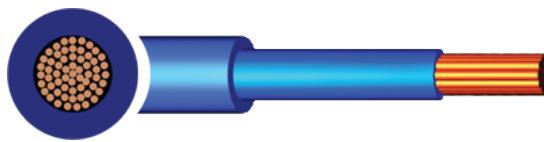


6381B Flexible Cable - Single Core, BS 7211, BS EN 60228, XLPE, LSZH - 16mm² to 300mm²



Description

Flexible, single core, LSZH telecoms cable. For use in DC power supplies on telecoms equipment and power applications where flexible cable is a requirement.

Key Features



Voltage Rating

1.5mm² To 35mm²: 450/750 Volts
50mm² And Above: 600/1000 Volts



Minimum Bending Radius

Fixed: 4 x overall diameter



Flame Retardancy

BS EN/IEC 60332-1-2



Temperature Limits

Temperature Range: 0°C to +90°C

Core Colours

Standard Colours Available:



Standards

- BS EN/IEC 60228
- Up to 35mm²: Generally to BS 7211
50mm² and above: BS EN/IEC 60502-1
- BS EN/IEC 60332-1-2

Construction

- **Conductor:** Class 5 flexible, stranded copper
- **Insulation:** Cross Linked polyethylene (XLPE)
- **Outer Sheath:** Low Smoke Zero Halogen (LSZH)
- **Sheath Colour:** All sizes available in Blue, Grey, Green/Yellow

QA Lab

Cleveland Cable Test & Training Lab

Our state-of-the-art cable testing facility ensures that every cable meets the highest standards of quality and compliance through continuous, rigorous testing. Where applicable, cables are independently tested and certified by BASEC to ensure full compliance.



CPR

Cleveland Cable Company is committed to compliance with the Construction Products Regulation (CPR). Where applicable, all cables manufactured after 1st July 2017 have been assessed in accordance with CPR requirements, with full supporting documentation available.



Our Sustainability Commitment

We are committed to the journey to Net Zero as a business partner, an employer and a community member.

By thinking and acting sustainably, we deliver excellent customer service while reducing carbon emissions in collaboration with our customers and suppliers.



ecovadis

Cleveland Cable Company has been independently assessed by EcoVadis, a globally recognised provider of business sustainability ratings. Our score places us among the top 35% of companies evaluated worldwide, reflecting our strong commitment to environmental, social, and ethical performance

ecovadis

6381B Flexible Cable - Single Core, BS 7211, BS EN 60228, XLPE, LSZH - 16mm² to 300mm² - Dimensions

Reference	Conductor Size (mm ²)	No Of Cores	Stranding(mm)	Overall Diameter(mm)	Weight(Kg/Km)	Gland Size
6381B10	10	1	80/0.40	7.1	121	20S
6381B16	16	1	126/0.40	8.4	177	20S
6381B25	25	1	196/0.40	10.3	266	20
6381B35	35	1	276/0.40	11.5	365	20
6381B50	50	1	396/0.40	14.9	535	20
6381B70	70	1	360/0.50	16.3	723	25
6381B95	95	1	475/0.50	18.6	940	25
6381B120	120	1	608/0.50	20.8	1183	25
6381B150	150	1	756/0.50	22.2	1468	32
6381B185	185	1	925/0.50	24.3	1785	32
6381B240	240	1	1221/0.50	27.8	2310	32



TABLE 4D1A

Conductor cross-sectional area	CURRENT-CARRYING CAPACITY (amperes):						Ambient temperature: 30 °C									
							Conductor operating temperature: 70 °C									
	Reference Method A (enclosed in conduit in thermally insulating wall etc)		Reference Method B (enclosed in conduit on a wall or in trunking etc.)		Reference Method C (clipped direct)		Reference Method F (in free air or on a perforated cable tray horizontal or vertical)									
	2 cables, single-phase AC or DC		3 or4 cables, three-phase AC		2 cables, single-phase AC or DC flat and touching		3 or4 cables, three- phase AC flat and touching or trefoil		2 cables, single-phase AC or DC flat		3 cables, three-phase AC flat		3 cables, three-phase AC trefoil		2 cables, single-phase AC or DC or 3 cables three- phase AC flat	
	2	3	4	5	6	7	8	9	10	11	12			Horizontal	Vertical	
(mm ²)	(A)	(A)	(A)	(A)	(A)	(A)	(A)	(A)	(A)	(A)	(A)			(A)	(A)	
1	11	10.5	13.5	12	15.5	14	-	-	-	-	-					
1.5	14.5	13.5	17.5	15.5	20	18	-	-	-	-	-					
2.5	20	18	24	21	27	25										
4	26	24	32	28	37	33										
6	34	31	41	36	47	43										
10	46	42	57	50	65	59										
16	61	56	76	68	87	79										
25	80	73	101	89	114	104	131	114	110	146	130					
35	99	89	125	110	141	129	162	143	137	181	162					
50	119	108	151	134	182	167	196	174	167	219	197					
70	151	136	192	171	234	214	251	225	216	281	254					
95	182	164	232	207	284	261	304	275	264	341	311					
120	210	188	269	239	330	303	352	321	308	396	362					
150	240	216	300	262	381	349	406	372	356	456	419					
185	273	245	341	296	436	400	463	427	409	521	480					
240	321	286	400	346	515	472	546	507	485	615	569					
300	367	328	458	394	594	545	629	587	561	709	659					
400	-	-	546	467	694	634	754	689	656	852	795					
500	-	-	626	533	792	723	868	789	749	982	920					
630	-	-	720	611	904	826	1005	905	855	1138	1070					
800	-	-	-	-	1030	943	1086	1020	971	1265	1188					
1000	-	-	-	-	1154	1058	1216	1149	1079	1420	1337					



