Q.HOME+
ESS HYB-G3-3P (-D)

Energy Storage Solution

Hybrid Inverter 5.0 / 6.0 / 8.0 / 10.0 / 12.0 / 15.0 kW | 6.0 / 9.0 / 12.0 kWh
Up to 98.0 % Conversion Efficiency

MODEL Q.VOLT HYB-G3-3P (-D) | Q.SAVE MATEBOX-G3-3P | Q.SAVE-G3



Q.VOLT HYB-G3-3P (-D)** **Q.SAVE MATEBOX-G3-3P** **Q.SAVE-G3**

Quick and easy installation
Modular type setting for faster and easier installation.

Supports 200 % oversized PV power
Two MPPTs with wide voltage range.
Excess energy to Battery.

Fast charging and high power discharge
Max. 30 A charge and discharge current.

Remote control and upgrading function
External control communication interface.

Working under extremely cold conditions
Working in full load under extreme cold temperature of –30 °C.*

On and off grid parallel use
Inverter on and off grid parallel to support higher power loads.

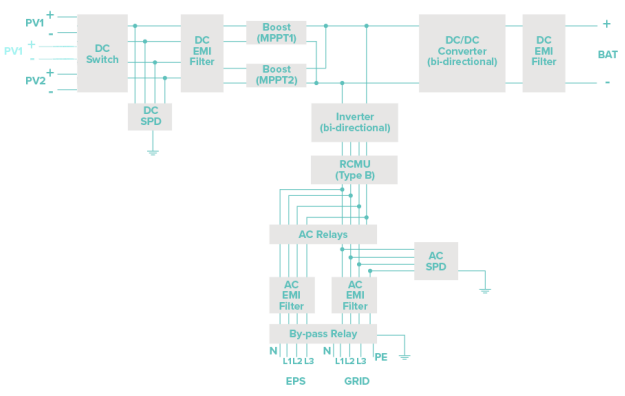
Unbalanced output supported
Prevent voltage imbalance when using high-power electrical appliances.

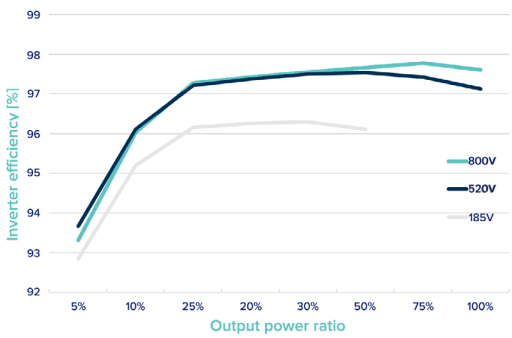
Shadow fix function for optimised yield
The inverter is able to find the best operating point to maximise the power output.

* Battery Heating must be on and SoC must be set up to 20 %.
** D variant with integrated DC switch for parallel installation.

Q.VOLT HYB-G3-3P (-D)

