PowerGem™+ Series

Single Phase Input & Output – True Online Double Conversion UPS 1kVA – 3kVA

>> Networking >> User-friendly

>> Affordable

The PowerGem+ range has the IT Manager in mind who requires a peripheral networking UPS device with full RS232 / USB and Ethernet communication interface but still requires a low cost solution.

The PowerGem+ has Digital Signal Processor (DSP) technology but in a more compact package with pure sinewave, no-break, online performance for all mission critical applications.

Should long runtime autonomies be required, BPC offer a range of matching battery cabinets so that extended backup options can be added. Provided with a plug-andplay cable package to simplify installation and ease your power protection connectivity concerns.

- » SoHo
- >> Networking
- >> Healthcare
- >> Industrial
- >> Telecommunications







PowerGem+ Features

ADVANCED FUNCTIONAL LCD DISPLAY

The PowerGem+ microprocessor controlled UPS provides an intelligent high density system suitable for powering a wide range of devices both simply and accurately.

The front display panel has a precise backlit LCD with comprehensive controls allowing all the key parameters to be accessed ensuring the IT Manager is shown the complete operating status of UPS and its alarm indications.



MULTIPLE COMMUNICATION OPTIONS

The PowerGem+ has a modern design suitable for networking interaction with multiple communication features which allow either the USB or RS232 ports to work with an SNMP simultaneously. An internal expansion slot is provided for remote control and monitoring agents like optional SNMP and relay contact boards.

WIDE INPUT VOLTAGE

Part of the unique design of the PowerGem+ is to improve the performance in extreme site conditions with a wide input voltage window, ranging from 110 volts up to 300 volts, without the need for the system to transfer into Battery Mode. Thus not only improving the efficiency of the system but also maximising the life of the battery.

LOW NOISE LEVEL

It is anticipated that the PowerGem+ will most often be installed in an office workspace and the environment will be an important factor in the design. Therefore, by using modern high frequency technology the noise produced is reduced to less than 5odBA.

- True online double conversion
- Digital Signal Processor (DSP) technology
- Intelligent self-diagnostics
- Wide input voltage (110V 300V)
- Frequency Converter Mode
- True sinewave output
- Multiple communication ports
- ECO Mode operation for energy saving
- Matching battery cabinets
- Intelligent slot for SNMP or relay internal card
- Generator compatible

ENVIRONMENTALLY FRIENDLY ENERGY SAVING

The intelligent microprocessor based control system allows for the very low power consumption offered by the interactive ECO Mode of operation which provides efficiencies as high as 98%.

The PowerGem+ switches instantaneously to online double conversion operation automatically when the mains becomes unstable and fluctuates outside the normal frequency and voltage parameters.

MATCHING EXTERNAL BATTERY CABINETS

For mission critical applications requiring longer runtimes or higher specification batteries, additional matching battery cabinets can be easily added. These have been designed both technically and aesthetically to complement the UPS, forming a combined unit which can be easily located without the need for special site considerations. For even larger battery systems or specialist battery installations, low cost open or cladded racks can be provided.



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PowerGem+ - Online Double Conversion UPS **Technical Specification**

PG+ 1K

| Power Rating VA / Watts | 1000 / 800 | 2000 / 1600 | 3000 / 2400 |
|--|---|-----------------|---------------|
| INPUT | | | |
| Nominal Voltage | 200 / 208 / 220 / 230 / 240 Vac | | |
| Voltage Range | 110 - 300 Vac at 50% load or 160 - 280 Vac at 100% load | | |
| Frequency Range | 40 - 70 Hz | | |
| Power Factor | >0.99 @ 100% load | | |
| OUTPUT | | | |
| Nominal Voltage | 200 / 208 / 220 / 230 / 240 Vac | | |
| AC Voltage Regulation (BatteryMode) | ±1% | | |
| Frequency Range (Synchronised Range) | 47 - 53 Hz or 57 - 63 Hz | | |
| Frequency Range (Battery Mode) | 50 Hz ±0.25 Hz or 60 Hz ±0.3 Hz | | |
| Crest Factor | 3:1 | | |
| Harmonic Distortion (Linear Mode) | ≤3% THD | | |
| Transfer Time | Zero | | |
| Waveform | Pure Sinewave | | |
| EFFICIENCY | | | |
| AC Mode | 88% | 89% | 90% |
| Battery Mode | 83% | 85% | 88% |
| BATTERY | | | |
| Battery Type | VRLA AGM Sealed Lead Acid Maintenance Free Batteries | | |
| Battery Numbers | 2 x Internal | 4 x Internal | 6 x Internal |
| Typical Recharge Time | 4 hours recover to 90% capacity | | |
| Charging Standard Models Current (max.) | 1Å | | |
| GENERAL | | | |
| Operating Humidity | 20 - 90% RH @ 0 - 40°C (non-condensing) | | |
| Acoustic Noise Level | <50 dB @ 1 metre | | |
| Management Software | Included | | |
| Standard Dimensions (mm) WxDxH | 145 x 282 x 220 | 145 x 397 x 220 | 190 x 421 318 |
| Model Net Weight (kgs) | 9.8 | 17 | 27.6 |

