

Solar inverter

Solar inverter KS-Series 1500 – 5000W

Grid-connected ,
1.500, 2.000, 3.000, 3.600, 4.200 and 5.000Watt,

NEU / NEW

The KS series solar inverters with an output of 1,500 to 5,000 watts are suitable for private use. They are characterized by high efficiency, reliability, compact design easy installation.



above: DT model
(2 MPPT trackers - available with 3000-5000 watts)

Properties

High efficiency

- Euro efficiency up to 96.8%
- High MPPT accuracy
- Fast MPPT calculation method
- Extreme low power loss at night
- Very high conversion efficiency DC-DC through soft-switch technology.

High reliability

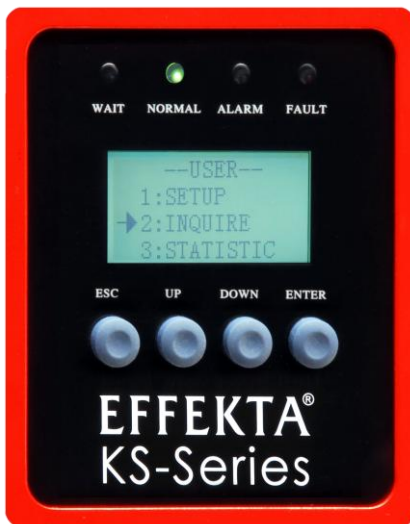
- Perfect cooling concept
- No derating up to 50°C during operation
- Comprehensive electronic protection such as over-current protection and internal inverter protection
- Mains protection by overcurrent protection, overvoltage protection, and frequency protection
- Comprehensive safety design: tests of insulation resistance and leakage current monitoring
- Excellent physical security through water and dust resistant IP65 enclosure
- Physical separation of PCB conformal coating in industry standard

User-friendly maintenance / commissioning

- Easy to install
- Software online updateable
- LCD panel with all operating status and monitoring data
- RS232/RS485 communication (optional WLAN)
- Optional DC isolator can be integrated into the housing



Above: ST-Modell
(1 MPPT tracker - available with 1500-3600 watts)



Above: Bottom of the DT models (2 MPPT trackers) with DC connector panel, AC output, communication ports, and optional integrated DC disconnect switch (view without cooling fins)

Left: Control panel of the DT models (2 MPPT trackers)

Specification

Model		KS 1500ST	KS 2000ST	KS 3000ST	KS 3600ST	KS 3000DT	KS 3600DT	KS 4200DT	KS 5000DT	
Input (DC)	Nominal DC power[Wp]	1650	2200	3100	3900	3100	3900	4300	5100	
	Max. DC power ($\pm 10\sim 20\%$) [Wp]	1800	2400	3300	4000	3300	4000	4600	5500	
	Max. DC voltage[V]	500VDC*				600VDC*				
	Max. input current[A]	9	11	17	20	9	11	13	15	
	Number of MPP tracker / Strings per MPP tracker	1 / 1		1 / 2		2 / 1		2 / 2		
	Max. MPPT voltage range (@ nominal power)	150-450VDC				150-500VDC				
	Max. DC power per MPP tracker									
Output (AC)	Nominal AC power [W]	1500	2000	3000	3600	3000	3600	4200	5000	
	Max. AC power [W]	1650	2200	3100	3700	3100	3700	4300	5100	
	Max. output current[A]	9	11	15	18	15	18	21	24	
	Rated output current (rms) [A]	6.5	8.7	13	15.6	13	15.6	18.3	21.7	
	Wire / Nominal AC voltage	1 / N / PE, 240VAC								
	AC voltage window	184V~264V								
	AC grid frequency / range [Hz]	50 / 60Hz \pm 5Hz								
	Power factor (cos ϕ), adjustable	1				0.9 leading- 0.9 lagging				
	Total harmonic distortion (THDi)	<3%								
	Efficiency	Max. efficiency	> 96.0%			> 97.5%				
Euro-efficiency		> 95.0%			> 96.5%					
MPPT efficiency		> 99.9%								
General data	Dimensions (W / H / D) [mm]	335 x 580 x 170				395 x 637 x 180				
	Weight [kg]	15.8		18.2		23.5		25.8		
	Operating temperature range [°C]	-20°C ~ +60°C								
	Ingress protection	IP65								
	Topology	transformer-less								
	Internal consumption (stand-by / night)	< 10W / < 2W				< 15W / < 2W				
	Cooling concept	convection cooling								
	Noise (typical) [dB]	< 25dB								
	LCD display	Yes								
	Communication port	RS485 standard; RS232, external WIFI o. Ethernet (option)								
	Standard warranty [year]	5								
	Grid management	Yes								
	DC switch	Option (can be integrated into the housing)								
	Protection	DC reverse-polarity protection	-							
		All-pole fault current monitoring	Yes							
AC short-circuit protection		-								
Ground fault monitoring		Yes								
Certification	Safety	VDE0126-1-1, VDE-AR-N-4105								
	EMI/EMC	EN61000-6-2, EN61000-6-3, EN61000-6-4, etc...								

* no galvanic isolation – note installation introduction of the solar-panel manufacturer.