

PowerStar

Mission Critical Power

PS15000 15KVA Terrestrial, Vehicular UPS

PS15000i 3 phase Shipboard UPS

2 models to choose:

PS15000 =15 KVA 12u 208v, 240v 40-70Hz dual or single phase in & out – 12,000W capacity

PS15000i =15 KVA 12u – 12,000W capacity
(220v, 230v, 240v 1 ϕ input with 220v, 230v, or 240v selectable 1 ϕ output),
(380v, 400v, 415v 3 ϕ input with 220v, 230v, or 240v 1 ϕ output)

Model PS15000 Dual-Conversion True online UPS with detachable battery cabinets

The new PS15000 UPS is loaded with features, and packed with power, performance, & protection. FCC class A and UL approved. The PS15000 can be used for vehicular or trailer mounting. Tough and rugged modifications make it ideal for these conditions. Or, for shipboard use, **The PS15000i can be used with a 3 phase Delta /Wye input transformer onboard ships** for a low cost yet high power UPS backup.

- Powerstar Ruggedized© for survivability & reliability (*We have been ruggedizing UPS for 18 years for the US Navy & Army*)
- APC electronics for performance, reliability and standardized conformity
- Additional battery cabinets may be added for increased runtimes. 6u each x720mm deep (181kg)
- Powerstar Premium™ Battery cells may be used to increase temperature range to -20 +50°C AND increase life expectancy of cells to 8-10 years @25°C.
- Delivery is normally less than 30 days, 2 year warranty.
- Web /SNMP card using Powerchute™ software is available. RS232 SmartUPS® port standard.
- Heavy duty rail kit included for 19" racks
- 93% efficient on Battery -- 94% efficient while on MAINS @ full load
- Input Total Harmonic Distortion (THD) less than 5% @ full load
- Input Power Factor correcting
- Full time multi-pole noise filtering : 0.3% IEEE surge let-through : zero clamping response time : meets UL 1449
- LCD illuminated display showing status. Audible Alarms with mute.



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PowerStar PS15000 15kva 12u UPS

- Emergency Power OFF (EPO) contacts for low voltage, low current contacts to force immediate shutdown of output (*for example, wiring from Fire Alarm circuit*)
- Temperature compensated battery charging to prolong battery life
- Hot swappable battery modules
- Automatic internal bypass- for overload or unit failure to keep your load powered.
- Automatic restart of load after battery depletion run and MAINS restoration
- Dual MAINS input for connection to an alternate power source like a backup generator
- Generator compatible
- Cold start capable- Start making AC Power without MAINS input.
- Built in Internal automatic or manual Bypass, Static Bypass
- Optional external bypass is available.
- Front to back airflow with 4 fans for redundancy

PS15000i description

- **Input voltage options.**
- 220, 230, 240V (L1,L2+G) 40-70 Hz. Single phase shipboard direct (max 83A input current)
- 380V, 400V, 415V 3 ϕ (L1, L2, L3+N+G) 40-70 Hz: You can use a Delta *W*ye transformer to interface with shipboard 3 phase. (max 28A each phase input current) *Powerstar can help select a transformer for you.*
- Optional Bypass Input can also be single phase or 3 ϕ for connections to alternate AC source.
- **NOTE:** Units configured for three phase input and single phase output operation, the entire load connected to the UPS will transfer to L1 and Neutral of the three phase input when the UPS is operating in Bypass mode so that L1 input breaker may need to be 100A

Output Voltage Options for PS15000i

- Hardwire tie points are located on rear of UPS. Use them or use a Jack field.
- 220V, 230V, 240V output 1 phase L1,L2 +G (up to 66A) @ <5% distortion @ 12KW 50/60Hz user selectable or Sync to MAINS
- 380V, 400V, 415V 3 phase Y output (up to 22A each phase) L1, L2, L3+N+G
- Military Spec circular connectors (please specify) on back panel. Jack field Rear panel size 5" x16.8" available for connectors and breakers. This jackfield is located on back of one of the battery cabinets
- Optional: Remote PDU available –customize it as you need it with standard or High G rated circuit breakers. (MS connectors or others available) We build these to order.
- Output transformers available per your needs if you want 120V outputs.

PS15000 208V 2 phase description, 240V 1 phase

- **Input voltage options.**
- 208V (L1, L2+G) 40-70 Hz. Dual phase terrestrial (max 85A input current); 160-280V range for MAINS operation. For Hardwire recommend 2AWG.
- 240V (L1, N+G) 40-70 Hz. 1 phase terrestrial (max 80A input current); 170-300V range for MAINS operation. Recommend 2AWG input and output wiring if hardwire is used.
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- Optional Bypass Input can also be single phase or 3 ϕ for connections to alternate AC source.
- **NOTE:** Units configured for three phase input and single phase output operation, the entire load connected to the UPS will transfer to L1 and Neutral of the three phase input when the UPS is operating in Bypass mode so that L1 input breaker may need to be 100A

Output Voltage Options for PS15000 208V 240V

PowerStar PS15000 15kva 12u UPS

- Hardwire tie points are located on rear of UPS. Use them or use a Jack field.
- 208V, 240V output 1 phase L1,L2/N +G (up to 72A) @ <5% distortion @ 12KW 50/60Hz user selectable or Sync to MAINS
- Military Spec circular connectors (please specify) on back panel. Jack field Rear panel size 5" x16.8" available for connectors and breakers. This jackfield is located on back of one of the battery cabinets
- Optional remote PDU available –customize it as you need it with standard or High G rated circuit breakers. (MS connectors or others available) We build these to order.
- Output transformers available per your needs if you want 120V outputs.

