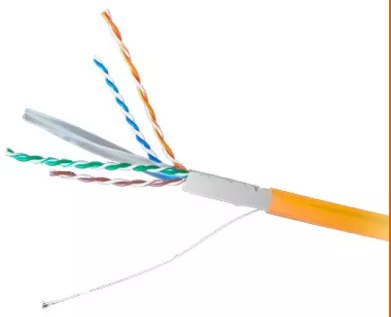
# LANmark-6A UTP Cable

**LANMARK-6A UTP AWG24 CAT 6A LSZH CCA S1A D1 A1 ORANGE 500M REEL**

**Aginode Ref:** N100.638GD-B3L

- Fully compliant with Category 6A standards
- Support 10GBase-T applications
- Guaranteed performance to 500MHz
- Noise immunity tape for enhanced Alien Crosstalk performance
- Reaction-to-fire performance according to CPR classification Cca-s1a,d1,a1 (h/EN50575:2014+A1:2016)



## STANDARDS

ANSI/TIA 568.2-D
EN 50173-1
EN 50288
IEC 61156-5
IEEE 802.3bt (PoE++)
ISO/IEC 11801

## Application

LANmark-6A cables have been specifically designed to support the higher frequencies required for 10 Gigabit Ethernet, whilst maintaining full backwards compatibility with lower speed applications.

They are manufactured and tested to the latest Category 6A specifications of the European, international and American cable standards and meet the quality and performance criteria needed to support all applications up to 500 MHz.

- 10Base-T Ethernet
- 100Base-TX Fast Ethernet
- 1000Base-TX Gigabit Ethernet
- 10GBase-T 10 Gigabit Ethernet
- 155 Mbit ATM
- 1.2 Gbit ATM
- future Cat 6A and Class EA applications

## Design

Aginode LANmark-6A UTP cables feature a double-sided plasticized alu tape which ensures the stringent internal and Alien Crosstalk requirements for Category 6A are met whilst requiring no earthing or bonding.

The cables have a central cross element which maintains the stability of the cable geometry and reduces the risk of decreased performance when bending the cable.

They feature an Orange LSZH sheath and are available in both EuroClass Dca and Cca compliant versions according to EN50575:2014+A1:2016.

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# Performance

With guaranteed performance to 500MHz, Aginode LANmark-6A UTP cables meet the requirements of the International, European and American cable standards for Category 6A as specified in IEC 61156-5, EN 50288 and TIA/EIA 568.2-D.

Systems built with LANmark-6A UTP cable and connectors, in conjunction with LANmark-10G patch cords, support 10GBase-T applications as defined in IEEE 802.3an and meet the link and channel requirements for Category 6A and Class EA as specified in TIA/EIA 568.2-D and ISO/IEC 11801 including all alien crosstalk related parameters.

# Installation

LANmark-6A UTP cable allows swift and rapid installation as no earthing or bonding is required.

To support the correct set-up of hand held analysers for installation testing, the actual cable NVP value is given in the cable print legend.

# Guarantees

Traceability codes on both cable and packaging ensure quality validation of the installed cable.

Installations with LANmark-6A UTP cable and connectivity qualify for a 25 year Class EA Channel warranty when used in combination with LANmark patch cords.

## Electrical Performance LANmark-6A UTP Cable

| Freq<br>in MHz | Attn<br>in dB<br>Max. | NEXT<br>in dB<br>Min. | PSNEXT<br>in dB<br>Min. | ACR-F<br>in dB<br>Min. | PS ACR-F<br>in dB<br>Min. | TCL<br>in dB<br>Min. | ELTCTL<br>in dB<br>Min. | PS ANEXT<br>in dB<br>Min. | PS AACR-F<br>in dB<br>Min. | RL<br>in dB<br>Min. |
|---|---|---|---|---|---|---|---|---|---|---|
| **1** | 2,1 | 75,0 | 72,3 | 67,8 | 64,8 | 40,0 | 35,0 | 67,0 | 67,0 | 20,0 |
| **4** | 3,8 | 66,3 | 63,3 | 55,8 | 52,8 | 40,0 | 23,0 | 67,0 | 66,2 | 23,0 |
| **10** | 5,9 | 60,3 | 57,3 | 47,8 | 44,8 | 40,0 | 15,0 | 67,0 | 58,2 | 25,0 |
| **16** | 7,5 | 57,2 | 54,2 | 43,7 | 40,7 | 38,0 | 10,9 | 67,0 | 54,1 | 25,0 |
| **20** | 8,4 | 55,8 | 52,8 | 41,8 | 38,8 | 39,0 | NA | 67,0 | 52,2 | 25,0 |
| **31,25** | 10,5 | 52,9 | 49,9 | 37,9 | 34,9 | 35,1 | NA | 67,0 | 48,3 | 23,6 |
| **62,5** | 15,0 | 48,4 | 45,4 | 31,9 | 28,9 | 32,0 | NA | 65,6 | 42,3 | 21,5 |
| **100** | 19,1 | 45,3 | 42,3 | 27,8 | 24,8 | 30,0 | NA | 62,5 | 38,2 | 20,1 |
| **155** | 24,1 | 42,0 | 39,4 | 24,0 | 21,0 | 28,5 | NA | 59,6 | 34,4 | 18,8 |
| **200** | 27,6 | 40,8 | 37,8 | 21,8 | 18,8 | 27,0 | NA | 58,0 | 32,2 | 18,0 |
| **250** | 31,1 | 39,3 | 36,3 | 19,8 | 16,8 | 26,0 | NA | 56,5 | 30,2 | 17,3 |
| **300** | 34,3 | 38,1 | 35,1 | 18,3 | 15,3 | 25,2 | NA | 55,3 | 28,7 | 17,3 |
| **500** | 45,3 | 34,8 | 31,8 | 13,8 | 10,8 | 23,0 | NA | 52,0 | 24,2 | 17,3 |

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# LANmark-6A UTP AWG24 Cat 6A LSZH Cca s1a d1 a1 Orange 500m reel

## Characteristics

| | |
|---|---|
| **구조적 특성** | |
| 색상 | 파란색 |
| 피복 | 폴리염화비닐 |
| Type of cable | UTP |
| **치수** | |
| Conductor cross-section (AWG/KCMIL) | 23 |
| Diameter over insulation | 1.12 mm |
| Nominal outer diameter (mm) | 7.4 mm |
| **전기적 특성** | |
| Mutual capacitance | 56 nF/km |
| Characteristic impedance | 100 Ohm |
| 20° C에서 최대 도체 DC저항 | 85 Ohm/km |
| **기계적 특성** | |
| Maximum operating pulling force | 100 N |
| **Transmission characteristics** | |
| Skew | 45 ns/100m |
| Propagation delay, max. 100 MHz | 536 ns/100m |
| **사용 특성** | |
| Range | LANmark-6A |
| Length | 305 m |
| 操作温度范围 | -20...60 °C |
| Category | Cat. 6A |
| 난연 | CMR - UL 1666 |
| Packaging | Reel |
| Ambient installation temperature, range | 0...50 °C |
| 최소 굽힘 반지름 - 설치시 (장력작용) | 59.2 mm |
| 최소 굽힘 반지름 - 설치 후 | 29.6 mm |

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