



YKYzo PVC 0.6/1kV Power Cable



Eland Product Group: P9N

APPLICATION

Power and control cable for fixed installation. Can be used indoors, outdoors, underground, in concrete and in water.

CHARACTERISTICS

Voltage Rating U_o/U
0.6/1kV

Temperature Rating

Fixed: -15°C to +70°C
Flexed: -5°C to +50°C

Minimum Bending Radius

Fixed: 12 x overall diameter

CONSTRUCTION

Conductor

RE: Class 1 solid copper conductor
RM: Class 2 stranded copper conductor

Insulation

PVC (Polyvinyl Chloride)

Filler

PVC (Polyvinyl Chloride)

Sheath

PVC (Polyvinyl Chloride)

Core Identification

2 core: ● Blue ● Brown
3 core: ● Green/Yellow ● Blue ● Brown
4 core: ● Green/Yellow ● Brown ● Black ● Grey
5 core: ● Green/Yellow ● Brown ● Black ● Grey ● Blue
7 core and above: ● Green Yellow ● Black with ○ White numbers

Sheath Colour

● Black

Note

YKY (without Green/Yellow earth conductor) also available

STANDARDS

IEC 60502-1, Generally to PN HD 603, IEC 60228

Flame retardant according to IEC/EN 60332-1-2

THE CABLE LAB[®]

AN ISO/IEC 17025 AND IECCE 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



REGULATORY COMPLIANCE

This cable is compliant with European Regulation EN 50575, the Construction Products Regulation.



This cable meets the requirements of the Low Voltage Directive 2014/35/EU, the RoHS Directive 2015/65/EU and Reach Directive EC 1907/2006. RoHS compliance has been tested and confirmed by The Cable Lab[®].





DIMENSIONS

ELAND PART NO.	NO. OF CORES	NOMINAL CROSS SECTIONAL AREA mm ²	CONDUCTOR TYPE	NOMINAL THICKNESS OF INSULATION mm	NOMINAL THICKNESS OF SHEATH mm	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
P9N10025	1	2.5	RE	0.8	1.4	6.15	62
P9N10040	1	4	RE	1	1.4	7.5	85
P9N10060	1	6	RE	1	1.4	7.5	108
P9N1010	1	10	RM	1	1.4	8.6	155
P9N1016	1	16	RM	1	1.4	9.6	218
P9N1025	1	25	RM	1.2	1.4	11.1	318
P9N1035	1	35	RM	1.2	1.4	12.1	414
P9N1050	1	50	RM	1.4	1.4	13.7	552
P9N1070	1	70	RM	1.4	1.4	15.5	750
P9N1095	1	95	RM	1.6	1.5	17.6	1020
P9N1120	1	120	RM	1.6	1.6	19.3	1259
P9N1150	1	150	RM	1.8	1.6	21	1546
P9N1185	1	185	RM	2	1.7	23.2	1913
P9N1240	1	240	RM	2.2	1.8	26.2	2471
P9N1300	1	300	RM	2.4	2	29.2	3097
P9N1400	1	400	RMv	2.6	2	33.8	4100
P9N1500	1	500	RMv	2.8	2.1	38	5200
P9N20015	2	1.5	RE	0.8	1.8	10	147
P9N20025	2	2.5	RE	0.8	1.8	10.7	179
P9N20040	2	4	RM	1	1.8	13	268
P9N20060	2	6	RM	1	1.8	14.2	337
P9N2010	2	10	RM	1	1.8	16.2	472
P9N2016	2	16	RM	1	1.8	18.2	644
P9N30015	3	1.5	RE	0.8	1.8	10.4	166
P9N30025	3	2.5	RE	0.8	1.8	11.3	212
P9N30040	3	4	RE	1	1.8	13.1	299
P9N30060	3	6	RE	1	1.8	15	402
P9N3010	3	10	RM	1	1.8	17.1	570
P9N3016	3	16	RM	1	1.8	19.2	789
P9N3025	3	25	RM	1.2	1.8	22.1	1141
P9N3035	3	35	RM	1.2	1.8	24.1	1462
P9N3050	3	50	RM	1.4	1.8	27.6	1964
P9N3070	3	70	RM	1.6	2.1	36.3	3635
P9N3095	3	95	RM	1.6	2.2	40	4488
P9N40015	4	1.5	RE	0.8	1.8	11.6	198
P9N40025	4	2.5	RE	0.8	1.8	12.1	252
P9N40040	4	4	RM	1	1.8	15.1	391
P9N40060	4	6	RM	1	1.8	16.5	465
P9N4010	4	10	RM	1	1.8	18.6	702
P9N4016	4	16	RM	1	1.8	21.1	992
P9N4025	4	25	RM	1.2	1.8	24.2	1431
P9N4035	4	35	RM	1.2	1.8	26.6	1861
P9N4050	4	50	RM	1.4	1.9	30.9	2535
P9N4070	4	70	RM	1.4	2.1	35.1	3441
P9N4095	4	95	RM	1.6	2.2	40.4	4691
P9N4120	4	120	RM	1.6	2.4	44.2	5757
P9N4150	4	150	RM	1.8	2.5	48.5	7095



