Product Overview

Demesilo

All-in-one
Energy Storage Machines

Your Energy, Our Innovation.

www.demesilo.com

More Product Parameters

Demesilo (Changxing) New Energy Technology Co.,Ltd.

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VERSION:20241028

Household Photovoltaic

Solar Solutions Supplier

DS-AIO SERIES ALL IN ONE

PV
Battery
Grid

Off-grid Single-Phase

Energy Storage Machine

APP Real-time monitoring
Real-time observation of power generation, electricity consumption, power, etc.

System Ecurity Guarding
System compatibility ensures accurate equipment operation data and automatic power-off shutdown.

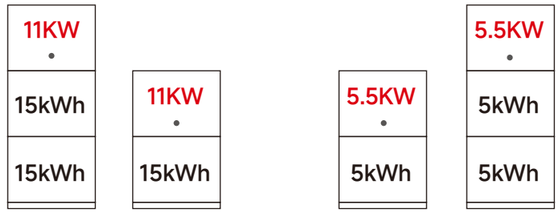
Multiple Power Supply Modes
Priority modes can be selected among photovoltaic, gird and battery.

Multiple guards for safe energy storage

A Phosphoric acid lithium iron phosphate battery
5000~10000 times above use cycle

Electricity Flexible Expansion
Can be expanded according to the needs of use flexible expansion

Built-in MPPT
Automatic voltage stabilization protect the electrical appliances



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DS-AIO SERIES 5500W/11000W

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On/Off Key
Upper and lower parts can be independent.More humanized design

BMS Management System
Each battery pack is equipped with BMS

Chassis

LCD Display
Real-time status display, easy to operate

Battery Module
The capacity of each battery module can be selected from 5 and 15 kilowatt-hours which can be flexibly matched acording to the demand of electricity consumption.

MODEL	DS-AIO-5500S	DS-AIO-11000S
Rated power	**5500VA/5500W**	**11000VA/11000W**
INPUT		
Input Voltage	230VAC	
Voltage range	170-280VAC(UPS mode) 90-280VAC(Inverter mode)	
Frequency Range	50HZ/60HZ(auto adapt)	
OUTPUT		
Output Voltage	230VAC+5%(inverter mode)	
Peak Power	11000VA	22000VA
Conversion Efficiency	94%	
Output Frequency	50/60HZ+0.1%(inverter mode)	
Switching Time	10MS (computer equipment), 30MS (household appliances)	
Output Waveform	Sine wave	
CHARGE		
Solar Charging Method	MTTP	
PV Maximum Input Powel	5500W	2*5500W
MPPT Input VoltageRange	60-500VDC	90-500VDC
Maximum PV ChargingCurrent	100A	150A
Maximum AC chargingcurrent	80A	150A
Maximum Chargingcurrent	100A	150A
BATTERY		
Battery Capacity	**5120Wh(5.12kWh)**	**15360Wh(15.36kWh)**
Battery Voltage	**51.2VDC**	**51.2VDC**
Battery Type	LIFEPO4	
Full Charge Voltage(FC)	58.4V	
Full Discharge Voltage(FD)	44	
Max Continuous Discharge Current	100A	200A
Protection	BMS Circuit breaker	
Recommended Charging Current	50A(0.5C)	100A(0.5C)
Max Charging Current	100A	200A
PHYSICAL PARAMETERS		
D*W*H(mm)	610*170*900	630*250*1030

