

# NR/PS/TEL/00015 Armoured Copper Trackside Cable



Eland Product Group: **A8T**

## APPLICATION

Suitable for installation in trackside concrete cable troughing, buried duct route or for direct burial installations.

## CONSTRUCTION

### Conductor

Class 1 solid copper conductor

### Insulation

PE (Polyethylene) Type 03 according to BS 6234

### Water Blocking Compound

Petroleum Jelly

### Separator

Impregnated Paper and/or Non-Hygroscopic Tape

### Moisture Barrier

Aluminium/Polymer Laminate Tape

### Armour

Corrugated Steel/Polymer Laminate Tape

### Sheath

PE (Polyethylene) Type 03C according to BS 6234

## CABLE STANDARDS

NR/PS/TEL/00015 (previously RT/E/PS/00015)

### Network Rail Certificate of Acceptance

No: PA05/03862



The electrical and dimensional properties of this product are measured by the Technical and Quality Assurance department at the Eland Cables laboratory. Cable performance in respect of conductor resistance, construction quality (workmanship), dimensional consistency, and other parameters are verified to published standards and approved product drawings. Conformance to RoHS (Restriction of the use of Hazardous Substances) is determined and confirmed.

## CHARACTERISTICS

### Temperature Rating

Fixed: -25°C to +85°C

### Minimum Bending Radius

Fixed: 10 x overall diameter

### Sheath Colour

● Black

## DIMENSIONS

### 0.63mm Conductor

ELAND PART NO.	NETWORK RAIL PART NO. / PADS	NO. OF PAIRS	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
A8T0263S	006/168011	2	18	205
A8T0563S	006/168012	5	19.5	285
A8T1063S	006/168013	10	21.3	380
A8T2063S	006/168014	20	23.8	550
A8T3063S	006/168015	30	26.1	690
A8T5063S	006/168016	50	29.9	960
A8T7563S	006/168017	75	33.9	1147
A8T10063S	006/168018	100	36.7	1464

**0.90mm Conductor**

ELAND PART NO.	NETWORK RAIL PART NO. / PADS	NO. OF PAIRS	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
A8T0209S	006/168061	2	19	250
A8T0509S	006/168062	5	21.3	365
A8T1009S	006/168063	10	23.8	520
A8T2009S	006/168064	20	27.6	820
A8T3009S	006/168065	30	30.9	1060
A8T5009S	006/168066	50	35.7	1550
A8T7509S	006/168067	75	41.5	1912
A8T10009S	006/168068	100	44.8	2450

**ELECTRICAL CHARACTERISTICS**

	2 PAIR	5 PAIR	10 PAIR	20 PAIR	30 PAIR	50 PAIR	75 PAIR	100 PAIR
<b>0.63mm CONDUCTOR RESISTANCE (ohms/km)</b>								
Maximum Average at 20°C	58	58	58	58	58	58	58	58
Maximum at 20°C	60	60	60	60	60	60	60	60
<b>0.90mm CONDUCTOR RESISTANCE (ohms/km)</b>								
Maximum Average at 20°C	28	28	28	28	28	28	28	28
Maximum at 20°C	30	30	30	30	30	30	30	30
<b>INSULATION RESISTANCE MINIMUM (Mohms/km)</b>								
	1500	1500	1500	1500	1500	1500	1500	1500
<b>0.63mm MUTUAL CAPACITANCE (nF/km)</b>								
Maximum Average	70	70	70	70	67	67	67	67
Maximum for 99% pairs	79	79	79	79	75	75	75	75
<b>0.90mm MUTUAL CAPACITANCE (nF/km)</b>								
Maximum Average	79	79	79	79	75	75	75	75
Maximum for 99% pairs	85	85	85	85	81	81	81	81
<b>CAPACITANCE UNBALANCE (Maximum pF/500m)</b>								
	800	275	275	275	275	275	275	275
<b>0.63mm ATTENUATION (dB/km Maximum Average)</b>								
1.0kHz	-	-	-	1.4	1.4	1.4	1.4	1.4
2.4kHz	-	-	-	2.15	2.15	2.15	2.15	2.15
1.024MHz	-	-	-	18.7	18.7	18.7	18.7	18.7
<b>0.90mm ATTENUATION (dB/km Maximum Average)</b>								
1.0kHz	-	-	-	0.95	0.95	0.95	0.95	0.95
2.4kHz	-	-	-	1.46	1.46	1.46	1.46	1.46
1.024MHz	-	-	-	14.6	14.6	14.6	14.6	14.6
<b>NEXTA (dB Minimum)</b>								
1kHz	-	-	-	70	70	70	70	70
1.024MHz (Within Units)	-	-	-	40	40	40	40	40
1.024MHz (Between Units)	-	-	-	47	47	47	47	47

\* NEXTA at 1.0kHz shall have an average value better than 75dB

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.