD-DRM T

AHD-GAP General alarm unit with fire alarm function

AHD 570 DP 5,7" LCD colour display

AHD-DRM R Control unit for colour displays and monitors with rotary push drive

Control unit for colour displays and

monitors with trackball

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APPLICATION Marine, offshore and industrial applications for use in environmental

categories ENV1, ENV2, ENV3, ENV4 (components marked with ⁽¹⁾) and ENV5 (components marked with ⁽²⁾, front only) as defined in Lloyd's Register's Type Approval System, Test Specification Number 1 – July 2015.

ADDITIONAL TESTS Low temperature test (-25°C/16hrs) components marked with (3)

STANDARD Manufacturer's specification

RATINGS Power supply: 24V DC

Power supply: (4) = 24V DC; 115V AC and 230V AC

OTHER CONDITIONS The complete installation is subject to a separate plan appraisal

according to applicable Rules and Regulations when installed on LR

classed vessels.

The Type Approval does not eliminate the need for normal inspection and survey procedures required by the Rules and Regulations.

If the specified standards are amended during the validity of this certificate, the product is to be re-approved prior to it being supplied to vessels to which the amended standards apply.

The Design Appraisal Document No. HTS/ETS 36993-18 and its supplementary Type Approval Terms and Conditions form part of this Certificate.

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