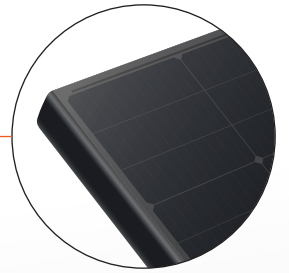
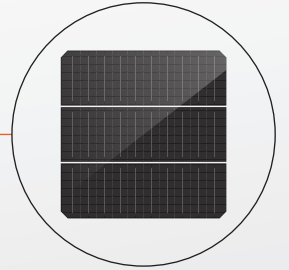


Innovative Design of Micro Inverter



Full-Screen PV Module



1/3 Cut Solar Cells

# SolarUnit —

The World's  
First Integrated  
PV System

**DAH-SU800D**



### Integrated System Design

- Modular design of solar system, convenient installation, lower BOS cost
- Each unit operates independently, unrestricted installation angle, more capacity on complex roofs



### High System Generation

- Integrated system solution, perfect match between module and inverter, higher system efficiency
- Module-level MPPT, greatly improve power generation of PV system



### Innovative Module Technology

- 1/3 cut low current module, less heat loss, better low light performance, system generation increased by around 3%
- Global patented Full-Screen module, decrease 6-15% power loss caused by dust accumulation



### Leading Inverter Technology

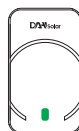
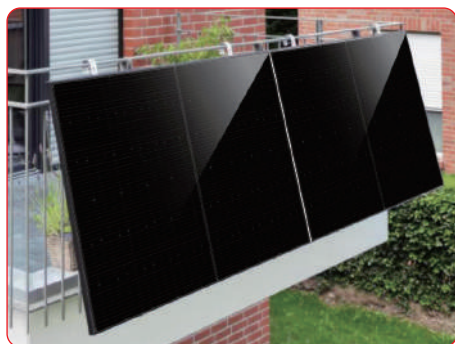
- Innovative contravariant scheme due to perfect match with low current module, peak efficiency above 97.16%
- The latest semiconductor technology, higher conversion efficiency, smaller inverter size, less consumption



### Improved Safety Assurance

- Lower risk of arcing due to lower system current, greatly reduce safety hazards
- Remote monitoring and rapid shutdown through Intelligent cloud platform

# System Configuration



## Configuration list

SYSTEM LAYOUT		DAH-SU8000	
Recommended PV Module Power (STC) Range	6units	6units	
Maximum Power (Pmax/W)	420W (PERC)	440W (N-TOPCon)	
AC Bus Cable Current-carrying	28A/1pcs	28A/1pcs	
AC Bus Connection Type	Fast-plug connector	Fast-plug connector	
<b>UNIT DATA</b>			
Max. Output Power	800VA	800VA	
Grid Voltage	220V/230V(180V-270V), L+N+PE	220V/230V(180V-270V), L+N+PE	
Output Frequency Range	50/60Hz±5Hz	50/60Hz±5Hz	
Max Output Current	4.0A	4.0A	
Power Factor(Default/Adjustable)	0.9leading...0.9lagging	0.9leading...0.9lagging	
Output Current Total Harmonic Distortion	< 2%	< 2%	
Peak Efficiency	97.16%	97.16%	
CEC Weighted Efficiency	97.02%	97.02%	
MPPT Efficiency	> 99.95%	> 99.95%	
Night Power Consumption	0W	0W	
<b>FEATURES</b>			
Operating Ambient Temperature Range	-40°C ~ +65°C	-40°C ~ +65°C	
Storage Temperature Range	-40°C ~ +85°C	-40°C ~ +85°C	
Protection	IP65	IP65	
Cooling	Natural convection-No fans	Natural convection-No fans	
Microinverter Size (H x W x D)	412mm×97mm×42.5mm	412mm×97mm×42.5mm	
Microinverter Weight	1.8kg	1.8kg	
System Size (H x W x D)	1766×1132×32mm (X2)	1766×1132×32mm (X2)	
System Weight	46.8kg	46.8kg	
Noise	< 10db	< 10db	
Overvoltage class	III	III	
Communication	Wifi/PLC	Wifi/PLC	
Operational Platform	DAH Smart Cloud Platform	DAH Smart Cloud Platform	
System Integration	Integration of System and Module	Integration of System and Module	
Certificates	ABNT NBR 16150,VDE-AR-N 4105: 2018	ABNT NBR 16150,VDE-AR-N 4105: 2018	
	IEC/EN 62109-1/-2	IEC/EN 62109-1/-2	
	IEC/EN 61000-6-1/-2/-3/-4	IEC/EN 61000-6-1/-2/-3/-4	
	IEC/EN 61000-3-2/-3	IEC/EN 61000-3-2/-3	
	IEC61215 IEC61730	IEC61215 IEC61730	



