NA2XS2Y 12/20 (24)kV Cable

APPLICATION

Medium voltage power cables for distribution networks and generation units, suitable for external installation including in direct in ground and in buried cable ducts. UV Resistant.

CHARACTERISTICS

Voltage Rating Uo/U
12/20 (24)kV
Test Voltage
42kV AC 50Hz (5 mins)
Temperature Rating
-20°C to +60°C
Permissible Conductor Operating Temperature: +90°C
Permissible Short Circuit Temperature up to 5 sec: 250°C
Minimum Bending Radius
15 x overall diameter

STANDARDS

IEC 60502-2, IEC 60228,
UV Resistant: ISO 4892-3
Abrasion and Tear Resistant: EN 60229-4.1
Impact rated to: AG2 EN 60364-5.51

THE CABLE TEST

We have world-class testing facility, and made rigorous testing regime, every meter of cable before leaving the factory must go through strict testing, testing qualified products will be shipped to customers, effectively ensure product quality and meet customer requirements.

SUSTAINABILITY COMMITMENT

Guowang Cable actively implements the "carbon reduction" goal, strives to promote the green's low-carbon transformation, strengthens energy-saving and emission reduction technology innovation, and promotes the company's healthy and sustainable development.

CONSTRUCTION

Conductor
Class 2 Stranded Aluminium
Conductor Screen
Semi-conductive material
Insulation
XLPE (Cross-Linked Polyethylene)
Insulation Screen
Semi-conductive material (bonded)
Screen
Copper wires and copper tape
Outer Sheath
MDPE (Medium Density Polyethylene)
Sheath Colour
●Black

GUOWANG CABLE GROUP

DIMENSIONS

NO. OF CORE	NOMINAL CROSS SECTIONAL AREA mm2		NOMINAL CONDUCTOR DIAMETER	NUMBER WIRES CONDUCTOR	NOM. THICKNESS SEMI-CON. LAYER		NOMINAL INSULATION THICKNESS	MINIMUM INSULATION THICKNESS	NOMINAL DIAMETER OVER INSULATION
	Conductor	Screen	mm	mm	INNER mm	OUTER mm	mm	mm	mm
1	50	16	8.20	7*2.90	0.50	0.40	5.50	4.85	20.40
1	70	16	9.70	19*2.18	0.50	0.40	5.50	4.85	21.90
1	95	16	11.40	19*2.55	0.50	0.40	5.50	4.85	23.60
1	120	16	12.65	19*2.90	0.50	0.40	5.50	4.85	24.90
1	150	25	14.40	19*3.16	0.50	0.40	5.50	4.85	26.60
1	185	25	15.75	37*2.55	0.50	0.40	5.50	4.85	28.40
1	240	25	18.20	37*2.90	0.50	0.40	5.50	4.85	30.90
1	300	25	20.50	61*2.55	0.50	0.40	5.50	4.85	33.20
1	400	35	23.00	61*2.90	0.50	0.40	5.50	4.85	35.70
1	500	35	26.00	61*3.20	0.50	0.40	5.50	4.85	38.70
1	630	35	30.20	61*3.65	0.50	0.40	5.50	4.85	42.90

NOMINAL CROSS SECTIONAL AREA mm2	NUMBER WIRES SCREEN mm	DIAMETER TAPE SCREEN mm	NOMINAL SHEATH THICKNESS mm	MINIMUM SHEATH THICKNESS mm	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km	MAXIMUM SIDEWALL PRESSURE N/CM2	MAXIMUM PULLING TENSION N
50	44*0.66	1*0.1*10	1.80	1.24	27	700	292	1500
70	44*0.66	1*0.1*10	1.90	1.32	28.00	800.00	371.00	2100.00
95	44*0.66	1*0.1*10	1.90	1.32	30	900	479	2850
120	44*0.66	1*0.1*10	2.00	1.40	31	1000	550	3600
150	71*0.66	1*0.1*10	2.00	1.40	33	1300	633	4500
185	71*0.66	1*0.1*10	2.10	1.48	35	1400	729	5550
240	71*0.66	1*0.1*10	2.10	1.48	38	1600	870	7200
300	71*0.66	1*0.1*10	2.20	1.56	40	1900	992	9000
400	60*0.85	1*0.1*15	2.30	1.64	43	2250	1212	12000
500	60*0.85	1*0.1*15	2.40	1.72	46	2750	1389	15000
630	60*0.85	1*0.1*15	2.50	1.80	51	3250	1571	18900

Derating factor (ground): 1 (Soil thermal resistivity: 1km/W, Depth 0.8m, Flat formation - touching)
Derating factor (air): 1 (Flat formation - touching

ELECTRICAL CHARACTERISTICS

NOMINAL CROSS SECTIONAL AREA mm²	CONDUCTOR DC RESISTANCE AT 20°C ohms/km	CONDUCTOR DC RESISTANCE AT 75°C ohms/km	CONDUCTOR AC RESISTANCE BY MAX TEMP ohms/km	CURRENT CARRYING CAPACITY (A) In Ground 20°C	In Air 30°C	REACTANCE ohms/km	CHARGING ADMITTANCE A/km	CAPACITANCE uF/km	S.C.C CONDUCTOR 1SEC kA	S.C.C SCREEN 1SEC kA	CONDUCTOR LOSSES IN THE GROUND kW/km
50	0.641	1.32	0.825	195	217	0.19	0.39	0.15	4.70	3.2	31.4
70	0.443	0.917	0.57	237	270	0.18	0.37	0.17	6.58	3.2	32
95	0.32	0.662	0.412	282	238	0.18	0.35	0.19	8.93	3.2	32.8
120	0.258	0.524	0.328	320	378	0.17	0.34	0.20	11.28	3.2	33.6
150	0.203	0.426	0.268	353	425	0.17	0.33	0.22	14.10	5.0	33.4
185	0.164	0.339	0.213	396	485	0.17	0.32	0.24	17.39	5.0	33.4
240	0.125	0.258	0.1600	457	573	0.16	0.31	0.27	22.56	5.0	34.0
300	0.100	0.207	0.1320	511	652	0.16	0.30	0.29	28.20	5.0	34.5
400	0.0778	0.161	0.1030	566	740	0.16	0.29	0.32	37.60	7.1	33.0
500	0.0605	0.125	0.0810	630	838	0.15	0.28	0.35	47.00	7.1	32.1
630	0.0469	0.0972	0.0640	860	1080	0.15	0.27	0.40	59.22	7.1	47.3

Derating factor (ground): 1 (Soil thermal resistivity: 1km/W, Depth 0.8m, Flat formation - touching)
Derating factor (air): 1 (Flat formation - touching