		Q.VOLT HYB-G3 X.X kW 3P (-D)					
		5.0	6.0	8.0	10.0	12.0	15.0
INPUT - DC							
Max. recommended PV power	[kWp]	10	12	16	20	24	30
Max. voltage (nominal operating voltage)	[V]	1000 (630)					
Max. input current (short circuit current) (input A / input B)	[A]	16 (20) / 16 (20)	16 (20) / 16 (20)	28 (35) / 16 (20)	28 (35) / 16 (20)	28 (35) / 16 (20)	28 (35) / 16 (20)
MPP voltage range (start operating voltage)	[V]	180 - 950 (200)					
No. of MPP trackers / strings per MPP tracker		2 / A:1, B:1	2 / A:1, B:1	2 / A:2, B:1	2 / A:2, B:1	2 / A:2, B:1	2 / A:2, B:1
INPUT - AC							
Max. apparent AC power	[kVA]	10	12	16	20	20	20
Max. current	[A]	16.1	19.3	25.8	32.0	32.0	32.0
Nominal grid voltage	[V]	380 / 400 / 415, 3P / N / PE					
Nominal grid frequency	[Hz]	50 / 60					
OUTPUT - AC							
Nominal (max.) power	[kVA]	5 (5.5)	6 (6.6)	8 (8.8)	10 (11.0)	12 (13.2)	15 (15.0)
Nominal grid voltage	[V]	380 / 400 / 415, 3P / N / PE					
Nominal grid frequency	[Hz]	50 / 60					
Rated current (Max. current)	[A]	7.2 (8.1)	8.7 (9.7)	11.6 (12.9)	14.5 (16.1)	17.5 (19.3)	21.8 (24.1)
Maximum output fault current (at 5ms)	[A]	68 for all types (5 - 15 kW)					
Displacement power factor		0.8 leading ~ 0.8 lagging					
THDi, rated power	[%]	< 3					
OUTPUT - AC / EPS (WITH BATTERY)							
Max. continuous apparent power	[kVA]	5	6	8	10	12	15
Rated voltage	[V]	400					
Rated frequency	[Hz]	50 / 60					
Max. continuous current	[A]	7.2	8.7	11.6	14.5	17.5	21.8
Peak apparent power	[kVA]	7.5	9	12	15	15	16.5
Duration	[s]	60					
Changeover time	[ms]	< 100					
THDv, linear Load	[%]	< 3					
EFFICIENCY							
MPPT efficiency	[%]	99.9					
Euro efficiency (max. efficiency)	[%]	97.0 (97.6)					
Battery charge / discharge efficiency	[%]	97.0 / 97.0					
COMPLIANCE							
Safety		EN 62109-1 / EN 62109-2					
EMC		EN 61000-6-1 2007 / EN 61000-6-2 2005 / EN 61000-6-3 / EN 61000-6-4 / EN 61000-3-2 / EN 61000-3-3 / EN 61000-3-11 / EN 61000-3-12					
Certification (more available upon request)		VDE 4105 / EN 50549-1 / CEI 0-21 / TOR Erzeuger Typ A / PPDS					
SAFETY & PROTECTION							
Overvoltage protection (integrated SPD)		AC (Type II) / DC (Type II)					
Integrated safety functions		• Over / under voltage protection • Grid protection • DC injection monitoring		• Back feed current monitoring • Residual current detection • Anti-islanding protection		• Over load protection • Over heat protection • Array insulation resistance detection	
DC switch		Yes (D variant)					
ENVIRONMENT LIMIT							
Protection degree		IP65					
Protection class		Class I					
Operating temperature range	[°C]	−35 - +60 (derating at +45)					
Max. operation altitude	[m]	3000					
Relative humidity	[%]	0 - 100 (non-condensing)					
Storage temperature	[°C]	−40 - +65					
Typical noise emission	[dB]	< 35	< 35	< 35	< 35	< 45	< 45
GENERAL DATA							
Dimensions (W × H × D)	[mm]	503 × 503 × 199					
Weight	[kg]	30					
Over voltage category (OVC)		III (AC) / II (DC)					
Cooling concept		Natural convection				Forced convection	
Topology		Non-isolated					
Communication interfaces		E-Meter / WLAN, Ethernet (both with adapter) / USB (for local upgrade) / Dry Contact (with adapter) / RS485 / CAN 2.0					
LCD display		Backlight, 20 × 4 character					
Warranty	[Year]	10					



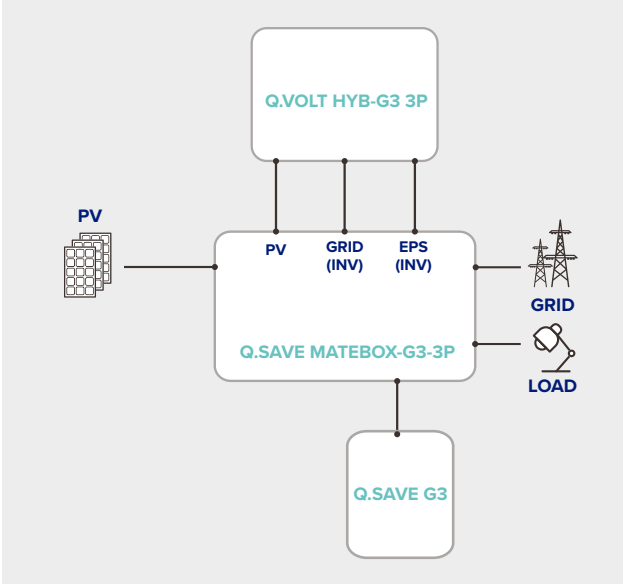


Q.SAVE MATEBOX-G3-3P

For the new Q.HOME+ ESS HYB-G3-3P, we get rid of the complicated wiring work by laying all the wires in the Q.SAVE MATEBOX-G3-3P. All you need to do is just to install one module on top of another, and connect all the cables which are already well sorted in the Q.SAVE MATEBOX-G3-3P in different ports.







