

SANUPS A11K-Li

Lithium-ion Battery UPS

Ver.5.5
English



SANUPS A11K-Li

Double Conversion Online UPS with
Lithium-ion Batteries



UPS unit

3-year
warranty

Lineup:

[No. of phases/wires] Input/Output voltage	Output capacity		Battery backup time		I/O connection	UL certification	Order no.	Page	
	[kVA]	[kW]	Load power factor 0.8	Load power factor 0.7				Specifications	Dimensions
[Single-phase 2-wire] 100 V model 100/110/120 V	1	0.8	13 min	15 min	Outlet	—	S-A11KL102B0013SSN00⁽¹⁾	p.5	p.8
						✓	S-A11KL102C0013UJ⁽¹⁾	p.10	p.11
	1.5	1.2	8 min	10 min	Outlet	—	S-A11KL152B0008SSN00⁽¹⁾	p.5	p.8
						✓	S-A11KL152C0008UJ⁽¹⁾	p.10	p.11
			19 min	20 min		—	S-A11KL152B0019SSN00⁽¹⁾	p.5	p.8
			100 min	110 min		—	S-A11KL152B0100TSN00⁽¹⁾	p.13	p.14
			200 min	220 min		—	S-A11KL152B0200TSN00□□⁽²⁾		
			300 min	330 min		—	S-A11KL152B0300TSN00□□⁽²⁾		
			400 min	440 min		—	S-A11KL152B0400TSN00□□⁽²⁾		
			500 min	550 min		—	S-A11KL152B0500TSN00	p.13	p.15
			600 min	660 min		—	S-A11KL152B0600TSN00		
	2	1.6	15 min	16 min	Outlet/terminal block	—	S-A11KL202B0015SS□□00⁽¹⁾	p.5	p.8
	3	2.4	9 min	10 min	Outlet/terminal block	—	S-A11KL302B0009SS□□00⁽¹⁾	p.7	p.9
			19 min	20 min		—	S-A11KL302B0019SS□□00⁽¹⁾		
			50 min	55 min		—	S-A11KL302B0050TS□□00⁽¹⁾	p.13	pp.16, 18
			100 min	110 min		—	S-A11KL302B0100TS□□00□□⁽²⁾		
			150 min	165 min		—	S-A11KL302B0150TS□□00□□⁽²⁾		
			200 min	220 min		—	S-A11KL302B0200TS□□00□□⁽²⁾		
			250 min	275 min		—	S-A11KL302B0250TS□□00	p.13	pp.17, 19
			300 min	330 min		—	S-A11KL302B0300TS□□00		
	5	4	11 min	12 min	Terminal block	—	S-A11KL502B0011SST00⁽¹⁾	p.7	p.9
			30 min	32 min		—	S-A11KL502B0030TST00⁽¹⁾	p.13	p.20
			60 min	64 min		—	S-A11KL502B0060TST00□□⁽²⁾		
			90 min	96 min		—	S-A11KL502B0090TST00□□⁽²⁾		
			120 min	128 min		—	S-A11KL502B0120TST00□□⁽²⁾	p.13	p.21
			150 min	160 min		—	S-A11KL502B0150TST00		
			180 min	192 min		—	S-A11KL502B0180TST00		

(1) Vertical (free-standing)/rack-mount convertible (2) Free-standing or rack-mount type can be selected.

Installation examples



Mountable in an EIA standard 19-inch rack

Rack support rails are optional.



Vertical installation

You can change the orientation of the LCD panel. Refer to the specifications for installation accessories such as vertical stands and floor mounting brackets.

Wide Operating Temperature Range

- The A11K-Li achieves an operating temperature range as wide as -20 to +55°C. It can be used with confidence even in harsh cold or hot environments.

Space-Saving

- The volume of the 30-minute backup model is about half of our conventional products,⁽¹⁾ and it can be installed in a smaller space.

Reduced Maintenance Work

- Our conventional UPSs⁽¹⁾ using lead-acid batteries require battery replacement about every 5 years.
- Thanks to Li-ion batteries, this UPS doesn't require battery replacement for 10 years.⁽²⁾ Thus, the cost of battery replacement can be reduced.

(1) Conventional UPS: A11K (with lead-acid batteries)

(2) At 30°C ambient temperature

Wide Input Range

- Its input voltage ranges from -40% to +20% of the rated voltage when the load level is less than 70%.
- Battery drain can be minimized even in unstable power environments.

Compatible with High Power Factor Loads

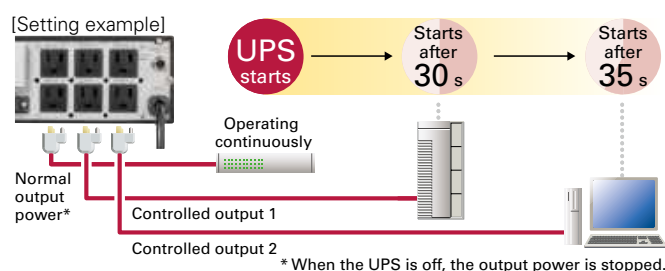
- With a 0.8 load power factor, the A11K-Li is capable of providing its power to loads with a high power factor.

Output capacity 1.5 kVA → **1.2 kW**

Easy and Reliable Sequential System Start and Stop

- The timing of power on and shutdown of hard drives or servers can be easily scheduled. (This only applies to models with a backup time of 19 minutes or less)

Settings can be done with an outlet box; it comes built-in for 1 and 1.5 kVA models, and optional for 2 and 3 kVA models.



Easy Maintenance

- An inverter module is removable from the front of a UPS unit for easy maintenance.
- Its built-in maintenance bypass circuit allows maintenance to be performed while maintaining inverter power supply.

SANUPS SOFTWARE STANDALONE

A free software program (Windows version) that enables the power management from computers is available for download from our website.

UPS status can be checked at a glance from a PC or server.

Note: This software can only be used on computers in serial connection with UPS.

For power management via a network, we have optional network solutions available.

Main functions

- Automatic start-up/shutdown of computers
- Scheduled operation
- UPS status display
- Message display
- UPS event log



Operation screen examples

Battery Cold Start Function

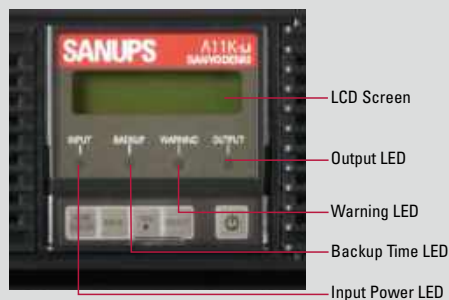
Batteries can start up the UPS even when grid AC power is not available, enabling inverter operation.

With this function enabled, the UPS can be used as an emergency power supply in the event of a natural disaster or emergency.

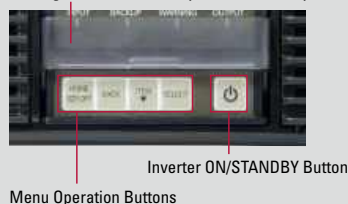
Note that the function is disabled by default.

Views and Part Names

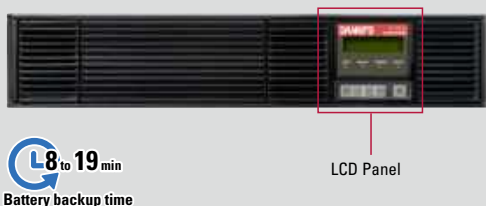
LCD Panel



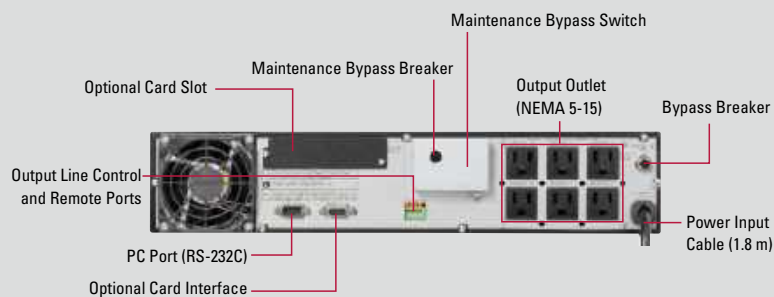
Sliding Button Cover Opened (slides up/down)



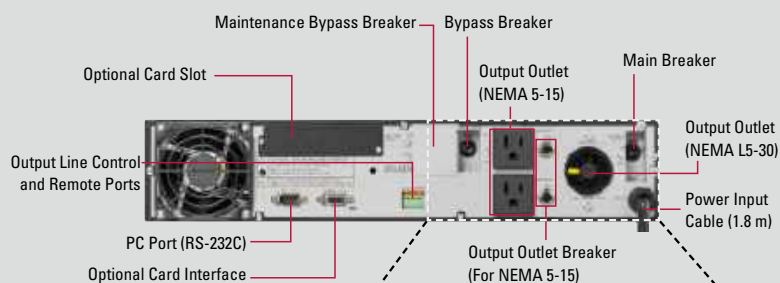
1, 1.5, 2 kVA, Front View



1, 1.5 kVA, Rear View



2 kVA, Rear View



2 kVA Terminal Block Type, Rear View

Model: S-A11KL202B0015SST00



Note: The photos above may look different from the actual products in the printed text, etc.

Specifications

Output capacity **1 to 2 kVA**Battery backup time **8 to 19 min**

Order no.			S-A11KL102B0013SSN00	S-A11KL152B0008SSN00	S-A11KL152B0019SSN00	S-A11KL202B0015SSN00	
Rated output capacity (apparent power / active power)			1 kVA / 0.8 kW		1.5 kVA / 1.2 kW		
Technology	Topology		Double conversion online				
	Rectifier		High power factor converter				
	Cooling method		Forced air cooling				
	Inverter		High-frequency PWM				
AC input	No. of phases/wires		Single-phase 2-wire ⁽¹⁾				
	Rated voltage		100/110/120 V (Same as output voltage)				
	Voltage range		At load level < 70%: Within -40 to +20% of rated voltage (-40% becomes -20% for recovery voltage)				
			At load level ≥ 70%: Within ± 20% of rated voltage				
	Rated frequency		50/60 Hz (auto-sensing ⁽²⁾)				
	Frequency range		Within ± 1, 3, 5, or 7% of rated frequency (same as output frequency regulation)				
	Required capacity ⁽³⁾		1.1 kVA	1.5 kVA	2.0 kVA		
	Input power factor		0.95 or greater	0.95 or greater	0.97 or greater		
AC output	No. of phases/wires		Single-phase 2-wire				
	Rated voltage		100/110/120 V (User-selectable. Factory setting: 100 V)				
	Rated current		10 A	15 A	20 A		
	Voltage regulation		Within ± 2% of rated voltage (at rated output)				
	Rated frequency		50/60 Hz (Same as the input rated frequency)				
	Frequency regulation	During grid operation	Within ± 1, 3, 5, or 7% of the rated frequency (User-selectable. Factory setting: ± 3%)				
		During battery operation	Within ± 0.5% of rated frequency				
	Output waveform		Pure sine wave				
	Voltage harmonic distortion	At linear load	3% or less (At rated output)				
		At rectifier load	7% or less (At rated output)				
	Load power factor		Rated				
	Transient voltage fluctuation		0.8 lagging (Variation range: 0.7 lagging to 1.0)				
	Overcurrent protection	For abrupt load change		Within ± 5% of rated voltage (For 0 ⇔ 100% load step changes at rated input)			
		For loss or return of input power		Within ± 5% of rated voltage (At rated output)			
		For abrupt input voltage change		Within ± 5% of rated voltage (For ± 10% abrupt change)			
	Overload capability		Automatic transfer to bypass (With automatic retransfer function)				
Output Line Control	Inverter	105% (for 200 ms)					
	Bypass	200% (for 30 s), 800% (for 2 cycles)					
Output Line Control		Yes					
		An optional outlet box is required					
Battery	Type		Lithium-ion battery				
	Battery backup time ⁽⁴⁾	Initial value	13 min (15 min)	8 min (10 min)	19 min (20 min)	15 min (16 min)	
		After 10 years ⁽⁵⁾	11 min (12 min)	6 min (8 min)	16 min (17 min)	12 min (13 min)	
	Battery self-test		Settings possible (Factory setting: "disabled")				
Interface	PC port		RS-232C				
	Remote port		Remote ON/OFF switch (can control up to 5 UPS units in Linked Operation using a dedicated connection cable)				
	Auxiliary port		Output Line Control contact ⁽⁶⁾				
	Dry contact		Optional dry contact interface card is required				
	Network support		Optional LAN interface card is required				
Acoustic noise	During normal operation		41 dB	45 dB	45 dB		
	During battery operation or at a temperature above 40°C		51 dB	51 dB	51 dB		
Heat dissipation (At rated operation, after battery charging completed)			82 W	127 W	153 W		
Input leakage current			3 mA	3 mA	3 mA		
Operating environment			Ambient temperature: -20 to +55°C, ⁽⁷⁾ humidity: 10 to 90% RH (non-condensing)				
Storage environment ⁽⁸⁾			Temperature: -20 to +55°C, humidity: 10 to 90% RH (non-condensing)				
Expected service life (of the UPS unit excluding battery)			10 years (At a 30°C average ambient temperature. For reference purposes only.)				
EMC standard			Compliant with VCCI 32-1 Class A				
Separate options							
Outlet box ⁽⁹⁾			—				
			P10030B (outlet type), P10035B (terminal block type)				
Rack support rails ⁽¹⁰⁾			RM030-US (2U)				
Floor mounting brackets ⁽¹¹⁾			FMA11KA00				
Caster base ⁽¹²⁾			CBA11KA01				
Air filter kit ⁽¹³⁾			FL008-3				

