

## PRESENTATION

These cables are for exterior use in local networks. They are plastic-wrapped suitable for underground installations in ducts.

## REFERENCE STANDARDS

UTE C 93-526 and UTE C 93-527-2

## CABLE STRUCTURE

### 1- Conductors

Each conductor consists of solid copper having a diameter of 0.4, 0.6 and 0.8 mm

### 2- Insulation of conductors

Conductors are insulated by a solid polyethylene layer.

The insulator is direct and such thick so as the electric specifications are respected.

### 3- Stranding

- Element of cabling: insulated conductors are assembled in Star Quads

- Cabling elements:

- Quads are assembled in concentric cables having a capacity of 8 pairs, 14 pairs and 28 pairs.
- Cables with 56 pairs are assembled in basic bundles of 14 pairs
- Cables having a capacity higher than 56 pairs are assembled in basic bundles of 28 pairs

### 4- Core wrapping

A dielectric polyester tape is applied over the cable core.

### 5- Screen

Over the cables core cover is applied an aluminium tape.

### 6- Drain wire

The Drain wire consists of tinned copper and has a diameter of 0.5 mm.

### 7- Outer sheath

The sheath consists of low density polyethylene. It is black and contains  $2.5 \pm 0.5$  mm of carbon black. It is complying with the European standards requirements EN 50290-2-24.



## DIMENSIONS

Cable	Sheath thickness (mm)	Max. diameter on sheath (mm)	Cable	Sheath thickness (mm)	Max. diameter on sheath (mm)
88 - 8 - 4	1,3	7,8	88 - 112 - 4	1,6	17,2
88 - 8 - 6	1,3	9,2	88 - 112 - 6	1,8	23,2
89 - 8 - 8	1,3	10,7	89 - 112 - 8	1,8	30,2
88 - 14 - 4	1,3	8,7	88 - 224 - 4	1,8	23,0
88 - 14 - 6	1,4	10,7	88 - 224 - 6	2,0	31,2
89 - 14 - 8	1,4	13,2	89 - 224 - 8	2,0	40,2
88 - 28 - 4	1,4	10,2	88 - 448 - 4	2,0	31,5
88 - 28 - 6	1,5	13,4	88 - 448 - 6	2,2	43,0
89 - 28 - 8	1,5	16,2	89 - 448 - 8	2,2	55,8
88 - 56 - 4	1,5	13,2	88 - 896 - 4	2,2	42,2
88 - 56 - 6	1,6	18,0	88 - 896 - 6	2,4	61,0
89 - 56 - 8	1,6	22,7	88 - 1792 - 4	2,4	57,2
			88 - 2688 - 4	2,4	66,5

## ELECTRICAL CHARACTERISTICS

### 1- Conductor electrical resistance

The conductor electrical resistance does not exceed the following values:

Conductor diameter (mm)	Individual value (Ω/km)	Average (Ω/km)
0,4	150	144
0,6	66,6	63,9
0,8	36,8	35,3

### 2- Voltage test

The cable insulation of conductors resists without failure to a direct voltage for one minute. The voltage values are provided in the table below according to the conductor diameter:

Conductors diameter (mm)	Applied voltage (kV)	
	Between conductors	Between conductor and screen
0,4	0,6	1,5
0,6	1,15	1,5
0,8	1,5	2,25

### 3- Insulation resistance

The insulation resistance values, at 200 V, are higher than 5000 MΩ.km;

### 4- Mutual capacitance

The mutual capacity values do not exceed the following values:

Number of pairs	Average value (nF/km)	Individual value (nF/km)
4	-	62,0
8 à 14 paires	-	57,5
28 paires	55,0	57,5
> 28 paires	52,5	57,5

### 5- Environmental characteristics

These cables do not contain any substance referred to in the European Decree N° 2002/95/EC(RoHS) of January 27, 2003, relating to limiting the use of certain dangerous substances in electric and electronic equipment.