



Pure sine wave

Wide temperature batteries

Voltage regulation

## Outdoor XUPs and EXt model

1000-7070

1000 VA  
840 watts  
120V input  
115V output  
2 hours @840W  
4.5 hrs @ 450W  
0° to +55°C;  
-40° to +55°C  
with optional  
battery heater

EXt-7070

For 1000 VA or  
an 840 watts  
load: adds  
6 hours @700W  
8 hours @550W  
0° to +55°C;  
-40° to +55°C  
with optional  
battery heater

# Outdoor UPS with voltage regulation

The OutdoorXUPs-1000-7070 UPS is constructed with extreme wide temperature batteries, and is housed in a weather protected NEMA-3R enclosure designed to be mounted on a bracket and blend in with the environment. This unit offers line-interactive automatic voltage regulation, over/under-voltage protection, surge protection with noise filtering, communications capability, and optional extended battery backup.

## Key Outdoor XUPs benefits

This rugged UPS design, with microprocessor-controlled 20 kHz sine wave inverter, reduces the number of solid-state devices required for power conversion and is suitable for use in severe outdoor environments.

Outdoor XUPs extreme/wide temperature batteries allow operation of the UPS system over an ambient temperature range of 0° to +55°C (32° to +131°F); -40° to +55°C (-40° to +131°F) with optional battery heater. Built-in automatic voltage regulation enables a wide input voltage window within which power is delivered without having to drain or exercise the batteries, thereby ensuring long battery life. Battery run-times for the outdoor XUPs-1000-7070: 2 hours at a 840 watts load, 4.5 hours at 450 watts load; the optional EXt-7070 provides an additional 6 hours at a 700W load and 8 hours at 550 watts load.

## How the Outdoor XUPs works

The Outdoor XUPs-1000-7070 UPS provides automatic voltage regulation with surge protection and noise filtering, as well as overvoltage protection with a threshold of 140 vac, and undervoltage protection with a threshold of 95 vac. Upon a brownout, overvoltage, or loss of power, the XUPs will transfer to battery power in less than 4 milliseconds, enabling uninterrupted operation of Radio Head (RH) systems.

By unlatching, the front door swings open; inside the cabinet is an array of LED status indicators, circuit breaker, and a power on/off switch.



## Typical applications

This heavy duty outdoor UPS is ideal for protection of Radio Head (RH) systems.

## Key Outdoor XUPs features

- Cabinet and color are designed for pole mounting and blending in with the environment
- Full weather outdoor protection NEMA-3R metal cabinet
- Pure sine wave output
- Over/under-voltage protection
- Wide temperature batteries
- Surge protection and noise filtering
- Automatic voltage regulation
- Two year limited warranty; batteries are covered by battery manufacturer's limited warranty



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# Outdoor XUPs



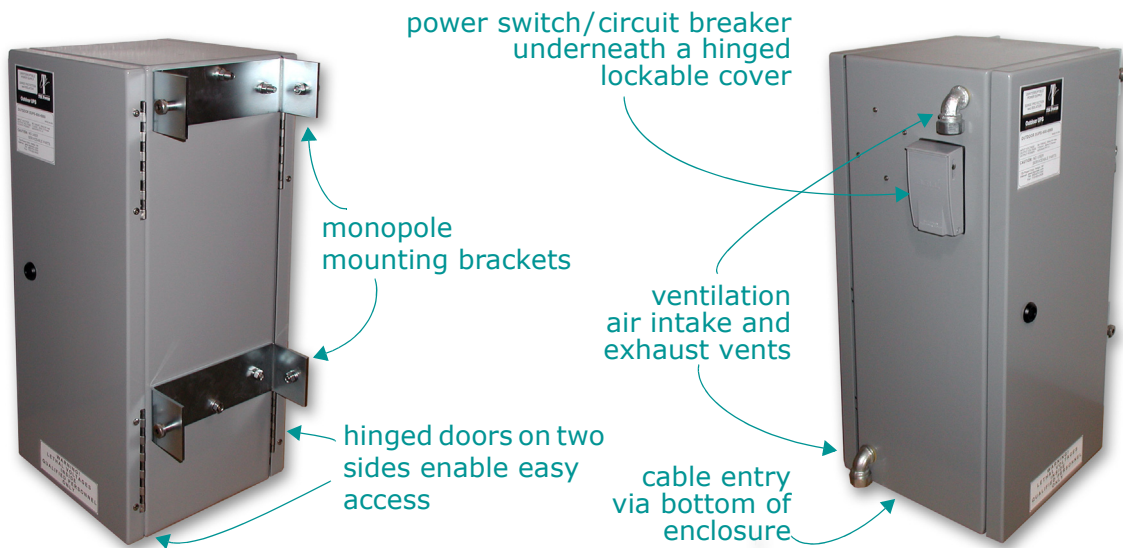
Outdoor UPS with line-interactive automatic voltage regulation, and wide temperature batteries

