

# EGbatt Solar DC EV Fast Charger

20kW / 30kW Direct PV-to-EV Charging Platform

[www.egbatt.com](http://www.egbatt.com)

**Next-Generation Solar Fast Charging Technology**  
**Designed for Residential, Fleet & Renewable Energy Applications**

**99%+**

Efficiency

**DC Coupled**

Direct Solar Charging

**IP65**

Outdoor Protection



## Executive Overview

The **EGbatt Solar DC EV Fast Charger** is an advanced photovoltaic-powered DC charging solution engineered to charge electric vehicles directly from solar energy. By eliminating unnecessary DC→AC→DC power conversion stages, the system achieves significantly higher efficiency, lower installation cost, and superior energy utilization.

### Why It Matters

Traditional EV charging systems rely on AC-coupled architecture requiring multiple conversion stages. EGbatt adopts a DC-coupled design that directly transfers solar power to EV batteries, maximizing solar utilization while reducing equipment complexity.

## Core Advantages

- **Direct Solar Charging**  
No inverter required between solar array and EV charger.
- **Ultra High Efficiency**  
Achieves >99% average efficiency with minimized power loss.
- **Lower Installation Cost**  
Reduced system components simplify installation and maintenance.
- **Flexible Compatibility**  
Supports CCS1, CCS2, NACS, CHAdeMO, and GB/T standards.
- **Commercial Ready**  
Designed for EV charging stations, fleets, carports, and solar parking.

## Traditional AC-Coupled vs EGbatt DC-Coupled

Traditional AC-Coupled	EGbatt DC-Coupled
PV → Inverter → AC → DC Charger → EV	PV → (MPPT → DC/DC) → EV
Multiple conversion stages	Single conversion architecture
Higher energy losses	Maximum solar efficiency
Higher installation cost	Simplified system
More maintenance	Lower operational cost

## Technical Specifications

Parameter	Specification
Rated Power	20kW / 30kW
Output Voltage	200Vdc – 750Vdc
MPPT Input Voltage	260Vdc – 750Vdc
Suggested MPPT Voltage	600Vdc – 720Vdc
Max MPPT input Current	28A/42A
Max Output Current	50A / 80A
Efficiency	>99%
Cooling	Forced Air
Screen	Touch screen 4.3 inch
Charging cable	5 meters
Size	325MM*485MM*174MM
Weight	36kgs/79lbs
Safety	CE/FCC

## Application Scenarios

- Commercial EV charging stations
- Solar-powered parking structures
- Fleet charging depots
- Residential solar EV charging
- Remote and off-grid charging infrastructure
- Renewable energy microgrid projects

# Why Choose EGbatt

DC-coupled architecture eliminates AC conversion losses. Charge EVs directly from solar PV — ideal for commercial fleets, off-grid infrastructure and sustainable mobility hubs.

<b>Factory Direct Manufacturing</b> Competitive pricing with OEM/ODM support	<b>Battery &amp; DC Expertise</b> Specialized in energy storage and DC power systems
<b>Flexible Customization</b> Supports branding and project-specific integration	<b>Global Compatibility</b> Designed for worldwide EV charging standards



Energy. Evolved.



Energy. Evolved.



Energy. Evolved.

## Power the Future with Direct Solar Charging

**EGbatt Energy Storage Solutions**

Professional Manufacturer of Battery & DC Energy Systems

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