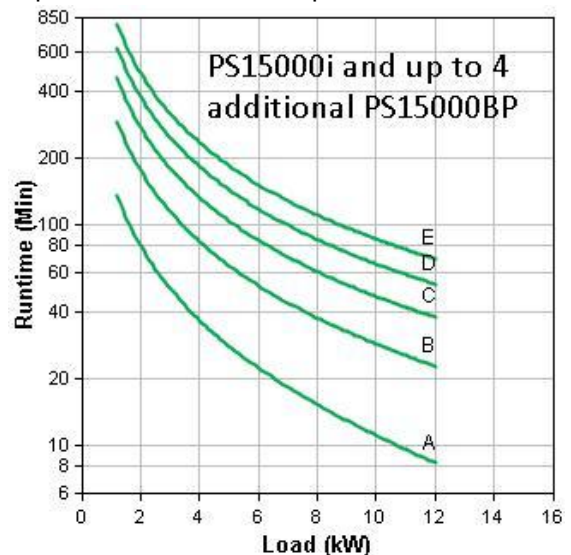
Battery cabinets and Jack fields for either unit

- **PS15000BP** (no jack field) 6u x 720mm depth; net weight 180KG. The standard battery cabinet contains 8 modular & removable PSRBC44 steel module packs with quick disconnect connectors. This makes it easy to dismantle the cabinet for installation. They are Sealed Lead-Acid VRLA non spillable CFR49 shippable using Absorptive glass mat technology. Electrolyte is absorbed into the glass mats between the plates. Batteries operate in any orientation. Battery interconnect cabling can be extended on request for remote location of battery cabinets. Order 8 ea. PSrbc44 or PSrbc44H for replacement cells for each cabinet
- **PS15000iBPJ** 6u x 739mm depth adds a jack field panel for carrying outlets on the rear of the PS15000BP. This jack field can contain optional NEMA or Mil Spec connectors and output breakers. **PS15000iBPJ** comes standard with 8ea. IEC320 C19 & 8 output breakers.
- **PS15000BPJ** 6u x 739mm depth adds a jack field panel for carrying outlets on the rear of the battery cabinet. This jack field can contain NEMA or optional Mil Spec connectors and output breakers. The jack field comes standard with (4ea. NEMA L6-20r) & (2ea. NEMA. L6-30r) & 6 output breakers.



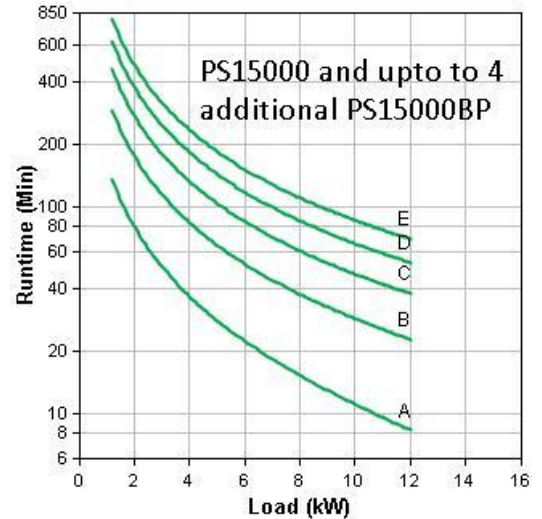
PS15000 specifications

- **12ru- 20.98"H x17"W x 30.4" depth (533x432x773mm) -248 KG. net weight** with 1 battery cabinet The UPS electronics cabinet is 6ru x 17"W x 30.4"Deep and weighs 68KG. Battery interconnect cabling can be extended on request for remote location of battery cabinets.
- Operating temp is (0 to 40°C) unless opt. batteries are used. **We have Powerstar Premium™ High temperature long life Navy tested batteries available. (8-10 year @25°C)**
- Overload support: 60 seconds @ 125% and 30 seconds @ 150% - then bypass is invoked
- Sound = 50 dbA @ 1 meter
- Heat= 2800 BTU/hr heat output at full load
- Operating elevation up to 3000m.



PowerStar PS15000 15kva 12u UPS

- Storage elevation up to 50,000ft.
- Storage temperature -5 to +45°C (for max battery life, recharge batteries every 3 to 6 months, temp dependent)
- Shipping specs: Height 990mm x 610mm Width x 1003mm width 315kg. Units per pallet =1
- Cabinet color: Gun Metal Black
- PS15000i Regulatory Approvals EN/IEC 62040-2, EN/IEC 62040-1-1, VDE
- Rohs exemption 7B, unit contains a Lithium battery
- PS15000 OSHPD, UL 1778
- Audio alarms as well as LED indicators and networked indicators.
- Built-in Ethernet SNMP/ Web based monitor and control system. Also "Smart UPS" RS232 monitor port can supply simple closure outputs for alarms.



- SNMP uses the world famous Powerchute® software.
- UPS shutdown software available for UNIX, HP, SUN, SCO, NT, Novell, Windows
- Dual pole circuit breaker for 1 phase unit
- Unganged 3 pole breaker used for 3 phase with bypass option is used (see NOTE PS1500i input)
- Intelligent ruggedized packaging- it can survive being bolted onto a HMMWV! We build them tough.
- Front panel has LED indicators for *Online*, *On-Battery*, *Bypass mode*, *Fault* indicators.
- Intelligent UPS; the built-in self test checks UPS and battery condition every 2 weeks and is configurable for the test interval.
- The lighted LCD display normally shows [% of Charge] and [% of Load] except when Alarms are being indicated or user is stepping through display.
- The firmware is upgradeable in the field via ftp if needed.
- Rack-mount rails, RS232 cable and Manual are included. Jonathan slide is available.
- Additional battery cabinets available from Powerstar, just plug in up to 4 additional PS15000BP.

PS15000 shown with rear mount Jack field NEMA

