



Application

Designed for outdoor fixed installations, the BS7870-4.10 medium voltage cable is primarily used for power distribution in urban networks, industrial plants, and infrastructure projects. It is well-suited for installation in a variety of environments, including underground ducts, cable trays, or directly in free air, where mechanical protection and reliability are critical. This cable is engineered to perform under harsh environmental conditions, making it ideal for both public and private utility networks.

Characteristics

Temperature rating 19/33 (36) kV
Min. bending radius 20 x Outer Diameter
Conductor Operating Temp up to 90 °C
Conductor Short Circuit Temp up to 250 °C
Water resistant AD7

Construction

Conductor
Circular Stranded Compacted Aluminum (Class 2)

Tape
Semi Conductive tape (630mm² and above)

Conductor Screen
Extruded Thermosetting Semi-conducting Compound

Insulation
Cross Linked Polyethylene (XLPE) DIX 3

Insulation Screen
Extruded Thermosetting Semi-conducting Compound (Bonded)

Water Blocking Tape
Semi-conductive Water Blocking Tape

Metallic Screen
Copper Wire Screen

Metallic Screen
Copper Tape Screen (Open Helix)

Water Blocking Tape
Non-conductive Water Blocking Tape

Outer Sheath
MDPE (DMP 5)

Sheath Colour

Black ●

Standards

BS 7870-4.10, BS EN 60228, UV resistant ISO 4892

Regulatory Compliance



The Copper Mark Partnership

- IEWC promotes sustainable practices by our suppliers
- Copper Mark promotes seven of 17 UN Global Sustainability Goals
- Copper Mark recipients cover
- 20% of global copper production

Data based on 35mm² CWS

Conductor Size	Approx. Conductor Screen Overall Diameter	Approx. Insulation Overall Diameter	Approx. Insulation Screen Overall Diameter	Approx. Water Blocking Tape Overall Diameter	Approx. Metallic Screen (wire) Overall Diameter	Approx. Metallic Screen (tape) Overall Diameter	Approx. Water Blocking Tape Overall Diameter	Approx. Outer Sheath Overall Diameter	Approx. Bending Radius	Approx. Weight (Kg/Km)
95	14.7	30.2	31.7	32.3	34.4	34.6	35.6	40.8	20xOD	1360
120	16.1	31.6	33.1	33.7	35.8	36	37	42.2	20xOD	1470
150	17.4	32.9	34.4	35	37.1	37.3	38.3	43.7	20xOD	1600
185	19.2	34.7	36.2	36.8	38.9	39.1	40.1	45.5	20xOD	1765
240	21.5	37	38.5	39.1	41.2	41.4	42.4	48	20xOD	1990
300	23.6	39.1	40.6	41.2	43.3	43.5	44.5	50.3	20xOD	2235
400	26.4	41.9	43.4	44	46.1	46.3	47.3	53.3	20xOD	2575
500	29.6	45.1	46.6	47.2	49.3	49.5	50.5	56.7	20xOD	3000
630	33.6	49.1	50.6	51.2	53.3	53.5	54.5	60.9	20xOD	3570
800	37.7	53.2	54.7	55.3	57.4	57.6	58.6	65.2	20xOD	4240
1000	42.4	57.9	60.4	61	63.1	63.3	64.3	71.3	20xOD	5850

This datasheet is for guidance only. While we believe the information is accurate at the time of publication, it is subject to manufacturing tolerances.