DS-AIO SERIES

ALL IN ONE

PV
Battery
Grid

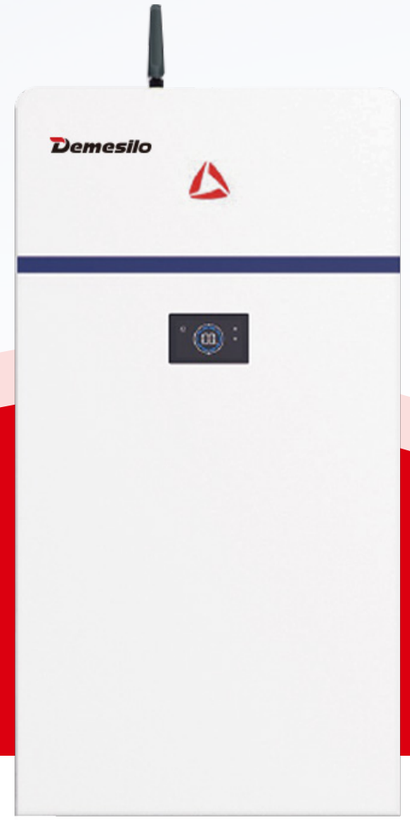
Single-Phase HV

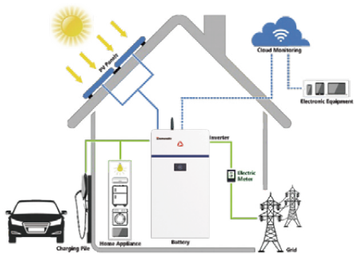
Energy Storage Machine

Intelligent Monitoring
Device information can be monitored inreal time via the app, that manages poweroutput intelligently and efficiently

Cost-Effectiveness
All-in-one design allows lower cost andhigher efficiency

Flexible Configuration
Our ESS enables PV charging, load matchingremote energy scheduling, and provides anemergency power supply (off-grid)





	Inverter Power		
	3.6kW	5kW	6kW
	Battery capacity: 10 kWh (expandable to 40 kWh)		

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DS-AIO SERIES 3600W/5000W/6000W

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Model	DS-AIO-S10-3600	DS-AIO-S10-5000	DS-AIO-S10-6000
System Parameters			
Rated Output Power/EPS Power (W)	3600/3600	5000/5000	6000/6000
AC Output Voltage (Vac)		230V， L/N/PE	
Frequency (Hz)		50/60	
Battery Capacity (kWh)		10 (Expandable to 40 kWh)	
Protection Level		IP55	
Operating Temperature		Charge: 0~55°C; Discharge: -20~60°C	
Storage Temperature		-10°C~35°C	
Noise (dB)		<25	
Weight (kg)		129	
Dimension (W*H*D, mm)		580*1100*230	
Warranty		5 years (Extendable to 10 years)	

Inverter Parameters

Model		CSPH 3600	CSPH 5000	CSPH 6000
PV Input	Max. PV Input Power (W)		9000	
	Max. PV Input Voltage (Vdc)		580	
	MPPT Voltage Range (Vdc)		100~550	
	Max. PV Input Current (Adc)		15*2	
	Number of MPPTs		2	
AC Output	Rated Output Power (W)	3600	5000	6000
	Rated Output Voltage (Vac)		230	
	Rated Output Current (A)	15.7	21.7	26.1
	Power Factor		0.8 Leading~0.8 Lagging	
Backup Output	Max. Output Power (W)	4680 (1 min)	6500 (1 min)	7800 (1 min)
	Transfer Time (ms)		<10	
General	Max. Efficiency		97.70%	
	European Efficiency		97.10%	
	Weight (kg)		19	
	Dimension (W*H*D, mm)		580*280*230	
	Certification		DIN V VDE V 0126-1-1/A1， VDE-AR-N4105， CEI 0-21， IEC62109-1， IEC62109-2， EN61000-6-3， EN61000-6-2， EN50549	

Battery Parameters

Battery Type	LiFePO4
Battery Capacity (kWh)	10
Rated Voltage (Vdc)	332.8
Voltage Range (Vdc)	291.2~374.4
Max. Charge/Discharge Current (A)	20/20
Max. Number of Parallel Connections	4
Weight (kg)	110
Dimension (W*H*D, mm)	580*820*213
Certification	CE/IEC 62619/UN 38.3/IEC 62040