PG+ 2K

AC input

MODEL

- Input circuit breaker
- USB communication port
- 4 RS232 communication port
- 5 SNMP intelligent slot (option)

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- 6 Emergency power off function connector (EPO)
- Output receptacles
- Output terminal
- 9 External & battery connectors
- Network/Fax/Modem surge protection







PG+3K

Accessories

Suitable for the Single Phase UPS Ranges PowerGem Xtreme / PowerGem+ / PowerOn /PowerGem Pro

SIMPLE NETWORK MANAGEMENT PROTOCOL (SNMP) MODULES

SNMP cards are used for the management of UPS systems via a computer or local network. With a web based programme built into the SNMP, simply connecting the card to a network via its LAN port allows for easy monitoring of the UPS. SNMP cards can be used not only to monitor UPS parameters, but also allow user controlled testing, email alerts and sending of remote console commands to client systems to initiate automatic shutdowns. SNMP cards can be fitted internally on some UPS models or externally fitted via the UPS RS232 port.

RELAY CARDS

Relay communication cards provide contact closures for the remote monitoring of the UPS system. The dry-port interface card provides a selection of dry-contact relays. The dry-contact signals monitor select parameters of the UPS such as, UPS failure, bypass active, low battery, UPS on and utility failure. The dry-ports will then change their status depending on this alarm.

RAIL KITS

Rail kits are available for all rackmount UPS, a simple kit to ease installation into 19" cabinets and will allow the UPS to be supported without the requirement of a shelf.

EXTERNAL RACKMOUNT MAINTENANCE BYPASS SWITCHES

Suitable for 1kVA – 3kVA models

- Provides continuous power to connected equipment during UPS maintenance
- Easy operation with simple rotary switch and indications
- Adjustable master-slave function
- Large number of sockets for extended usage
- Rack and tower designs to fit into a diverse working environment
- Simple plug-and-play connectivity
- Diverse socket selections: IEC, UK, Schuko and NEMA









Suitable for PowerGem Pro 6kVA & 10kVA models

- Easy operation with simple rotary switch and indications
- 100% make-before-break to provide continuous power to connected equipment during UPS maintenance
- Automatic UPS protection design auto transfer UPS to bypass when opening the maintenance bypass switch panel
- Easy operation with simple rotary switch
- Terminal block type





The BPC Group

BPC is an international company operating for 20 years globally, with partners and distributors located around the world.

These regions include:

EUROPE

UK, France, Germany, Gibralta, Ireland, Netherlands, Malta, Norway, Portugal.

MIDDLE EAST

Bahrain, Jordan, Kuwait, KSA, Lebanon, Oman, Qatar, UAE, Yemen.

AFRICA

Burkina Faso, Democratic Republic of the Congo, Egypt, Ethiopia, Kenya, Ghana, Libya, Nigeria, Rwanda, Sierra Leone, Sudan, Tanzania, Uganda, Zambia.

FAR EAST & ASIA

India, Pakistan, Sri Lanka.

To ensure a high level of pre and post-sales support is offered, BPC work closely with distributors, providing key commercial and technical training whilst providing competitive costing structures tailored to specific region markets, ensuring the most suitable BPC products are offered. We pride ourselves on long standing relationships with our partners which is reflected in the ongoing support provided locally.



The British Power Conversion Company

Authorised Distributor