



Confirmation of Product Type Approval

Company Name: STORED ENERGY SYSTEMS, LLC

Address: 1840 INDUSTRIAL CIRCLE CO 80501 United States

Product: Battery Charger

Model(s): EnerGenius IQ

Endorsements:

Certificate Type	Certificate Number	Issue Date	Expiry Date
Product Design Assessment (PDA)	23-2367896-PDA	10-MAR-2023	09-MAR-2028
Manufacturing Assessment (MA)	23-5820693	15-MAY-2023	30-MAY-2028
Product Quality Assurance (PQA)	NA	NA	NA

Tier

5 - Unit Certification Required

Intended Service

Charging of stationary batteries while providing clean stable DC power for continuous loads in Marine and Offshore Applications.

Description

Automatic DC Power Supply / Charger with Intelligent Battery Monitoring & Data Logging suitable for non-hazardous locations.

Model QXXXYYYYAZZZZZZZ

Where XXX = DC output voltage

Options: 012, 024, 048, 120, 240

Where YYY = DC output current

Options: 006, 012, 016, 025, 035, 050, 075, 100, 150

Where A = AC input voltage

Options:

3 = 208V, 60 Hz

4 = 230-240V, 50/60 Hz

8 = 480V, 60 Hz

P = 115-120/208/230-240V, 50/60 Hz

S = 230-240V, 60 Hz

T = 115-120/208/230-240V, 60 Hz

V = 400V, 50/60 Hz

Z = 208/240V, 60 Hz

Where Z = single digit option codes

Ratings

Output Voltage: 12, 24, 48, 120, 240 VDC Nominal;

Frequency: 50/60 Hz;

Operating Temperature: -40°C to + 50°C;

Enclosure: IP 22;

Service Restrictions

1. Unit Certification is not required for this product except where used for essential or emergency services as defined by 4-8-3/5.11.1(a) of the Marine Vessel Rules or 6-1-7/19.9 of the MOU Rules.

2. If the manufacturer or purchaser request an ABS Certificate for compliance with a specification or standard, the specification or standard, including inspection standards and tolerances, must be clearly defined.

Comments

- The Manufacturer has provided a declaration about the control of, or the lack of Asbestos in this product.

- The charging facilities are to be such that a completely discharged battery is recharged to at least 80% capacity in not more than 10 hours.

- End user must use output cables that have sufficient current carrying capacity as per ABS Marine Vessel Rules 4-8-2/7.7.1.

Notes, Drawings and Documentation

Declaration of Conformity, DoC Letter, Date: March 1 2023, Pages: 1

COMPLIANCE SPEC_IQ, Specification, Date: July 20, 2021, Pages: 3

(Previous Submittals)

20140619-E117114, UL Certificate of Compliance, Date: 06-19-2014

Term of Validity

This Product Design Assessment (PDA) Certificate remains valid until 09/Mar/2028 or until the Rules and/or Standards used in the assessment are revised or until there is a design modification warranting design reassessment (whichever occurs first).

Acceptance of product is limited to the "Intended Service" details prescribed in the certificate and as per applicable Rules and Standards.

This Certificate is valid for installation of the listed product on ABS units which exist or are under contract for construction on or previous to the effective date of the ABS Rules and standards applied at the time of PDA issuance. Use of the Product for non-ABS units is subject to agreement between the manufacturer and intended client.

ABS Rules

The Rules for Conditions of Classification, Part 1 2023 Marine Vessel Rules 1-1-4/7.7, 1-1-A3, 1-1-A4, which covers the following:

2023 Marine Vessel Rules: 4-8-3/1.11.1, 4-8-3/5.9;

The Rules for Conditions of Classification, Part 1 2023 Offshore Units and Structures 1-1-4/9.7, 1-1-A2, 1-1-A3, which covers the following:

2023 Mobile Offshore Unit Rules: 4-3-3/3.1.1(a), 6-1-7/9.17.

International Standards

IEC 63000:2018

IEC 60335-1:2020

IEC 60335-2-29:2019

IEC 61000-6-2:2019

IEC 61000-6-4:2019

EU-MED Standards

NA

National Standards

UL 1012, 8th Edition

CAN/CSA 22.2 No 107.2, R2021

Government Standards

NA

Other Standards

NA



Corporate ABS Programs
American Bureau of Shipping
Print Date and Time: 05-Jun-2023 3:02

ABS has used due diligence in the preparation of this certificate, and it represents the information on the product in the ABS Records as of the date and time the certificate is printed.

If the Rules and/or standards used in the PDA evaluation are revised or if there is a design modification (whichever occurs first), a PDA revalidation may be necessary.

The continued validity of the MA is dependent on completion of satisfactory audits as required by the ABS Rules. The validity of both PDA and MA entitles the product to receive a **Confirmation of Product Type Approval**.

Acceptance of product is limited to the "Intended Service" details prescribed in the certificate and as per applicable Rules and Standards.

This Certificate is valid for installation of the listed product on ABS units which exist or are under contract for construction on or prior to the effective date of the ABS Rules and standards applied at the time of PDA issuance. ABS makes no representations regarding Type Approval of the Product for use on vessels, MODUs or facilities built after the date of the ABS Rules used for this evaluation.

Type Approval requires Drawing Assessment, Prototype Testing and assessment of the manufacturer's quality assurance and quality control arrangements. The manufacturer is responsible to maintain compliance with all specifications applicable to the product design assessment. Unless specifically indicated in the description of the product, certification under type approval does not waive requirements for witnessed inspection or additional survey for product use on a vessel, MODU or facility intended to be ABS classed or that is presently in class with ABS.

Due to wide variety of specifications used in the products ABS has evaluated for Type Approval, it is part of our contract that; whether the standard is an ABS Rule or a non-ABS Rule, the Client has full responsibility for continued compliance with the standard.

Questions regarding the validity of ABS Rules or the need for supplemental testing or inspection of such products should, in all cases, be addressed to ABS.