DS-AIO SERIES ALL IN ONE

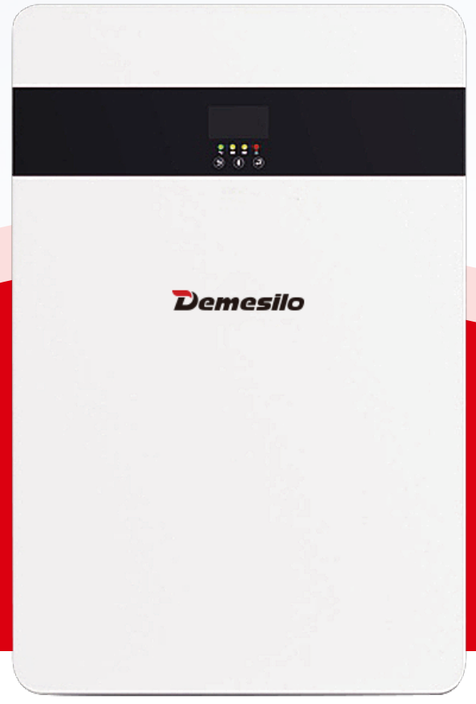
Off-grid Single-phase Wall-mounted

Energy Storage Machine

User-Friendly
The Utility priority mode, batterypriority mode, energy-saving mode, and RV priority mode can be selectedto meet different electricity needsreduce the electricity bil

High Safety
Intelligent BMS provides multipleprotections feature, safe and reliable

Flexible Configuration
Compatible with PV and grid charge, flexible and adaptable,Capacity options:2.56kWh or 5.12kWh



Main Features

Demesilo Energy all-in-one off-grid low-voltage residential energy storage system is an independentenergy solution that connects solar panel , the grid (or generator) and load. With its built-in LFPbattery, off-grid inverter and battery management system (BMS), it is suitable for areas withoutgrid coverage or situations that require backup power sources , ensuring stable power supply andsupporting various electricity needs for residential, businesses, and industries.

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Model	DS-AIOL-3kw	DS-AIOL-5kw
Rated Power	3kW	5kW
Battery Type	LiFePO4	
Battery Parameters		
Rated Voltage (Vdc)	25.6	51.2
Rated Capacity (kWh)	2.56	5.12
Input		
Utility Input Voltage (Vac)	170~260	
Utility Frequency Range (Hz)	50~60 (Automatic recognition)	
Solar Charger & AC Charger		
Max. PV Array Power (W)	4000	6000
PV Array Open Circuit Voltage (Vdc)	120~430	120~430
Max. Solar Input Current (A)	15	15
Max. Solar Charge Current (A)	80	80
Max. AC Charge Current (A)	32	32
Max. Charge Current (PV+AC) (A)	80	80
Output		
AC Output Voltage (Vac)	208/220/230/240	
Frequency (Hz)	50/60	
Other		
Overload Alarm	Alarm at 110% load, one minute shutdown at 120% load, 3 seconds shutdown at 150% load Automatic shutdown when load falls below 8%	
Protection Features	Charging overvoltage protection, Discharging undervoltage protection, Overcurrent protection, Overtemperature protection, Low temperature protection, Short circuit protection, etc.	
Four Working Modes	Utility priority mode, Battery priority mode, Energy-saving mode, RV priority mode	
Fan Control	Intelligent speed control	
Switching Time (ms)	<5	
Protection Level	IP20	
Installation	Wall mounting	
Color	Gun grey (Customizable)	
Operating Temperature	Charge: 0~55°C; Discharge: -20~55°C	
Storage Temperature	-10°C~35°C	
Relative Humidity	10%～95%RH	
Weight (kg)	44	60
Dimension (W*H*D, mm)	460*140*700 (Depth dimensions do not include brackets)	
Warranty	Based on 2 years	
Certification	UN 38.3	

