## VeraSol Standardized Specifications Book

Manufacturer: Fosera Group

**Component Family Name:** Ignite Family

Date of Standardized Specifications Book Expiration: July 31, 2022

Verify Online: https://data.verasol.org/products/sek/fs-igfamily

Contact Information: info@fosera.com

Website: https://fosera.com



This VeraSol Standardized Specifications Book presents a **component-level Standardized Specifications Sheet** listing the available components in the product family by component type, each individual component's performance rating, and performance results for each component tested according to the Edition 4 of IEC 62257-9-5. Following the component-level Standardized Specifications Sheet is a **list of the systems** covered by this Specifications Book that use combinations of these components.

**NOTICE**: Systems or kits developed using components from the component family will each perform differently and have not all been evaluated on a system-level basis. All systems listed in this Specifications Book are regarded to have passed the applicable Lighting Global Quality Standards or to meet the requirements in IEC 62257-9-8.

Quality Standards Framework Version: 2021

Revision: 2021.08

## **Component-Level Standardized Specifications Sheet**

Fosera Group Ignite Family

| Battery / Control Box  |                        |                        |                                       |                                      |  |  |  |  |  |
|------------------------|------------------------|------------------------|---------------------------------------|--------------------------------------|--|--|--|--|--|
| Name /<br>Model Number | Battery Chemistry      | Nominal<br>Voltage (V) | Battery<br>Capacity<br>Rating<br>(Ah) | Measured<br>Battery Capacity<br>(Ah) |  |  |  |  |  |
| 3.8 Ah battery         | Lithium iron phosphate | 3.2                    | 3.80                                  | 4.0                                  |  |  |  |  |  |
| 7.6 Ah battery         | Lithium iron phosphate | 3.2                    | 7.60                                  | not tested                           |  |  |  |  |  |
| 11.4 Ah battery        | Lithium iron phosphate | 3.2                    | 11.4                                  | 12                                   |  |  |  |  |  |
| 15.2 Ah battery        | Lithium iron phosphate | 3.2                    | 15.2                                  | not tested                           |  |  |  |  |  |
| 19 Ah battery          | Lithium iron phosphate | 3.2                    | 19.0                                  | 19                                   |  |  |  |  |  |

| PV Module           |                              |                            |
|---------------------|------------------------------|----------------------------|
| Name / Model Number | Peak Power at STC Rating (W) | Measured Peak Power at STC |
| 15 W PV module      | 15                           | 15                         |
| 30 W PV module      | 30                           | not tested                 |
| 50 W PV module      | 50                           | 51                         |
| 75 W PV module      | 75                           | not tested                 |
| 150 W PV module     | 150                          | 140                        |

| Light Sources*      |                              |        |     |      |                                |     |      |                                  |     |  |  |
|---------------------|------------------------------|--------|-----|------|--------------------------------|-----|------|----------------------------------|-----|--|--|
|                     | Luminous Flux<br>Rating (lm) |        |     |      | Measured Luminous<br>Flux (Im) |     |      | Measured Lamp<br>Efficacy (lm/W) |     |  |  |
| Name / Model Number | High                         | Medium | Low | High | Medium                         | Low | High | Medium                           | Low |  |  |
| Lamp 12V 100        | 100                          |        | -   | 110  | -                              | 49  | 140  | -                                | 140 |  |  |
| Lamp 12V 200        | 200                          | -      |     | 220  | -                              | 42  | 140  | 1                                | 110 |  |  |
| Lamp 12V 400        | 400                          |        |     | 420  | -                              |     | 120  |                                  |     |  |  |
| Lamp mini 12V 100   | 100                          |        |     | 100  |                                |     | 140  |                                  |     |  |  |
| Tubelight 12V 400   | 400                          |        |     | 390  |                                | 41  | 100  |                                  | 100 |  |  |

| Appliances*         |                |                    |  |                                      |                                      |
|---------------------|----------------|--------------------|--|--------------------------------------|--------------------------------------|
| Name / Model Number | Description    | Rated<br>Power (W) | Measured<br>Power<br>During<br>Use (W) | Rated<br>Battery<br>Capacity<br>(Ah) | Measured<br>Battery<br>Capacity (Ah) |
| 23.6" TV 240        | 23.6" diagonal | 12                 | 9.1                                    | n/a                                  | n/a                                  |

**NOTICE:** As indicated, not all components listed on this page were tested according to the Quality Test Method (QTM) in Edition 4 of IEC 62257-9-5. However, based on the satisfactory performance of the tested components in the family, the components that were not tested are regarded to have passed the applicable Lighting Global Quality Standards or the requirements in IEC 62257-9-8. In addition, all tested components passed an internal inspection, the full array of applicable QTM durability tests, as well as ingress protection testing (where applicable). \*Light points and appliances may perform differently when used with different systems.

