



POWER CESS 1000 US SERIES

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## INDUSTRIAL CONTAINER ENERGY STORAGE SYSTEM



back-up  
power supply



store and trade  
energy



manage energy  
sources and tariffs



increase  
self-sufficiency

### RELIABLE POWER SUPPLY

- 466-932 kWh outdoor-rated container storage system
- AC coupled system

### SAFE TECHNOLOGY

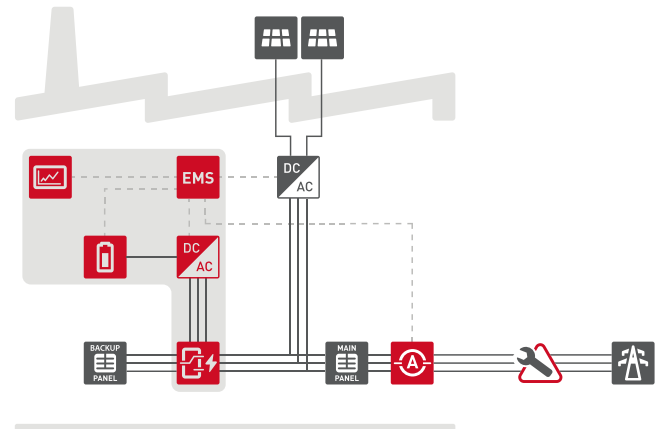
- Multi-level protection
- Lithium iron phosphate (LFP) chemistry provides highest level of safety, thermal stability and reliability
- Preinstalled liquid cooled RCT Power Battery modules
- Integrated multi-level battery management system (BMS) assures optimized and well-balanced power storage

### ENERGY MANAGEMENT SYSTEM

- Back-up power
- Peak shaving
- Micro-grids
- Demand mitigation
- Rate arbitration

### SMART & HIGH EFFICIENCY

- Highly efficient AC/DC inverter
- Smart energy monitoring cloud platform for remote monitoring and control
- Intelligent charging and reduction of peak loads
- High degree of performance
- Multi-parallel system supported



## POWER CESS

### 900 class 2 hour system

### 900 class 4 hour system

### 700 class 2 hour system

### 450 class 2 hour system

932-500-02D

932-250-02D

699-375-02D

466-250-02D

### BATTERY

|                            |  |         |         |         |
|----------------------------|--|---------|---------|---------|
| Nominal capacity           | 932 kWh  | 932 kWh | 699 kWh | 466 kWh |
| Usable capacity (94 % DoD) | 871 kWh  | 871 kWh | 653 kWh | 435 kWh |
| Battery technology         | LiFePO <sub>4</sub>                                  |         |         |         |
| Charge/discharge rate      | 0.5 P  |         |         |         |
| Battery pack structure     | 1P52S (46.59 kWh) liquid cooled                      |         |         |         |
| BMS                        | integrated   |         |         |         |
| Battery life cycle         | ≥6000 times @77°F± 36°F 0,5 P 93.5% DOD, 80% SOH EOL |         |         |         |

### INVERTER

|                                 |                          |        |        |        |
|---------------------------------|--------------------------|--------|--------|--------|
| Rated AC power                  | 500 kW (125 kW x 4)      | 250 kW | 375 kW | 250 kW |
| DC-side operating voltage range | 680 - 950 Vdc            |        |        |        |
| Rated AC current                | 600 A (150 A x 4)        | 300 A  | 450 A  | 300 A  |
| AC line voltage                 | 480 Vac (- 15 % - +10 %) |        |        |        |
| Rated AC line frequency         | 60 Hz                    |        |        |        |
| Current harmonics               | < 3 % @ rated AC power   |        |        |        |
| Cooling Method                  | Liquid                   |        |        |        |

### STS

|   |                      |        |        |        |
|---|----------------------|--------|--------|--------|
| Grid port power                             | 1000 kW (250 kW x 4) | 500 kW | 750 kW | 500 kW |
| Grid port rated current                     | 1200 A (300 A x 4)   | 600 A  | 900 A  | 600 A  |
| Load port power                             | 500 kW (125 kW x 4)  | 250 kW | 375 kW | 250 kW |
| Long-term overload capacity                 | 110%                 |        |        |        |
| From On-grid to Off-grid Switch Time        | 20 ms                |        |        |        |
| From Off-grid to On-grid Switch Time        | 20 ms                |        |        |        |
| Corrosion-proof Grade/Salt Spray Resistance | C4                   |        |        |        |
| Dark Start                                  | Yes                  |        |        |        |

### ENERGY MANAGEMENT SYSTEM

|     |            |
|-----|------------|
| EMS | Integrated |
|-----|------------|

### COMMUNICATION

|                        |                           |
|------------------------|---------------------------|
| Touch panel            | 15.6" industrial standard |
| Communication protocol | Modbus TCP/RTU            |
| Cloud                  | yes                       |
| App                    | yes                       |

### OPERATION

|                             |                         |
|-----------------------------|-------------------------|
| Noise Level                 | ≤75dB@1m                |
| Relative operating humidity | 0-95 %, no-condensation |
| Operating temperature range | -13 °F... +122 °F       |
| Operating altitude          | ≤ 6500 ft               |

### DIMENSIONS

|                        |                   |                  |                  |                  |
|------------------------|-------------------|------------------|------------------|------------------|
| Dimensions (W x H x D) | 118" x 102" x 96" |                  |                  |                  |
| Weight                 | aprox 25,000 lbs  | aprox 24,000 lbs | aprox 21,000 lbs | aprox 17,000 lbs |

### SAFETY / STANDARDS

|                 |  |   |  |  |
|-----------------|--|---|--|--|
| Protection      | IP54/NEMA 3R   |   |  |  |
| Safety features | a. Flammable / explosive gas detection<br>b. Flammable / explosive gas exhaust<br>c. Smoke detection<br>d. Temperature detection   | e. Aerosol fire extinguish<br>f. Siren and strobe alarm<br>g. Emergency stop button<br>h. Dry pipe and sprinkle |  |  |
| Certification   | UL 1741 Supplement SB - 3rd Edition, UL 1741 Supplement SA - 3rd Edition, SunSpec compliant, California Rule 21 compliant, IEEE2030.5, IEEE1547-2018, IEEE1547.1-2020, OpenADR |   |  |  |

### WARRANTY

|          |          |
|----------|----------|
| Warranty | 10 years |
|----------|----------|