(1) If single-wire grounding the AC input and output, set the input/output ground phase according to the UPS specification. The W (N) terminal of AC input (S phase) and the W (N) terminal of AC output (V phase) are to be grounded.

(2) The inverter synchronizes operation with AC input and allows uninterrupted transfer through a bypass circuit provided that the AC input frequency is within a range of the rated frequency ±3% (1, 3, 5, or 7% selectable) and the AC input voltage is within the rated voltage ±20% (if the load level is less than 70%: between -40% and +20%).

(3) Max. capacity during battery recovery charging

(4) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries. In parentheses are values at 0.7 load power factor.

(5) Assuming 10 power outages per year

(6) For 2 kVA models, settings can be done with an optional outlet box.

(7) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(8) Avoid use or storage in 30°C or higher temperatures for extended periods of time, or the battery's life will be shortened. If a UPS is to be stored for a long period, it will be necessary to recharge batteries once every six months.

(9) Enables Output Line Control, the coordinated on/off management of UPS outlets. "Output 0" is normal output; "Output 1 (and 2)" is controlled output.
Note that its operating temperature range is different from that of the UPS.

(10) Used for mounting the UPS on a standard 19-inch rack. Prior to purchase, check that the rails are mountable to your 19-inch rack.

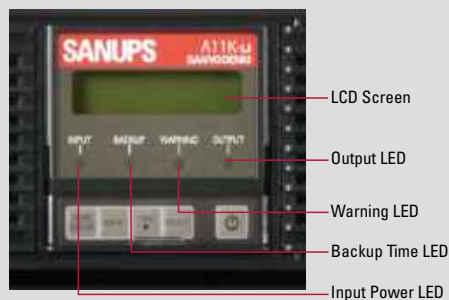
(11) Used to secure a free-standing type UPS to the floor.

(12) Used to carry a vertically-installed UPS.

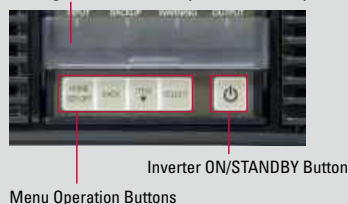
(13) A front side air intake filter for preventing dust ingress.

Views and Part Names

LCD Panel



Sliding Button Cover Opened (slides up/down)

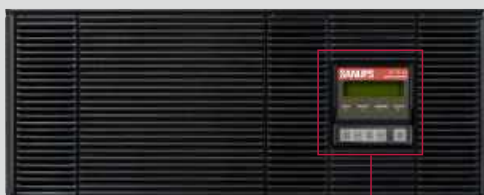


3 kVA, Front View



L10_{min}
Battery backup time

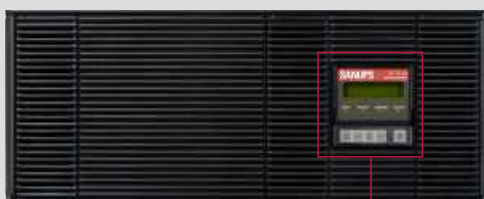
LCD Panel



L19_{min}
Battery backup time

LCD Panel

5 kVA, Front View

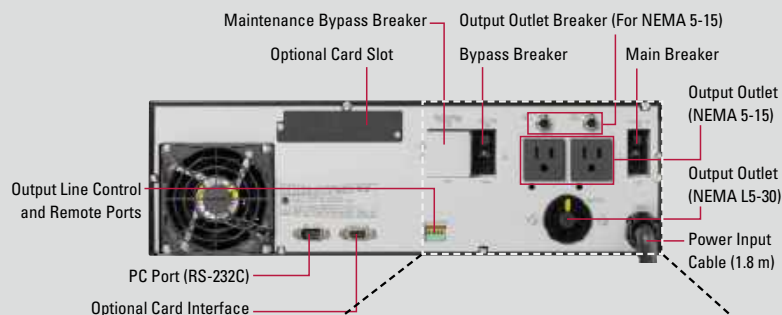


L12_{min}
Battery backup time

LCD Panel

3 kVA, Rear View

Model: S-A11KL302B0009SSN00



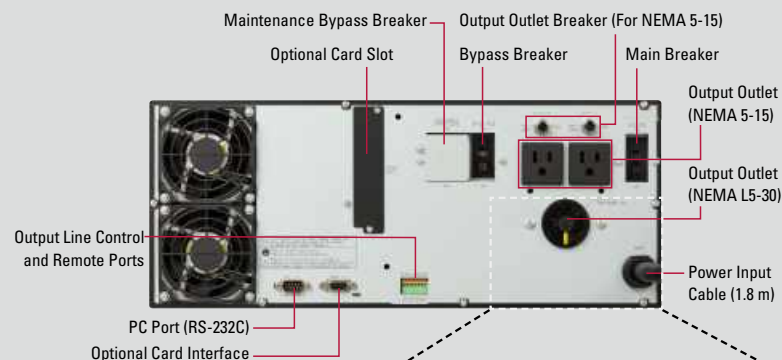
Terminal Block Type, Rear View

Model: S-A11KL302B0009SST00



3 kVA, Rear View

Model: S-A11KL302B0019SSN00

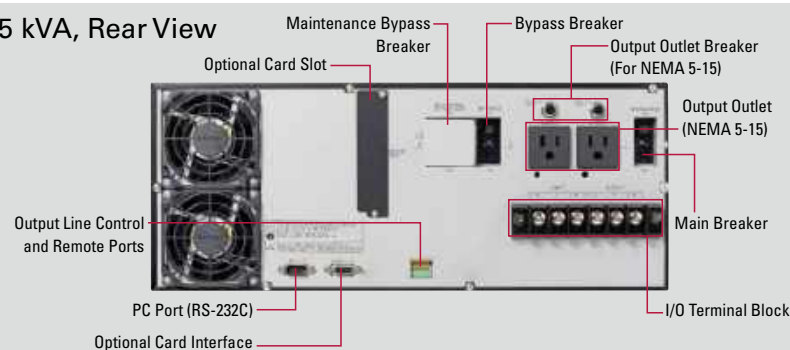


Terminal Block Type, Rear View

Model: S-A11KL302B0019SST00



5 kVA, Rear View



Note: The photos above may look different from the actual products in the printed text, etc.

Specifications

Output capacity **3 kVA, 5 kVA**Battery backup time **10 to 19 min**

Order no.			S-A11KL302B0009SS□00	S-A11KL302B0019SS□00	S-A11KL502B0011SST00
Rated output capacity (apparent power / active power)			3 kVA / 2.4 kW		5 kVA / 4 kW
Technology	Topology		Double conversion online		
	Rectifier		High power factor converter		
	Cooling method		Forced air cooling		
	Inverter		High-frequency PWM		
AC input	No. of phases/wires		Single-phase 2-wire ⁽¹⁾		
	Rated voltage		100/110/120 V (Same as output voltage)		
	Voltage range		At load level < 70%: Within -40 to +20% of rated voltage (-40% becomes -20% for recovery voltage) At load level ≥ 70%: Within ±20% of rated voltage		
	Rated frequency		50/60 Hz (auto-sensing ⁽²⁾)		
	Frequency range		Within ±1, 3, 5, or 7% of rated frequency (same as output frequency regulation)		
	Required capacity ⁽³⁾		3.0 kVA	5.3 kVA	
	Input power factor		0.97 or greater	0.97 or greater	
AC output	No. of phases/wires		Single-phase 2-wire		
	Rated voltage		100/110/120 V (User-selectable. Factory setting: 100 V)		
	Rated current		30 A	50 A	
	Voltage regulation		Within ±2% of rated voltage (at rated output)		
	Rated frequency		50/60 Hz (Same as the input rated frequency)		
	Frequency regulation	During grid operation	Within ±1, 3, 5, or 7% of the rated frequency (User-selectable. Factory setting: ±3%)		
		During battery operation	Within ±0.5% of rated frequency		
	Output waveform		Pure sine wave		
	Voltage harmonic distortion	At linear load	3% or less (At rated output)		
		At rectifier load	7% or less (At rated output)		
	Load power factor	Rated	0.8 lagging (Variation range: 0.7 lagging to 1.0)		
	Transient voltage fluctuation	For abrupt load change	Within ±5% of rated voltage (For 0⇔100% load step changes at rated input)		
		For loss or return of input power	Within ±5% of rated voltage (At rated output)		
		For abrupt input voltage change	Within ±5% of rated voltage (For ±10% abrupt change)		
	Overcurrent protection		Automatic transfer to bypass (With automatic retransfer function)		
	Overload capability	Inverter	105% (for 200 ms)		
Bypass		200% (for 30 s), 800% (for 2 cycles)			
Output Line Control		An optional outlet box is required		Contact us	
Battery	Type		Lithium-ion battery		
	Battery backup time ⁽⁴⁾	Initial value	9 min (10 min)	19 min (20 min)	11 min (12 min)
		After 10 years ⁽⁵⁾	6 min (8 min)	16 min (17 min)	9 min (10 min)
	Battery self-test		Settings possible (Factory setting: "disabled")		
Interface	PC port		RS-232C		
	Remote port		Remote ON/OFF switch (can control up to 5 UPS units in Linked Operation using a dedicated connection cable)		
	Auxiliary port		Output Line Control contact ⁽⁶⁾		
	Dry contact		Optional dry contact interface card is required		
	Network support		Optional LAN interface card is required		
Acoustic noise	During normal operation		46 dB		46 dB
	During battery operation or at a temperature above 40°C		55 dB		55 dB
Heat dissipation (At rated operation, after battery charging completed)			254 W		421 W
Input leakage current			3.5 mA		3.5 mA
Operating environment			Ambient temperature: -20 to +55°C, ⁽⁷⁾ humidity: 10 to 90% RH (non-condensing)		
Storage environment ⁽⁸⁾			Ambient temperature: -20 to +55°C, humidity: 10 to 90% RH (non-condensing)		
Expected service life (of the UPS unit excluding battery)			10 years (At a 30°C average ambient temperature. For reference purposes only.)		
EMC standard			Compliant with VCCI 32-1 Class A		
Separate options					
Outlet box ⁽⁹⁾			P10030B (outlet type), P10035B (terminal block type)		—
Rack support rails ⁽¹⁰⁾			RM027-US (3U)		RM028-US (4U)
Floor mounting brackets ⁽¹¹⁾			—		
Caster base ⁽¹²⁾			CBA11KA01		CBA11KA02
Air filter kit ⁽¹³⁾			FL009-3		FL010-3

(1) If single-wire grounding the AC input and output, set the input/output ground phase according to the UPS specification. The W (N) terminal of AC input (S phase) and the W (N) terminal of AC output (V phase) are to be grounded.