### **List of Covered Systems**

# Fosera Group Ignite Family

|                    |                                  | Number of each component included in each system |                                   |                                   |                                 |                |                |                |                |                 |          |          |          |                   |                   |              |
|--------------------|----------------------------------|--|-----------------------------------|-----------------------------------|---------------------------------|----------------|----------------|----------------|----------------|-----------------|----------|----------|----------|-------------------|-------------------|--------------|
| System Name        | Main Unit with 3.8<br>Ah battery | Main Unit with 7.6<br>Ah battery                 | Main Unit with 11.4<br>Ah battery | Main Unit with 15.2<br>Ah battery | Main Unit with 19<br>Ah battery | 15 W PV module | 30 W PV module | 50 W PV module | 75 W PV module | 150 W PV module | Lamp 100 | Lamp 200 | Lamp 400 | Lamp mini 12V 100 | Tubelight 12V 400 | 23.6" TV 240 |
| Ignite 50 - Multi  | 1                                |  |                                   |                                   |                                 | 0-1            | 0-1            |                |                |                 | 0-6      | 0-6      | 0-6      | 0-6               | 0-6               |              |
| Ignite 100         |                                  | 1  |                                   |                                   |                                 |                | 1              |                |                |                 |          |          |          | 4                 |                   | 1            |
| Ignite 100 - Multi |                                  | 1  |                                   |                                   |                                 |                | 0-1            | 0-1            |                |                 | 0-6      | 0-6      | 0-6      | 0-6               | 0-6               | 0-1          |
| Ignite 150         |                                  |  | 1                                 |                                   |                                 |                |                | 1              |                |                 |          | 2        |          |                   | 4                 | 1            |
| Ignite 150 - Multi |                                  |  | 1                                 |                                   |                                 |                |                | 0-1            | 0-1            |                 | 0-6      | 0-6      | 0-6      | 0-6               | 0-6               | 0-1          |
| Ignite 200 - Multi |                                  |  |                                   | 1                                 |                                 |                |                | 0-1            | 0-1            | 0-1             | 0-6      | 0-6      | 0-6      | 0-6               | 0-6               | 0-1          |
| Ignite 250**       |                                  |  |                                   |                                   | 1                               |                |                |                |                | 1               |          |          | 4        |                   |                   | 1            |
| Ignite 250 - Multi |                                  |  |                                   |                                   | 1                               |                |                |                | 0-1            | 0-1             | 0-6      | 0-6      | 0-6      | 0-6               | 0-6               | 0-1          |

<sup>\*\*</sup>Tested as full systems. Individual SSS available on VeraSol website.

#### NOTICE:

Only the Ignite 250 was fully tested as a system according to Edition 4 of IEC 62257-9-5. Individual Standardized Specifications Sheets (SSS) that report system-level performance are available for the Ignite 250 at https://data.verasol.org Systems that were not tested, but that were developed using components from the component family will perform differently than the system(s) shown in the individual system-level SSS. All systems listed above are regarded to have passed the applicable Lighting Global Quality Standards or the requirements in IEC 62257-9-8.

Unless otherwise noted, the following information applies to all listed systems and components:

#### **Warranty Information**

Three year warranty covering manufacturing defects

| Marke    | and Certific | rations |
|----------|--------------|---------|
| 11101111 |              |         |

## **Available Daily Electrical Energy and Port Information**

Fosera Group Ignite Family

| System Name  | Available Daily Electrical Energy<br>(Wh/day) | Includes ports for charging? |
|--------------|---|------------------------------|
| Ignite 100   | 100   | yes                          |
| Ignite 150   | 160   | yes                          |
| Ignite 250** | 320   | yes                          |

<sup>\*\*</sup>Tested as full systems. Individual SSS available on VeraSol website.

#### NOTICE:

The available daily electrical energy (Wh/day) is calculated for fully tested systems following the energy service calculations as described in IEC/TS 62257-9-5 Ed. 4. For products in a family that are not tested as a full system, estimations of available daily electrical energy (Wh/day) are calculated according to an alternative method using data from the test reports of fully-tested products and components. Estimating Wh/day values requires making assumptions about system efficiencies, power consumption, and user behavior. As with any calculation based on multiple assumptions, there is some degree of error in the Wh/day estimate, which may be greater or less than the actual value for a given product.