

## TYPE APPROVAL CERTIFICATE

Certificate No: **TAE00002XC** Revision No:

This	is	to	cei	rtify:	
That t	he	Lo	w V	oltag	e Cable

with type designation(s)
Texiline HF90 TW 250V

Issued to

# amo specialkabel AB ALSTERMO, Sweden

is found to comply with

DNV rules for classification - Ships, offshore units, and high speed and light craft

#### Application:

Switchboard wires for control and instrumentation (150/250 V)

For use inside cabinets only.

Products approved by this certificate are accepted for installation on all vessels classed by DNV.

Rated voltage (V) 150/250 V

Temp. class (°C) 90

Issued at Høvik on 2023-07-03

This Certificate is valid until 2028-05-28.

DNV local unit: Malmö

Approval Engineer: Ivar Bull

for **DNV** 

Frederik Tore Elter Head of Section

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.



Form code: TA 251 Revision: 2022-12 www.dnv.com Page 1 of 3

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.



Job Id: 262.1-036721-5 Certificate No: TAE00002XC

Revision No:

#### **Product description**

Texiline HF90 TW 250V

Construction Single wire

Conductor Plain or tinned stranded copper; class 5

Core insulation XLPE

No of Elements:	Cross sectional area [mm <sup>2</sup> ]
1 core	0,5 0,75

### **Application/Limitation**

Wire with flexible conductors (IEC 60228 class 5) are to be terminated using approved compression terminals intended and designed for these conductors. For use inside cabinets only.

### **Type Approval documentation**

#### **Tests carried out**

Standard	Release	General description	Limitation
DNV CP-0399	2021-08	Electric cables.	
IEC 60092-350 2020-01		Electrical installations in ships - Part 350:	
		General construction and test methods of	
		power, control and instrumentation cables for	
		shipboard and offshore applications	
IEC 60092-360	2021-01 Electrical installations in ships - Part 360:		
		Insulating and sheathing materials for shipboard	
		and offshore units, power, control,	
		instrumentation and telecommunication cables	
IEC 60092-376	2017-05	Cables for control and instrumentation circuits	
JEO 00000 4 0	0045.07	150/250 V (300 V)	
IEC 60332-1-2	2015-07	Tests on electric cables under fire conditions.	
		Test for vertical flame propagation for a single insulated wire or cable.	
IEC 60332-3-22	2018-07	Tests on electric and optical fibre cables under	Charred portion of sample
120 00332-3-22	2010-01	fire conditions - Part 3-22: Test for vertical flame	does not exceed 2,5m
		spread of vertically mounted bunched wires or	above bottom edge of
		cables - Category A	burner.
IEC 60754-1	2019-11	Test on gases evolved during combustion of	Low Halogen:
120 007 01 1	20.0	materials from cables - Part 1: Determination of	<0,5% Halogen
		the halogen acid gas content	3,0 /0 / 18.10 90.11
IEC 60754-2	2019-11	Test on gases evolved during combustion of	Halogen free:
		materials from cables - Part 1: Determination of	pH > 4,3
		the halogen acid gas content	Conductivity < 10µS/mm
IEC 61034-1/2 2019-1		Measurement of smoke density of cables	Low smoke
		burning under defined conditions –	Light transmittance >60%
		Part 1: Test apparatus	
		Part 2: Test procedure and requirements	

Marking of product AMOKABEL Texiline HF90 TW – size 150/-250 V - YYWW

Form code: TA 251 Revision: 2022-12 www.dnv.com Page 2 of 3



Job Id: **262.1-036721-5** Certificate No: **TAE00002XC** 

Revision No: 1

#### 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) and selected type tests (ref. to applicable class programs) checked (if not available these tests shall 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

Form code: TA 251 Revision: 2022-12 www.dnv.com Page 3 of 3