PV		
Max. input voltage	[V]	1000
Max. short circuit current (input A / input B)	[A]	30 / 20
BATTERY		
Battery voltage range	[V]	80 - 480
Max. charge / discharge current	[A]	30
GRID (INV)		
Rated voltage	[V]	380 / 400 / 415
Rated frequency	[Hz]	50 / 60
Max. on-grid current	[A]	24.1
EPS / OFF-GRID (INV)		
Rated voltage	[V]	380 / 400 / 415
Rated frequency	[Hz]	50 / 60
Max. current	[A]	24.1
GRID		
Rated grid voltage	[V]	380 / 400 / 415
Rated frequency	[Hz]	50 / 60
Max. input / output current	[A]	63 / 24.1
LOAD		
Rated grid voltage	[V]	380 / 400 / 415
Rated frequency	[Hz]	50 / 60
Max. input / output current	[A]	63
ENVIRONMENT LIMIT		
Protection degree		IP54
Protection class		Class I
Operating temperature range	[°C]	−35 - +60 (derating at +45)
Storage temperature	[°C]	−40 - +70
Relative humidity	[%]	0 - 100 (non-condensing)
Max. operation altitude	[m]	3000
GENERAL DATA		
Dimensions (W × H × D)	[mm]	503 × 652 × 204
Weight	[kg]	14.5
Over voltage category (OVC)		III (AC) / II (DC)
Cooling concept		Natural
Warranty	[Year]	10

Q.SAVE-G3

		Q.SAVE-G3 X.X kWh		
		6.0	9.0	12.0
SYSTEM DATA				
System Components		• 1x Q.SAVE BMS-G3 • 2x Q.SAVE BAT-G3	• 1x Q.SAVE BMS-G3 • 3x Q.SAVE BAT-G3	• 1x Q.SAVE BMS-G3 • 4x Q.SAVE BAT-G3
Usable energy	[kWh]	5.5	8.3	11.0
Total energy	[kWh]	6.1	9.2	12.3
Battery type			LFP (LiFePO4)	
Nominal voltage	[V]	204.8	307.2	409.6
Operating voltage range	[V]	180 - 232	270 - 348	360 - 464
Max. charge / discharge power	[kW]	6.1	9.2	12.3
Max. charge / discharge current	[A]		30	
Rated charge / discharge power	[kW]	5.1	7.65	10.2
Rated charge / discharge current	[A]		25	
Faradic charge efficiency	[%]		99	
Battery roundtrip efficiency	[%]		95	
Max. Depth Of Discharge (DOD)	[%]		90	
Cycle life [@90 % DOD]			6000 cycles	
ENVIRONMENT LIMIT				
Protection degree			IP65	
Protection class			Class I	
Operating temperature range	[°C]		–30 to 50	
Relative humidity	[%]		0 - 100 (non-condensing)	
Storage temperature	[°C]		0 to 40 (1 year)	
Max. operation altitude	[m]		3000	
COMMUNICATION AND USER INTERFACE				
BMS / Inverter / Battery module			RS485 / CAN 2.0	
BMS LED indicator			SOC: 4 LED (25 %, 50 %, 75 %, 100 %); Status: 1 LED (working mode)	
System switch (ON / OFF)			Power button, DC-Breaker	
COMPLIANCE				
Safety			VDE 2510-50 / EN 62619	
EMC			EN 61000-6-1 / EN 61000-6-2 / EN 61000-6-3 / EN 61000-6-4 / EN 61000-3-2 / EN 61000-3-3 / EN 61000-3-11 / EN 61000-3-12	
UN number			UN 3480	
Hazardous materials classification			Class 9	
Transport testing requirement			UN38.3	
GENERAL DATA				
Over voltage category (OVC)			II (DC)	
Cooling concept			Natural convection	
Reverse connect protection			Yes	
Warranty	[Year]		10*	
Q.SAVE BMS-G3				
Dimensions (W × H × D)	[mm]		482 × 173 × 153	
Weight	[kg]		7.5	
Q.SAVE BAT-G3				
Dimensions (W × H × D)	[mm]		482 × 471 × 153	
Weight	[kg]		34.5	

CONFIGURATIONS (SUGGESTED) **

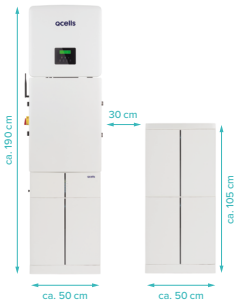
* See Warranty Terms

**Installation instructions must be followed. For more installation configurations, please refer to the installation manual and the technical documentation or contact our technical service department for further information on approved installation and use of this product.

Q.SAVE-G3 6.0 kWh



Q.SAVE-G3 9.0 kWh



Q.SAVE-G3 12.0 kWh



Specifications subject to technical changes. © Qcells Q.HOME+_ESS_HYB-G3-3P_2026-06_Rev09_EN