

S5-GC(80-110)K

Solis Three Phase Grid-Tied Inverters

Efficient

- 9/10 MPPTs, max. efficiency 98.8%
- > 150% DC/AC ratio
- String current up to 16A, perfectly match large current bifacial modules

Smart

- Night SVG function
- Intelligent string monitoring, smart I-V curve scan
- Remote firmware upgrade with simple operation

Safe

- IP66
- Built-in PID recovery for better module performance (optional)
- AFCI protection, proactively reduces fire risk
- Globally recognised branded componentry for longer life

Economic

- Power line communication (PLC) (optional)
- DC side supports "Y" connector

Models:

S5-GC80K

S5-GC100K-HV

S5-GC110K-BHV



360° View

DATASHEET

S5-GC(80-110)K

Models	80K	100K-HV	110K-BHV
Input DC			
Max. input voltage	1100 V		
Rated voltage	600 V	720 V	
Start-up voltage	195 V		
MPPT voltage range	180 - 1000 V		
Max. input current	9 × 32 A	10 × 32 A	
Max. short circuit current	9 × 40 A	10 × 40 A	
MPPT number / Max. input strings number	9 / 18	10 / 20	
Output AC			
Rated output power	80 kW	100 kW	110 kW
Max. apparent output power	88 kVA	110 kVA	121 kVA
Max. output power	88 kW	110 kW	121 kW
Rated grid voltage	3/N/PE, 220 V / 380 V, 230 V / 400 V	3/PE, 480 V	3/PE, 540 V
Rated grid frequency	50 Hz / 60 Hz		
Rated grid output current	121.6 A / 115.5 A	120.3 A	117.6 A
Max. output current	133.7 A	132.3 A	129.4 A
Power factor	> 0.99 (0.8 leading - 0.8 lagging)		
THDi	< 3%		
Efficiency			
Max. efficiency	98.7%	98.8%	
EU efficiency	98.3%	98.5%	
Protection			
DC reverse-polarity protection	Yes		
Short circuit protection	Yes		
Output over current protection	Yes		
Surge protection	DC Type II / AC Type II		
Grid monitoring	Yes		
Anti-islanding protection	Yes		
Temperature protection	Yes		
Strings monitoring	Yes		
I/V Curve scanning	Yes		
Integrated AFCI 2.0	Optional		
Integrated PID recovery	Optional		
Integrated DC switch	Yes		
Integrated AC switch	Optional		
General Data			
Dimensions (W × H × D)	1050 × 567 × 314.5 mm (with AC switch)		
Weight	85 kg		
Topology	Transformerless		
Self-consumption (night)	< 2 W		
Operating ambient temperature range	-30 ~ +60°C		
Relative humidity	0 - 100%		
Ingress protection	IP66		
Cooling concept	Intelligent fan-cooling		
Max. operation altitude	4000 m		
Grid connection standard	G98 or G99, VDE-AR-N 4105/VDE-AR-N 4110/VDE V 0124, EN 50549-1, VDE 0126/UTE C 15/VFR:2019, CEI 0-21, C10/11, NRS 097-2-1, TOR, EIFS 2018.2, IEC 62116, IEC 61727, IEC 60068, IEC 61683, EN 50530		
Safety / EMC standard	IEC/EN 62109-1/-2, IEC/EN 61000-6-2/-4		
Features			
DC connection	MC4 connector		
AC connection	OT terminal (max. 185 mm ²)		
Display	LCD		
Communication	RS485, Optional: Wi-Fi, GPRS, PLC		