

Cat 5e U/UTP SWA LSZH Cable



Eland Product Group: **A8N**

APPLICATION

An armoured multi-pair high performance cable that consists of twisted pairs, used mainly for data transmission. Category 5E cables support a frequency range of up to 100MHz and designed for transmission speeds of up to 1 gigabit per second (Gigabit Ethernet). For installations where fire, smoke emissions and toxic fumes create a potential risk to life and equipment.

CONSTRUCTION

Conductor

Class 1 solid copper conductor

Insulation

HDPE (High Density Polyethylene)

Inner Jacket 1

LSZH (Low Smoke Zero Halogen)

Inner Jacket 2

LSZH (Low Smoke Zero Halogen)

Armour

SWA (Steel Wire Armour)

Sheath

LSZH (Low Smoke Zero Halogen)

CABLE STANDARDS

BS EN/IEC 60332-1



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

Voltage Rating

600V

Temperature Rating

-20°C to +60°C

Pair Identification

Pair 1: ● Blue ● White/Blue

Pair 2: ● Orange ● White/Orange

Pair 3: ● Green ● White/Green

Pair 4: ● Brown ● White/Brown

Sheath Colour

● Black

DIMENSIONS

ELAND PART NO.	NO. OF PAIRS	AWG	STRAND DIAMETER mm	NOMINAL OVERALL DIAMETER mm
A8NCAT5EUTPSWA	4	24	0.51	12.8

ELECTRICAL CHARACTERISTICS

FREQUENCY MHz	RL dB	INSERTION LOSS dB	NEXT dB	ACR-N dB	ACR-F dB
1	19	4	60	56	58.6
4	19	4	54.8	50.8	44.6
8	19	5.4	50	44.6	40.6
10	19	6.1	48.5	42.4	38.6
16	19	7.7	45.2	37.5	34.5
20	19	8.7	43.7	35	32.6
25	18	9.7	42.1	32.4	30.7
31.25	17.1	10.9	40.5	29.6	28.7
62.5	14	15.8	35.7	19.8	22.7
100	12	20.4	32.3	11.9	18.6

IMPEDANCE ohms	100 ± 15
MAXIMUM DC RESISTANCE OF CONDUCTOR AT 20°C ohms/km	<96.5
VELOCITY RATIO %	65