

Technical Specification

12/20kV NA2XS(FL)2Y POWER CABLE 1x150/25mmp RM
Standard : UNE-HD 620 S3

Version: A/0

Date: January 30, 2026

Economic Operator:



1.Scope

Eastful®12/20kV NA2XS(FL)2Y POWER CABLE 1x150/25mm² RM is made of Aluminum conductor, XLPE insulation, copper wire shielding, Aluminum-plastic composite tape longitudinal wrapping for water resistance, PE sheath.

This specification covers the general requirements and performance of 12/20kV NA2XS(FL)2Y POWER CABLE 1x150/25mm² RM which Eastful® offered including physical characteristics, mechanical characteristics, electrical characteristics etc.

2.Quality Control Standard

ISO 9001 Quality Management Systems

ISO 14001 Environmental Management Systems

ISO 45001 Occupational Health and Safety Management Systems

3.Test and Inspection

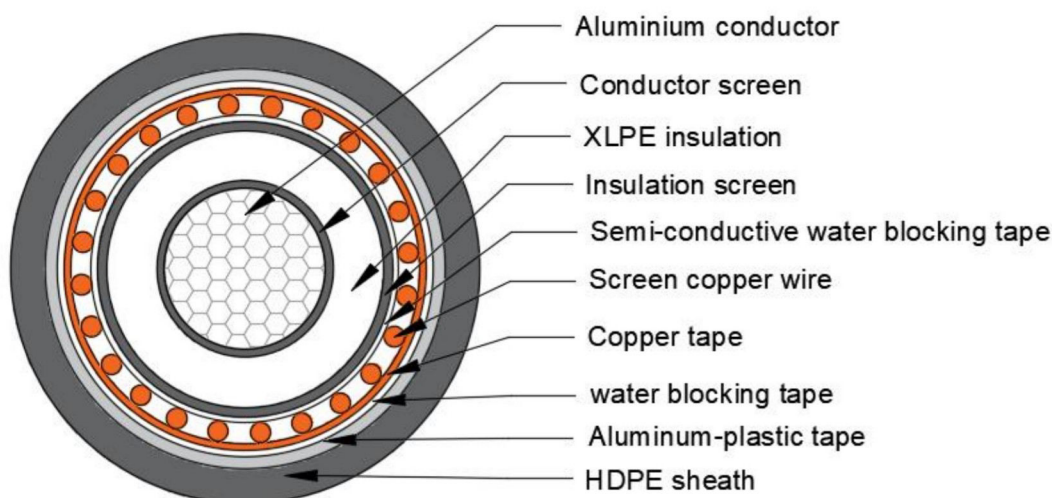
3.1 Routine Test

Eastful® 12/20kV NA2XS(FL)2Y POWER CABLE 1x150/25mm² RM shall be in accordance with the applicable HD 620 S3 standard, relevant industry standards, and the customer's requirements in their entirety.

The following test items shall be carried out according to corresponding references.

No.	Items	Reference Standards
1	Dimensions	HD 620 S3
2	Resistivity Test	IEC 60228
3	A.C.Voltage Test	HD 620 S3
4	Tensile Strength	HD 620 S3
5	Elongation	HD 620 S3
6	Partial Discharge Test	HD 620 S3

3.2 Construction Drawing



3.3 General Information

No.	Description	Unit	Value
1	Brand name or trade mark	-	Eastful
2	Manufacturer		Eastful Group Co., Ltd.
3	Applicable standard	-	HD 620 S3
4	Type	-	12/20kV NA2XS(FL)2Y POWER CABLE 1x150/25mm ² RM
5	Nominal size	mm ²	150 RM
6	Core count	-	1
7	Rated voltage	kV	12/20

3.4 Physical Characteristics

No.	Description	Unit	Value
1	Conductor		
	Material	-	Aluminum
	Class	-	2
	Shape of conductor	-	Stranded Compact round
	Nominal cross section area	mm ²	150
	Minimum number of single wires	No.	15
	Approximate diameter of conductor	mm	14.4
2	Conductor screen		
	Nominal thickness	-	0.8
	Approximate diameter of conductor screen	mm	16.0
3	Insulation		
	Material	-	XLPE
	Nominal thickness	mm	5.5
	Minimum thickness	mm	4.85
	Approximate diameter of insulation	mm	27.2
4	Insulation screen		
	Nominal thickness	-	0.5
	Approximate diameter of insulation screen	mm	28.1
5	Semi-conductive water blocking tape		
	Material	-	Semi-conductive water blocking tape

	Nominal thickness	mm	0.3
6	Metallic shield		
	Material	-	Copper wire
	Number of copper wire	-	44
	Diameter of copper wire	mm	0.85
	Nominal cross section area	mm ²	25
7	Copper tape		
	Nominal thickness	-	0.1
	Approximate diameter of copper tape	mm	30.9
8	Water blocking tape		
	Material	-	Water blocking tape
	Nominal thickness	mm	0.3
9	Aluminum-plastic tape		
	Material	-	Aluminum-plastic tape
	Nominal thickness	mm	0.25
10	sheath		
	Material	-	HDPE
	Colour	-	Black
	Nominal thickness	mm	2.1
	Minimum thickness	mm	1.69
11	Approximate overall diameter of the cable	mm	36.7
12	Approximate total weight of the cable	kg/km	1395

3.5 Mechanical and Electrical Characteristics

No.	Description	Unit	Value
1	Mechanical properties of insulation	-	
1.1	Minimum tensile strength	MPa	12.5
1.2	Minimum elongation at rupture	%	200
2	Mechanical properties of sheath	-	
2.1	Minimum tensile strength	MPa	12.5
2.2	Minimum elongation at rupture	%	300

3	Temperature of operation	°C	90
4	Short circuit temperature	°C	250
5	Maximum D.C. resistance at 20°C	ohm/km	0.206
6	A.C. voltage test	-	42kV/5min. , No breakdown
7	Partial discharge test	-	magnitude at 24kV shall not exceed 2 pC.

— End of specifications —