

# **Power Rating:**

250 kW / 500 kW / 1,000 kW

# **Energy Rating:**

1.000 kWh

### **Enclosure Style:**

Custom 20'



# **Codes and Standards**

Contact Generac for details.



UL 1642



UL 1973



UL 9540A



UL 1741



UL 9540



CSA 22.2



UN 38.3



**▶IEEE** IEEE 1547



**NFPA 855** 

# **The Generac Solution:**

Energy management today means balancing a combination of carbon reduction, energy savings, and energy resilience goals. Generac's Stationary Battery Energy storage system (SBE) is our latest edition to a portfolio of products and technologies helping commercial and industrial customers to meet their current and future energy goals.

The SBE energy storage systems enable commercial and industrial customers to:

- 1. Reduce peak demand charges and save on energy costs.
- 2. Pair with on-site solar and lower both carbon footprint and energy costs.
- 3. Provide site resilience during brownouts/power quality issues, back up critical loads during shorter duration blackouts, and pair with our line of gas and diesel generators for full facility resilience during long duration blackouts.
- 4. Earn additional revenue by monetizing the asset to support broader grid resilience.

# SBE1000 | 1,000 kWh | LFP

# LITHIUM ION BATTERY ENERGY STORAGE SYSTEM



BESS SPECIFICATIONS	250 kW / 1,000 kWh	500 kW / 1,000 kWh	1,000 kW / 1,000 kWh
AC port configurations	3-wire (3P3W)	3-wire (3P3W)	3-wire (3P3W)
Nominal AC voltage	480, 600 V	480, 600 V	480, 600 V
Frequency	60 Hz	60 Hz	60 Hz
Overload capacity	110%, 10 mins. 125%, 10s	110%, 10 mins. 125%, 10s	110%, 10 mins. 125%, 10s
Power factor	Unity; Full 4-quadrant	Unity; Full 4-quadrant	Unity; Full 4-quadrant
Peak efficiency	Up to 98.4%	Up to 98.4%	Up to 98.4%
DC voltage range	740 - 1,475 VDC	710 - 1,250 VDC	710 - 1,250 VDC
Nominal voltage	998.4 V	998.4 V	998.4 V
Max battery C-rate	1 C	1 C	1 C
Dimensions (approx.)	20' x 8' x 9'	20' x 8' x 9'	20' x 8' x 9'
Weight (approx.)	25,606 lbs	25,744 lbs	26,544 lbs

Contact Generac for smaller capacities within the 20' enclosure; minimum capacity is 600 kWh.

# **ENVIRONMENTAL**

Operating temperature	-13° F to 113° F	-13° F to 113° F	-13° F to 113° F
	-25° C to 45° C	-25° C to 45° C	-25° C to 45° C
Enclosure	NEMA 3R (Outdoor)	NEMA 3R (Outdoor)	NEMA 3R (Outdoor)
Altitude before derate	3,280 ft / 1,000 m	3,280 ft / 1,000 m	3,280 ft / 1,000 m
Noise (approx.)	65 dB < 1m	65 dB < 1m	65 dB < 1m

# **STANDARD FEATURES**

#### **ELECTRICAL SYSTEMS**

- DC Combiner
- Auxiliary load panel
- Lighting
- BESS controller panel
- · Ground fault monitoring

#### **CONTROLS**

· Door open alarm switch

# **BIDIRECTIONAL INVERTER**

- · Dynamic transfer
- Grid tie
- Off-grid
- 4 quadrant operation
- THD < 2%

# FIRE PREVENTION AND SUPPRESSION SYSTEM

- Smoke detectors
- Audible alarm
- Visual alarm
- Remote E-Stop
- Dry solution suppression
- Remote alarm
- Temperature sensors

#### **ENCLOSURE**

- NEMA 3R
- Structural steel base
- Drip edge door covers
- Insulated enclosure doors
- Reinforced cable cutouts entry points
- Lifting eye bolts



#### **BESS CONTROL SYSTEM**

#### **USE CASES**

- · Peak shaving
- Arbitrage
- Back up power
- Black start
- Renewable energy shifting
- Voltage regulation
- Frequency response
- **Engineered UPS**
- Grid forming off-grid

Event reporting

**FEATURES** 

· Local data server

· Cloud based monitoring

HMI interface

Remote configuration firmware and software upgrade

Data acquisition and control functions

Multilevel authentications for security opera-

- Ramp rate control demand management
- Modbus TCP
- Sunspec protocol
- CAN
  - Ethernet based communication
- Compatibility with 3rd party EMS, SCADA systems

### **OPTIONS**

#### **ELECTRICAL SYSTEMS**

- · Automatic transfer switch
- Isolation transformer
- · LV circuit breaker

#### **HVAC**

- Motorized damper with pressure relief
- Electric reheat with humidity control

#### CONTROLS

- Custom HMI screen interface
- Larger HMI screen

## FIRE PREVENTION AND SUPPRESSION SYSTEM

- · Off gas detection (Li-ion Tamers)
- Sprinkler system
- Motorized louvers
- Dry pipe
- Deflagration venting panels

#### 0&M

- 10 year limited warranty
- Long term service contract
- Contact Generac for performance guarantee service products

#### **ENCLOSURE**

- Security camera
- Exterior flood lights
- Sound reduction silencer
- Seismic rating
- Explosion rated exterior pressured doors
- Exterior finishing
- Arctic rated
- Key pad lock

Contact Generac for a one stop solution to integrate our line of generators with our SBE battery system. Contact Generac for partner(s) referral regarding on-site Engineer/Procurement/Construct (EPC) services.