

GUTOR MODULAR AC UPS SYSTEM

Compact, flexible, redundant, and scalable industrial grade AC power protection.

Gutor Modular UPS systems are designed, tested, and built to last - even in harsh environments - with highly flexible configurations.

Designed for harsh environments

- Protects against electrical outage with surge protection and galvanic isolation
- The short circuit capability allows it to be installed near substation equipments
- Industrial enclosure with unique framework increases robustness and protection
- NEMA Type 1 with ingress protection up to IP42
- Has a 20+ years design lifespan

Enhance system availability

- N+1 or N+x design increases the internal redundancy of the system
- All Gutor Modular power modules have a "live swap" concept that allows the power modules to be maintained and repaired without interrupting the load



Bottom entry

Top and Bottom entry

Flexible and Scalable Design

Independent modular chargers with internal redundancy



Breakers for input, output, battery, bypass & manual bypass (up to 65kA)



Advanced asset management



- Ready to connect to most communication protocols
- Cybersecure certified

Integrated output feeders



Power factor correction



Modular inverters associated with static and manual bypass switch



Cable entry

- Bottom cable entry allows for a smaller footprint
- Top and bottom cable entry with a wider enclosure



Battery

- Ready for lead acid (VRLA and VLA), NiCd, Li-Ion, and SMC
- VRLA and SMC batteries can be integrated into one cabinet to achieve footprint optimization

Technical Data

Model	GUMUPS
Rectifier input	
Input voltage tolerance (V _{AC})	120V / 240V / 277V (other voltages on request)
Frequency	60 Hz ±10 % (other frequency upon request)
THDi harmonic	≤5 %
Power factor	Up to 0.99
Withstand short circuit (kA)	15kA up to 65kA on option
Voltage range (V _{DC})	Depending on battery configuration
Efficiency	Up to 95%
Inverter	
Input voltage (V _{DC})	24, 48, 60, 125 or 220V
Output voltage tolerance (V _{AC})	110, 120, 127V (1ph + N) - other voltages upon request
Output power	Up to 10 kVA @ PF 0.8 (configuration-specific) / other configurations on request
Power factor	0.8 lag to 0.8 lead
Frequency	60 Hz ± 5 % / free running ± 0.1 %
Static voltage tolerance	± 1 %
Dynamic voltage tolerance	± 10 % @ full load
ThDU	Typical ≤ 3 % linear loads
Overload	Module-specific, most configurations have 125% / 30sec - 140% / 4sec - 250% / 0.5sec
Efficiency	Up to 91.6%
Bypass input	
Input voltage tolerance (V _{AC})	110, 120, 127V (1ph+N) - other voltages upon request.
Frequency	60 Hz ± 5%
Switching time	2 ms typical
Overload	Module-specific, most configurations have 125% / 30sec - 140% / 4sec - 250% / 0.5sec
Backfeed protection	Included by default
General arrangement	
Configuration	N, N+1, N+x, N+N between racks
Input Neutral earthing type	TN, IT, HRG
Display	Front 10" touch display with up to 39 LEDs for warning or alarms
Communication	Minimum 2 output dry contacts Modbus TCP / Modbus RS485 / SNMP / IEC 61850 as an option - others upon request
Emergency power off (EPO)	EPO input terminal with an internal 24V _{DC} power supply
Serviceability	MTBF > 300'000h, and a low MTTR due to the live swap concept: replacing power modules without switching off the system
Battery protection	Breakers are included
Output earthing system	Galvanic isolation through double conversion line. Earthing system follows input of bypass.
Battery	Built-in VRLA or SMC battery, or separate battery such as VLA, NiCd and Li-Ion
Output distribution breakers	Up to 9 output breakers with signal contact
General data	
Cable entry	Bottom or top
Dimensions (width x depth x height)	Top entry - NEMA 1 : 31.5 x 23.7 x 82.7 inches (800 x 600 x 2100 mm) Bottom entry - NEMA 1 : 23.7 x 23.7 x 82.7 inches (600 x 600 x 2100 mm) For NEMA 2 (Top entry / Bottom entry), the height is 86.2 inches (2191 mm)
Ambient temperature range for operation	14°F to 104°F (-10°C to 40°C) - design for higher ambient conditions upon request
Noise level	55dBA - 68dBA
Air flow	From front to top
Allowable air humidity	Up to 95% non-condensing
Altitude above sea level	Nominal up to 6,600ft (2,000m), with derating up to 10,000ft (3,000m) - others on request
Paint	RAL 7035, similar to ANSI-61
Standards	NEMA PE1, UL 1778 & CAN/CSA C22.2 No. 107.3, IEC 62040-2
Options	
Built-in configuration	Additional dry contacts, analog metering, input voltage adaptation, multiple battery string protection, and more on request.

Contact your local sales representatives for a secure power solution customized for your site requirement.