ELAND PART NO.	NO. OF CORES	NOMINAL CROSS SECTIONAL AREA mm ²	CONDUCTOR TYPE	NOMINAL THICKNESS OF INSULATION mm	NOMINAL THICKNESS OF SHEATH mm	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
P9N4185	4	185	RM	2	2.7	53.9	8810
P9N4240	4	240	RM	2.2	2.9	61.1	11400
P9N50015	5	1.5	RE	10.8	1.8	12	232
P9N50025	5	2.5	RE	0.8	1.8	13.1	302
P9N50040	5	4	RM	1	1.8	16.6	477
P9N50060	5	6	RM	1	1.8	18.2	618
P9N5010	5	10	RM	1	1.8	20.3	853
P9N5016	5	16	RM	1	1.8	23.1	1212
P9N5025	5	25	RM	0.8	1.8	26.6	280
P9N70015	7	1.5	RE	1	1.8	16.6	477
P9N70025	7	2.5	RE	0.8	1.8	14.1	368
P9N120015	12	1.5	RE	0.8	1.8	16.6	475
P9N120025	12	2.5	RE	0.8	1.8	18.2	628
P9N140015	14	1.5	RE	0.8	1.8	17.1	515
P9N190015	19	1.5	RE	0.8	1.8	18.9	648
P9N190025	19	2.5	RE	0.8	1.8	20.3	843
P9N270015	27	1.5	RE	0.8	1.8	22.6	895

CONDUCTORS

Class 1 Solid Conductors for Single Core and Multi-Core Cables

NOMINAL CROSS SECTIONAL AREA mm ²	MAXIMUM RESISTANCE OF CONDUCTOR AT 20°C ohms/km	
	Circular, Annealed Copper Conductor	
	Plain Wires	
1.5	12.1	
2.5	7.41	
4	4.61	
6	3.08	
10	1.83	
16	1.15	
25	0.727	
35	0.524	
50	0.387	
70	0.268	
95	0.193	
120	0.153	
150	0.124	
185	0.101	
240	0.0775	
300	0.062	



Class 2 Stranded Conductors for Single Core and Multi-Core Cables

NOMINAL CROSS SECTIONAL AREA mm ²	MINIMUM NO. OF WIRES IN CONDUCTOR						MAXIMUM RESISTANCE OF CONDUCTOR AT 20°C
	Circular		Circular Compacted		Shaped		Annealed Copper Conductor
	Cu	Al	Cu	Al	Cu	Al	Plain wires ohms/km
1.5	7	-	6	-	-	-	12.1
2.5	7	-	6	-	-	-	7.41
4	7	-	6	-	-	-	4.61
6	7	-	6	-	-	-	3.08
10	7	7	6	6	-	-	1.83
16	7	7	6	6	-	-	1.15
25	7	7	6	6	6	6	0.727
35	7	7	6	6	6	6	0.524
50	19	19	6	6	6	6	0.387
70	19	19	12	12	12	12	0.268
95	19	19	15	15	15	15	0.193
120	37	37	18	15	18	15	0.153
150	37	37	18	15	18	15	0.124
185	37	37	30	30	30	30	0.0991
240	37	37	34	30	34	30	0.0754
300	61	61	34	30	34	30	0.0601
400	-	-	-	-	-	-	0.047
500	-	-	-	-	-	-	0.0366

The above table is in accordance with EN 60228

ELECTRICAL CHARACTERISTICS

Current Carrying Capacity

NO. OF CORES	NOMINAL CROSS SECTIONAL AREA mm ²	CONDUCTOR TYPE	CURRENT CARRYING CAPACITY Amps	
			In Duct	In Air
1	2.5	RE	-	26
1	4	RE	-	47
1	6	RE	-	57
1	10	RM	-	78
1	16	RM	127	103
1	25	RM	163	137
1	35	RM	195	169
1	50	RM	230	206
1	70	RM	282	261
1	95	RM	336	321
1	120	RM	382	374
1	150	RM	428	428
1	185	RM	483	414
1	240	RM	561	590
1	300	RM	632	678
1	400	RMv	-	646
1	500	RMv	-	747
2	1.5	RE	32	20
2	2.5	RE	42	27
2	4	RM	54	37
2	6	RM	68	48
2	10	RM	90	66



ELECTRICAL CHARACTERISTICS

Current Carrying Capacity

NO. OF CORES	NOMINAL CROSS SECTIONAL AREA mm ²	CONDUCTOR TYPE	CURRENT CARRYING CAPACITY Amps	
			In Duct	In Air
2	16	RM	116	89
3	1.5	RE	26	18
3	2.5	RE	34	25
3	4	RE	44	34
3	4	RM	44	34
3	6	RE	56	43
3	6	RM	56	43
3	10	RM	75	60
3	16	RM	98	80
3	25	RM	128	106
3	35	RM	157	131
3	50	RM	185	159
3	95	RM	275	244
3	120	RM	313	282
4	1.5	RE	26	18
4	2.5	RE	34	25
4	4	RE	44	34
4	4	RM	44	34
4	6	RE	56	43
4	6	RM	56	43
4	10	RM	75	60
4	16	RM	98	80
4	25	RM	128	106
4	35	RM	157	131
4	50	RM	185	159
4	70	RM	252	247
4	95	RM	303	305
4	120	RM	313	282
4	150	RM	390	407
4	185	RM	399	371
4	240	RM	464	436
5	1.5	RE	24	18
5	2.5	RE	34	25
5	4	RE	44	34
5	4	RM	44	34
5	6	RE	56	43
5	6	RM	56	43
5	10	RM	75	60
5	16	RM	98	80
5	25	RM	128	106
7	1.5	RE	15	12
7	2.5	RE	20	16
12	1.5	RE	12	9
12	2.5	RE	16	13
14	1.5	RE	12	9
19	1.5	RE	10	8
19	2.5	RE	13.6	11.3
27	1.5	RE	12	9



Ambient Temperature: 30°C
Depth of Laying: 0.5m
Ground Temperature: 15°C
Thermal Resistivity of Soil: 12km/w



DE-RATING FACTORS

For Air Temperature other than 30°C

AIR TEMPERATURE	20°C	25°C	30°C	35°C	40°C	45°C	50°C
DE-RATING FACTOR	1.12	1.07	1.00	0.94	0.87	0.79	0.71

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.