

Automotive Cables

EV Shielded, Unshielded & Battery Cables
AC & DC Charging cable



PVC Insulated Battery Cables

PVC insulated Battery Cables are manufactured using Bright Annealed 99.99% pure, high conductivity bare copper. They are insulated with a special grade PVC compound that makes them withstand to prevail in extreme conditions especially for Automobile applications, making them resistant to Oil, Water, Lubricants and Grease to meet the required requirements.

The cables are available in various sizes ranging from 6 sq. mm to 240 sq. mm.

Our range consists of Flexible Battery Cable & Extra Flexible battery cable.



APPLICATION

Cables are suitable to use in Batteries of Cars, Tractors, Buses, UPS, Solar Battery Bank arrays for supplying DC Current from the battery.

STANDARDS : SAE J 1127, BS 6231, IS2465/1984 & IEC 60502-1

CONSTRUCTION DETAILS

Conductor	For Flexible Battery Cable: Electrolytic Multi Stranded Bare Copper conductor class 5 flexible as per SAE J 1127, VDE 0295, IEC 60228, IS2465, BS6882	For Extra Flexible Battery Cable: Electrolytic Multi Stranded Bare Copper conductor class 6 extra flexible as per SAE J 1127, VDE 0295, IEC 60228, IS2465, BS6862
Separator	Polyester tape over conductor for HOFR Insulated extra flexible battery cable	
Insulation	Flexible Battery Cables: HR PVC	Extra Flexible Battery Cables: HOFR
Insulation Colour	Red & Black or other colour as on request	

ELECTRICAL, THERMAL & MECHANICAL CHARACTERISTICS:

- Operating Temperature:
 - 20°C to +85°C -Heat Resistance Insulation
 - 40°C to +105°C -HOFR Insulation
- Nominal Voltage: 300 V
- Test Voltage: 3500 V
- Insulation Resistance: > 20 M Ohm-Km
- Spark Test: 6000 Vac
- Excellent Flame-retardant properties
- Minimum Bending Radius:
 - 7 x cable diameter for heat resistant PVC Insulated Battery Cables,
 - 6 x cable diameter for HOFR Insulated Extra Flexible Battery Cables
- High Mechanical strength
- Very good resistance to Oil and chemicals
- Weathering-UV Resistance
- Excellent Mechanical & Electrical properties

SINGLE CORE HR PVC INSULATED FLEXIBLE BATTERY CABLES

Single Core Size (Sq mm)	Number/ Nominal Dia. of Strands	HR 85°C Insulation Thickness Nominal (mm)	Overall Diameter Nominal (mm)	Conductor Resistance Max. (Bare Copper) Ohm/Km	Current Rating Amp.
6.0 Sq mm	84 / 0.30	0.8	5.0	3.30	31
10 Sq mm	80 / 0.40	1.0	6.5	1.91	42
16 Sq mm	126 / 0.40	1.0	8.1	1.21	57
25 Sq mm	190 / 0.40	1.2	9.1	0.780	71
35 Sq mm	266 / 0.40	1.2	11.2	0.554	91
50 Sq mm	380 / 0.40	1.4	13.5	0.386	120
70 Sq mm	348 / 0.50	1.4	15.5	0.272	165
95 Sq mm	460 / 0.50	1.6	18.0	0.206	200
120 Sq mm	585 / 0.50	1.6	19.8	0.161	225
150 Sq mm	750 / 0.50	1.8	22.1	0.129	250
185 Sq mm	925 / 0.50	2.0	24.5	0.106	300
240 Sq mm	1221 / 0.50	2.2	28.0	0.0801	425

SINGLE CORE HOFR INSULATED EXTRA FLEXIBLE BATTERY CABLES

Single Core Size (Sq mm)	Number/ Nominal Dia. of Strands	HOFR 105°C Insulation Thickness Nominal (mm)	Overall Diameter Nominal (mm)		Conductor Resistance Max. (Bare Copper) Ohm/Km	Current Rating Amp.
			Min.	Max.		
6.0 Sq mm	190 / 0.2	1.2	5.3	6.0	3.30	31
10 Sq mm	273 / 0.2	1.2	6.2	7.8	1.91	42
16 Sq mm	513 / 0.2	1.2	7.3	9.1	1.21	57
25 Sq mm	783 / 0.2	1.2	8.6	10.8	0.780	71
35 Sq mm	1107 / 0.2	1.2	9.8	12.3	0.554	91
50 Sq mm	1566 / 0.2	1.5	11.9	14.8	0.386	120
70 Sq mm	2214 / 0.2	1.5	13.6	17.0	0.272	165
95 Sq mm	2997 / 0.2	1.8	15.6	19.5	0.206	200

Halogen Free Battery Cables

Halogen-Free Battery Cables are manufactured using Bright Annealed 99.99% pure, high conductivity bare copper. They are insulated & sheathed with a special grade HFFR compound that makes Cable to withstand in extreme conditions especially inside a Central Office Power Distribution, Grounding, Connection of Back-Up Batteries, Solar PV Plant, Telecommunication application making them resistant to Fire, Smoke, Oil and Water to meet required requirements.

Our cables are available in various sizes ranging from 25sq. mm to 240 sq. mm.



APPLICATION

Battery Cables is suitable for use in batteries of Cars, Tractors, Buses, UPS, Solar Battery bank arrays, Telecommunication application for supplying DC Current from the battery.

