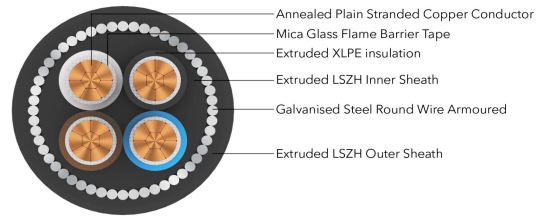


POLYCAB IGNIS 210

Fire Survival Cable, 600/1000 V AC



Images not to scale. Follow table for dimensions

APPLICATION

POLYCAB FS Multicore core Armoured cable is suitable to use in various indoor & outdoor applications where continuity of power supply during the event of fire, is highly essential and corrosive gas evaluation could be a cause of hazard to the people or the precision instruments in high rise building, schools, hospitals, hotels, Malls, Subways etc.

CHARACTERISTICS

Voltage Rating
0.6/1KV

Operation Temperature
-40°C to +90°C
Short Circuit Temperature 250°C

Bending Radius
Min. 12 x Overall Diameter

Test Voltage
3500 V AC at (20±5) °C

CONSTRUCTION

- Annealed plain stranded copper conductor as per IEC 60228, Class-2.
- Mica Glass flame barrier tape.
- Extruded XLPE insulation.
- Insulated Cores assembled together.
- Extruded LSZH Inner Sheath (FRLS Inner Sheath available on demand)
- Galvanised Steel Wire Armoured.
- Extruded LSZH Outer Sheath, Colour: Black. (FRLS Outer Sheath available on demand) (other colour as per request).

Core Identification

- 2 core: brown, blue;
- 3 core: brown, black, grey;
- 4 core: blue, brown, black, grey;
- 5 core: green-and-yellow, blue, brown, black, grey;
- Above 5 core can be supplied with number printing
- (All cores: optional number printing)

OUTSTANDING FEATURES

- High Resistant to Fire
- Reduced Flame Propagation
- Circuit Integrity when exposed to Fire
- Low Toxicity
- Fire Barrier

STANDARD FOLLOWS

EN 60228:2005
BS 7846:2016

COMPLIANCE

Fire Resistant	BS 7846-F2 / BS 6387 CWZ / BS EN 50200 (PH 60) / BS 8434 / BS 8491 / EN 60331-3
Flame Propagation	EN 60332-1-2
Fire Retardant	EN 60332-3-24 (Cat.C)
Halogen free material	EN 60754-1
Smoke Density	EN 61034-2
Toxicity	NES 02-713

OUR ACCREDITATIONS



APPROVAL



DIMENSIONS AND WEIGHTS:

Product Code	No. of Cores	Cross Sectional Area (mm ²)	Nom. Insulation Thickness (mm)	Nom. Dia over Armour (mm)	Nom. Cable Overall Dia. (mm)	Cable Weight Approx. (kg / km)
FSBS07CXSWLS002C1.5SA001P	2	1.5 A)	0.6	10.9	13.5	340
FSBS07CXSWLS002C2.5SA001P	2	2.5 A)	0.7	12.1	14.9	410
FSBS07CXSWLS002C004SA001P	2	4 A)	0.7	13.2	16	470
FSBS07CXSWLS002C006SA001P	2	6 A)	0.7	14.3	17.2	540
FSBS07CXSWLS002C010SA001P	2	10 A)	0.7	16.2	19.2	690
FSBS07CXSWLS002C016SA001P	2	16 A)	0.7	19	22	1010
FSBS07CXSWLS002C025SA001P	2	25 A)	0.9	22.4	25.7	1330
FSBS07CXSWLS002C025SA001P	2	25 B)	0.9	18.7	22	1170
FSBS07CXSWLS002C035SA001P	2	35 A)	0.9	25.8	29.2	1830
FSBS07CXSWLS002C035SA001P	2	35 B)	0.9	21.4	25	1590
FSBS07CXSWLS002C050SA001P	2	50 B)	1	24	27.8	2030
FSBS07CXSWLS002C070SA001P	2	70 B)	1.1	26.8	30.8	2550
FSBS07CXSWLS002C095SA001P	2	95 B)	1.1	30.4	34.6	3420
FSBS07CXSWLS002C120SA001P	2	120 B)	1.2	32.1	36.5	4020
FSBS07CXSWLS002C150SA001P	2	150 B)	1.4	35.1	39.7	4780
FSBS07CXSWLS002C185SA001P	2	185 B)	1.6	39.7	44.7	6100
FSBS07CXSWLS002C240SA001P	2	240 B)	1.7	43.3	48.6	7410
FSBS07CXSWLS002C300SA001P	2	300 B)	1.8	47.4	52.8	8890
FSBS07CXSWLS002C400SA001P	2	400 B)	2	51.7	57.6	10660
FSBS07CXSWLS003C1.5SA001P	3	1.5 A)	0.6	11.5	14.1	385
FSBS07CXSWLS003C2.5SA001P	3	2.5 A)	0.7	12.8	15.6	470
FSBS07CXSWLS003C004SA001P	3	4 A)	0.7	14	16.8	550
FSBS07CXSWLS003C004SA001P	3	4 A)C)	0.7	14.7	17.5	655
FSBS07CXSWLS003C006SA001P	3	6 A)	0.7	15.2	18	650
FSBS07CXSWLS003C006SA001P	3	6 A)C)	0.7	15.9	18.7	760
FSBS07CXSWLS003C010SA001P	3	10 A)	0.7	17.9	20.9	970
FSBS07CXSWLS003C016SA001P	3	16 A)	0.7	20.2	23.4	1250
FSBS07CXSWLS003C025SA001P	3	25 A)	0.9	25	28.4	1890
FSBS07CXSWLS003C025SA001P	3	25 B)	0.9	21.5	24.9	1700
FSBS07CXSWLS003C035SA001P	3	35 A)	0.9	27.5	31	2300
FSBS07CXSWLS003C035SA001P	3	35 B)	0.9	23.3	26.9	2070
FSBS07CXSWLS003C050SA001P	3	50 B)	1	26.2	30	2660
FSBS07CXSWLS003C070SA001P	3	70 B)	1.1	29.3	33.1	3400
FSBS07CXSWLS003C095SA001P	3	95 B)	1.1	33.3	37.6	4580
FSBS07CXSWLS003C120SA001P	3	120 B)	1.2	36	40.5	5470

