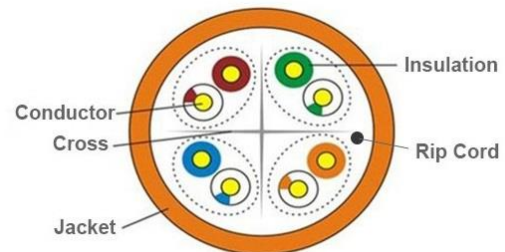


Overview

The **Solitine UTP Cat6 CCA Network Cable** is a high-performance, cost-effective solution designed for high-speed data networking and analog/digital video setups. Engineered with 23 AWG Copper Clad Aluminum (CCA) conductors and integrated with a PE central cross separator (spline), it offers balanced transmission characteristics while mitigating crosstalk. This cable provides an optimal budget-friendly option for local area network (LAN) structures, IP CCTV transmissions, and voice deployments where restricted-length or standard runs are required.



Key Features

- **Optimal Gauge:** Standard 23 AWG solid conductors balance flexibility with reliable structural alignment.
- **Cross Spline Separator:** Internal PE cross separator reduces internal pair-to-pair crosstalk (NEXT) and maintains geometric stability during installation.
- **High Bandwidth:** Supports operating frequencies up to 250 MHz, meeting Category 6 system benchmarks.
- **Flame Retardant Jacket:** Wrapped in an FR-PVC outer jacket, providing essential tensile strength and standard fire protection.
- **Eco-Friendly:** Fully compliant with RoHS 2.0 environmental safety regulations.
- **Packaging:** Housed in a 305-meter (1,000 ft) "Easy-Pull" box to ensure smooth, tangle-free dispensing on-site.

Application

This cable is optimized for high-speed local data environments and standard security network architectures, including:

- 1000BASE-T (Gigabit Ethernet over restricted lengths)
- 100BASE-TX Fast Ethernet & 10BASE-T (IEEE 802.3u/i)
- IP CCTV & Analog Video Transmission
- Voice-over-IP (VoIP) and ISDN telecom setups
- ATM 155 Mbps & Token Ring environments
- *Note: Due to the physical resistance properties of aluminum, CCA cables are recommended strictly for short-range or low-power PoE applications.*

Compliant Standards

- **ANSI/TIA-568.2-D & TIA/EIA-568-B.2** (Category 6 Standards)
- **ISO/IEC 11801** Class E
- **RoHS 2.0** Directive Compliant
- **CE / CPR** Flame Retardant Rated (Class Eca equivalent)

Transmission & Physical Performance

Parameter	Specification
Conductor Material	Solid Copper Clad Aluminum (CCA)
Conductor Diameter	23 AWG (0.57 ± 0.01 mm)
Insulation Material	High-Density Polyethylene (HDPE)
Number of Pairs	4 Twisted Pairs (8 Conductors)
Outer Jacket Material	Flame-Retardant PVC (FR-PVC)
Cable Outer Diameter	6.2 ± 0.4 mm
Characteristic Impedance	$100 \pm 15 \Omega$ (1.0–250.0 MHz)
DC Loop Resistance	$\leq 18.6 \Omega/100$ m
Nom. Velocity of Propagation (NVP)	72%
Operating Temperature	-20°C to +60°C

Ordering Information

Part Number	Description	Jacket Type	Standard Length
SOL5157-GR-U	Solitine U/UTP 4-Pair Cat-6 CCA PVC LAN Cable 23AWG	FR-PVC (Grey)	305m (1000 ft) Pull Box
SOL5157-OR-U	Solitine U/UTP 4-Pair Cat-6 CCA PVC LAN Cable 23AWG	FR-PVC (Orange)	305m (1000 ft) Pull Box

Note: Custom jacket colors (Blue, Yellow, Green, Black) and bulk wooden reel options are available upon wholesale request. Contact your Solitine distribution partner for localized lead times.