

EC-TYPE EXAMINATION CERTIFICATE (MODULE B)

Certificate No:
MEDB00006WH

Application of: Directive 2014/90/EU of 23 July 2014 on marine equipment (MED). This Certificate is issued by DNV SE based on the notification of the Federal Maritime and Hydrographic Agency of Germany.

This is to certify:

That the Heading control system (HCS)

with type designation(s)
HLD-SC200, HLD-SC600

Issued to

Beijing Highlander Digital Technology Co., LTD
Beijing, China

is found to comply with the requirements in the following Regulations/Standards:

Regulation (EU) 2020/1170,

**item No. MED/4.16. SOLAS 74 as amended, Regulations V/18 & V/19, IMO Res. A.342(IX), IMO Res. A.694(17),
IMO Res. MSC.191(79), IMO Res. MSC.64(67) Annex 3, IMO Res. MSC.302(87)**

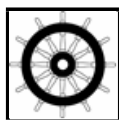
Further details of the equipment and conditions for certification are given overleaf.

This Certificate is valid until **2026-05-27**.

Issued at **Hamburg** on **2021-05-28**

DNV local station:
Nantong

Approval Engineer:
Harald Bluhm



Notified Body
No.: **0098**

for **DNV SE**

Christine Mydlak-Roeder
Head of Notified Body

A U.S. Coast Guard approval number will be assigned to the equipment when the production module has been completed and will appear on the production module certificate (module D, E or F) of Annex B of the MED is fully complied with and controlled by a written inspection agreement with a Notified Body. The product liability rests with the manufacturer or his representative in accordance with Directive 2014/90/EU.

This certificate is valid for equipment, which is conform to the approved type. The manufacturer shall inform DNV SE of any changes to the approved equipment. This certificate remains valid unless suspended, withdrawn, recalled or cancelled.

Should the specified regulations or standards be amended during the validity of this certificate, the product is to be re-approved before being placed on board a vessel to which the amended regulations or standards apply.

LEGAL DISCLAIMER: Unless otherwise stated in the applicable contract with the holder of this document, or following from mandatory law, the liability of DNV AS, its parent companies and their subsidiaries as well as their officers, directors and employees ("DNV") arising from or in connection with the services rendered for the purpose of the issuance of this document or reliance thereon, whether in contract or in tort (including negligence), shall be limited to direct losses and under any circumstance be limited to 300,000 USD.



Product description

The Heading Control System (HCS) HLD-SC200 and HLD-SC600 consists of the following equipment necessary for the heading control function:

HLD-SC600		
Equipment	Type	Software Version
Automatic Control Unit	HLD-ACU600	2.x
Alarm Display Unit	HLD-ADU600	2.x
Steering Control Unit	HLD-SCU600	2.x
Rudder Feedback Unit	HLD-RFU600 or HLD-RFU200	1.x
Lever Drive System	HLD-LD600 or HLD-LD200	none
Steering Mode Selector Switch	HLD-SW200	none
Steering Connection Terminal Strip	HLD-SCT600	2.x
Signal Connection Terminals	HLD-ACT600	2.x
HLD-SC200		
Operation Unit	HLD-OP200	2.x
Automatic Control Unit	HLD-AC200	2.x
Alert Display Unit	HLD-AD200	2.x
Alert Control Unit	HLD-AL200	2.x
Steering Interface Unit	HLD-SI200	2.x
Rudder Feedback Unit	HLD-RFU600 or HLD-RFU200	1.x
Lever Drive System	HLD-LD600 or HLD-LD200	none
Steering Mode Selector Switch	HLD-SW200	none

Manuals:

HLD-SC600 Installation Manual HLD0700AZ V1.1, HLD-SC600 Operation Manual HLD0700SS2 V1.1
HLD-SC200 Installation Manual HLD0500AZ V1.3, HLD-SC200 Operation Manual HLD0500SS2 V1.3

Type Examination documentation

Tests carried out

ISO 11674:2019, IEC 60945 (2002) incl. IEC 60945 Corr. 1 (2008), IEC 61162-1 ed5.0, IEC 61162-2 Ed1.0 (1998-09), IEC 62288 Ed. 2.0 (2014-07), IEC 62923-1(2018), IEC 62923-2(2018)

Marking of product

According to Article 10 of the Council Directive (MED):

- The wheel mark shall be affixed visibly, legibly and indelibly to the product or to its data plate and, where relevant, embedded in its software. Where that is not possible or not warranted on account of the nature of the product, it shall be affixed to the packaging and to the accompanying documents.
- The wheel mark shall be affixed at the end of the production phase.
- The wheel mark shall be followed by the identification number of the notified body, where that body is involved in the production control phase, and by the year in which the mark is affixed.
- The identification number of the notified body shall be affixed by the body itself or, under its instructions, by the manufacturer or the manufacturer's authorised representative.

For specific products, manufacturers may use an appropriate and reliable form of electronic tag instead of, or in addition to, the wheel mark.