

# QD180A SERIES SEAL CHARGER

This series chargers design of unsealed structure. It suitable for flooded lead acid batteries, sealed lead acid batteries, Lithium batteries, NI-MH batteries, Nickle Cadmium batteries, etc. They ate used to cycle charge or floating charge battery pack in Elderly mobility scooter, Table Lifter, E-Mower, E-Tools, Medical wheelchairs, Hand push sweeper, electric power, ships, etc.

| Models       | Rated Voltage for Battery Pack | Output Voltage Range | Max Output current | CV        |        |         | cut-off Current |
|--------------|--------------------------------|----------------------|--------------------|-----------|--------|---------|-----------------|
|              |                                |                      |                    | Lead Acid | Li-ion | LiFePO4 |                 |
|              |                                |                      |                    |           |        |         | Li              |
| QD180A-12V8A | 12V                            | 12-17V               | 8A                 | 14.7V     | 12.6V  | 14.6V   | 1.0A            |
| QD180A-24V6A | 24V                            | 24-34V               | 6A                 | 29.4V     | 29.4V  | 29.2V   | 1.0A            |
| QD180A-36V4A | 36V                            | 30-44V               | 4A                 | 44.1V     | 42.0V  | 43.8V   | 1.0A            |
| QD180A-48V3A | 48V                            | 39-60V               | 3A                 | 58.8V     | 54.6V  | 58.4V   | 0.5A            |

## TECHNOLOGY PARAMETERS

|                        |                     |
|------------------------|---------------------|
| AC Input Voltage Range | 100-240VAC; 45-65Hz |
| AC Input Max Current   | 1.2A@220VAC         |
| Efficiency             | ≥92.0%              |
| Noise                  | ≤45dB               |

## Product characteristics

|             |   |
|-------------|---|
| SAFFTY      | Active Flyback technique is applied for a rapid respond on a fault; Quick active software self -protection and reliable passive hardware self-protection on VOLTAGE&CURRENT; Advanced charging strategy is integrated as a safeguard for battery system.  |
| RELIABILITY | The shell is shaped by extrude Aluminum technique. The active cooling fan is also designed to be a fan with a potting structure and a longer life. Products of Charger Series have been operating in all kinds of industrial environment (Wet. Hot. Cold. High altitude) for more than ten years,the design is proved to pass the verification. |
| FUNCTIONS   | Double Colors Indicator<br>Charging Interlock System  |

## SIZE AND WEIGHT&TEMPERATURE

|                     |          |                       |           |
|---------------------|----------|-----------------------|-----------|
| Net Weight          | 0.8kg    | Operating Temperature | -30℃—65℃  |
| Storage Temperature | -40℃—95℃ | Size/mm               | 150*83*49 |

## ROTECTION FUNCTIONS

|  |  |
|--|--|
| Burnout Protection                             | Temperature of charger exceeds the limitation. The charge will low down the power load. Temperature of environment exceeds 65℃, the charger will stop charging and switch itself to standby mode until temperature of environment goes down. |
| Protection for Reverse Connection of Batteries | The circuit inside the charger shuts down with batteries when the batteries are connected reversely and will not damage the charger.   |
| NO-load Protection                             | There is no output when the batteries are not connected.   |
| Short Circuit Protection                       | The circuit inside the charger shuts down with batteries when output is short circuit. The charger will start charging only after troubleshooting and restart the charger.   |
| Automatic shutdown when fully charging         | The charging automatically turns off after the battery is fully charged according to the charger' s judgment.  |

