

## K23

Signalling Urban railways (underground networks)

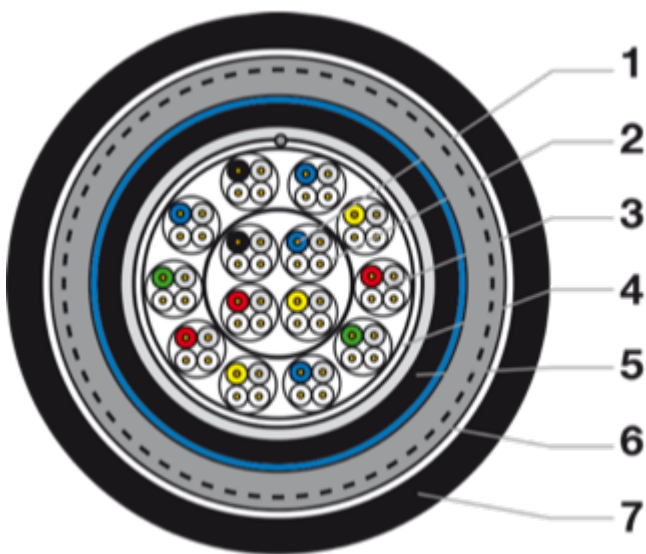
## BENEFITS

- International benchmark for tunnel cables
- Exceptional fire performance and mechanical properties

## APPLICATIONS

- Main cable for signal, remote control and remote transmission, installed in ducts, cable trays or on hooks
- Halogen-free cable, laid along electrified underground lines up to 1500VCC
- Intended use: metro
- Other possible uses: tunnel or underground sections of the Regional Express Network and Tramway

## GENERAL CHARACTERISTICS



1. Red copper solid core
2. Insulation: coloured polyethylene
3. 4-wire wiring except in 4 pairs (twisted pair wiring)

4. Shielding by aluminium tape with continuity wire
5. Internal water-blocking sheath made of halogen-free material
6. Armour: steel spiral strips
7. Outer jacket in coloured halogen-free materials + marking + metric

## Mechanical

- Operating temperature: 60°C
- Resistant to mineral oils
- Resistant to acids and bases
- Resistant to tearing, damage and cracking
- Fire resistance: Euroclass B2ca-s1a, d0, a1
- Bending radius: Static: 8 x D, Dynamic: 16 x D

## Electrical

- Linear resistance:
  - 6/10 cores: 64Ω/km,
  - 10/10 cores: 23Ω/km,
  - 12/10 cores: 16Ω/km
- Operating voltages:
  - 6/10 cores: 150V,
  - 10/10 cores: 500V,
  - 12/10 cores: 750V
- Capacitances:
  - 1 pair: < 67nF/km,
  - 4 pairs: < 62nF/km,
  - others: < 57.5nF/km
- Average capacitance unbalance for 500m:
  - in the 4-wire cable: 90pF,
  - between 4-wires or adjacent pairs: 45pF

## RANGE

	Number of pairs	Diameter of insulation (mm)	Diameter of sheath (mm)	Net weight (kg/km)	Reel format Length (m)
Range 6/10					
U3636	2 p.	0,9	9,1	150	A 500
U3637	4 p.	0,9	10,3	175	A 500
U3638	8 p.	0,9	11,9	230	A 500
Range 10/10					
U3656	2 p.	1,8	10,8	210	A 500
U3657	4 p.	1,8	14,1	310	B 500
U3658	8 p.	1,8	17,3	460	D 500
U3659	14 p.	1,8	19,5	610	D 500
U3660	20 p.	1,8	22,8	775	E 500
U3661	28 p.	1,8	25,4	1020	E 500
Range 12/10					
U3666	1 p.	2,0	11,0	210	A 500
U3667	2 p.	2,0	11,8	245	A 500
U3668	4 p.	2,0	15,4	375	B 500
U3669	8 p.	2,0	18,4	545	C 500
U3670	14 p.	2,0	21,3	745	C 500
U3671	20 p.	2,0	24,3	1010	D 500
U3672	28 p.	2,0	27,4	1270	E 500

## NORMS AND STANDARDS

### General standards

- LSOH
- Standard NF F 55-623