



# NEK606 RFOU P113 18/30kV Cable



Eland Product Group: ASH

## APPLICATION

A flame-retardant and halogen-free medium voltage cable designed for fixed installation in conditions where oil and gas rigs are usually working. Suitable for use in extreme temperatures, saline atmospheres, and where UV radiation, hydrocarbons, oils and drilling fluids and muds are present, meeting the requirements of NEK606.

## CHARACTERISTICS

### Voltage Rating

18/30kV

### Maximum Operating Voltage $U_{max}$

36kV

### Temperature Rating

+90°C

### Minimum Bending Radius

4 or 5 x depending on Overall Diameter

## CONSTRUCTION

### Conductor

Class 2 Annealed Tinned Copper

### Semiconductors

HF (Halogen Free) extruded compound

### Insulation

HEPR HF (Hard Ethylene Propylene Rubber Halogen Free) Compound

### Screen

TCWB (Tinned Copper Wire Braid)

### Bedding & Fillers

Fiberglass Tape + Fiberglass Fillers (Extruded)

### Inner Sheath

SHF2 extruded compound

### Armour

TCWB (Tinned Copper Wire Braid)

### Outer Sheath

SHF2 H-M compound

### Core Identification

Numbered Tapes (with coloured tapes on request)

### Outer Sheath Colour

● Red

## CABLE THIRD-PARTY ACCREDITATIONS

### We supply DNV approved products

Cables are tested and certified by Det Norske Veritas (Norway)

### We supply Lloyds Register approved products

Cables are tested and certified by Lloyds Register (UK)

### We supply ABS approved products

Cables are tested and certified by American Bureau of Shipping (USA)

## STANDARDS

NEK 606, IEC 60092-360

Flame Retardant: IEC 60332-1-2, IEC 60332-3-22 Cat A

Halogen Content & Corrosivity: IEC 60754-1 & 2, IEC 60684-2

Smoke Density: IEC 61034-1 & 2

UV Resistance: UL 1581 & 1200

Ozone Resistance: IEC 60092-360

Mineral / Hydraulic Oils & Mud Resistant: NEK 606

Impact & Cold Resistance: CSA C 22.2 N° 0.3-09 & N° 38-18

Temperature Range: IEC 60092-360

## THE CABLE LAB<sup>®</sup>

### AN ISO/IEC 17025 AND IECEE CBTL ACCREDITED FACILITY

Our world-class testing facility assures the quality and compliance of this cable through a continuous and rigorous testing regime.



## SUSTAINABILITY COMMITMENT

We are on a journey to Net Zero.

We've committed to near-term emissions reductions and a net-zero target with the Science Based Targets initiative and we're a signatory to the United Nations Global Compact Sustainable Development Goals.

Learn more about embodied carbon and our carbon emissions reduction actions, our comprehensive recycling services, and wider ESG activities for sustainable operations at: [www.elandcables.com/company/about-us/esg-sustainability](http://www.elandcables.com/company/about-us/esg-sustainability)



SCIENCE  
BASED  
TARGETS

BUSINESS  
AMBITION FOR 1.5°C



## REGULATORY COMPLIANCE

This cable meets the requirements of the RoHS Directive 2015/65/EU and Reach Directive EC 1907/2006. RoHS compliance has been tested and confirmed by The Cable Lab<sup>®</sup>.





## DIMENSIONS

ELAND PART NO.	NO. OF CORES	NOMINAL CROSS SECTIONAL AREA mm <sup>2</sup>	NOMINAL BRAID CROSS SECTION mm <sup>2</sup>	NOMINAL DIAMETER UNDER ARMOUR mm	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
ASHNR30KV0150	1	50	16	33.7	42.4	2445
ASHNR30KV0170	1	70	25	35.3	44.3	2790
ASHNR30KV0195	1	95	25	37.0	46.0	3145
ASHNR30KV01120	1	120	25	38.5	47.7	3520
ASHNR30KV01150	1	150	25	39.7	49.1	3860
ASHNR30KV01185	1	185	25	41.7	51.1	4390
ASHNR30KV01240	1	240	35	45.2	55.0	5295
ASHNR30KV01300	1	300	35	48.7	58.7	6145
ASHNR30KV0350	3	50	35	70.8	82.6	7645
ASHNR30KV0370	3	70	35	74.3	86.3	8710
ASHNR30KV0395	3	95	35	77.9	90.3	9915
ASHNR30KV03120	3	120	35	81.2	93.8	11030
ASHNR30KV03150	3	150	35	83.8	96.6	12080

## ELECTRICAL CHARACTERISTICS

NO. OF CORES	NOMINAL CROSS SECTIONAL AREA mm <sup>2</sup>	MAX. CONDUCTOR RESISTANCE Ω/km		MAX. REACTANCE Ω/km		NOMINAL CAPACITANCE μF/km	NOMINAL INDUCTANCE μH/km	IMPEDANCE Ω/km				MAXIMUM CURRENT IN FREE AIR Amps	SHORT CIRCUIT FOR 1S @ 90°C/250°C KA
		20°C	90°C	50 HZ	60 HZ			20°C 50 HZ	20°C 60 HZ	90°C 50 HZ	90°C 60 HZ		
1	50	0.391	0.499	0.144	0.173	0.144	458	0.42	0.43	0.52	0.53	179	7.15
1	70	0.27	0.344	0.135	0.162	0.16	430	0.3	0.31	0.37	0.38	231	10
1	95	0.195	0.249	0.128	0.153	0.117	406	0.23	0.25	0.28	0.29	283	13.6
1	120	0.154	0.196	0.122	0.146	0.19	388	0.2	0.21	0.23	0.24	331	17.2
1	150	0.126	0.161	0.118	0.142	0.202	377	0.17	0.19	0.2	0.21	384	21.5
1	185	0.1	0.128	0.113	0.136	0.219	360	0.15	0.17	0.17	0.19	441	26.5
1	240	0.0762	0.0927	0.108	0.13	0.242	344	0.13	0.15	0.15	0.16	524	34.3
1	300	0.0607	0.0774	0.104	0.125	0.267	331	0.12	0.14	0.13	0.15	608	42.9
3	50	0.391	0.499	0.135	0.162	0.144	430	0.41	0.42	0.52	0.52	130	7.15
3	70	0.27	0.344	0.127	0.152	0.16	404	0.3	0.31	0.37	0.38	159	10
3	95	0.195	0.249	0.12	0.144	0.177	383	0.23	0.24	0.28	0.29	203	13.6
3	120	0.154	0.196	0.116	0.139	0.19	369	0.19	0.21	0.23	0.24	246	17.2
3	150	0.126	0.161	0.112	0.135	0.202	358	0.17	0.18	0.2	0.21	286	21.5

The information contained within this datasheet is for guidance only and is subject to change without notice or liability. All the information is provided in good faith and is believed to be correct at the time of publication. When selecting cable accessories, please note that actual cable dimensions may vary due to manufacturing tolerances.