

### Introduction

DC (Direct Current) charging cables are used for fast charging, delivering direct current directly to the vehicle's battery. These are typically known as DC Fast Charging or Level 3 charging and are designed for rapid charging in commercial and public highspeed charging stations.

# **Application**

High-Speed Public Charging Stations: Ideal for quick charging along highways and major routes.

Urban Charging Hubs: Used in city centers and high-traffic areas for rapid turnaround.

Commercial and Fleet Vehicles: Essential for fast charging of commercial EVs and fleet vehicles to minimize downtime.

### Performance

Ambient Temperature: -40~ to 50°C

Rated voltage: 1kV Bending radius: ≥5D

Withstand voltage test: DC cable 8.4kV/15min

Acid and alkali resistance: 23C/168h

Tensile strength change rate: maximum±30%

Elongation at break: minimum 100%.

Resistance to picking test: minimum new strength of 20N/mm

#### Construction

Conductors: Heavy-duty copper conductors capable of handling high current loads.

Insulation: Enhanced materials like TPE (Thermoplastic Elastomer) or silicone for high-temperature resistance and safety. Sheathing: Multi-layered protection including LSZH materials to minimize smoke and toxic emissions.

## Specification

-IEC 62196: Defines the connectors and charging standards, including DC fast charging connectors like CCS and CHAdeMO.

- -IEC 61851: Specifies the electric vehicle conductive charging system, covering both AC and DC charging.
- -CHAdeMO Protocol: Defines the requirements for CHAdeMO connectors and charging standards.
- -CCS Standard: Defines the requirements for the Combined Charging System used in Europe and North America.
- \*\*\* This is customized product and can be designed according to customers' request.

### Eastful Cable Lab



We have CNAS Accredited Facility to assure conformity assessment services with a focus on quality, expertise, and customer satisfaction.

CNAS has international mutual recognition among IAF, ILAC, APLAC and PAC.

### Accreditation

We meet the requirements of ISO9001, ISO14001, ISO45001 and ISO50001 and our cables have certificate of CCC, RoHS, CASC, UL, cUL, TÜV Rhineland and CCS.



# **National Green Factory**



Our facility has been awarded of National Green Factory by Ministry of Industry and Information Technology of China. We are committed to the development of high-end, intelligent and green manufacturing industry.

\*The overall energy consumption level of green factories is better than the energy efficiency benchmark level.









# **Technical Parameters**

No. of Cores × Nominal Cross Section Area	Conductor Resistance Bare Copper/Tinned copper	Insulation Thickness	Sheath Thickness	Cable Overall Dia.
mm²	Ω/km	mm	mm	mm
2×10	1.91/1.95	1.0	2.3	17.1~21.7
2×16	1.21/1.24	1.0	2.5	19.8~25.1
2×25	0.780/0.795	1.2	3.0	24.5~31.0
2×35	0.554/0.565	1.2	3.3	27.7~35.0
2×50	0.386/0.393	1.4	3.7	32.4~40.9
2×70	0.272/0.277	1.4	4.2	37.1~46.8
2×95	0.206/0.210	1.6	4.6	41.8~52.7
2×120	0.161/0.164	1.6	5.0	46.2~58.1
2×150	0.129/0.132	1.8	5.5	51.6~64.9
2×185	0.106/0.108	2.0	6.0	56.9~71.5
2×240	0.0801/0.0817	2.2	6.8	64.7~81.2