(2) The inverter synchronizes operation with AC input and allows uninterrupted transfer through a bypass circuit provided that the AC input frequency is within a range of the rated frequency ±3% (1, 3, 5, or 7% selectable) and the AC input voltage is within the rated voltage ±20% (if the load level is less than 70%: between -40% and +20%).

(3) Max. capacity during battery recovery charging

(4) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries. In parentheses are values at 0.7 load power factor.

(5) Assuming 10 power outages per year

(6) For 3 kVA models, settings can be done with an optional outlet box.

(7) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(8) Avoid use or storage in 30°C or higher temperatures for extended periods of time, or the battery's life will be shortened. If a UPS is to be stored for a long period, it will be necessary to recharge batteries once every six months.

(9) Enables Output Line Control, the coordinated on/off management of UPS outlets. "Output 0" is normal output; "Output 1 (and 2)" is controlled output. Note that its operating temperature range is different from that of the UPS.

(10) Used for mounting the UPS on a standard 19-inch rack. Prior to purchase, check that the rails are mountable to your 19-inch rack.

(11) Used to secure a free-standing type UPS to the floor.

(12) Used to carry a vertically-installed UPS.

(13) A front side air intake filter for preventing dust ingress.

DimensionsOutput capacity **1 to 2 kVA**

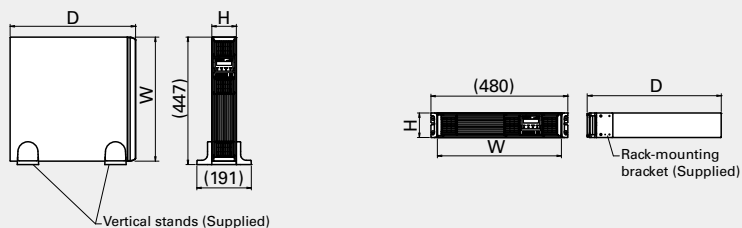
Order no. ⁽¹⁾		Outlet type	S-A11KL102B0013SSN00	S-A11KL152B0008SSN00	S-A11KL152B0019SSN00	S-A11KL202B0015SSN00
		Terminal block type	—	—	—	S-A11KL202B0015SST00
Rated output capacity (apparent power / active power)			1 kVA / 0.8 kW	1.5 kVA / 1.2 kW	1.5 kVA / 1.2 kW	2 kVA / 1.6 kW
Battery backup time ⁽²⁾			13 min (15 min)	8 min (10 min)	19 min (20 min)	15 min (16 min)
Battery capacity [Ah-cell]			84	84	180	180
Battery power consumption [Wh]			310	310	666	666
Input plug			NEMA 5-15P	NEMA 5-15P	NEMA 5-15P	NEMA L5-30P or M5 terminal
Output outlet			NEMA 5-15R × 6	NEMA 5-15R × 6	NEMA 5-15R × 6	NEMA L5-30R × 1 or M5 terminal NEMA 5-15R × 2 (15 A each)
Acoustic noise	During normal operation		41 dB	45 dB	45 dB	45 dB
	During battery operation or at a temperature above 40°C		51 dB	51 dB	51 dB	51 dB
Heat dissipation (At rated operation, after battery charging completed)			82 W	127 W	127 W	153 W
Input leakage current			3 mA	3 mA	3 mA	3 mA
Operating environment		Ambient temperature: -20 to +55°C, ⁽³⁾ humidity: 10 to 90% RH (non-condensing)				
Dimensions ⁽⁴⁾ (Unit: mm)						
Drawing			Fig. 1	Fig. 1	Fig. 1	Fig. 1
W			435	435	435	435
H			86 (2U)	86 (2U)	86 (2U)	86 (2U)
D			440	488	625	625
Mass			17 kg	18 kg	27 kg	27 kg

(1) Vertical/rack-mount convertible

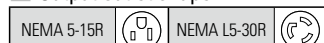
(2) At a 25°C ambient temperature, 0.8 load power factor, using new, fully charged batteries. The values in parentheses are the values at a load power factor of 0.7.

(3) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(4) Dimensions do not include protruding objects like screws.

Fig. 1

Paint color: Black (Munsell N1.5)

Input plug shape**Output outlet shape**

Output capacity **3 kVA, 5 kVA**

Order no. ⁽¹⁾		Outlet type	S-A11KL302B0009SSN00	S-A11KL302B0019SSN00	—
		Terminal block type	S-A11KL302B0009SST00	S-A11KL302B0019SST00	S-A11KL502B0011SST00
Rated output capacity (apparent power / active power)		3 kVA / 2.4 kW		3 kVA / 2.4 kW	5 kVA / 4 kW
Battery backup time ⁽²⁾		9 min (10 min)		19 min (20 min)	11 min (12 min)
Battery capacity [Ah-cell]		180		360	360
Battery power consumption [Wh]		666		1332	1332
Input plug		NEMA L5-30P or M5 terminal		NEMA L5-30P or M5 terminal	M5 terminal
Output outlet		NEMA L5-30R × 1 or M5 terminal NEMA 5-15R × 2 (15 A each)		NEMA L5-30R × 1 or M5 terminal NEMA 5-15R × 2 (15 A each)	M5 terminal NEMA 5-15R × 2 (15 A each)
Acoustic noise	During normal operation	46 dB		46 dB	46 dB
	During battery operation or at a temperature above 40°C	55 dB		55 dB	55 dB
Heat dissipation (At rated operation, after battery charging completed)		254 W		254 W	421 W
Input leakage current		3.5 mA		3.5 mA	3.5 mA
Operating environment		Ambient temperature: -20 to +55°C, ⁽³⁾ humidity: 10 to 90% RH (non-condensing)			
Dimensions ⁽⁴⁾ (Unit: mm)					
Drawing		Fig. 2		Fig. 3	Fig. 3
W		435		435	435
H		131 (3U)		175 (4U)	175 (4U)
D		625		690	690
Mass		32 kg		47 kg	49 kg

(1) Vertical/rack-mount convertible

(2) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries. In parentheses are values at 0.7 load power factor.

(3) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(4) Dimensions do not include protruding objects like screws.

Fig. 2

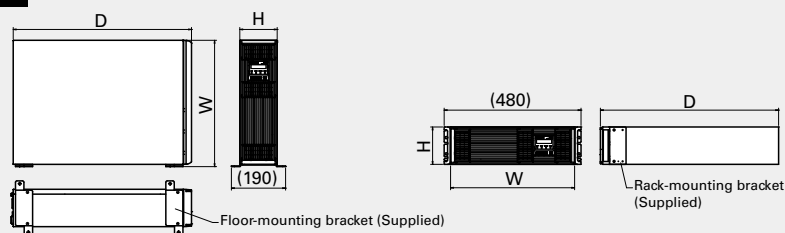
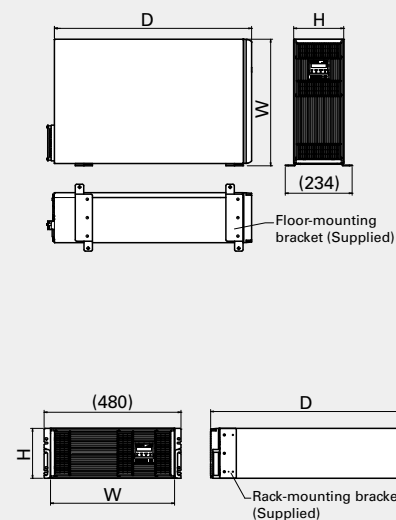
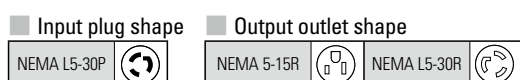


Fig. 3



Paint color: Black (Munsell N1.5)



Specifications

UL certified models

Output capacity **1 kVA, 1.5 kVA**

Order no.			S-A11KL102C0013UJ		S-A11KL152C0008UJ	
UL-registered no.			A11KL102U001J		A11KL152U001J	
Rated output capacity (apparent power / active power)			1 kVA / 0.8 kW		At 100 V setting: 1.25 kVA / 1.0 kW At 110 V setting: 1.375 kVA / 1.1 kW At 120 V setting: 1.5 kVA / 1.2 kW	
Technology	Topology		Double conversion online			
	Rectifier		High power factor converter			
	Cooling method		Forced air cooling			
	Inverter		High-frequency PWM			
AC input	No. of phases/wires		Single-phase 2-wire ⁽¹⁾			
	Rated voltage		100/110/120 V (Same as output voltage)			
	Voltage range		At load level < 70%: Within -40 to +20% of rated voltage (-40% becomes -20% when returning to grid operation) At load level ≥ 70%: Within ±20% of rated voltage			
	Rated frequency		50/60 Hz (auto-sensing ⁽²⁾)			
	Frequency range		Within ±1/3/5/7% of rated frequency (same as output frequency regulation)			
	Required capacity ⁽³⁾		1.1 kVA		1.5 kVA	
	Input power factor		0.95 or greater			
	AC output	No. of phases/wires		Single-phase 2-wire		
Rated voltage		100/110/120 V (User-selectable. Factory setting: 100 V)				
Rated current		10 A		12.5 A		
Voltage regulation		Within ±2% of rated voltage (at rated output)				
Rated frequency		50/60 Hz (Same as the input rated frequency)				
Frequency regulation		During grid operation	Within ±1/3/5/7% of the rated frequency (User-selectable. Factory setting: ±3%)			
		During battery operation	Within ±0.5% of rated frequency			
Output waveform		Pure sine wave				
Voltage harmonic distortion		At linear load	3% or less (At rated output)			
		At rectifier load	7% or less (At rated output)			
Load power factor		Rated	0.8 lagging (Variation range: 0.7 lagging to 1.0)			
Transient voltage fluctuation		For abrupt load change	Within ±5% of rated voltage (For 0⇔100% load step changes at rated input)			
		For loss or return of input power	Within ±5% of rated voltage (at rated output)			
		For abrupt input voltage change	Within ±5% of rated voltage (For ±10% abrupt change)			
Overcurrent protection		Automatic transfer to bypass (With automatic retransfer function)				
Overload capability		Inverter	105% (for 200 ms)			
		Bypass	200% (for 30 s), 800% (for 2 cycles)			
Output Line Control		Yes				
Battery	Type		Lithium-ion battery			
	Battery backup time ⁽⁴⁾	Initial value	13 min (15 min)		8 min (10 min)	
		After 10 years ⁽⁵⁾	11 min (12 min)		6 min (8 min)	
	Battery self-test		Can be enabled (Factory setting: "disabled")			
Interface	PC port		RS-232C			
	Remote port		Remote ON/OFF switch (can control up to 5 UPS units in Linked Operation using a dedicated connection cable)			
	Dry contact		Optional dry contact interface card is required			
	Network support		Optional LAN interface card is required			
Acoustic noise	During normal operation		41 dB		45 dB	
	During battery operation or at a temperature above 40°C		51 dB		51 dB	
Heat dissipation (At rated operation, after battery charging completed)			82 W		127 W	
Input leakage current			3 mA		3 mA	
Operating environment			Ambient temperature: -20 to +55°C, ⁽⁶⁾ humidity: 10 to 90% RH (non-condensing)			
Storage environment ⁽⁷⁾			Temperature: -20 to +55°C, humidity: 10 to 90% RH (non-condensing)			
Expected service life (of the UPS unit excluding battery)			10 years (At a 30°C average ambient temperature. For reference purposes only.)			
Safety standard			UL 1778 5th edition (E226092), CSA C22.2 No. 107.3-14 (3rd edition)			
EMC standard			Compliant with VCCI 32-1 Class A Self-declared for FCC Part 15, Subpart B Class A			
Separate options						
Rack support rails ⁽⁸⁾			RM030-US (2U)			
Floor mounting brackets ⁽⁹⁾			FMA11KA00			
Caster base ⁽¹⁰⁾			CBA11KA01			
Air filter kit ⁽¹¹⁾			FL008-3			

(1) If single-wire grounding the AC input and output, set the input/output ground phase according to the UPS specification. The W (N) terminal of AC input (S phase) and the W (N) terminal of AC output (V phase) are to be grounded.

