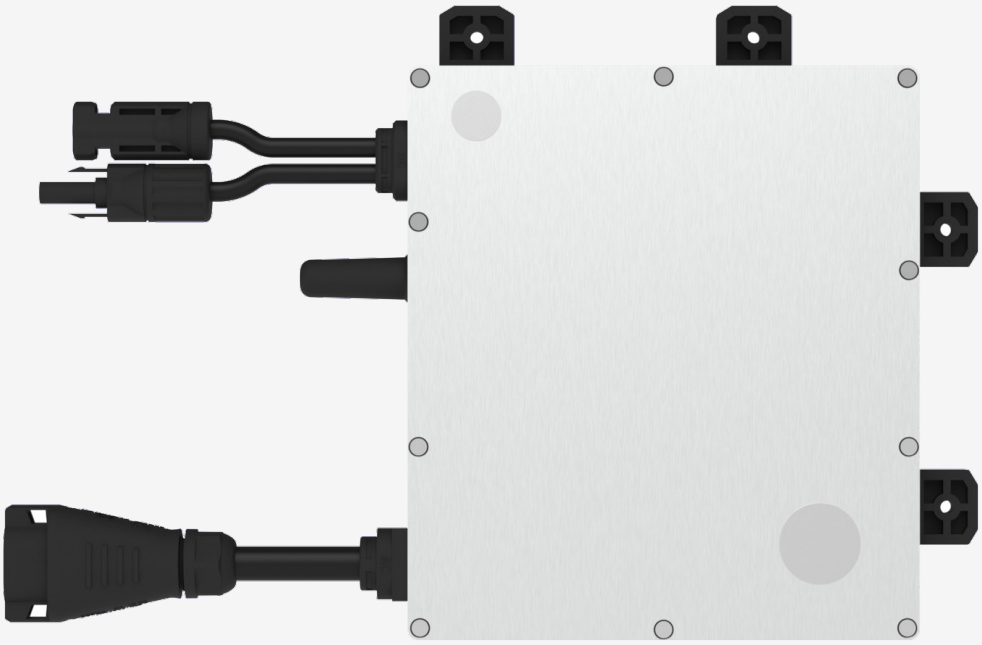

Microinverter Datasheet

HMS-300-1A
HMS-350-1A
HMS-400-1A

Description

Hoymile HMS-400-1A series microinverter benefits from a new design architecture and is more suitable for AC module applications.
Each microinverter connects to one PV module. With module-level MPPT and real-time monitoring function, Hoymile HMS-400-1A series microinverter harvests more energy and offers more convenient operation and maintenance.
The new Sub-1G wireless communication solution allows for more stable communication under various environmental conditions.

Features

01 Suitable for AC module applications

02 Safer for rooftop solar stations with integrated rapid shutdown functionality and isolated transformer

03 With Reactive Power Control, compliant with EN 50549-1:2019, VDE-AR-N 4105:2018, UL 1741, etc.

04 Grid protection relay integrated

05 Sub-1G wireless solution allows stable communication with Hoymiles gateway DTU

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Technical Specifications

Model	HMS-300-1A	HMS-350-1A	HMS-400-1A
Input Data (DC)			
Commonly used module power (W)	240 to 405+	280 to 470+	320 to 540+
Maximum input voltage (V)		60	
MPPT voltage range (V)		16-60	
Start-up voltage (V)		22	
Maximum input current (A)	12	13	14
Maximum input short circuit current (A)	20	20	25
Number of MPPTs		1	
Number of Inputs per MPPT		1	
Output Data (AC)			
Rated output power (VA)	300	350	400
Rated output current (A)	1.30	1.52	1.74
Nominal output voltage/range (V)[1]	230/180 ~ 275	230/180 ~ 275	230/180 ~ 275
Nominal frequency/range (Hz)[1]		50/45-55	
Power factor (adjustable)		> 0.99 default 0.8 leading ... 0.8 lagging	
Total harmonic distortion		< 3%	
Maximum units per 12 AWG branch[2]	15	13	11
Maximum units per 10 AWG branch[2]	24	21	18
Efficiency			
CEC peak efficiency		96.70%	
Nominal MPPT efficiency		99.80%	
Night power consumption (mW)		< 50	
Mechanical Data			
Ambient temperature range (°C)		-40 to +65	
Storage temperature range (°C)		-40 to +85	
Dimensions (W×H×D [mm])		184.5 × 204.5 × 26	
Weight (kg)		1.71	
Enclosure rating		Outdoor-IP67 (NEMA 6)	
Cooling		Natural convection – No fans	
Features			
Communication		Sub-1G	
Topology		Galvanically Isolated HF Transformer	
Monitoring		S-Miles Cloud	
Compliance		EN 50549-1: 2019, VDE-AR-N 4105: 2018, UL 1741, IEC/EN 62109-1/-2,IEC/EN 61000-6-1/-2/-3/-4, IEC/EN 61000-3-2/-3	

*1 Nominal voltage/frequency range can be changed due to the requirements of local power department.
*2 Refer to local requirements for the exact number of microinverters per branch.