marine & naval control cable

DEF STAN 61-12 PART 25 & NES 525 / NES 526 (LFH)

DEF STAN 61-12 Part 25 & NES 525 / NES 526 440/600 V LFH Naval Shipboa



DEF STAN 02-525 / 02-526 · 440/600 V · Marine & naval control cable

DEF STAN 02-525 / 02-526 | **440/600 V (-30 to +105 °C)** | **NES 518 Low Fire Hazard (LFH) Sheath**

Application

DEF STAN 61-12 Part 25 & NES 525 / NES 526 440/600 V LFH Naval Shipboard Cable (DEF STAN 02-525 / 02-526) engineered for 440/600 V service across -30 to +105 °C (min. bend radius 6 × OD).

Typical uses: Naval Frigate, Destroyer & Submarine Systems, Shipboard Propulsion & Auxiliary Control, Offshore Drilling Rig Control Rooms, Marine Switchgear & Console Interconnects

Construction





Cross-section, not to scale

1. Flexible Tinned Copper (7×1.5 mm²)
2. Thin-Wall LFH Cross-Linked Insulation
3. Tinned Copper / Steel Braid (NES 526 / 5
4. NES 518 Low Fire Hazard (LFH) Sheath

Technical data

Typical values

Rated voltage / transmission duty	440/600 V (UK MoD DEF STAN 02-525 (NES 525) / 02-526 (NES 526) & DEF STAN 61-12 Part 25)	**Core / conductor construction**	Flexible Tinned Copper (7×1.5 mm²) — Class 5 tinned annealed copper conductors per BS EN 60228
Primary dielectric / buffering	Thin-Wall LFH Cross-Linked Insulation — White number-coded Low Fire Hazard cross-linked insulation	**Continuous operating temperature**	−30…+105 °C (shipboard & offshore duty)
Short-circuit / peak thermal rating	Verified thermal stability per UK MoD DEF STAN 02-525 (NES 525) / 02-526 (NES 526) & DEF STAN 61-12 Part 25	**Storage & transport temperature**	−40…+80 °C on export wooden/steel drum
Outer protection / armouring	NES 518 Low Fire Hazard (LFH) Sheath — Black low-smoke zero-halogen low-toxicity elastomer jacket (NES 713)	**Minimum bending radius**	6 × OD
Armour, screen & mechanical duty	Tinned Copper / Steel Braid (NES 526 / 525) — Braided tinned copper screen or galvanized steel wire armour	**Flame, fire & smoke performance**	Qualified for marine flame-retardance and low-smoke zero-halogen / fire safety per UK MoD DEF STAN 02-525 (NES 525) / 02-526 (NES 526) & DEF STAN 61-12 Part 25
Oil, drilling mud & seawater resistance	Resistant to marine fuel/lube oils, salt mist and offshore fluids per UK MoD DEF STAN 02-525 (NES 525) / 02-526 (NES 526) & DEF STAN 61-12 Part 25	**RoHS & REACH compliance**	RoHS 2 (2011/65/EU + 2015/863) & REACH SVHC compliant
Standards	UK MoD DEF STAN 02-525 (NES 525) / 02-526 (NES 526) & DEF STAN 61-12 Part 25		

Sizes

3 standard constructions

Tick the sizes you need and send this page to info@tebaoflex.com or WhatsApp +86 185 9591 3361.

Order designation	Configuration	Core / stranding	Outer Ø ≈ mm	Net weight ≈ kg/km	Tensile rating kN ≈	Min. bend R mm
DEF STAN 61-12 PART 25 & NES 525 / NES 526 (LFH) Construction Schedule (−30…+105 °C) 3 sizes						
☐ **DEF STAN 61-12 PART 25 4G2.5 mm²**	**4 × 2.5 mm² (or 4C × 14 AWG)**	**IEC 60228 Class 2/5 Cu/SnCu**	**13.2**	**275**	**1.5**	**80**
☐ **DEF STAN 61-12 PART 25 7G2.5 mm²**	**7 × 2.5 mm² (or 7C × 14 AWG)**	**IEC 60228 Class 2/5 Cu/SnCu**	**15.8**	**415**	**2.6**	**95**
☐ **DEF STAN 61-12 PART 25 12G1.5 mm²**	**12 × 1.5 mm² (or 12C × 16 AWG)**	**IEC 60228 Class 2/5 Cu/SnCu**	**17.4**	**495**	**2.7**	**105**

– Custom core cross-sections, pair/fibre counts, armour grades and factory drum lengths available per UK MoD DEF STAN 02-525 (NES 525) / 02-526 (NES 526) & DEF STAN 61-12 Part 25.

Electrical, optical & thermal parameters

3 sizes

Configuration	Max. DC R_{20} / Atten. Ω/km or dB/km	Rating / Impedance	Operating temp.
4 × 2.5 mm² (or 4C × 14 AWG)	**7.98**	**440/600 V (26 A)**	**−30…+105 °C**
7 × 2.5 mm² (or 7C × 14 AWG)	**7.98**	**440/600 V (21 A)**	**−30…+105 °C**
12 × 1.5 mm² (or 12C × 16 AWG)	**13.30**	**440/600 V (14 A)**	**−30…+105 °C**

– Every production length undergoes routine conductor DC resistance, high-voltage dielectric or OTDR continuity and dimensional verification.

Standards and approvals

- DEF STAN 02-525 / 02-526 Compliant
- EN 10204 3.1 Factory Test Certificate
- CE, RoHS 2 (2011/65/EU) & REACH

Certifications

Management systems: ISO 9001, ISO 14001, ISO 45001

Request a quotation

Send the size, length and destination. An application engineer replies within 2 business hours.

WhatsApp / phone
+86 185 9591 3361

Email
info@tebaoflex.com

Web
tebaoflex.com/cables/def-stan-61-12-part-25-nes-525-nes-526-lfh

Typical values for this cable type, based on UK MoD DEF STAN 02-525 (NES 525) / 02-526 (NES 526) & DEF STAN 61-12 Part 25. Values for your order are confirmed in the quotation. Subject to change without notice. Jiangsu Tebaoflex Special Cable Co., Ltd., Taicang, Jiangsu, China.