DS-AIO SERIES

ALL IN ONE

PV
Battery
Grid

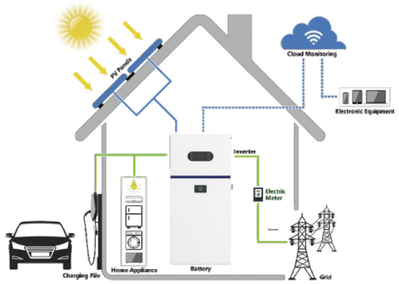
Three-phase HV

Energy Storage Machine

Cost-Effectiveness
All-in-one design allows lower cost and higher efficiency

Intelligent Monitoring
Our ESS is equipped with a smart LCD,
Device information can be monitored in real time
via the app that manages poweroutput intelligently and efficiently

Flexible Configuration
Our ESS enables PV charging, loadmatching,
remote energy scheduling, and provides
an emergency powersupply (off-grid)



	Inverter Power					
	4kW	5kW	6kW	8kW	10kW	12kW
						
	Battery capacity: 10 kWh (expandable to 40 kWh)					

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DS-AIO SERIES 4000W/5000W/6000W/8000W/10kW/12kW

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Model	DS-AIO-T10 4000T	DS-AIO-T10 5000T	DS-AIO-T10 6000T	DS-AIO-T10 8000T	DS-AIO-T10 10000T	DS-AIO-T10 12000T
System Parameters						
Rated Output Power/EPS Power (W)	4000/4000	5000/5000	6000/6000	8000/8000	10000/10000	12000/10000
AC Output Voltage (Vac)	400/380V , 3W/N/PE					
Frequency (Hz)	50/60					
Battery Capacity (kWh)	10 (Expandable to 40 kWh)					
Protection Level	IP55					
Operating Temperature	Charge: 0~55°C; Discharge: -20~60°C					
Storage Temperature	-10°C~35°C					
Noise (dB)	<35					
Weight (kg)	140.6					
Dimension (W*H*D, mm)	580*1245*213					
Warranty	5 years (Extendable to 10 years)					

Inverter Parameters

Model		CPH4K	CPH5K	CPH6K	CPH8K	CPH10K	CPH12K
PV Input	Max. PV Input Power (W)	6000	7000	9000	12000	15000	15000
	Max. PV Input Voltage (Vdc)	1000					
	MPPT Voltage Range (Vdc)	200~850					
	Max. PV Input Current (Adc)	13*2					
	Max. Short Circuit Current (Adc)	20*2					
	Number of MPPTs	2					
AC Output	Rated Output Power (W)	4000	5000	6000	8000	10000	12000
	Rated Output Voltage (Vac)	400/380					
	Rated Output Current (A)	6	7.6	9.1	12.2	15.2	18.2
	Power Factor	0.8 Leading~0.8 Lagging					
Backup Output	Max. Output Power (W)	4000	5000	6000	8000	10000	10000
	Transfer Time (ms)	<10					
General	Max. Efficiency	98.0%	98.0%	98.2%	98.2%	98.2%	98.2%
	European Efficiency	97.3%	97.3%	97.5%	97.5%	97.5%	97.5%
	Weight (kg)	30.6					
	Dimension (W*H*D, mm)	580*425*213					
	Certification	VDE-AR-N4105 , IEC61727 , IEC62116 , VDE0124-AR-N0124 , EN50549 , IEC62109 , IEC62477					

Battery Parameters

Battery Type	LiFePO4
Battery Capacity (kWh)	10
Rated Voltage (Vdc)	332.8
Voltage Range (Vdc)	291.2~374.4
Max. Charge/Discharge Current (A)	20/20
Max. Number of Parallel Connections	4
Weight (kg)	110
Dimension (W*H*D, mm)	580*820*213
Certification	CE/IEC 62619/UN 38.3/IEC 62040