Specifications	OutdoorXUPs - 1000-7070
<b>Electrical</b>	
Capacity in VA (watts)	1000VA (840W maximum output)
UPS topology	High efficiency line-interactive with 20 kHz PWM sine wave inverter.
<b>Input</b>	
Nominal voltage	120 vac, L1, N and Ground with circuit breaker
Input current maximum	8.3 amperes @ 120 vac
UPS operating voltage	95–140 vac (within which UPS will not have to use batteries)
Frequency	47–63 Hz
Hardwire connection	14AWG conductors
<b>Output</b>	
Nominal voltage	115 volts ac
Voltage regulation	115 vac +/- 8% upon changes in line or load
Crest ratio	3:1
Output waveform	Pure sine wave, less than 3% THD with linear load
Power efficiency	94% at full load when in ac line mode with fully charged batteries
Power on/off switch	On/off rocker style power switch
Transfer time	<4 milliseconds
Batteries	Eight 31 Ah, 12 vdc wide temperature sealed gel-cells rated for 0° to 55°C (32° to 131°F); -40° to +55°C (-40° to +131°F) with optional battery heater.
Battery backup time and recharge time	2 hours @ 840 watts load, or 4.5 hours @ 450 watts load. 12 hours to 90% capacity after full discharge.
Optional extra battery pack(s) for longer backup time (heater optional)	Optional matching size EXt-7070 extra battery cabinet available with two SB50 connectors. Provides extra eight 12 vdc, 31 Ah wide temperature batteries for an extra 6 hours @ 700W load, or 8 hours @ 550W load.
SNMP interface for UPS monitoring and automatic shutdown configuration (optional)	Using an external SNMP adapter, the RS-232 signals (from the DB-9 female connector) from the UPS can be converted to 10M/100M fast Ethernet signals (and RJ-45 connection) for external UPS monitoring/configuration capability using Telnet, web browsers, or NMS (for TCP/IP, UDP, SNMP, Telnet, SNTp, PPP, HTTP & SMTP protocols).
Surge let-through voltages	Test pulse injection: Line-Neutral: Line-Ground: and Neutral-Ground. Combination Wave: L-N: 450V, L-G: 300V, N-G: 300V
Status indicators	5 LEDs for load level: 0 to 100% of rated load. 5 LEDs for battery charge level: from 0 to 100% of rated charge. 3 LEDs for: in boost, buck or normal mode. 3 LEDs for: inverter on/off, battery fault and overload.
<b>Physical</b>	
Dimensions - either XUPs-1000-7070 or EXT	292mm(11.5")wide x 400mm(15.75")deep x 660mm(26")high
Weight-XUPs-1000-7070 - Opt. Ext-7070	119 kg (263 lbs) 103 kg (228 lbs)
Steel cabinet	Full weather NEMA-3R outdoor design in storm gray color.
Mounting options	Four studs on back provides for mounting to customer supplied pole bracket.
<b>Environmental</b>	
Operating temperature	0° to 55°C (32° to 131°F) ambient air temperature. -40° to +55°C (-40° to +131°F) with optional battery heater.

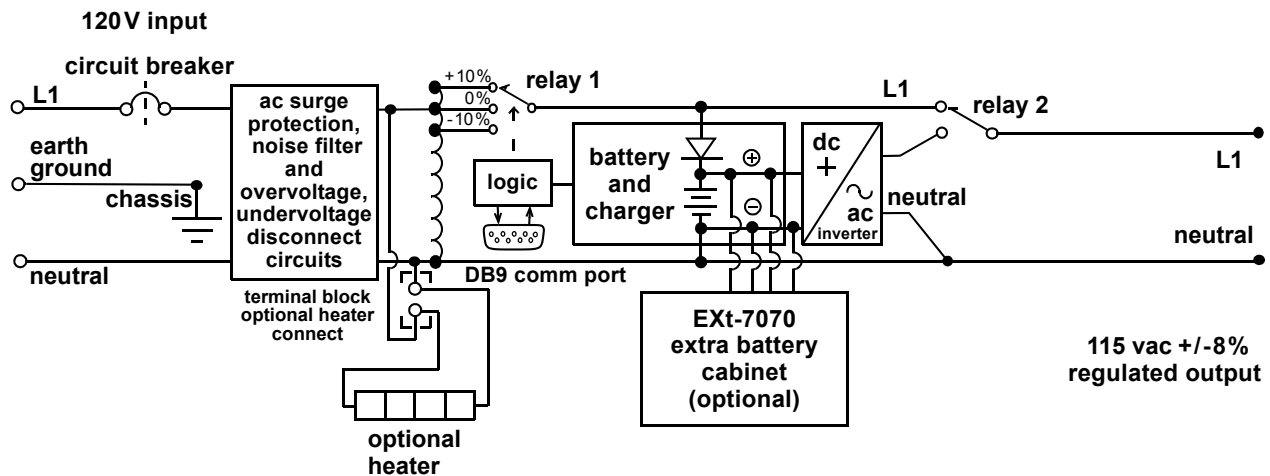


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## OutdoorXUPs-1000-7070 system architecture



## OutdoorXUPs-1000-7070 at a glance

Heavy-duty outdoor UPS with line-interactive automatic voltage regulation and extreme/wide temperature batteries

- Wide ambient temperature range sealed gel-cell batteries:  
0° to 55°C (32° to 131°F);  
-40° to + 55 °C (- 40° to +131°F)  
with optional battery heater
- 2 hours @ 840 watts load,  
4.5 hours @ 450 watts load
- 6 hours @ 700 watts load,  
8 hours @ 550 watts load with  
the addition of an EXt-7070
- 115 vac +/- 8% output  
from 95–140 vac input  
without going to batteries
- Microprocessor-controlled  
20 kHz PWM sine wave inverter
- Pure sine wave output
- Surge protection and  
noise filtering



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