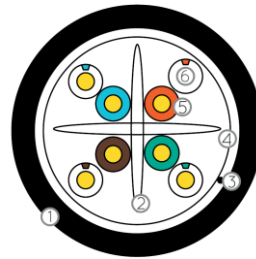
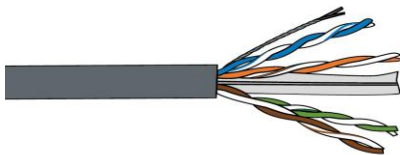


**Cable Reference**
**PROLINK Positioning** CAT.6 U/UTP

**Cable construction**

<b>Conductor</b>	Solid copper wire AWG23 (Ø 0.58mm).
<b>Insulation</b>	Polyethylene ≤ Ø 1.1 mm.
<b>Twisting</b>	2 cores to the pair.
<b>Cable lay up</b>	4 pairs to the core, non-metallic cross separator (spline).
<b>Cable core filling</b>	Waterproof compound to prevent moisture migration and water protection.
<b>Sheath</b>	White, LSZH or PVC



- ① Outer Jacket;
- ② Cross Separator;
- ③ Rip-cord;
- ④ PET tape;
- ⑤ Insulation;
- ⑥ Conductor.

**Application**

Primary (Campus), Secondary (Riser), Tertiary (Horizontal)  
 IEEE 802.3: 10Base-T; 100Base-T; 1000Base-T;  
 IEEE 802.5 16 MB; ISDN; TPDDI; ATM  
 IEEE 802.3af-2002: POE; IEEE 802.3at: POE+  
 Outdoor installations. Filled with compound to prevent water penetration.  
 To ensure electrical properties even in continuous wet conditions.

**Standards**

ISO/IEC 11801.; EN 50288-6-1; IEC 61156-5 EN 50173-1,  
 IEC 60794-1-2F5 , method B

**Water penetration rating**
**Fire rating**

-(PE outer sheath) IEC 60754-2; Smoke classification: No

**Technical Data**

<b>Cable designation</b>	Industry U/UTP Cat.6 250MHz 4PxAWG23
<b>Packaging</b>	Drum 305 m
<b>Outer diameter</b>	Nominal 7.2 mm
<b>Weight</b>	20 kg / km
<b>Thermal load</b>	1884 MJ / km
<b>Segregation class</b>	b



**PROLINK U/UTP CAT.6 250 MHZ**

**Mechanical Properties**

<b>Tensile force</b>	100 N
<b>Bending radius</b>	≥ 33 mm during operation (without load)
	≥ 65 mm during installation (with load)
<b>Temperature range</b>	During operation -55°C...+ 60°C
	During installation -15°C...+ 50°C

**Electrical Properties  
(at 20°C ± 5°C)**

<b>DC loop residence</b>		≤ 17.6 Ω / 100 m
<b>Resistance unbalance</b>		≤ 2 %
<b>Test voltage</b>	DC, 1 min, core/core	1000 V
<b>Insulation resistance</b>	500 V	≥ 5000 MΩ * km
<b>Capacitance</b>		48 pF / m nom.
<b>Capacitance unbalance</b>		≤ 1500 pF / km
<b>Mean characteristic impedance</b>		100 ± 5 Ω
<b>Nominal velocity of propagation</b>		Approx. 67 %
<b>Propagation delay</b>	At 1 MHz	≤ 535 ns / 100 m
<b>Delay skew</b>		≤ 20 ns / 100 m
<b>Coupling attenuation</b>		≥ 40 dB
<b>Balance TCL</b>	At 1 MHz	≤ 55 dB
	At 10 MHz	≤ 40 dB
	At 100 MHz	≤ 35 dB

**Typical transmission characteristics (at 20°C)**

f (MHZ)	Attenuation (Db/100 m)		NEXT (dB)		PS-NEXT (dB)		ACR-F 1) (dB/100 m)		PS-ACR-F 1) (dB/100 m)		Return loss (dB)	
	Max	Typ	Min	Typ	Min	Typ	Min	Typ	Min	Typ	Min	Typ
<b>4</b>	3.8	3.8	66	71	63	66	58	59	55	56	23	26
<b>10</b>	6	5.6	60	65	57	60	50	50	47	48	25	28
<b>20</b>	8.5	8.5	56	60	53	56	44	45	41	42	25	28
<b>62.5</b>	15.5	15.1	48	56	45	48	34	35	31	32	21.5	25
<b>100</b>	19.9	19.1	45	50	42	45	30	31	27	28	20.1	23
<b>250</b>	33	32	39	44	36	39	22	23	19	20	17.3	20
<b>450</b>	-	44.8	-	40	-	35	-	15	-	17	-	20

**Cable Part Number**

Part No.	Item
PL-C6-LSZH-W	ProLink CAT. 6 U/UTP CABLE, 4 PAIR 23 AWG , LSZH , White , RIB
PL-C6-PVC-W	ProLink CAT. 6 U/UTP CABLE, 4 PAIR 23 AWG , PVC , White , RIB