TABLE 4D1B

VOLTAGE DROP (per ampere per metre):

Conductor operating temperature: 70 °C

Conductor cross-sectional area	2 cables DC	2 cables, single-phase AC						3 or 4 cables, three-phase AC														
		Reference Methods A & B (enclosed in conduit or trunking)			Reference Methods C & F (clipped direct, on tray or in free air)			Reference Methods A & B (enclosed in conduit or trunking)		Reference Methods C & F (clipped direct, on tray or in free air)												
					Cables touching		Cables spaced*			Cables touching, Trefoil		Cables touching, Flat		Cables spaced*, Flat								
1	2	3	4	5	6	7	8	9														
mm ²	(mV/Nm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)	(mV/Afm)						
1	44	44	44	44	38	38	38	38														
1.5	29	29	29	29	25	25	25	25														
2.5	18	18	18	18	15	15	15	15														
4	11	11	11	11	9.5	9.5	9.5	9.5														
6	7.3	7.3	7.3	7.3	6.4	6.4	6.4	6.4														
10	4.4	4.4	4.4	4.4	3.8	3.8	3.8	3.8														
16	2.8	2.8	2.8	2.8	2.4	2.4	2.4	2.4														
		r	X	Z	r	X	Z	r	X	Z	r	X	Z	r	X	Z	r	X	Z			
25	1.75	1.80	0.33	1.80	1.75	0.20	1.75	0.29	1.80	1.50	0.29	1.55	1.50	0.175	1.50	1.50	0.25	1.55	1.50	0.32	1.55	
35	1.25	1.30	0.31	1.30	1.25	0.195	1.25	0.28	1.30	1.10	0.27	1.10	1.10	0.170	1.10	1.10	0.24	1.10	1.10	0.32	1.15	
50	0.93	0.95	0.30	1.00	0.93	0.190	0.95	0.93	0.97	0.81	0.26	0.85	0.80	0.165	0.82	0.80	0.24	0.84	0.80	0.32	0.86	
70	0.63	0.65	0.29	0.72	0.63	0.185	0.66	0.63	0.27	0.69	0.56	0.25	0.61	0.55	0.160	0.57	0.55	0.24	0.60	0.55	0.31	0.63
95	0.46	0.49	0.28	0.56	0.47	0.180	0.50	0.47	0.27	0.54	0.42	0.24	0.48	0.41	0.155	0.43	0.41	0.23	0.47	0.40	0.31	0.51
120	0.36	0.39	0.27	0.47	0.37	0.175	0.41	0.37	0.26	0.45	0.33	0.23	0.41	0.32	0.150	0.36	0.32	0.23	0.40	0.32	0.30	0.44
150	0.29	0.31	0.27	0.41	0.30	0.175	0.34	0.29	0.26	0.39	0.27	0.23	0.36	0.26	0.150	0.30	0.26	0.23	0.34	0.26	0.30	0.40
185	0.23	0.25	0.27	0.37	0.24	0.170	0.29	0.24	0.26	0.35	0.22	0.23	0.32	0.21	0.145	0.26	0.21	0.22	0.31	0.21	0.30	0.36
240	0.180	0.195	0.26	0.33	0.185	0.165	0.25	0.185	0.25	0.31	0.17	0.23	0.29	0.160	0.145	0.22	0.160	0.22	0.27	0.160	0.29	0.34
300	0.145	0.160	0.26	0.31	0.150	0.165	0.22	0.150	0.25	0.29	0.14	0.23	0.27	0.130	0.140	0.190	0.130	0.22	0.25	0.130	0.29	0.32
400	0.105	0.130	0.26	0.29	0.120	0.160	0.20	0.115	0.25	0.27	0.12	0.22	0.25	0.105	0.140	0.175	0.105	0.21	0.24	0.100	0.29	0.31
500	0.086	0.110	0.26	0.28	0.098	0.155	0.185	0.093	0.24	0.26	0.10	0.22	0.25	0.086	0.135	0.160	0.086	0.21	0.23	0.081	0.29	0.30
630	0.068	0.094	0.25	0.27	0.081	0.155	0.175	0.076	0.24	0.25	0.08	0.22	0.24	0.072	0.135	0.150	0.072	0.21	0.22	0.066	0.28	0.29
800	0.053	-	-	-	0.068	0.150	0.165	0.061	0.24	0.25	-	-	-	0.060	0.130	0.145	0.060	0.21	0.22	0.053	0.28	0.29
1000	-0.042	-	-	-	0.059	0.150	0.160	0.050	0.24	0.24	-	-	-	0.052	0.130	0.140	0.052	0.20	0.21	0.044	0.28	0.28

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