STANDARDS

SAE J 1127, IEC60228,
IEC 60754, IEC 60332

CONSTRUCTION DETAILS

Conductor	Electrolytic Multi Stranded Bare Copper conductor class 5 flexible as per IEC 60228,
Separator	Polyester tape over conductor (If required)
Insulation	HFFR (Halogen Free Flame Retardant)
Insulation Colour	Black or other colour as on request
Sheath	HFFR (Halogen Free Flame Retardant)
Sheath Colour	Grey or other colour as on request

ELECTRICAL, THERMAL & MECHANICAL CHARACTERISTICS:

- Operating Temperature:
 - -20°C to +90°C
- Nominal Voltage: 600 V
- Test Voltage: 3500 V
- Insulation Resistance: > 20 M Ohm-Km
- Spark Test: 6000 Vac
- Excellent Flame-retardant properties
- Minimum Bending Radius: 6 X Cable Diameter
- High Mechanical strength
- Very good resistance to Oil and chemicals
- Weathering-UV Resistance
- Excellent Mechanical & Electrical properties
- Flame retardant - IEC 60332-3-24 (Cat C)
- Halogen Free - IEC 60754

SINGLE CORE HFFR INSULATED FLEXIBLE BATTERY CABLES

Single Core Size (Sq mm)	Number/ Nominal Dia. of Strands	HFFR Insulation Thickness Nominal (mm)	HFFR Sheath Thickness Nominal (mm)	Overall Diameter Nominal (mm)	Conductor Resistance Max. (Bare Copper) Ohm/Km
25 Sq mm	190 / 0.40	1.2	1.4	12.8	0.780
35 Sq mm	266 / 0.40	1.2	1.4	13.5	0.554
50 Sq mm	380 / 0.40	1.4	1.4	15.2	0.386
70 Sq mm	348 / 0.50	1.4	1.6	16.5	0.272
95 Sq mm	460 / 0.50	1.6	1.6	19.5	0.206
120 Sq mm	585 / 0.50	1.6	1.6	20.5	0.161
150 Sq mm	750 / 0.50	1.8	1.8	25.5	0.129
185 Sq mm	925 / 0.50	2.0	2.0	27.5	0.106
240 Sq mm	1221 / 0.50	2.2	2.0	30.5	0.0801



EV SHIELDED, UNSHIELDED & BATTERY CABLES

Our Shielded & Unshielded cables are manufactured using bright annealed 99.99% pure, high conductivity bare copper. We are insulated with a special grade PVC/XLPO compound that makes them suitable to prevail in extreme conditions especially inside an Electric Vehicle, along with making them resistant to oil, water, lubricants and grease to fulfil all requirements.

- We manufacture a range of shielded and unshielded cable for automotive industries.
- Single core & Multicore cables available with or without shielding
- Braiding with Annealed Bare Copper / Annealed Tinned Copper
- Shielding can include tapes (Aluminium-Mylar, Polyester etc) & drain wire
- Flame retardant, Heat Resistant & Highly Flexible
- Bending radius ranging from 4D to 10D
- Size up to Single core - 1C X 240 mm²
Multicore - 4C X 120 mm² & 25C X 2.5 mm²
- Cable manufactured as per IS 2465 / ISO 6722 / ISO 19642

- IS 2465 : Temp Range: -40°C to 105°C
- ISO 6722 :
 - Class B - Temp Range: -40°C to 105°C
 - Class C - Temp Range: -40°C to 125°C
 - Class D - Temp Range: -40°C to 150°C
 - Class E - Temp Range: -40°C to 170°C
 - Class F - Temp Range: -40°C to 200°C

Features

- Copper Conductor
- Insulation: 150° C XLPO -Cable Class D
- Sheath: 150° C XLPO -Cable Class D
- RoHS Compliant

Product Options

- Colours: Orange. Other available upon request
- Braiding: Tinned Copper
- Screening: Aluminium-Backed PET foil in contact with Braid

APPLICATION

- Cable used for transportation vehicle systems
- Suitable for use inside the engine compartment
- Temperature Range: -40° C TO 150° C

STANDARDS

ISO 19642-9



DC FAST CHARGING CABLE

IEC 62893-4-1:2020

2Cx 4.0 mm² + 1CX 4.0 mm² + 8C X 0.5 mm²

2Cx 6.0 mm² + 1CX 6.0 mm² + 8C X 0.5 mm²

2Cx 10 mm² + 1CX 10 mm² + 8C X 0.5 mm²

2Cx 16 mm² + 1CX 16 mm² + 8C X 0.5 mm²

2Cx 25 mm² + 1CX 16 mm² + 8C X 0.5 mm²

2Cx 35 mm² + 1CX 16 mm² + 8C X 0.5 mm²

2Cx 50 mm² + 1CX 25 mm² + 8C X 0.5 mm²

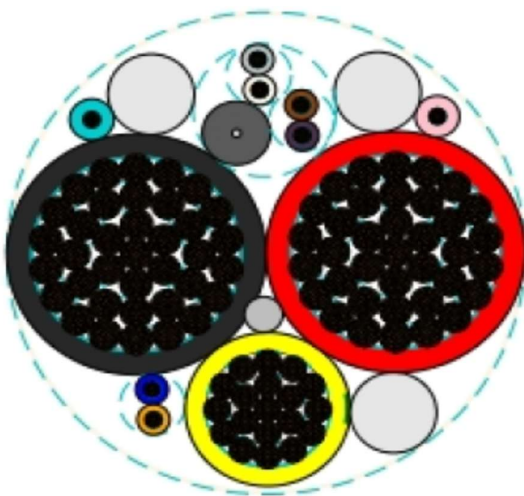
2Cx 70 mm² + 1CX 35 mm² + 8C X 0.5 mm²

2Cx 95 mm² + 1CX 50 mm² + 8C X 0.5 mm²

2Cx 120 mm² + 1CX 70 mm² + 8C X 0.5 mm²

2Cx 150 mm² + 1CX 95 mm² + 8C X 0.5 mm²

Auxiliary Power, Control & Temperature Sensor cores Change as per customer request.





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