(2) The inverter synchronizes operation with AC input and allows uninterrupted transfer through a bypass circuit provided that the AC input frequency is within a range of the rated frequency ±3% (1, 3, 5, or 7% selectable) and the AC input voltage is within the rated voltage ±20% (if the load level is less than 70%: between -40% and +20%).

(3) Max. capacity during battery recovery charging

(4) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries. In parentheses are values at 0.7 load power factor.

(5) Assuming 10 power outages per year

(6) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(7) Avoid use or storage in 30°C or higher temperatures for extended periods of time, or the battery's life will be shortened. If a UPS is to be stored for a long period, it will be necessary to recharge batteries once every six months.

(8) Used for mounting the UPS on a standard 19-inch rack. Prior to purchase, check that the rails are mountable to your 19-inch rack.

(9) Used to secure a free-standing type UPS to the floor.

(10) Used to carry a vertically-installed UPS.

(11) A front side air intake filter for preventing dust ingress.

Dimensions

UL certified models

Output capacity **1 kVA, 1.5 kVA**

Order no. ⁽¹⁾		S-A11KL102C0013UJ	S-A11KL152C0008UJ
Rated output capacity (apparent power / active power)		1 kVA / 0.8 kW	At 100 V setting: 1.25 kVA / 1.0 kW At 110 V setting: 1.375 kVA / 1.1 kW At 120 V setting: 1.5 kVA / 1.2 kW
Battery backup time ⁽²⁾		13 min (15 min)	8 min (10 min)
Battery capacity [Ah-cell]		80	80
Battery power consumption [Wh]		264	264
Input plug		NEMA 5-15P	NEMA 5-15P
Output outlet		NEMA 5-15R × 6	NEMA 5-15R × 6
Acoustic noise	During normal operation	41 dB	45 dB
	During battery operation or at a temperature above 40°C	51 dB	51 dB
Heat dissipation (At rated operation, after battery charging completed)		82 W	127 W
Input leakage current		3 mA	3 mA
Operating environment		Ambient temperature: -20 to +55°C, ⁽³⁾ humidity: 10 to 90% RH (non-condensing)	
Dimensions ⁽⁴⁾ (Unit: mm)			
Drawing		Fig. 1	Fig. 1
W		435	435
H		86 (2U)	86 (2U)
D		440	488
Mass		16 kg	17 kg

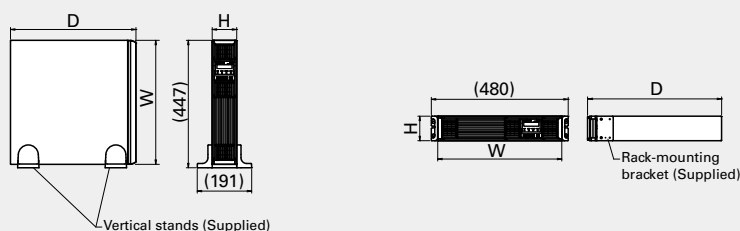
(1) Vertical/rack-mount convertible

(2) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries. In parentheses are values at 0.7 load power factor.

(3) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

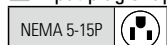
(4) Dimensions do not include protruding objects like screws.

Fig. 1

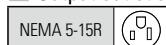


Paint color: Black (Munsell N1.5)

Input plug shape

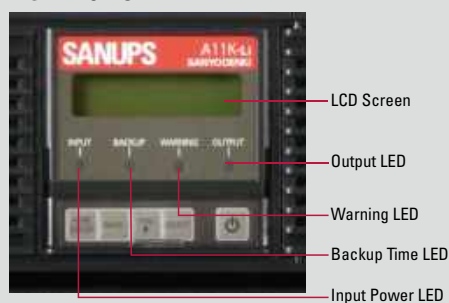


Output outlet shape

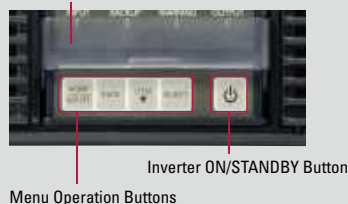


Views and Part Names

LCD Panel



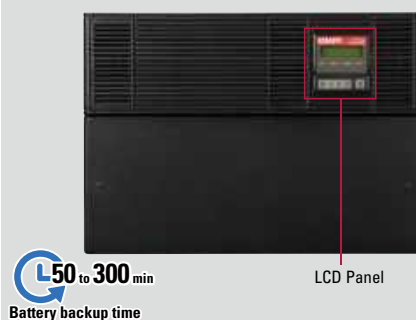
Sliding button cover Opened (slides up/down)



1.5 kVA, Front View



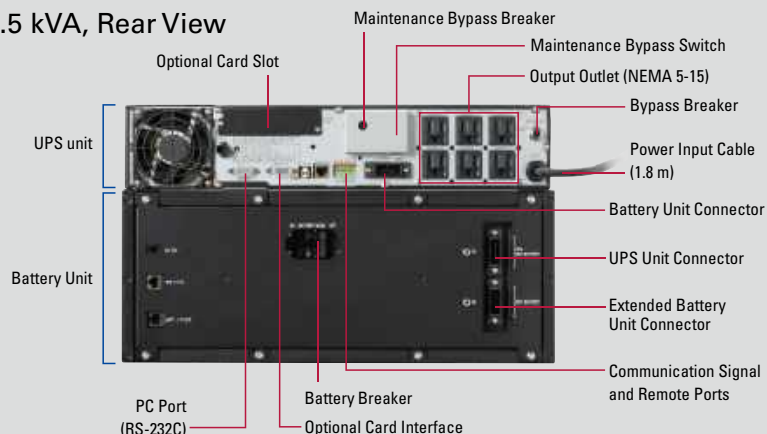
3 kVA, Front View



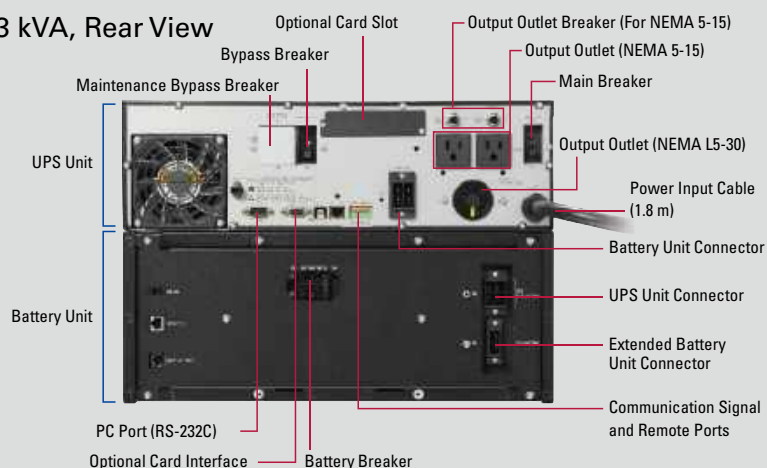
5 kVA, Front View



1.5 kVA, Rear View

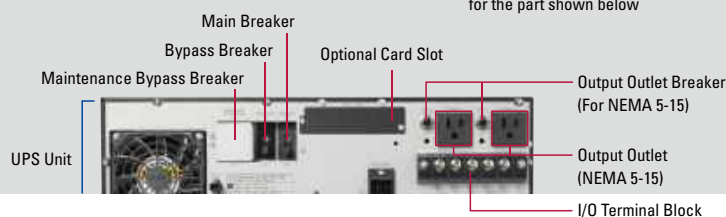


3 kVA, Rear View

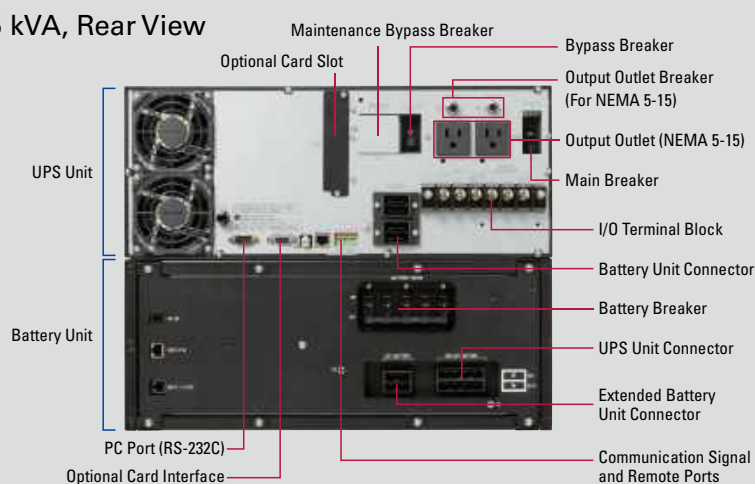


3 kVA Terminal Block Type, Rear View

Same as above model except for the part shown below



5 kVA, Rear View



Note: The photos above may look different from the actual products in the printed text, etc.

