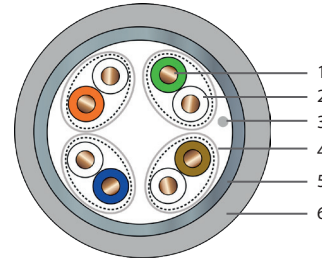


CAT 6 F-FTP 23 AWG DATA CABLE



WHERE IT IS USED/ FEATURES	CABLE STRUCTURE
<p>ERAT CAT 6 cables transmit digital and analog voice, data and video, POE signals, used for transportation.</p> <p>ERAT CAT 6 F/FTP cables, cable carrying data at 250 MHz 1 Gbps/sec is the type. Production with LSZH-HFFR and PVC sheath according to customer demands is being done.</p> <ul style="list-style-type: none"> • 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. Ground Wire 4. Aluminium Foil 5. Aluminium Foil 6. Outer Jacket

PHYSICAL PROPERTIES

Conductive	Solid, annealed copper
Conductor Diameter	23 AWG
Insulation	Polyolefin
Number of Insulated Conductors	8, twisted in 4 pairs
Ground Wire	Solid, tin-coated annealed copper
Overall Inner Shield	Laminated aluminum foil providing 100% coverage (foil face is introverted)
Individual Pair Shield	Laminated aluminum foil providing 100% coverage (the foil face is turned outwards)
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

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

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PACKAGING & SIZE & WEIGHT		
Packaging Type	Outer Diameter (mm)	Approximate Weight (kg)
500 m Plywood Reel	7.4±0.3	28
1000 m Plywood Reel	7.4±0.3	58

ELECTRICAL SPECIFICATIONS	
Characteristic Impedance	100±6 Ohm @ 1-250 MHz
DC Resistance	93 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	1.7 kV a.c. / 2 seconds
Velocity of Propagation (NVP)	Min. %78 - 80
The Signal Transmission Time (Prop. Delay)	534 + 36/f ^{1/2} nS/100m max @ 1-250 MHz
Propagation Delay Skew	45 nS/100m max @ 1-250 MHz
Insulation Resistance	5000 MegaOhm•km min. @ 500 Vdc
Coupling attenuation	55 dB min @ 30-100 MHz 55-20Log(f/100) @100-250 MHz
Transfer Impedance	10 mOhm/m max @ 1-10 MHz 30 mOhm/m max @ 30 MHz

Frequency (MHz)	Return Loss (dB)	Insertion Loss (dB)	NEXT Loss (dB)	PS NEXT Loss (dB)	ACRF (dB)
	Min.	Max.	Min.	Min.	Min.
1.00	19.1	1.9	65.0	62.0	64.2
4.00	21.0	3.5	64.1	61.8	52.1
8.00	21.0	5.0	59.4	57.0	46.1
10.00	21.0	5.5	57.8	55.5	44.2
16.00	20.0	7.0	54.6	52.2	40.1
20.00	19.5	7.9	53.1	50.7	38.2
25.00	19.0	8.9	51.5	49.1	36.2
31.25	18.5	10.0	50.0	47.5	34.3
62.50	16.0	14.4	45.1	42.7	28.3
100.00	14.0	18.6	41.8	39.3	24.2
200.00	11.0	27.4	36.9	34.3	18.2
250.00	10.0	31.1	35.3	32.7	16.2

ISOLATED COLORS							
Blue	White	Orange	White	Green	White	Brown	White