

Single Core

Copper, XLPE Insulated, AWA, FRPVC / LHFRPVC sheathed.

Application:

For use in power circuit systems of 600 / 1000V. Installed in cable trays and ducts.

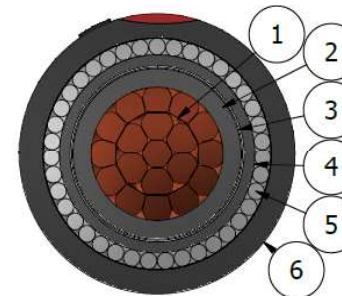
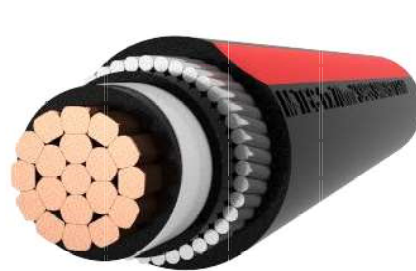
Construction:

Single core, circular Copper stranded conductor, XLPE insulated, FRPVC bedded, Aluminium wire armour, FRPVC sheath.

Voltage rating: 600 / 1000V

Specification: SANS 1507-4

SIZE CODE		CPX 1x(conductor size)FR / LH AWA 1kV																	
Conductor size	Conductor diameter	Insulation diameter	Cable diameter	Cable mass	Gross mass 500m	Bending radius	Current rating Trefoil			Resistance Ω/km max		Reactance Ω/km	Impedance Ω/km	Capacitance μF/km	Short circuit		Volt drop		
							air	ground	ducts	dc @ 20°C	ac @ 90°C				Symmetrical	Earth fault	Single phase	3 Phase	
mm ² Nom	mm Nom.	mm Nom.	mm Nom.	kg/m Nom.	kg Nom.	mm Min.	A			Ω/km	Ω/km	μF/km	kA (1sec)	kA (1sec)	mV/A/m				
50	8.20	11.10	17.95	0.85	520	144	199	201	165	0.387	0.358	0.115	0.376	0.734	6.43	3.83	0.75	0.65	
70	9.90	12.80	20.06	1.11	663	160	253	247	204	0.268	0.250	0.110	0.273	0.865	9.28	4.16	0.55	0.47	
95	11.75	15.10	21.91	1.40	810	175	312	299	246	0.193	0.186	0.105	0.214	0.886	12.89	4.63	0.43	0.37	
120	13.10	16.40	24.44	1.77	1 083	195	361	340	280	0.153	0.155	0.102	0.185	0.989	16.26	5.14	0.37	0.32	
150	14.75	18.50	26.55	2.10	1 251	212	403	374	312	0.124	0.133	0.099	0.166	0.981	20.06	5.77	0.33	0.29	
185	16.30	20.50	28.46	2.50	1 452	228	463	422	353	0.099	0.114	0.098	0.150	0.969	25.10	6.18	0.30	0.26	
240	18.85	23.40	31.62	3.23	1 815	253	544	487	407	0.075	0.092	0.094	0.132	1.028	32.99	6.16	0.26	0.23	
300	21.15	26.10	35.08	3.94	2 170	281	616	543	455	0.060	0.076	0.094	0.121	1.057	41.39	9.85	0.24	0.21	
400	23.85	29.20	39.40	5.06	2 732	315	705	611	512	0.047	0.061	0.094	0.112	1.098	52.93	13.95	0.22	0.19	
500	27.15	32.90	43.52	6.27	3 335	348	717	666	558	0.037	0.050	0.091	0.104	1.157	67.97	15.34	0.21	0.18	



Item	Description
1	Annealed Copper conductor
2	Insulation
3	Separator tape if applicable
4	Bedding
5	Aluminium wire armour
6	Sheath

Revision: R00 24/07/2017



The information contained within this document must not be copied, reprinted or reproduced in any form, either wholly or in part, without the written consent of M-TEC. The information is believed to be correct at the time of issue to the best of M-TEC's knowledge. M-TEC reserves the right to amend this specification without prior notification. This specification is not contractually valid unless specifically authorised by M-TEC. M-TEC shall not be liable for any damages whatsoever (including indirect, accidental, special, punitive or consequential damages and loss of profits, opportunities or information) arising from or result from the use of or reliance on information contained in this document, and/or any inaccuracy or omission in such information contained in this document.