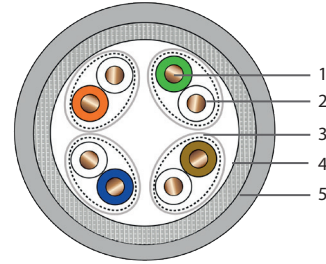


CAT 7 S-FTP 23 AWG 1000 MHZ DATA CABLE

IEC 61156-5+A1, ANSI/TIA-568-2.D, ISO/IEC 11801, TS EN 60332-1-2, EN 50173



| WHERE IT IS USED/ FEATURES | CABLE STRUCTURE |
|--|---|
| <p>ERAT CAT 7 cables are used for digital and analog audio, data and video, POE signals used for transportation.</p> <p>ERAT CAT 7 S/FTP cables are a type of cable carrying data at a speed of 10000 Megabits 1000 MHZ. According to customer demands, production is carried out with LSZH-HFFR and PVC sheaths.</p> <ul style="list-style-type: none"> • 10000BASE-TX Gigabit Ethernet • 10000BASE-T Gigabit Ethernet • 1000BASE-TX Gigabit Ethernet • 1000BASE-T Gigabit Ethernet • ATM 155 / ATM 25 • 100BASE-T "Fast Ethernet" • 100BASE-T2/ 100BASE-T4 • 100BASE-TX • 10BASE-T Ethernet • ISDN, TPDDI, TP-PMD • Power Over Ethernet (PoE) | <ol style="list-style-type: none"> 1. Copper Conductor 2. PE Insulation 3. Aluminium Foil 4. Tinned Copper Braid 5. Outer Jacket |

PHYSICAL PROPERTIES

| | |
|---------------------------------------|--|
| Conductive | Solid, annealed copper |
| Conductor Diameter | 23 AWG |
| Insulation | Polyolefin |
| Number of Insulated Conductors | 8, twisted in 4 pairs |
| Overall Inner Shield | Laminated aluminum foil providing 100% coverage (the foil face is turned outwards) |
| Overall Outer Shield | Tinned Copper Braid |
| Outer Jacket | LSZH (Low Smoke Zero Halogen) flame retardant or PVC component |
| Jacket Color | Gray. (Ral 7040) (Different colors can be produced according to customer demand.) |
| Cable information the text | Brand, Type of cable, Relevant standards, Date, Serial number, Meter |
| CPR | B2ca |

MECHANICAL AND ENVIRONMENTAL PROPERTIES









| | |
|------------------------------------|----------------------------|
| Pulling Force | 50 N / mm ² max |
| Bending Radius (Short Term) | 4 x Cable Diameter |
| Bending Radius (Long Term) | 8 x Cable Diameter |
| Operating Temperature | -40 to +70 °C |
| Installation Temperature | -10 to +50 °C |
| Storage Temperature | -40 to +70 °C |

CAT 7 S-FTP 23 AWG 1000 MHZ DATA CABLE

| PACKAGING & SIZE & WEIGHT | | |
|---------------------------|---------------------|-------------------------|
| Packaging Type | Outer Diameter (mm) | Approximate Weight (kg) |
| 500 m Plywood Reel | 7.4±0.3 | 28.5 |
| 1000 m Plywood Reel | 7.4±0.3 | 60.2 |

| ELECTRICAL SPECIFICATIONS | |
|--|--|
| Characteristic Impedance | 100±6 Ohm @ 1-1000 MHz |
| DC Resistance | 76 Ohm/km max. |
| Resistance Unbalance | 2% max. |
| Capacitance | 45 pF/m nom. @ 1 KHz |
| Capacity Imbalance (Wire to ground) | 1600 pF/km max. @ 1 KHz. |
| Voltage | 72 Vdc max. |
| Dielectric Strength | 1500 Volt / 1 dakika min. rms |
| Velocity of Propagation (NVP) | Min. %77 - 80 |
| The Signal Transmission Time (Prop. Delay) | 534 + 36/f ^{0.5} @ 1-1000 MHz |
| Propagation Delay Skew | 25 nS/100m max @ 1-1000 MHz |
| Insulation Resistance | 5000 MegaOhm•km min. @ 500 Vdc |
| Coupling attenuation | 55 dB min @ 30-100 MHz 55-20Log(f/100) @100-1000 MHz |
| Transfer Impedance | 10 mOhm/m max @ 1-30 MHz 30 MOhm/m max @ 30-100 MHz |

| Frequency (MHz) | Return Loss (dB) | Insertion Loss (dB/100m) | NEXT Loss (dB) | PS NEXT Loss (dB) | PS ELFEXT (dB/100m) |
|-----------------|------------------|--------------------------|----------------|-------------------|---------------------|
| 1 | 20,0 | 2,0 | 78,0 | 75,0 | - |
| 4 | 23,0 | 3,7 | 78,0 | 75,0 | 75,0 |
| 8 | 24,5 | 5,2 | 78,0 | 75,0 | 72,9 |
| 10 | 25,0 | 5,9 | 78,0 | 75,0 | 71,0 |
| 16 | 25,0 | 7,4 | 78,0 | 75,0 | 66,9 |
| 20 | 25,0 | 8,3 | 78,0 | 75,0 | 65,0 |
| 25 | 24,3 | 9,3 | 78,0 | 75,0 | 63,0 |
| 31,25 | 23,6 | 10,4 | 78,0 | 75,0 | 61,1 |
| 62,5 | 21,5 | 14,9 | 75,5 | 72,5 | 55,1 |
| 100 | 20,1 | 19,0 | 72,4 | 69,4 | 51,0 |
| 200 | 18,0 | 27,5 | 67,9 | 64,9 | 45,0 |
| 250 | 17,3 | 31,0 | 66,4 | 63,4 | 43,0 |
| 300 | 17,3 | 34,2 | 65,2 | 62,2 | 41,5 |
| 400 | 17,3 | 40,0 | 63,4 | 60,4 | 39,0 |
| 500 | 17,3 | 45,3 | 61,9 | 58,9 | 37,0 |
| 600 | 17,3 | 50,1 | 60,7 | 57,7 | 35,4 |
| 700 | 17,3 | 54,6 | 59,7 | 56,7 | 34,1 |
| 800 | 17,3 | 58,9 | 58,9 | 55,9 | 32,9 |
| 1000 | 17,3 | 66,9 | 57,4 | 54,4 | 31,0 |

| ISOLATED COLORS | | | | | | | |
|---|---|---|---|---|---|---|---|
|  |  |  |  |  |  |  |  |
| Blue | White | Orange | White | Green | White | Brown | White |