Specifications

Output capacity **1.5 to 5 kVA**Battery backup time **30 to 600 min**

Order no. (A set of a UPS unit and battery units)			S-A11KL152B0□□00TSN00□□	S-A11KL302B0□□0TS□00□□	S-A11KL502B0□□0TST00□□
UPS unit model no.			A11KL152	A11KL302	A11KL502
Rated output capacity (apparent power / active power)			1.5 kVA / 1.2 kW	3 kVA / 2.4 kW	5 kVA / 4 kW
Technology	Topology		Double conversion online		
	Rectifier		High power factor converter		
	Cooling method		Forced air cooling		
	Inverter		High-frequency PWM		
AC input	No. of phases/wires		Single-phase 2-wire ⁽¹⁾		
	Rated voltage		100/110/120 V (Same as output voltage)		
	Voltage range		At load level < 70%: Within -40 to +20% of rated voltage (-40% becomes -20% for recovery voltage) At load level ≥ 70%: Within ±20% of rated voltage		
	Rated frequency		50/60 Hz (auto-sensing ⁽²⁾)		
	Frequency range		Within ±1, 3, 5, or 7% of rated frequency (same as output frequency regulation)		
	Required capacity ⁽³⁾	1.5 kVA	3.0 kVA	5.3 kVA	
	Input power factor	0.95 or greater	0.97 or greater		
AC output	No. of phases/wires		Single-phase 2-wire		
	Rated voltage		100/110/120 V (User-selectable. Factory setting: 100 V)		
	Rated current		15 A	30 A	50 A
	Voltage regulation		Within ±2% of rated voltage (at rated output)		
	Rated frequency		50/60 Hz (Same as the input rated frequency)		
	Frequency regulation	During grid operation	Within ±1, 3, 5, or 7% of the rated frequency (User-selectable. Factory setting: ±3%)		
		During battery operation	Within ±0.5% of rated frequency		
	Output waveform		Pure sine wave		
	Voltage harmonic distortion	At linear load	3% or less (At rated output)		
		At rectifier load	7% or less (At rated output)		
	Load power factor	Rated	0.8 lagging (Variation range: 0.7 lagging to 1.0)		
	Transient voltage fluctuation	For abrupt load change	Within ±5% of rated voltage (For 0⇔100% load step changes at rated input; output switching)		
		For loss or return of input power	Within ±5% of rated voltage (At rated output)		
		For abrupt input voltage change	Within ±5% of rated voltage (For ±10% abrupt change)		
	Overcurrent protection		Automatic transfer to bypass (With automatic retransfer function)		
Overload capability	Inverter	105% (for 200 ms)			
	Bypass	200% (for 30 s), 800% (for 2 cycles)			
Output Line Control		No			
Battery	Type		Lithium-ion battery		
	Battery backup time ⁽⁴⁾	Initial value	100/200/300/400/500/600 min	50/100/150/200/250/300 min	30/60/90/120/150/180 min
		After 10 years ⁽⁵⁾	95/190/285/380/475/570 min	47/95/142/190/237/285 min	28/57/85/114/142/171 min
	Battery self-test		Settings possible (Factory setting: "disabled")		
Interface	PC port		RS-232C		
	Remote port		Remote ON/OFF switch (can control up to 5 UPS units in Linked Operation using a dedicated connection cable)		
	Communication signal port		Failure/Outage		
	Dry contact		Optional dry contact interface card is required		
	Network support		Optional LAN interface card is required		
Acoustic noise	During normal operation		45 dB or less	46 dB or less	46 dB or less
	During battery operation or at a temperature above 40°C		51 dB or less	55 dB or less	55 dB or less (60 dB or less when battery voltage is low)
Heat dissipation (At rated operation, after battery charging completed)			127 W	254 W	430 W
Input leakage current			3 mA or less	3.5 mA or less	3.5 mA or less
Operating environment			Ambient temperature: -20 to +55°C, ⁽⁶⁾ humidity: 10 to 90% RH (non-condensing)		
Storage environment ⁽⁷⁾			Ambient temperature: -20 to +55°C, humidity: 10 to 90% RH (non-condensing)		
Expected service life (of the UPS unit excluding battery)			10 years (At a 30°C average ambient temperature. For reference purposes only.)		
EMC standard			Compliant with VCCI 32-1 Class A		
Separate options					
UPS unit rack support rails ⁽⁸⁾			RM030-US (2U)	RM027-US (3U)	RM028-US (4U)
Battery unit rack support rails ⁽⁸⁾			RM028-US (4U)	RM028-US (4U)	RM028-US (4U)
Floor mounting brackets (for free-standing type) ⁽⁹⁾			FMBCA01	FMBCA01	FMBCA01
Air filter kit ⁽¹⁰⁾			FL008-3	FL009-3	FL010-3

(1) If single-wire grounding the AC input and output, set the input/output ground phase according to the UPS specification. The W (N) terminal of AC input (S phase) and the W (N) terminal of AC output (V phase) are to be grounded.

(2) The inverter synchronizes operation with AC input and allows uninterrupted transfer through a bypass circuit provided that the AC input frequency is within a range of the rated frequency ±3% (1, 3, 5, or 7% selectable) and the AC input voltage is within the rated voltage ±20% (if the load level is less than 70%: between -40% and +20%).

(3) Max. capacity during battery recovery charging

(4) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

(5) Assuming 10 power outages per year

(6) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(7) Avoid use or storage in 30°C or higher temperatures for extended periods of time, or the battery's life will be shortened. If a UPS is to be stored for a long period, it will be necessary to recharge batteries once a year.

(8) Used for mounting a UPS unit and battery unit on an EIA standard 19-inch rack. Prior to purchase, check that the rails are mountable to your 19-inch rack.

(9) Used to secure a free-standing type to the floor.

(10) A front side air intake filter for preventing dust ingress.

DimensionsOutput capacity **1.5 kVA**

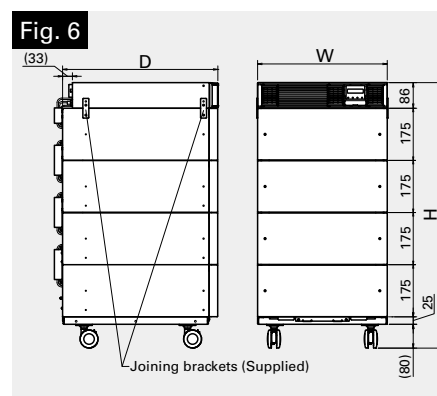
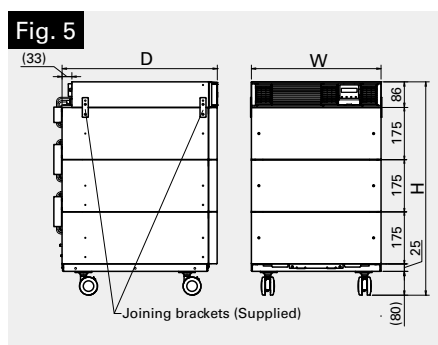
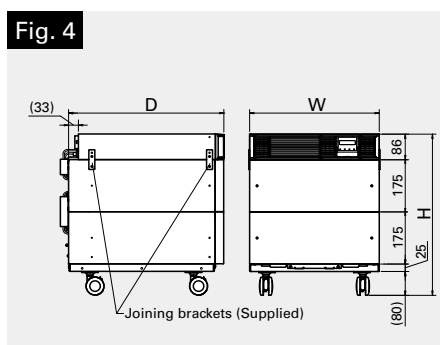
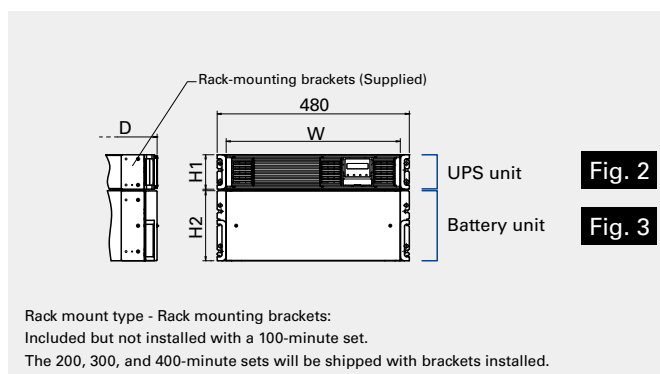
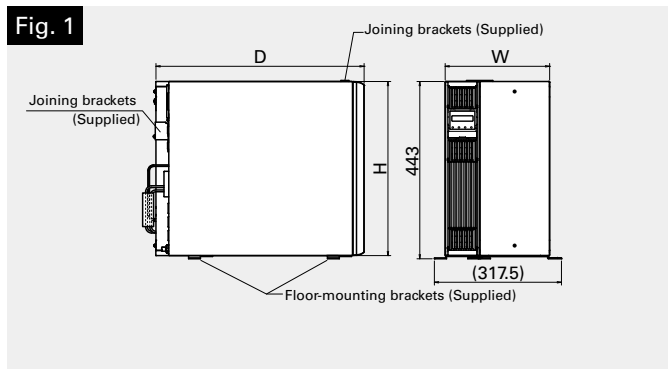
Free-standing type (A set of a UPS unit and battery units)	Order no.	S-A11KL152B0100TSN00 ⁽¹⁾	S-A11KL152B0200TSN00	S-A11KL152B0300TSN00	S-A11KL152B0400TSN00
Rack mount type (A set of a UPS unit and battery units)	Order no.		S-A11KL152B0200TSN00RM	S-A11KL152B0300TSN00RM	S-A11KL152B0400TSN00RM
Rated output capacity (apparent power / active power)	1.5 kVA / 1.2 kW				
Battery backup time ⁽²⁾	100 min	200 min	300 min	400 min	
Battery capacity [Ah-cell]	1104	2208	3312	4416	
Battery power consumption [Wh]	2484	4968	7452	9936	
Input plug	NEMA 5-15P				
Output outlet	NEMA 5-15R × 6				
Acoustic noise	During normal operation	45 dB or less			
	During battery operation or at a temperature above 40°C	51 dB or less			
Heat dissipation (At rated operation, after battery charging completed)	127 W				
Input leakage current	3 mA or less				
Operating environment	Ambient temperature: -20 to +55°C, ⁽³⁾ humidity: 10 to 90% RH (non-condensing)				
Free-standing type - Dimensions ⁽⁴⁾ (Unit: mm)					
Drawing	Fig. 1	Fig. 4	Fig. 5	Fig. 6	
W	86+175	435	435	435	
H	435	541	716	891	
D	520	520	520	520	
Mass	66 kg	124 kg	176 kg	228 kg	
Rack mount type - UPS unit dimensions ⁽⁴⁾ (Unit: mm)					
Drawing	Fig. 2				
W	435				
H1	86 (2U)				
D	488				
Mass	14 kg				
Rack mount type - Battery unit dimensions ⁽⁴⁾ (Unit: mm)					
Drawing	Fig. 3 × 1	Fig. 3 × 2	Fig. 3 × 3	Fig. 3 × 4	
W	435	435	435	435	
H2	175 (4U)	175 × 2 (8U)	175 × 3 (12U)	175 × 4 (16U)	
D	520	520	520	520	
Mass	52 kg	52 kg × 2	52 kg × 3	52 kg × 4	

(1) Vertical/rack-mount convertible

(2) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

(3) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(4) Dimensions do not include protruding objects like screws.



Paint color: Black (Munsell N1.5)

Output capacity **1.5 kVA**

Free-standing type (A set of a UPS unit and battery units)		Order no. S-A11KL152B0500TSN00	S-A11KL152B0600TSN00
Rack mount type (A set of a UPS unit and battery units)		—	—
Rated output capacity (apparent power / active power)		1.5 kVA / 1.2 kW	
Battery backup time ⁽¹⁾		500 min	600 min
Battery capacity [Ah-cell]		5520	6624
Battery power consumption [Wh]		12420	14904
Input plug		NEMA 5-15P	
Output outlet		NEMA 5-15R × 6	
Acoustic noise	During normal operation	45 dB	
	During battery operation or at a temperature above 40°C	51 dB	
Heat dissipation (At rated operation, after battery charging completed)		127 W	
Input leakage current		3 mA or less	
Operating environment		Ambient temperature: -20 to +55°C, ⁽²⁾ humidity: 10 to 90% RH (non-condensing)	
Free-standing type - Dimensions ⁽³⁾ (Unit: mm)			
Drawing		Fig. 7	Fig. 8
W		435	435 + 435 (+ 65)
H		1066	716
D		520	520
Mass		286 kg	184 + 170 kg
Rack mount type - UPS unit dimensions ⁽³⁾ (Unit: mm)			
Drawing		—	
W		—	
H1		—	
D		—	
Mass		—	
Rack mount type - Battery unit dimensions ⁽³⁾ (Unit: mm)			
Drawing		—	
W		—	
H2		—	
D		—	
Mass		—	

(1) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

(3) Dimensions do not include protruding objects like screws.