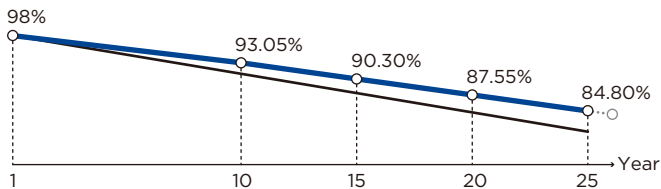
DHM-T56X10  
**420W**

# Full Screen

**No Dust and Dirt on the Surface Increases Power Generation**

## Quality Guarantee

- 12-year → Material & technology warranty
- 25-year → Linear power output warranty



- DAH Solar Linear power output guarantee
- Standard Linear power output guarantee

## Comprehensive Products & System Certificates



IEC 61215 / IEC 61730 / CE / FIDE / INMETRO  
 ISO 45001 : 2018/International standards for occupational health & safety  
 ISO 14001 : 2015/Standards for environmental management system  
 ISO 9001 : 2015/Quality management system

Low current, increase power generation  
 1/3 design, lower current and lower loss

Increase power generation by 6.15% +  
 Panel is capable to decrease power generation loss caused by Dust, reduce the hot spot risk.

Curved Surface 128° R Angle  
 Reduce holding pressure by 75%+  
 Curved Frame with ergonomic Design, optimized Delivery and Installation Experience.

Revolutionary Assembling Technology  
 Using excellent frame assembling technology, Strong Adhesion, Durable in Use.

Excellent mechanical load capacity  
 Certified by Dust-Sand, Salt-Mist, Ammonia etc. weather resistance tests and enhanced mechanical load: wind load (2400 Pa) and snow load (5400 Pa).

# DHM-T56X10 420W



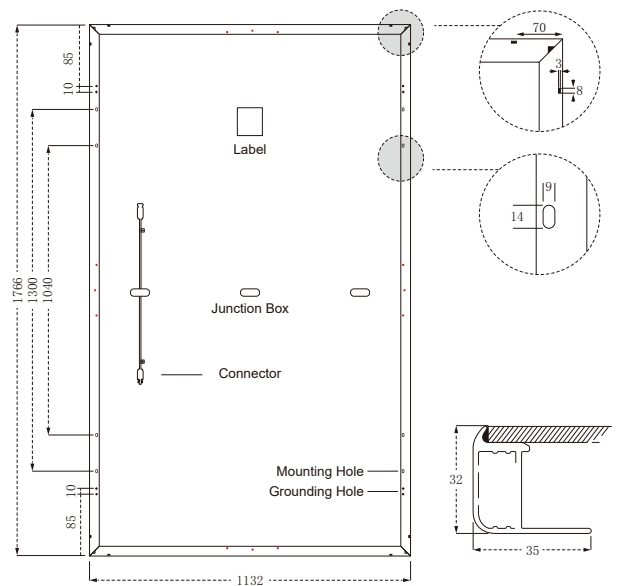
## Mechanical Specification

Cable	4.0mm <sup>2</sup> , 1200/1200mm in length,
(Including connector)	length can be customized
No.of Cells	168 (6×28)
Glass	3.2mm High Transmission, Antireflection Coating
Junction box	IP68, 3 Bypass Diodes
Connector	MC4 Compatible
Weight	22.5kg
Cells Type	Mono 182×60.7mm
Dimension (L×W×T)	1766×1132×32mm
Packing	34pcs/pallet, 816pcs/40HQ

## Operating Parameters

Maximum system voltage	1500V DC
Operating Temperature	-40 ~ +85°C
Maximum series fuse rating	15A
Snow load, frontside/Wind load, backside	5400Pa/2400Pa
Nominal operating cell temperature	45°C±2°C
Application level	Class A

## Design



## STC — Electrical Characteristics

Module Type	DHM-T56X10
Maximum Power (Pmax/W)	420
Open-circuit Voltage (Voc/V)	115.4
Maximum Power Voltage (Vmp/V)	97.3
Short-circuit Current (Isc/A)	4.56
Maximum Power Current (Imp/A)	4.32
Module Efficiency (%)	21.01

Power Tolerance: 0~+5W, Temperature Coefficient of Isc: 0.05%/°C, Temperature Coefficient of Voc: -0.31%/°C, Temperature Coefficient of Pmax: -0.35%/°C

