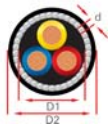
Armadac®
PVC PVC SWA PVC (FR) BLK/Red (1,9 / 3,3 kV)

ABERDARE CABLES
Driven by Powertech

D1 = Diameter over bedding sheath d = Diameter of armour wire D2 = Diameter over outer sheath



Cable Description
Electrical and physical properties of 3 core PVC insulated PVC bedded SWA PVC sheathed 1,9 / 3,3 kV cables with copper conductors and manufactured to SANS 1507-3.

Application Information
The cost effectiveness of transferring power over long distances through intermediate step-up step-down systems is desirable for the electrification of industrial and residential installations, including game lodges.

Armadac® consists of 3 circular stranded plain soft copper conductors, PVC insulated, PVC bedded, Steel Wire Armoured, PVC sheathed, 1,9/3,3 kV manufactured to SANS 1507-3. Applications where this cable can typically be used include, amongst others, residential installations, game lodges and general long distance electricity transfer applications at intermediate voltage.

Advantages of using an intermediate voltage cable over the conventional 400V 3-phase system offered by the increased voltage of 3,3 kV include the fact that volt drop will be considerably lower and small conductor sizes (10mm², 16mm² or 25mm²) will suffice for most applications. The Armadac® cable is steel wire armoured and provides a robust mechanical protection to the cable, hence it is suitable to be installed underground. Furthermore, Armadac® offers additional protection against attack by rodents and other animals as provided by the steel wire armouring. The steel wire armouring can also be utilized as an earth continuity path, therefore eliminating the need for an external earth conductor. Armadac® makes use of circular cores which limits electrical stress in the insulation and also incorporates a flame retardant PVC Sheath, which limits the spread of fire.

Properties

Specification	:	SANS 1507-3
Temperature Range	:	-10°C to 70°C
Voltage Rating	:	1900/3300V
Core Identification	:	Red, Yellow, Blue
Packaging	:	Available on 500 metre wooden drums

Technical Data

Electrical & Physical Properties

Cable Size	Electrical Properties						Physical Properties			
	Current Rating *			Impe-dance (Z)	Volt Drop	1 Sec Short Circuit Rating	Nominal Diameters			Approx. Mass
	Ground	Ducts	Air				D1	d	D2	
(mm²)	(A)	(A)	(A)	(Ω/km)	(mV/A/m)	(kA)	(mm)	(mm)	(mm)	(kg/km)
10	68	58	60	2.34	2,2	1,4	20,7	1,6	227,3	1543
16	91	76	81	1.47	1,4	2,2	22,8	1,6	29,6	1859
25	113	95	103	0.93	0,9	3,4	24,9	1,6	31,7	2221

- Recommended depth of lay 500mm. Soil thermal resistivity 1,2 km/W
- Soil temperature at 25°C
- * In ground at 500mm depth