(2) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

Fig. 7

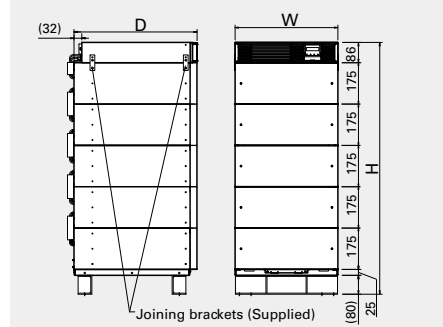
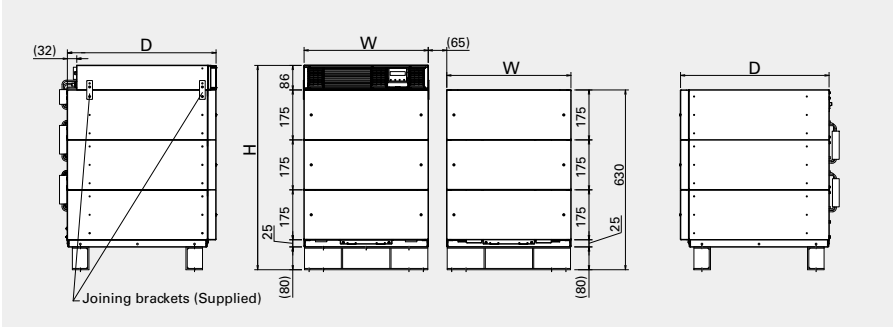
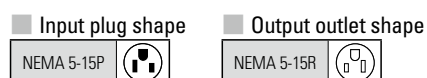


Fig. 8



Paint color: Black (Munsell N1.5)



DimensionsOutput capacity **3 kVA**

Terminal block type in the next spread

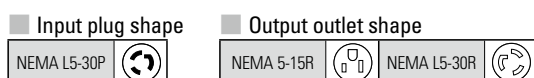
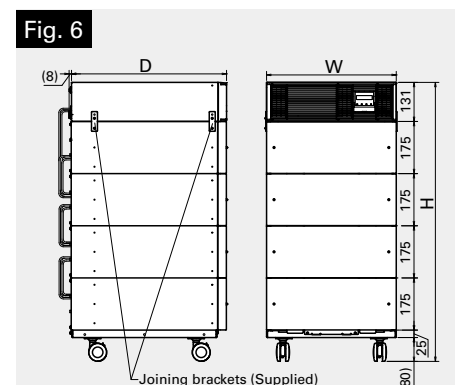
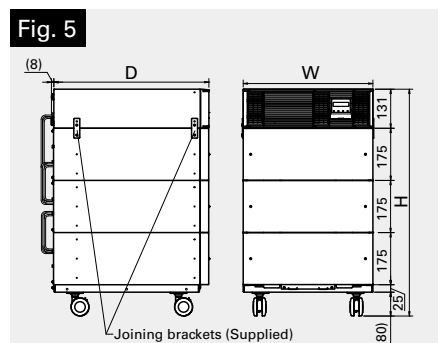
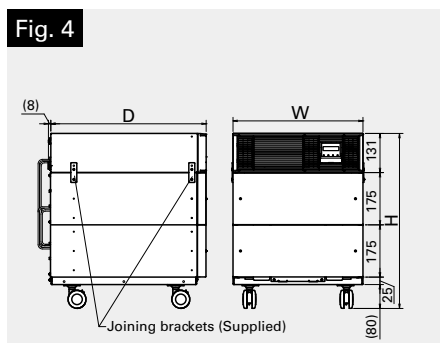
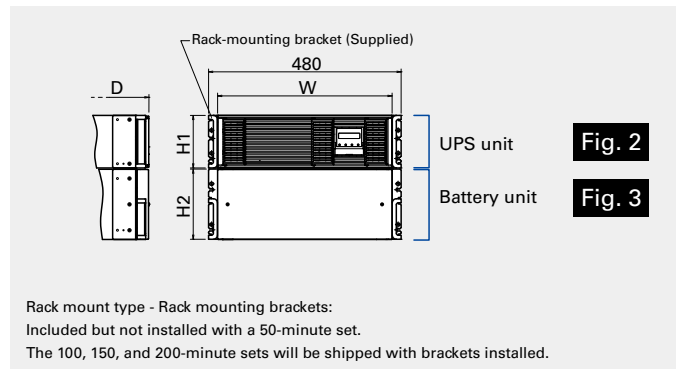
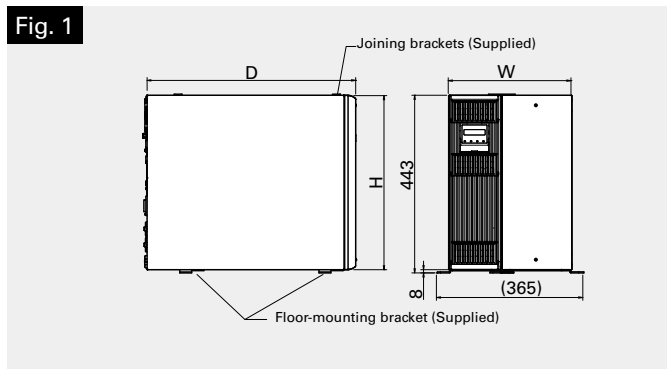
Free-standing type (A set of a UPS unit and battery units)	Order no.	S-A11KL302B0050TSN00⁽¹⁾		S-A11KL302B0100TSN00	S-A11KL302B0150TSN00	S-A11KL302B0200TSN00
Rack mount type (A set of a UPS unit and battery units)	Order no.	S-A11KL302B0100TSN00RM		S-A11KL302B0150TSN00RM	S-A11KL302B0200TSN00RM	
Rated output capacity (apparent power / active power)	3 kVA / 2.4 kW					
Battery backup time ⁽²⁾	50 min	100 min	150 min	200 min		
Battery capacity [Ah-cell]	1104	2208	3312	4416		
Battery power consumption [Wh]	2484	4968	7452	9936		
Input plug	NEMA L5-30P					
Output outlet	NEMA L5-30R × 1, NEMA 5-15R × 2 (15 A each)					
Acoustic noise	During normal operation	46 dB or less				
	During battery operation or at a temperature above 40°C	55 dB or less				
Heat dissipation (At rated operation, after battery charging completed)	254 W					
Input leakage current	3.5 mA or less					
Operating environment	Ambient temperature: -20 to +55°C, ⁽³⁾ humidity: 10 to 90% RH (non-condensing)					
Free-standing type - Dimensions ⁽⁴⁾ (Unit: mm)						
Drawing	Fig. 1	Fig. 4	Fig. 5	Fig. 6		
W	131+175	435	435	435		
H	435	586	761	936		
D	520	520	520	520		
Mass	74 kg	132 kg	184 kg	236 kg		
Rack mount type - UPS unit dimensions ⁽⁴⁾ (Unit: mm)						
Drawing	Fig. 2					
W	435					
H1	131 (3U)					
D	520					
Mass	22 kg					
Rack mount type - Battery unit dimensions ⁽⁴⁾ (Unit: mm)						
Drawing	Fig. 3 × 1	Fig. 3 × 2	Fig. 3 × 3	Fig. 3 × 4		
W	435	435	435	435		
H2	175 (4U)	175 × 2 (8U)	175 × 3 (12U)	175 × 4 (16U)		
D	520	520	520	520		
Mass	52 kg	52 kg × 2	52 kg × 3	52 kg × 4		

(1) Vertical/rack-mount convertible

(2) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

(3) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(4) Dimensions do not include protruding objects like screws.



Paint color: Black (Munsell N1.5)

Output capacity **3 kVA**

Terminal block type in the next page

Free-standing type (A set of a UPS unit and battery units)		Order no. S-A11KL302B0250TSN00	S-A11KL302B0300TSN00
Rack mount type (A set of a UPS unit and battery units)		Order no. —	—
Rated output capacity (apparent power / active power)		3 kVA / 2.4 kW	
Battery backup time ⁽¹⁾		250 min	300 min
Battery capacity [Ah-cell]		5520	6624
Battery power consumption [Wh]		12420	14904
Input plug		NEMA L5-30P	
Output outlet		NEMA L5-30R × 1, NEMA 5-15R × 2 (15 A each)	
Acoustic noise	During normal operation	46 dB or less	
	During battery operation or at a temperature above 40°C	55 dB or less	
Heat dissipation (At rated operation, after battery charging completed)		254 W	
Input leakage current		3.5 mA or less	
Operating environment		Ambient temperature: -20 to +55°C, ⁽²⁾ humidity: 10 to 90% RH (non-condensing)	
Free-standing type - Dimensions ⁽³⁾ (Unit: mm)			
Drawing		Fig. 7	Fig. 8
W		435	435 + 435 (+ 65)
H		1111	761
D		520	520
Mass		294 kg	192 + 170 kg
Rack mount type - UPS unit dimensions ⁽³⁾ (Unit: mm)			
Drawing		—	
W		—	
H1		—	
D		—	
Mass		—	
Rack mount type - Battery unit dimensions ⁽³⁾ (Unit: mm)			
Drawing		—	
W		—	
H2		—	
D		—	
Mass		—	

(1) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

(2) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(3) Dimensions do not include protruding objects like screws.

Fig. 7

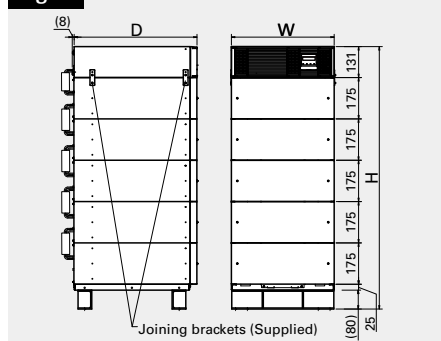
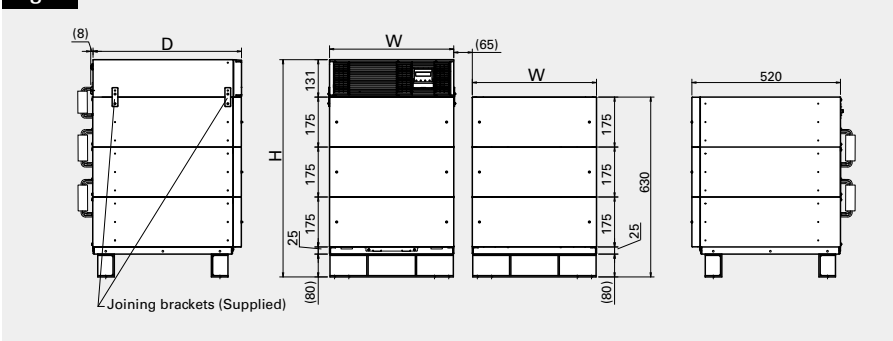
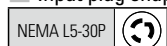


