



CABLE STRUCTURE

Conductor	23 AWG Bare Copper
Insulation	PE compound
Central Cross	Halogen free separator
Overall Screen	Al-Pet Foil and Tinned Copper Wire Braiding
Sheath	Halogen free flame retardant compound (SHFI)

TECHNICAL PROPERTIES

Overall diameter	Ø 7,10 ± 0,20 mm
Cable Weight	64 kg/km
Min. Bending radius during draw in	60 mm
Min. Bending radius permanently installed	30 mm
Max. Tensile Strength	90 N
Min. Crush Resistance	1000 N/10 cm
Min. Impact	10 Impacts
Installation Temperature	0°C / +50°C
Operating Temperature	- 20°C / +70°C
Standarts	IEC 61156-5, EN 50288-5-1, EN 50173-1, ISO/IEC 11801 2nd ed
Flame Retardant	IEC 60332-1-2, IEC 60332-3-24
Halogen Free	IEC 60684-2, IEC60754-1/2
Low Smoke	IEC 61034-1/2

ELECTRICAL PROPERTIES at 20°C

Max. Conductor Resistance	< 9.5 Ω / km
Max. Resistance Unbalance	< 2 %
Min. Insulation Resistance	5000 MΩ x m
Mutual Capacitance	< 60 pF / m
Capacitance Unbalance	1600 pF / km
Impedance at 100 MHz	100 ± 5 Ω
Velocity of Propagation	66 %
Delay Skew	< 45 ns / 100 m
Coupling Attenuation	> 70 Db
Transfer Impedance at 1/10 / 30 MHz	< 10 / 10 / 30 mΩ / m
Segregation Class	C
Test Voltage	1000 V
Operating Voltage	125 V

APPLICATIONS

IEEE 802.3: 10Base-T, 100Base-T, 1000Base-T, IEEE 802.5 16 MB, ISDN, TPDDI, ATM Power over Ethernet (PoE) / PoE+. These cables are used in data communication networks and for the transmission of digital and analogue voice, video and signals on ships.



Nominal Transmission Characteristics at 20 °C

Frequency (MHz)	Attenuation (dB/100 m)	NEXT (dB)	PS - NEXT (dB)	ACR (dB/100 m)	PS-ACR (dB/100 m)	ACRF (dB/100 m)	PS-ACRF (dB/100m)	Return Loss (dB)
1	2	83	80	85	82	83	80	25
4	3.6	73	70	70	67	70	67	31
10	6	73	70	65	62	60	57	30
100	19.5	55	52	40	37	35	32	25
200	28.5	50	47	25	22	30	27	22
250	32	45	42	25	22	22	19	22
300	33	40	37	15	12	20	17	22
400	39	40	37	17	4	20	17	20