

Cable Standards

The cable is compliant with:

- ISO 61156-5 ed 2 and ANSI/TIA/EIA 568C

It is also designed to be compliant with EN50288-10-1 standards when it is published:

These cables are also fully backwards compatible with Category 5 and Category 6 systems

Brand-Rex Copper Cables - 10GPlus
Communication Cable, U/FTP, 100 Ω, 4x2xAWG 23/1

Electrical Characteristics @ 20°C	Specification	Typical Performance
Conductor Loop Resistance	Max 19 Ω / 100m	14 Ω / 100m
Conductor Resistance Unbalance	Max 2%	0.5%
Dielectric Strength	1.0kV dc or 0.7kV ac for 1 min	100% in process test
Insulation Resistance	>500MΩ @ 100-500 V test voltage	>5 GΩ.km
Capacitance Unbalance to Earth	Max 120 pF/100m	80 pF/100m
Velocity of Propagation	<537.6 nsec/100m @ 100MHz	417 nsec/100m @ 100MHz (NVP for hand held testers = 0.80)
Skew	Max 20 nsec/100m @ 100MHz	5 nsec/100m @ 100MHz
Mean Characteristic Impedance	100 Ω +/- 5 Ω @ 100MHz	100 Ω +/- 3 Ω @ 100MHz
Transfer Impedance	Max 100 mΩ/m @ 10MHz	30 mΩ/m @ 10MHz (ISO 61156 grade 2 cable)
Coupling Attenuation up to 1Ghz	Min 55 dB	75 dB

Characteristic	Typical Headroom vs Cat6 (250MHz)	Typical Headroom vs AC6 (500MHz)
Return Loss	5dB	5dB
Insertion Loss	6%	2%
NEXT	20dB	20dB
PSNEXT	20dB	20dB
ELFEXT	15dB	15dB
PSELFEXT	15dB	15dB
PSANEXT	NA	10dB
PSAELFEXT	NA	10dB

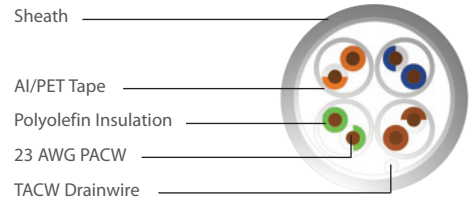
Typical headroom on key S/N characteristics - for information only

	Typical Headroom vs Cat6 (250MHz)	Typical Headroom vs AC6 (500MHz)
PSACR-N @ 500MHz	NA	35dB
PSAACR-N* @ 500MHz	NA	20dB

* Power Sum Attenuation to Alien Crosstalk (near end) Ratio
The Alien crosstalk performance of cables is assessed using a '6 round 1' or '4 on a drum' method.

Product Part Numbering

Part Number	Length (m)	Cable type	Colour	Nominal Cable Diameter (mm)	Nominal Weight (Kg/Km)	Calorific Value kWh/m	Fire Safety Rating
AC6U/FTP-HF1-500VT	500	LSHF	Violet	7.1	51	0.12	IEC 60332-1-2
AC6U/FTP-HF1-1000VT	1000						
AC6U/FTP-HF1-D500VT	500	LSHF	Violet	14.3 x 7.1	102	0.25	IEC 60332-1-2
AC6U/FTP-HF1-D1000VT	1000						



Independent 3rd Party Certification (3P)

PRODUCT DESCRIPTION

10GPlus U/FTP, 100 Ω, 4x2xAWG 23/1 is a premium grade Class EA / Augmented Category 6 cable to support 10 Gigabit Ethernet protocol for installation in horizontal and backbone areas.

PRODUCT PERFORMANCE

Core

- Conductor: 23 AWG Plain Annealed Copper Wire
- Insulation: Cellular Polyolefin
- Diameter: 1.36mm Nominal
- Pair: 2 of the above cores
- Tape Screen: Individual pair wrapped with aluminium polyester tape, applied metal side out
- Pair Colour: Blue-White, Orange-White, Green-White, Brown-White

Final Assembly

- Cable: 4 of the above shielded pairs
- Drainwire: 0.5mm Tinned Annealed Copper Wire
- Sheath: LSHF compound

Mechanical and Environmental

- Temp - Installation: 0°C to +50°C
- Temp - Operation: -20°C to +75°C
- Max Tensile Load: 10kg per simplex cable (installation)
- Min Bend Radius: 8 x Outer Diameter (installation)
4 x Outer Diameter (operation)
- Halogen Free cable types (LSHF) meet IEC 60754-2 and IEC 61034