Fig. 8



Input plug shape



Output outlet shape



DimensionsOutput capacity **3 kVA**

Terminal block type

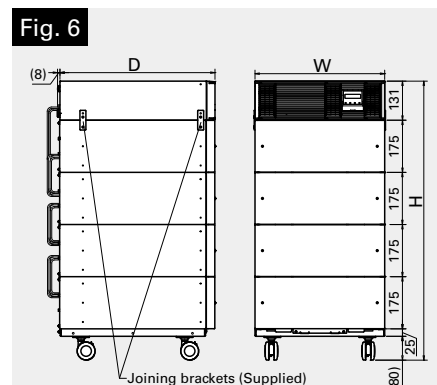
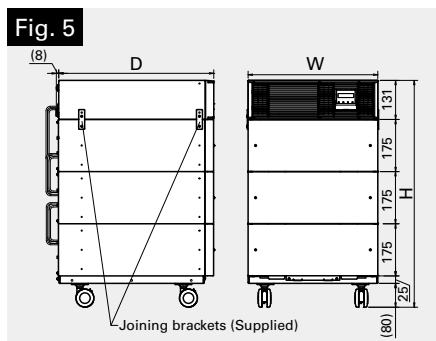
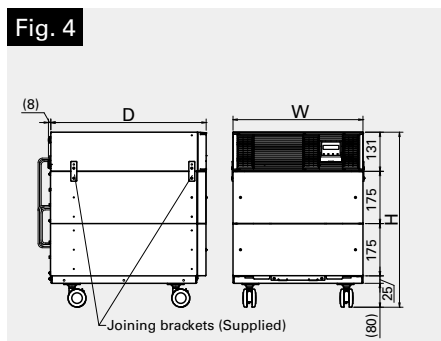
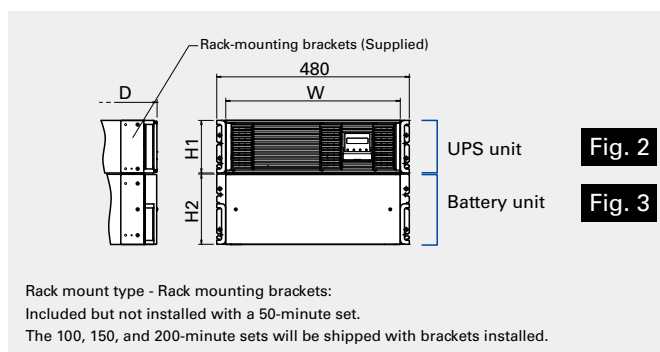
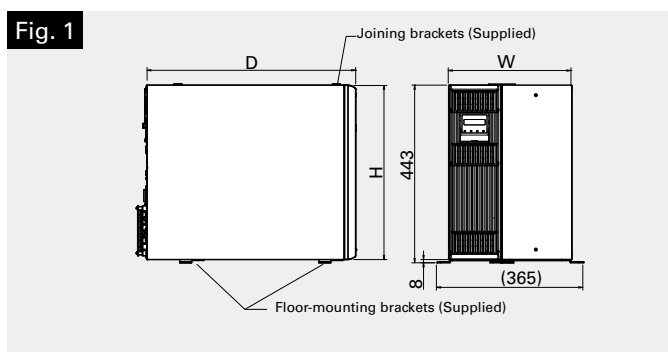
Free-standing type (A set of a UPS unit and battery units)		Order no.	S-A11KL302B0050TST00 ⁽¹⁾		S-A11KL302B0100TST00	S-A11KL302B0150TST00	S-A11KL302B0200TST00
Rack mount type (A set of a UPS unit and battery units)		Order no.	S-A11KL302B0100TST00RM		S-A11KL302B0150TST00RM	S-A11KL302B0200TST00RM	
Rated output capacity (apparent power / active power)			3 kVA / 2.4 kW				
Battery backup time ⁽²⁾			50 min	100 min	150 min	200 min	
Battery capacity [Ah-cell]			1104	2208	3312	4416	
Battery power consumption [Wh]			2484	4968	7452	9936	
Input terminal			M5 terminal				
Output terminal and receptacle			M5 terminal and NEMA 5-15R × 2 (15 A each)				
Acoustic noise	During normal operation		46 dB or less				
	During battery operation or at a temperature above 40°C		55 dB or less				
Heat dissipation (At rated operation, after battery charging completed)			254 W				
Input leakage current			3.5 mA or less				
Operating environment			Ambient temperature: -20 to +55°C, ⁽³⁾ humidity: 10 to 90% RH (non-condensing)				
Free-standing type - Dimensions ⁽⁴⁾ (Unit: mm)							
Drawing			Fig. 1	Fig. 4	Fig. 5	Fig. 6	
W			131+175	435	435	435	
H			435	586	761	936	
D			520	520	520	520	
Mass			74 kg	132 kg	184 kg	236 kg	
Rack mount type - UPS unit dimensions ⁽⁴⁾ (Unit: mm)							
Drawing			Fig. 2				
W			435				
H1			131 (3U)				
D			520				
Mass			22 kg				
Rack mount type - Battery unit dimensions ⁽⁴⁾ (Unit: mm)							
Drawing			Fig. 3 × 1	Fig. 3 × 2	Fig. 3 × 3	Fig. 3 × 4	
W			435	435	435	435	
H2			175 (4U)	175 × 2 (8U)	175 × 3 (12U)	175 × 4 (16U)	
D			520	520	520	520	
Mass			52 kg	52 kg × 2	52 kg × 3	52 kg × 4	

(1) Vertical/rack-mount convertible

(2) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

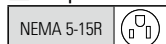
(3) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(4) Ignoring screw lengths and the like



Paint color: Black (Munsell N1.5)

Output outlet shape



Free-standing type (A set of a UPS unit and battery units)		Order no. S-A11KL302B0250TST00	Order no. S-A11KL302B0300TST00
Rack mount type (A set of a UPS unit and battery units)		—	—
Rated output capacity (apparent power / active power)		3 kVA / 2.4 kW	
Battery backup time ⁽¹⁾		250 min	300 min
Battery capacity [Ah-cell]		5520	6624
Battery power consumption [Wh]		12420	14904
Input plug		M5 terminal	
Output outlet		M5 terminal and NEMA 5-15R × 2 (15 A each)	
Acoustic noise	During normal operation	46 dB or less	
	During battery operation or at a temperature above 40°C	55 dB or less	
Heat dissipation (At rated operation, after battery charging completed)		254 W	
Input leakage current		3.5 mA or less	
Operating environment		Ambient temperature: -20 to +55°C; ⁽²⁾ humidity: 10 to 90% RH (non-condensing)	
Free-standing type - Dimensions ⁽³⁾ (Unit: mm)			
Drawing		Fig. 7	Fig. 8
W		435	435 + 435 (+ 65)
H		1111	761
D		520	520
Mass		294 kg	192 + 170 kg
Rack mount type - UPS unit dimensions ⁽³⁾ (Unit: mm)			
Drawing		—	
W		—	
H1		—	
D		—	
Mass		—	
Rack mount type - Battery unit dimensions ⁽³⁾ (Unit: mm)			
Drawing		—	
W		—	
H2		—	
D		—	
Mass		—	

(3) Dimensions do not include protruding objects like screws.

Fig. 7

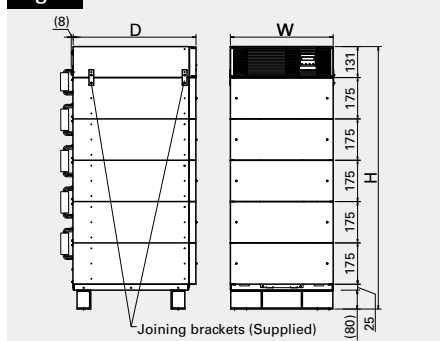
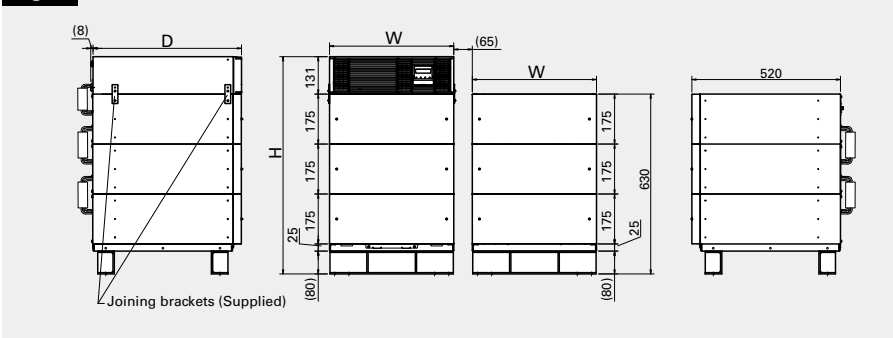


Fig. 8



Paint color: Black (Munsell N1.5)

NEMA 5-15R

Dimensions

Output capacity **5 kVA**

Free-standing type (A set of a UPS unit and battery units)	Order no.	S-A11KL502B0030TST00 ⁽¹⁾		S-A11KL502B0060TST00	S-A11KL502B0090TST00
Rack mount type (A set of a UPS unit and battery units)	Order no.			S-A11KL502B0060TST00RM	S-A11KL502B0090TST00RM
Rated output capacity (apparent power / active power)	5 kVA / 4 kW				
Battery backup time ⁽²⁾	30 min	60 min	90 min		
Battery capacity [Ah-cell]	1104	2208	3312		
Battery power consumption [Wh]	2484	4968	7452		
Input terminal	M5 terminal				
Output terminal and receptacle	M5 terminal and NEMA 5-15R × 2 (15 A each)				
Acoustic noise	During normal operation	45 dB or less			
	During battery operation or at a temperature above 40°C	56 dB or less			
	When battery voltage is low	60 dB or less			
Heat dissipation (At rated operation, after battery charging completed)	430 W				
Input leakage current	3.5 mA or less				
Operating environment	Ambient temperature: -20 to +55°C, ⁽³⁾ humidity: 10 to 90% RH (non-condensing)				
Free-standing type - Dimensions ⁽⁴⁾ (Unit: mm)					
Drawing	Fig. 1	Fig. 4	Fig. 5		
W	175+175	435	435		
H	435	630	805		
D	520	520	520		
Mass	82 kg	140 kg	192 kg		
Rack mount type - UPS unit dimensions ⁽⁴⁾ (Unit: mm)					
Drawing	Fig. 2				
W	435				
H1	175 (4U)				
D	520				
Mass	30 kg				
Rack mount type - Battery unit dimensions ⁽⁴⁾ (Unit: mm)					
Drawing	Fig. 3 × 1	Fig. 3 × 2	Fig. 3 × 3		
W	435	435	435		
H2	175 (4U)	175 × 2 (8U)	175 × 3 (12U)		
D	520	520	520		
Mass	52 kg	52 kg × 2	52 kg × 3		

(1) Vertical/rack-mount convertible

(2) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

(3) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

(4) Dimensions do not include protruding objects like screws.

Fig. 1

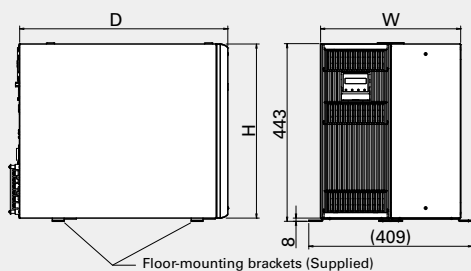
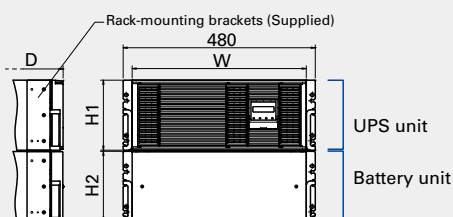


Fig. 2

Fig. 3



Rack mount type - Rack mounting brackets:
Included but not installed with a 30-minute set.
The 60, 90, and 120-minute sets will be shipped with brackets installed.

