RENAC

On-grid Inverters

R1 Mini Series

1.1kW / 1.6kW / 2.2kW / 2.7kW / 3.3kW / 3.7kW
Single Phase, 1 MPPT



FEATURES

- Natural cooling for mute operation
- Compact design
- Remote firmware upgrade
- IP65 outdoor design
- 130% DC input oversizing
- Built-in zero export function

R1 Mini Series

Model	R1-1K1-SS	R1-1K6-SS	R1-2K2-SS	R1-2K7-SS	R1-3K3-SS	R1-3K7-SS
PV Input Data						
Max. Recommended PV Power [Wp]	1400	2400	2800	3500	4200	4800
Max. PV Input Voltage [V]	500	500	500	550	550	550
MPPT Voltage Range [V]	50 ~ 500	50 ~ 500	50 ~ 500	50 ~ 550	50 ~ 550	50 ~ 550
Rated Input Voltage [V]	360					
Start-up Voltage [V]	70					
No. of MPP Trackers	1					
No. of Input Strings per Tracker	1					
Max. PV Input Current [A]	13.5	13.5	13.5	13.5	16	13.5
Max. Short-circuit Current per MPPT [A]	17	17	17	17	20	17
DC Switch	Optional					
AC Output Data						
Rated AC Power [W]	1100	1600	2200	2700	3300	3680
Max. Output Power [VA]	1100	1600	2200	2700	3300	3680
Max. AC Current [A]	4.8	7.2	9.6	12	14.4	16
Rated AC Voltage / Range [V]	220 / 230; 160 ~ 290					
Grid Frequency / Range [Hz]	50 / 60; ±5					
Adjustable Power Factor [cosφ]	0.8 leading ~ 0.8 lagging					
Output THDi (@Rated Output)	≤ 2%					
Efficiency						
Max. Efficiency	97.00%	97.10%	97.10%	97.30%	97.30%	97.30%
Euro Efficiency	96.50%	96.60%	96.60%	96.80%	96.80%	96.80%
General Data						
Size (Width * Height * Depth) [mm]	260 * 295 * 115					260 * 335 * 120
Weight [kg]	6.8	6.8	6.8	6.8	6.8	7.5
User Interface	LCD					
Communication	RS485 or Wifi or 4G (optional)					
Ambient Temperature Range [℃]	-25 ~ +60					
Relative Humidity	0 ~ 100%					
Operating Altitude [m]	≤ 4000					
Standby Self Consumption [W]	< 0.2					
Topology	Transformerless					
Cooling	Natural					
Enclosure	IP65					
Noise [dB]	< 30					
Warranty [years]	5 / 7 / 10					
Certifications & Standards						
Grid Regulation	VDE 0126-1-1, G98, EN 50549, C10 / 11, PEA, MEA, AS 4777, CEI 0-21, IEC 61727, IEC 62116, IEC 60068, IEC 61683					
Safety Regulation	IEC 62109-1, IEC 62109-2					
EMC	EN 61000-3-2, EN 61000-3-3, EN 61000-6-1, EN 61000-6-3, IEC 61000-4-16, IEC 61000-4-18, IEC 61000-4-29					
Protection						
	• DC Insulation Monitoring		• AC Overvoltage Protection		• Anti-island Protection	
	• Residual Current Monitoring		• AC Overcurrent Protection		• Over-heat Protection	
	• Input Reverse Polarity Protection		• AC Short-circuit Protection		• DC / AC Surge Protection	