

## BS 7889

XLPE Insulated, PVC Sheathed Single Core Cable. BS 7889. 600/1000 V



Prysmian BS 7889 is an unarmoured industrial single core wiring cable with cross linked polyethylene insulation and PVC sheath.

### KEY APPLICATIONS

Suitable for installation in areas with reduced risk of mechanical damage; on tray, in free air or clipped direct. Suitable also for conduit and wiring installations when mechanical protection is required.

### FEATURES AND BENEFITS

- Manufactured under ISO 9001 Quality management systems

### ADDITIONAL TECHNICAL SUPPORT

- [FAQ's](https://uk.prysmian.com/technical-area/faqs) - uk.prysmian.com/technical-area/faqs
- [Technical email](mailto:tech.info@prysmian.com) - tech.info@prysmian.com
- [Live Chat](https://uk.prysmian.com/technical-area) - uk.prysmian.com/technical-area
- Technical hotline: 02380 295222

### STANDARDS



**BS 7889**  
**BS EN 60332-1-2**

Construction Standard  
Flame Propagation - Single Cable

### CONSTRUCTION

Conductor material	Copper
Conductor surface	Bare
Core insulation material	XLPE
Material outer sheath	Polyvinyl chloride (PVC)
Cable shape	Round

## APPLICATIONS PROPERTIES

Nominal voltage U <sub>0</sub> [V]	600
Nominal voltage U [V]	1,000
Flame retardant	In accordance with BS EN 60332-1-2
Max. conductor temperature [°C]	90
Min. Operation temperature [°C]	-15
UV resistant	Yes
Outdoor installation	Yes
Min. Installation temperature [°C]	0
Max. Installation temperature [°C]	80
Bending radius (rule)	6D

## COLOURS

Insulation: Brown or Blue

Sheath: Black

## CURRENT RATINGS

Refer to table 4E1 of BS 7671 Requirements for Electrical Installations. IET Wiring Regulations

Note: Where a conductor operates at a temperature exceeding 70°C it shall be ascertained that the equipment connected to the conductor is suitable for the conductor operating temperature.

## TECHNICAL DATA

Nominal cross section conductor [mm <sup>2</sup> ]	Conductor category	Nominal thickness insulation [mm]	Nominal outer diameter [mm]	Cable weight [kg/km]	Conductor resistance at 20° C [Ohm/km]	Embodied Carbon [CO <sub>2</sub> e kg/km]
10	Class 2 = stranded	0.7	8.4	150	1.83	476
16	Class 2 = stranded	0.7	9	200	1.15	645
25	Class 2 = stranded	0.9	10.6	295	0.727	851
35	Class 2 = stranded	0.9	11.6	390	0.524	1,078
50	Class 2 = stranded	1	13.2	520	0.387	1,432
50	Class 2 = stranded	1	13.2	520	0.387	1,432
70	Class 2 = stranded	1.1	14.9	720	0.268	1,895
95	Class 2 = stranded	1.1	16.7	1,000	0.193	2,595
120	Class 2 = stranded	1.2	18.9	1,250	0.153	3,426
120	Class 2 = stranded	1.2	18.9	1,250	0.153	3,426
150	Class 2 = stranded	1.4	21	1,550	0.124	4,114
150	Class 2 = stranded	1.4	21	1,550	0.124	4,114
185	Class 2 = stranded	1.6	23	1,900	0.0991	4,997
185	Class 2 = stranded	1.6	23	1,900	0.0991	4,997
240	Class 2 = stranded	1.7	26	2,500	0.0754	6,413
240	Class 2 = stranded	1.7	26	2,500	0.0754	6,413
300	Class 2 = stranded	1.8	29	3,100	0.0601	7,839
300	Class 2 = stranded	1.8	29	3,100	0.0601	7,839
400	Class 2 = stranded	2	33	3,100	0.047	9,955
400	Class 2 = stranded	2	33	3,100	0.047	9,955
500	Class 2 = stranded	2.2	37	5,000	0.0366	12,683
500	Class 2 = stranded	2.2	37	5,000	0.0366	12,683
630	Class 2 = stranded	2.4	41	6,400	0.0283	16,124
630	Class 2 = stranded	2.4	41	6,400	0.0283	16,124
800	Class 2 = stranded	2.6	46	8,300	0.0221	20,998

## TECHNICAL DATA

Nominal cross section conductor [mm <sup>2</sup> ]	Conductor category	Nominal thickness insulation [mm]	Nominal outer diameter [mm]	Cable weight [kg/km]	Conductor resistance at 20° C [Ohm/km]	Embodied Carbon [CO <sub>2</sub> e kg/km]
1,000	Class 2 = stranded	2.8	51	10,300	0.0176	26,827
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\*The embodied carbon figure is taken from a single product in the range, for more information on how we calculate our embodied carbon figure visit here: <https://uk.prysmiangroup.com/embodied-carbon>