DS-S SERIES ALL IN ONE

Off-grid Single-phase Stacked

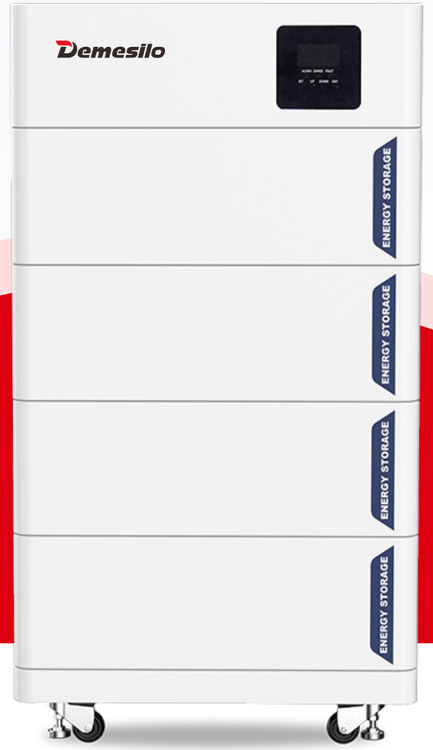
Energy Storage Machine

Universal Wheel
Wheel design, easy to move

Super Silent
Noise less than 60 decibels

LongBattery Life
6000 cycle life (DOD 80%)

Smart Charging
Avoid overcharging
Extending battery life



Main Features

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DS-S SERIES 5500W

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Model	BATTERY DS-S51100			
Single Module Capacity	5.12kWh			
Module Number	1	2	3	4
Rated Capacity	5.12kWh	10 24kWh	15.36kWh	20.48kWh
Nominal Voltage	51.2V			
Working Voltage	44V-58.4V			
Nominal Discharge Current	100A	200A	300A	400A
Nominal Charging Current	50A	100A	150A	200A
Cycle Life	6000 cycles (@80% DoD)			
Humidity	20%-60%			
Installation Method	Stacked mode			
Protection Rating	IP20			
Communication Protocol	CAN/RS485/RS232 (WIFI optional)			
Combined size Size(Battery+inverter+base)	440*600*500mm	440*600*700mm	440*600*900mm	440*600*1100mm
Packaging/Product Size (Single Battery)	660*550*320mm / 600*440*200mm			
Gross/Net Weight (Battery)	53.5kg/49kg	107kg/98kg	160.5kg/147kg	214kg/196kg
Cell Type	LFP			
Battery Rated Input Voltage	48Vdc			
Hybrid Max. Charging Current	80A			
Battery Pack Voltage Range	40Vdc-60Vdc			

Model	INVERTER DS5000
Max. PV Open Circuit Voltage	500Vdc
PV Working Voltage Range	120V-500Vdc
MPPT Voltage Range	120V-450Vdc
Max. PV Input Current	22A
Max. PV Input Power	5500W
Max. PV Charging Current	80A
Gross/Net Weight	19.5kg / 16.5kg
Packaging/Product Size	660*500*280mm / 600*440*180mm

AC Parameters (Grid-connected Side)

Max. Charging Current	60A
Rated Input Voltage	220V/230Vac
Input Voltage Range	170Vac-280Vac
Frequency	50Hz/60Hz
Charging Efficiency (bypass and inverter)	>95%
Switching Time	10ms
Max. Bypass Overload Current	40A

AC Output Parameters (Grid-connected Side)

Output Voltage Waveform	Pure Sine Wave
Rated Output Voltage	230VAC±5%
Rated Output Power	5000W
Peak Power	10000VA