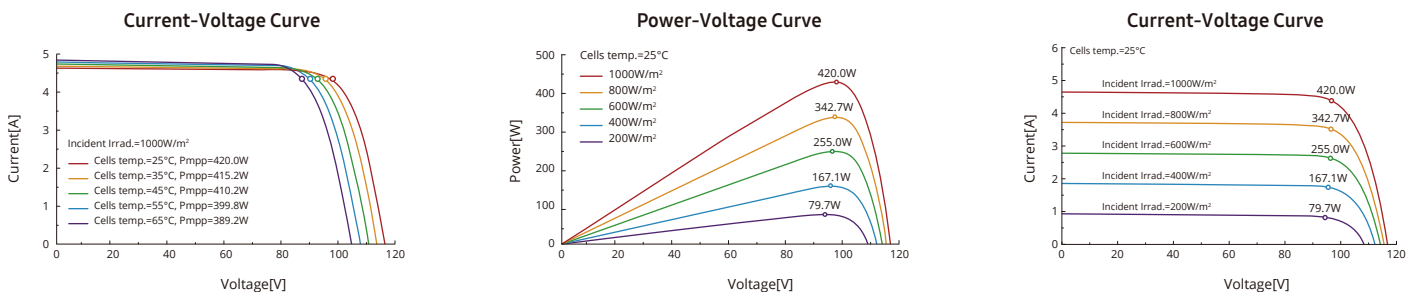
Standard Test Environment : Irradiance 1000W/m<sup>2</sup>, Cell temperature 25°C, Spectrum AM1.5

## NOCT — Electrical Characteristics

Maximum Power (Pmax/W)	312
Open-circuit Voltage (Voc/V)	108.2
Maximum Power Voltage (Vmp/V)	91.2
Short-circuit Current (Isc/A)	3.68
Maximum Power Current (Imp/A)	3.43

Standard Test Environment : Irradiance 800W/m<sup>2</sup>, Ambient temperature 20°C, Spectrum AM1.5, Wind speed 1m/s

## I-V Curve DHM-T56X10-420W



DHN-SU600D-G0/B0

DHN-SU800D-G0/B0

DHN-SU920D-G0

DHN-SU1K5T-G0



Innovative Design of MicroInverter



# Technical Specifications

Model	DHN-SU600D-G0/B0		DHN-SU800D-G0/B0		DHN-SU920D-G0	DHN-SU1K5T-G0
<b>DC input</b>						
Maximum input voltage (V)	420					450
MPPT voltage range (V)	120-360	70-300	120-360	70-300	120-360	
Start-up voltage (V)	50	40	50	40	50	
Rated input voltage (V)	190		200		240	320
Input grid connected voltage (V)	180					
Input off grid voltage (V)	160					
Full load input voltage range (V)	134-360	134-300	178-360	178-300	200-360	300-360
Input overvoltage protection value (V)	410					435
Maximum input current (A)	4.5				4.2	5.2
Maximum input short-circuit current (A)	4.6					5.7
Maximum allowable current of input terminal (A)	6.5					
<b>AC output</b>						
Rated output power (VA)	600		800		920	1500
Rated output voltage (V)	220/230					
Rated output frequency (Hz)	50/60					
Maximum AC output current (A)	3.0		4.0		4.2	6.82
Power factor	> 0.99 (0.9 leading...0.9 lagging)					
Total harmonic distortion	< 3%		< 2%		< 3%	
Grid voltage range (Vac)	180-270 (According to safety regulations)					
<b>Efficiency</b>						
Peak efficiency	97.10%		97.16%		97.20%	97.55%
CEC Weighted Efficiency	97.00%		97.02%		97.05%	97.16%
Chinese efficiency	97.10%		97.16%		97.20%	97.50%
MPPT efficiency	> 99.95%					
<b>Basic parameters</b>						
Ambient Temperature (°C)	-40~65					
Cooling	Self cooling					
Communication	Wifi/PLC	Wifi	Wifi/PLC	Wifi	Wifi/PLC	
Weight (Kg)	1.8	1.6	1.8	1.6	1.8	
Size (W×H×Dmm)	412×97×42.5	372×99×43	412×97×42.5	372×99×43	412×97×42.5	
Topology	Non-Isolated					
Night power consumption (W)	0					
Ingress Protection	IP65					
Protective class	I					
<b>Certification standards</b>						
Certifications	NBR16149/NBR16150					
	VDE AR-N 4105: 2018-11					
	NBT 32004-2018					
Compliance	IEC/EN 62109-1/-2					
	IEC/EN 61000-6-1/-2/-3/-4					
	IEC/EN 61000-3-2/-3					
Warranty	10 years					