

VeraSol

Standardized Specifications Book

Manufacturer: Chaohu Venus Solar Technology Co., Ltd.

Component Family Name: VEK12V Family

Date of Standardized Specifications Book Expiration: June 30, 2025

Verify Online: <https://data.verasol.org/products/sek/cvs-vek12vfamily>

Contact Information: wei.cheng@ezrenewables.com

Website: www.ezrenewables.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 meet the requirements in IEC 62257-9-8.

Revision: 2023.06

Component-Level Standardized Specifications Sheet

Chaohu Venus Solar Technology Co., Ltd.

VEK12V Family

Battery / Control Box

Name / Model Number	Battery Chemistry	Nominal Voltage (V)	Battery Capacity Rating (Ah)	Measured Battery Capacity (Ah)
6 Ah LFP main unit	Lithium iron phosphate	12.8	6.0	6.1
8 Ah LFP main unit	Lithium iron phosphate	12.8	8.0	8.0
6.6 Ah main unit	Lithium-ion	11.1	6.6	not tested
8.8 Ah main unit	Lithium-ion	11.1	8.8	not tested
10 Ah main unit	Lithium-ion	11.1	10	9.5
15 Ah main unit	Lithium-ion	11.1	15	14

PV Module

Name / Model Number	Peak Power at STC Rating (W)	Measured Peak Power at STC (W)
20 W PV module	20	23
30 W PV module	30	32
40 W PV module	40	42

Light Sources*

Name / Model Number	Luminous Flux Rating (lm)	Measured Luminous Flux (lm)	Measured Lamp Efficacy (lm/W)
	On	On	On
2 W lamp	200	320	140
7 W lamp	not stated	1020	140

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 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 may perform differently when used with different systems.

List of Covered Systems

Chaohu Venus Solar Technology Co., Ltd.

VEK12V Family

System Name	Number of each component included in each system										
	6 Ah LFP main unit	8 Ah LFP main unit	6.6 Ah main unit	8.8 Ah main unit	10 Ah main unit	15 Ah main unit	20 W PV module	30 W PV module	40 W PV module	2 W lamp	7 W lamp
VEK1206-LFP**	1	--	--	--	--	--	1	--	--	2	--
VEK1208-LFP	--	1	--	--	--	--	--	1	--	2	Optional
VEK1206	--	--	1	--	--	--	1	--	--	2	Optional
VEK1208	--	--	--	1	--	--	--	1	--	2	Optional
VEK1210**	--	--	--	--	1	--	--	1	--	2	--
VEK1215	--	--	--	--	--	1	--	--	1	2	Optional

**Tested as full systems. Individual SSS available on VeraSol website.

NOTICE:

Only the Solar Home System (VEK1206-LFP) and Solar Home System (VEK1210) were fully tested as systems according to Edition 4 of IEC 62257-9-5. Individual Standardized Specifications Sheets (SSS) that report system-level performance are available for the Solar Home System (VEK1206-LFP) at <https://data.verasol.org/products/sek/cvs-vek1206> and Solar Home System (VEK1210) at <https://data.verasol.org/products/sek/cvs-vek1210>. 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 requirements in IEC 62257-9-8.

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

Warranty Information

A 2-year warranty covering manufacturing defects in the system.

Available Daily Electrical Energy and Port Information

Chaohu Venus Solar Technology Co., Ltd.

VEK12V Family

System Name	Available Daily Electrical Energy (Wh/day)	Includes ports for charging?
VEK1206-LFP**	84	yes
VEK1208-LFP	100	yes
VEK1206	75	yes
VEK1208	100	yes
VEK1210**	117	yes
VEK1215	140	yes

**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.