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Product Code	No. of Cores	Cross Sectional Area (mm ²)	Nom. Insulation Thickness (mm)	Nom. Dia over Armour (mm)	Nom. Cable Overall Dia. (mm)	Cable Weight Approx. (kg / km)
FSBS07CXSWLS003C150SA001P	3	150 B)	1.4	40.5	45.1	6950
FSBS07CXSWLS003C185SA001P	3	185 B)	1.6	44.6	49.4	8300
FSBS07CXSWLS003C240SA001P	3	240 B)	1.7	48.9	54.1	10210
FSBS07CXSWLS003C300SA001P	3	300 B)	1.8	53.5	58.9	12350
FSBS07CXSWLS003C400SA001P	3	400 B)	2	58.6	64.4	14890
FSBS07CXSWLS004C1.5SA001P	4	1.5 A)	0.6	12.5	15.1	435
FSBS07CXSWLS004C2.5SA001P	4	2.5 A)	0.7	14	16.7	530
FSBS07CXSWLS004C004SA001P	4	4 A)	0.7	15.3	18.1	640
FSBS07CXSWLS004C006SA001P	4	6 A)	0.7	17.3	20.3	890
FSBS07CXSWLS004C010SA001P	4	10 A)	0.7	19.6	22.6	1140
FSBS07CXSWLS004C016SA001P	4	16 A)	0.7	22.1	25.3	1470
FSBS07CXSWLS004C025SA001P	4	25 A)	0.9	27.4	30.8	2250
FSBS07CXSWLS004C025SA001P	4	25 B)	0.9	24.7	28.1	2100
FSBS07CXSWLS004C035SA001P	4	35 A)	0.9	30.2	33.7	2780
FSBS07CXSWLS004C035SA001P	4	35 B)	0.9	27	30.6	2580
FSBS07CXSWLS004C050SA001P	4	50 B)	1	30.6	34.4	3360
FSBS07CXSWLS004C070SA001P	4	70 B)	1.1	35.7	40	4680
FSBS07CXSWLS004C095SA001P	4	95 B)	1.1	39.3	43.7	5840
FSBS07CXSWLS004C120SA001P	4	120 B)	1.2	43.1	47.7	7420
FSBS07CXSWLS004C150SA001P	4	150 B)	1.4	47.2	52	8910
FSBS07CXSWLS004C185SA001P	4	185 B)	1.6	51.6	56.8	10620
FSBS07CXSWLS004C240SA001P	4	240 B)	1.7	57.1	62.5	13130
FSBS07CXSWLS004C300SA001P	4	300 B)	1.8	62.3	68	15890
FSBS07CXSWLS004C400SA001P	4	400 B)	2	70	76.4	20250
FSBS07CXSWLS005C1.5SA001P	5	1.5	0.6	13.5	16.3	495
FSBS07CXSWLS005C2.5SA001P	5	2.5	0.7	15.2	18	605
FSBS07CXSWLS005C004SA001P	5	4	0.7	16.6	19.7	740
FSBS07CXSWLS005C004SA001P	5	4 A)	0.7	17.3	20.4	860
FSBS07CXSWLS005C006SA001P	5	6	0.7	18.9	21.9	1020
FSBS07CXSWLS005C010SA001P	5	10	0.7	21.4	24.6	1330
FSBS07CXSWLS005C016SA001P	5	16	0.7	25.3	28.7	1950
FSBS07CXSWLS005C025SA001P	5	25	0.9	30	33.6	2650
FSBS07CXSWLS005C035SA001P	5	35	0.9	33	36.9	3280
FSBS07CXSWLS005C050SA001P	5	50	1	39.1	43	4640
FSBS07CXSWLS005C070SA001P	5	70	1.1	43.8	48.2	5840
FSBS07CXSWLS007C1.5SA001P	7	1.5	0.6	14.6	17.5	580

