

MULTICORE FLEXIBLE CABLES 0.6/1 kV

XLPE/PVC (Multicore) X-90


Application

Suitable for mains, submains and sub circuits unenclosed, enclosed in conduit, buried or in underground ducts for building and industrial plants where not subject to mechanical damage. Suitable where space is at a premium and/or where conditions of overload may occur.

Approvals

Suitable for fixed installations only, in accordance with AS/NZS 3000 + AS/NZS 5000.1

Behaviour in flame and fire:

Flame propagation – AS/NZS 1660.5.6

Temperature range

Maximum operating temperature: +90°C

Minimum operating temperature: -25°C

Minimum bending radius

Installed cables: 4D

During installation: 6D

Resistance to

Chemical exposure: Occasional

Mechanical impact: Light

Water exposure: Occasional condensation

Solar radiation and

weather exposure: Occasional

Cable design

Conductor:

Class 5 Flexible as per the datasheet

Insulation:

X-90 XLPE (Flexible XLPE)

Colour: 1C: Natural

2C+E: Red, Black, Green/yellow

4C+E: Red, White, Blue, Black, Green/yellow

Sheath:

5V-90 PVC

Colour: Orange

Installation conditions

In free air

In conduit

In trench

In ground with protection

In duct

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Physical & electrical characteristics

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Product code	Conductor		Cable			Min. installed bending radius mm
	Nominal C.S.A. mm ²	Number of cores	Nominal insulation thickness mm	Nominal overall diameter mm	Approx. mass kg/100 m	
102CEFF90	10	2C+E	0.7	14.6	34.2	60
162CEFF90	16	2C+E	0.7	16.5	47.7	70
104CEFF90	10	4C+E	0.7	17.6	58.8	70
164CEFF90	16	4C+E	0.7	20.7	85.2	85
254CEFF90	25	4C+E	0.9	24.5	122.2	100
354CEFF90	35	4C+E	0.9	27.3	162.3	110
504CEFF90	50	4C+E	1.0	32.6	234.2	135
704CEFF90	70	4C+E	1.1	38	332.8	155
954CEFF90	95	4C+E	1.1	42.7	420.9	175

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Nominal conductor area mm ²	Unenclosed		Buried direct A	Underground wiring enclosure A	Maximum DC resistance @ 20°C Ω/km	Three phase* voltage drop (@ 50Hz & 90°C) mV/A. m
	Spaced A	Touching A				
TWO CORE						
10	78	72	75	74	1.91	4.22
16	103	96	132	95	1.21	2.68
25	136	128	170	124	0.78	1.73
35	169	158	205	150	0.554	1.23
50	213	199	244	186	0.386	0.866
70	269	251	300	231	0.272	0.618
95	322	300	360	271	0.206	0.477
THREE & FOUR CORE						
10	66	61	63	62	1.91	4.22
16	87	81	110	79	1.21	2.68
25	116	108	143	103	0.78	1.73
35	144	135	172	127	0.554	1.23
50	182	170	204	155	0.386	0.866
70	230	214	251	193	0.272	0.618
95	275	256	302	226	0.206	0.477

Note: Refer to Cable Selection in Technical Cable Guide for more information and data based on AS/NZS 3008.1.1.

*To determine the single phase Voltage drop value, the current in the neutral conductor needs to be considered by multiplying the three phase value by 1.155

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