DS-FS SERIES ALL IN ONE

Three-phase HV

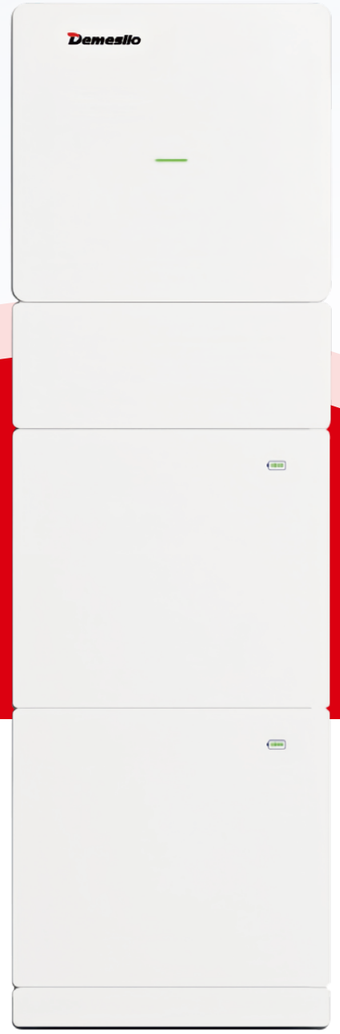
Energy Storage Machine

PV Battery Grid

Flexible Configuration
Our ESS enables PV charging, loadmatching, remote energy scheduling, and provides anemergency powersupply (off-grid)

High Scalability
Inverters support parallel operation;
Batteries support parallel expansion

Multiple Product Modes
System supports split type and integratedtype, provide users with more choices



Main Features

- Lower users' electricity bills throughself-consumption
- Balance the power load through peakshaving and valley filling
- Emergency backup power in caseof power failures
- Absorb new energy to ease thepressure on grid regulation

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DS-FS SERIES 3000W/3600W/4000W/5000W/6000W Demesilo

Model	DS-FS-3000S	DS-FS-3600S	DS-FS-4000S	DS-FS-5000S	DS-FS-6000S
System Parameters					
Rated Output Power/EPS Power (W)	3000/3000	3600/3600	4000/4000	5000/5000	6000/6000
AC Output Voltage (Vac)	220/230/240V, L/N/PE				
Frequency (Hz)	50/60				
Battery Capacity (kWh)	5 (Expandable to 15 kWh)				
Protection Level	IP65 (Inverter)/IP20 (Battery)				
Operating Temperature	Charge: 0~55°C; Discharge: -20~60°C				
Storage Temperature	-10°C~35°C				
Noise (dB)	<25				
Weight (kg)	77 (5kWh) / 125 (10kWh) / 173 (15kWh)				
Dimension (W*H*D, mm)	500*1178*180 (5kWh) / 500*1618*180 (10kWh) / 500*2058*180 (15kWh)				
Warranty	5 years (Extendable to 10 years)				
Inverter Parameters					
Model	**3000S**	**3600S**	**4000S**	**5000S**	**6000S**
PV Input — Max. PV Input Power (W)*	4500	6000	6000	7500	9000
PV Input — Max. PV Input Voltage (Vdc)	600				
PV Input — MPPT Voltage Range (Vdc)	80~550				
PV Input — Max. PV Input Current (Adc)	13*2				
PV Input — Number of MPPTs	2				
AC Output — Rated Output Power (W)	3000	3600	4000	5000	6000
AC Output — Rated Output Voltage (Vac)	220V/230V/240V, L/N/PE				
AC Output — Power Factor	0.8 Leading~0.8 Lagging				
Backup Output — Nominal Output Power (W)	3000	3600	4000	5000	6000
Backup Output — Nominal Output Current (A)	13.6	16.4	18.2	22.7	27.2
Backup Output — Transfer Time (ms)	<20				
Battery — Battery Voltage Range (Vdc)	42~58				
Battery — Max. Charging/ Discharging Current (A)	75	85	85	100	100
Battery — Nominal Charging/ Discharging Power (KW)	3	3.6	4	5	5
General — Ingress Protection Rating	IP65				
General — Weight (kg)	21				
General — Dimension (W*H*D, mm)	500*470*180				
General — Certification	IEC 62109-1&2,EN 62109-1&2,EN 61000-6-1&2&3&4, VDE 4105, EN 50549-1, C10/11, G98/G99/G100, CEI 0-21, NRS 097-2-1, UNE 217002				
Battery Parameters					
Battery Capacity (kWh)	5.12				
Rated Voltage (Vdc)	51.2				
Voltage Range (Vdc)	44.8~57.6				
Rated Charge/Discharge Current (A)	50				
Max. Charge/Discharge Current (A)	100				
Weight (kg)	48				
Dimension (W*H*D, mm)	500*440*167				
Certification	CE/IEC 62619/UN 38.3				