POLYCAB IGNIS 210

Fire Survival Cable, 600/1000 V AC

Product Code	No. of Cores	Cross Sectional Area (mm ²)	Nom. Insulation Thickness (mm)	Nom. Dia over Armour (mm)	Nom. Cable Overall Dia. (mm)	Cable Weight Approx. (kg / km)
FSBS07CXSWLS007C1.5SA001P	7	1.5 A)	0.6	15.3	18.2	690
FSBS07CXSWLS012C1.5SA001P	12	1.5	0.6	19.7	22.7	990
FSBS07CXSWLS019C1.5SA001P	19	1.5	0.6	22.8	26.1	1300
FSBS07CXSWLS027C1.5SA001P	27	1.5	0.6	28.2	31.7	1920
FSBS07CXSWLS037C1.5SA001P	37	1.5	0.6	31.4	34.9	2315
FSBS07CXSWLS007C2.5SA001P	7	2.5	0.7	16.5	19.3	720
FSBS07CXSWLS007C2.5SA001P	7	2.5 A)	0.7	17.2	20	840
FSBS07CXSWLS012C2.5SA001P	12	2.5	0.7	22.2	25.5	1230
FSBS07CXSWLS019C2.5SA001P	19	2.5	0.7	27	30.5	1860
FSBS07CXSWLS027C2.5SA001P	27	2.5	0.7	32	36.7	2410
FSBS07CXSWLS037C2.5SA001P	37	2.5	0.7	35.7	39.4	2970
FSBS07CXSWLS007C004SA001P	7	4	0.7	18.8	21.8	1020
FSBS07CXSWLS012C004SA001P	12	4	0.7	25.6	28.8	1725
FSBS07CXSWLS019C004SA001P	19	4	0.7	29.7	33.2	2300
FSBS07CXSWLS027C004SA001P	27	4	0.7	35.3	39.2	3025
FSBS07CXSWLS037C004SA001P	37	4	0.7	40.7	44.8	4140

Note:

A) Circular or compacted circular stranded conductor (Class 2).

B) Shaped stranded conductor (Class 2).

ELECTRICAL CHARACTERISTICS:

Current Carrying Capacity (Amperes)								
Air Ambient Temperature - 30°C								
Ground Ambient Temperature - 20°C								
Conductor operating Temperature - 90°C								
Conductor cross-sectional area	Max. Conductor Resistance		Reference Method C (clipped direct)		Reference Method E (in free air or on a perforated cable tray etc, horizontal or vertical)		Reference Method D (direct in ground or in ducting in ground, in or around buildings)	
	at 20°C DC	at 90°C AC	1 two-core cable, single-phase AC or DC	1 three- or 1 four-core cable, three-phase AC	1 two-core cable, single-phase AC or DC	1 three- or 1 four-core cable, three-phase AC	1 two-core cable, single-phase AC or DC	1 three- or 1 four-core cable, three-phase AC
mm ²	Ohm/km		Amp.	Amp.	Amp.	Amp.	Amp.	Amp.
1.5	12.1	15.4	27	23	29	25	25	21
2.5	7.41	9.45	36	31	39	33	33	28
4	4.61	5.88	49	42	52	44	43	36
6	3.08	3.93	62	53	66	56	53	44
10	1.83	2.33	85	73	90	78	71	58
16	1.15	1.47	110	94	115	99	91	75
25	0.727	0.927	146	124	152	131	116	96
35	0.524	0.668	180	154	188	162	139	115
50	0.387	0.493	219	187	228	197	164	135
70	0.268	0.342	279	238	291	251	203	167
95	0.193	0.246	338	289	354	304	239	197
120	0.153	0.195	392	335	410	353	271	223
150	0.124	0.158	451	386	472	406	306	251
185	0.0991	0.126	515	441	539	463	343	281
240	0.0754	0.0961	607	520	636	546	395	324
300	0.0601	0.0766	698	599	732	628	446	365
400	0.047	0.0599	787	673	847	728	-	-

The above table is in accordance with Table 4E4A of BS 7671-2018

Current rating de-rating factors for other than 30°C ambient air temperature.

Air Temperature	25	30	35	40	45	50	55	60	65	70	75	80
De-rating factor	1.02	1.00	0.96	0.91	0.87	0.82	0.76	0.71	0.65	0.58	0.50	0.41

Current rating de-rating factors for other than 20°C ground temperature.

Air Temperature	10	15	20	25	30	35	40	45	50	55	60	65	70	75	80
De-rating factor	1.07	1.04	1.00	0.96	0.93	0.89	0.85	0.80	0.76	0.71	0.65	0.60	0.53	0.46	0.38