Fig. 4

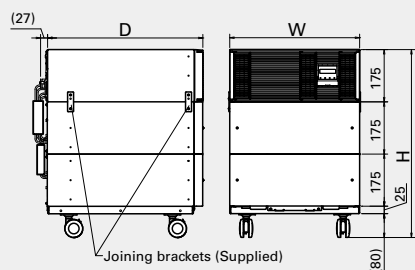
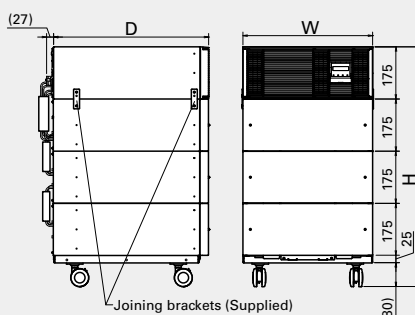
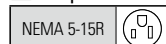


Fig. 5



Paint color: Black (Munsell N1.5)

Output outlet shape



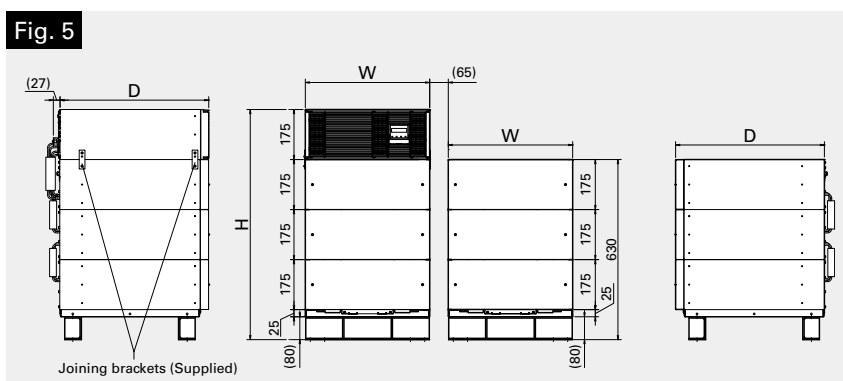
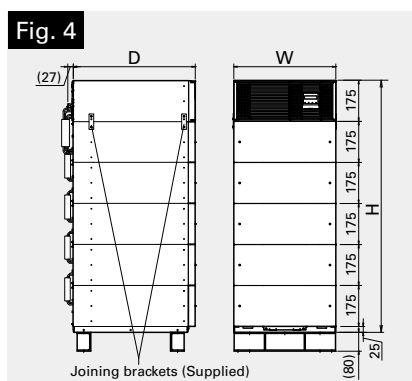
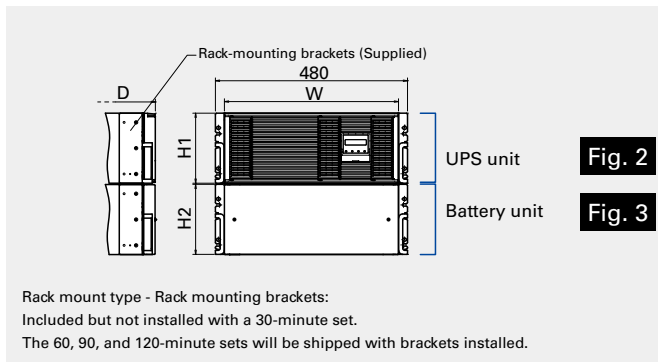
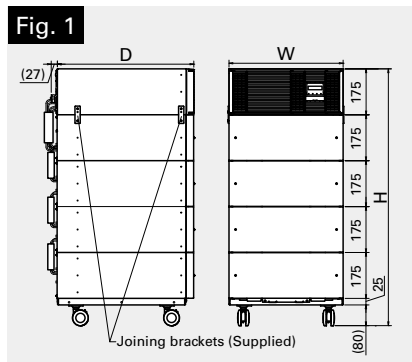
Output capacity **5 kVA**

Free-standing type (A set of a UPS unit and battery units)		Order no. S-A11KL502B0120TST00		S-A11KL502B0150TST00		S-A11KL502B0180TST00	
Rack mount type (A set of a UPS unit and battery units)		Order no. S-A11KL502B0120TST00RM		—		—	
Rated output capacity (apparent power / active power)		5 kVA / 4 kW					
Battery backup time ⁽¹⁾		120 min		150 min		180 min	
Battery capacity [Ah-cell]		4416		5520		6624	
Battery power consumption [Wh]		9936		12420		14904	
Input terminal		M5 terminal					
Output terminal and receptacle		M5 terminal and NEMA 5-15R × 2 (15 A each)					
Acoustic noise	During normal operation	45 dB or less		45 dB or less			
	During battery operation or at a temperature above 40°C	56 dB or less		56 dB or less			
	When battery voltage is low	60 dB or less		60 dB or less			
Heat dissipation (At rated operation, after battery charging completed)		430 W					
Input leakage current		3.5 mA or less					
Operating environment		Ambient temperature: -20 to +55°C, ⁽²⁾ humidity: 10 to 90% RH (non-condensing)					
Free-standing type - Dimensions ⁽³⁾ (Unit: mm)							
Drawing		Fig. 1		Fig. 4		Fig. 5	
W		435		435		435 + 435 (+ 65)	
H		980		1155		805	
D		520		520		520	
Mass		244 kg		302 kg		200 + 170 kg	
Rack mount type - UPS unit dimensions ⁽³⁾ (Unit: mm)							
Drawing		Fig. 2		—		—	
W		435		—		—	
H1		175 (4U)		—		—	
D		520		—		—	
Mass		30 kg		—		—	
Rack mount type - Battery unit dimensions ⁽³⁾ (Unit: mm)							
Drawing		Fig. 3 × 4		—		—	
W		435		—		—	
H2		175 × 4 (16U)		—		—	
D		520		—		—	
Mass		52 kg × 4		—		—	

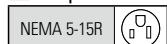
(1) At 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

(3) Dimensions do not include protruding objects like screws.

(2) When the battery temperature exceeds 55°C, battery charging will stop and a Device Error (minor malfunction) will be generated to warn the faulty battery temperature.

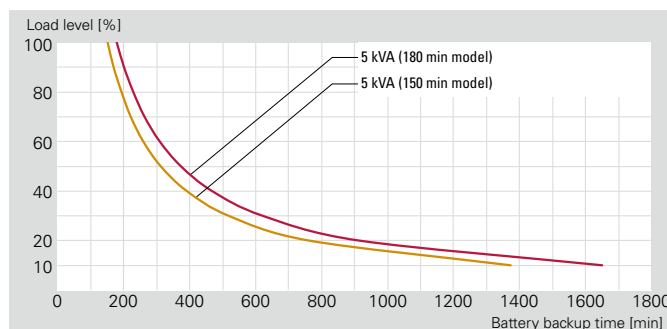
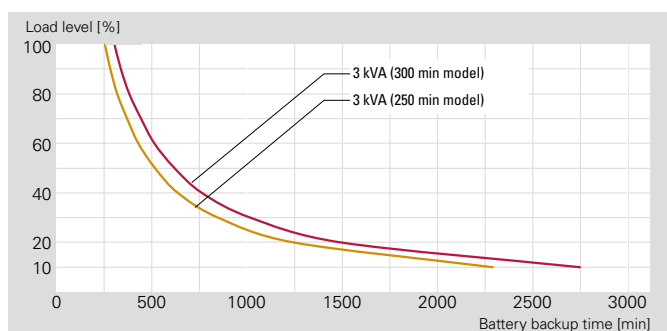
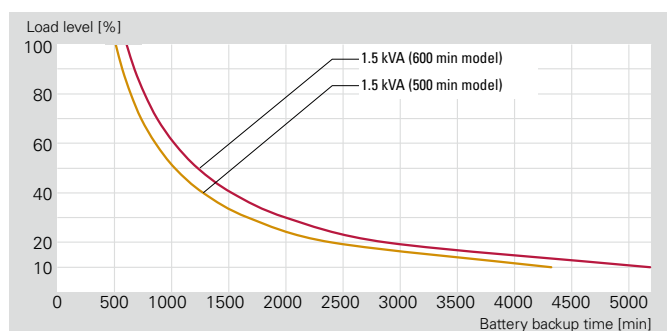
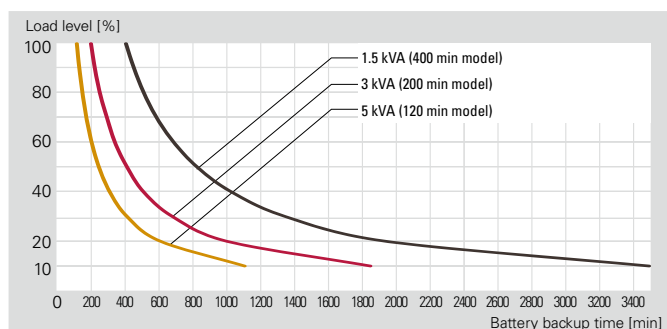
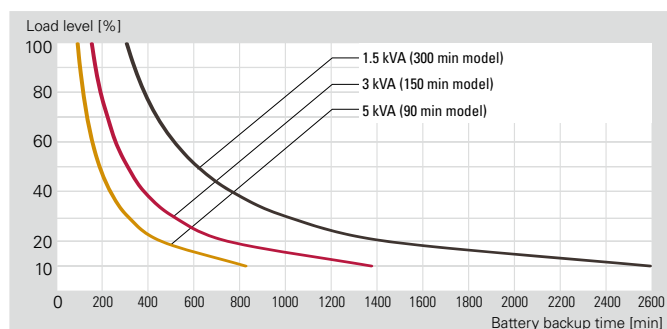
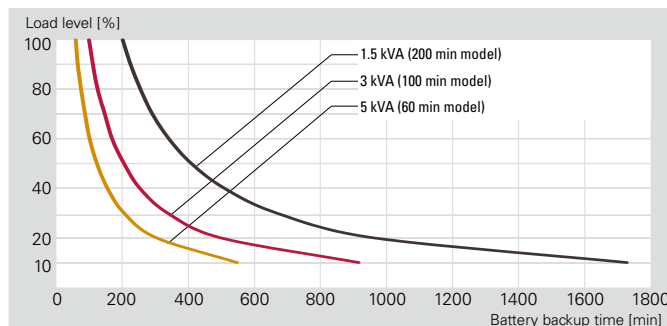
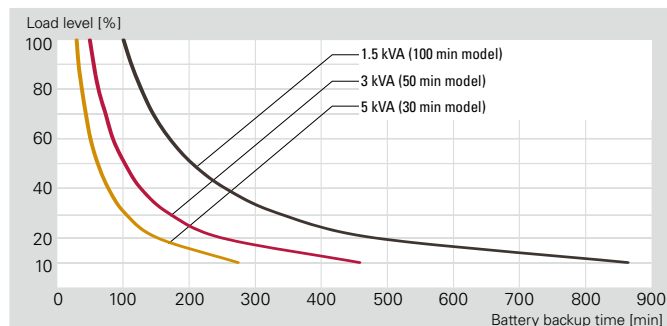
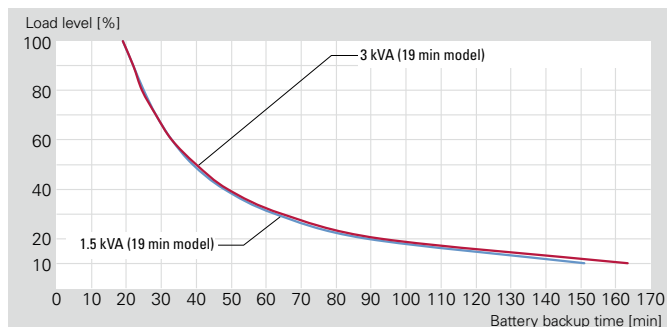
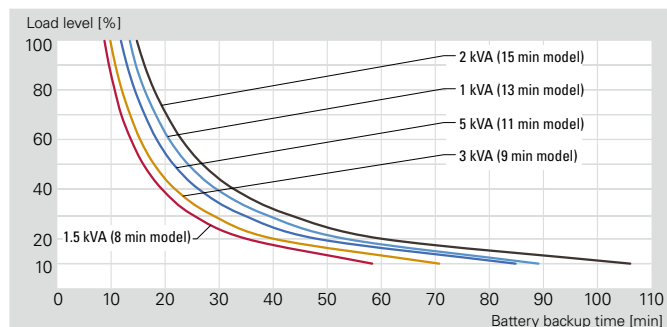


Output outlet shape



Paint color: Black (Munsell N1.5)

Load Level vs BackupTime



Note: Reference value at 25°C ambient temperature and load power factor of 0.8, using new, fully charged batteries.

