



# Powerful. Configurable. Versatile...

The NEW Freedom SW 24 Vdc inverter/charger is packed with features and it is one of the most advanced inverter/chargers in the market today. The Freedom SW features premium sine wave output with high surge capability and temperature compensated, power factor corrected, multi-stage charging to meet power needs of demanding loads including inductive motor loads. Available in two 24 Vdc models, the Freedom SW offers SERIES and PARALLEL stacking capability to enable twice-the-rated output and operation of 240 Vac applications respectively. Both models are compatible with optional accessories such as the System Control Panel, Automatic Generator Start and Freedom Sequence Power Manager.

The Freedom SW inverter/charger provides utility grade AC power to operate commonly used AC-powered electronics such as plasma television sets, microwaves, entertainment systems, computers, printers, power tools, refrigerators and much more.

## **Application**

Designed for a variety of mobile applications such as commercial, emergency and recreational vehicle, marine vessel, bus, construction and other heavy duty applications.

### **Product Features**

- Available in 2 models: 2000W with 50A charger, 3000W with 75A charger
- Parallel stacking capability to double the inverter power output
- Series stacking capability enables operation of 240 Vac appliances
- Advanced configuration options for customized applications
- Built-in transfer switch automatically transfers between inverter power and incoming AC power
- Power factor corrected multi-stage charger for fast, efficient charging
- ▶ Temperature compensated charging for all climate conditions
- ▶ Ignition lockout prevents unnecessary battery drain when the alternator is not providing power\*
- ▶ Full output at higher temperatures
- ▶ Conformal coated circuit boards to protect against humid environments
- Dual input / Dual output AC interface (3000W model only)
- ► Compatible with the Xantrex Automatic Generator Start\*\* (Part# 809-0915)
- ▶ Meets CSA, UL458 (with marine supplement), ABYC and FCC Part 15, Class B requirements
- \*When used with the remote panel, \*\*Sold separately

#### **Protection Features**

- ▶ Battery over-voltage and under-voltage protection
- Over-temperature shutdown
- Automatic overload protection
- Short-circuit protection
- Integrated, resettable AC breakers













This product has undergone rigorous testing under extreme thermal & mechanical conditions

### **Schneider Electric**

3700 Gilmore Way Burnaby, British Columbia Canada V5G 4M1 800 670 0707 Toll Free

541 Roske Drive, Suite A Elkhart, Indiana USA 46516 800 670 0707 Toll Free



### **FREEDOM SW Inverter/Chargers**

Electrical Specifications - Inverter	Freedom SW 2024 (815-2024)	Freedom SW 3024 (815-3024)
Output power (continuous at 40°C)	2000 W	3000 W
Surge rating (5 seconds)	4000 W	6000 W
Peak output current	55 A	80 A
Output frequency	60 Hz +/- 0.2 Hz	60 Hz +/- 0.2 Hz
Output voltage	120 Vac	120 Vac
Output wave form	Pure sine wave	Pure sine wave
Optimal efficiency	94%	94%
No-load power draw (inverting)	<1.5 Adc	< 1.5 Adc
Input DC voltage range	20 - 32 Vdc	20 - 32 Vdc
AC connections	Single phase in / out	Split phase in / dual out
Electrical Specifications - Charger		
Output current (continuous at 25°C)	50 A	75 A
Output voltage	24 Vdc	24 Vdc
Output voltage range	12 - 32 Vdc	12 - 32 Vdc
Charge control	3 stage with manual equalize	3 stage with manual equalize
Charge temperature compensation	Remote battery sensor (included)	Remote battery sensor (included)
Efficiency	> 85%	> 85%
AC input power factor (maximum charge)	0.98 typical	0.95 typical
Input current (for maximum charging)	15.8 A rms nominal	22 A rms nominal
Input AC voltage	120 Vac	120 Vac
Input AC voltage range	85 - 140 Vac	85 - 140 Vac
Dead battery charge	> 12 Vdc	> 12 Vdc
General Specifications		
Compatible battery types	Flooded / Gel / AGM	Flooded / Gel / AGM
Transfer relay rating	1 leg of 30 A	2 legs at 30 A each
Transfer time (AC to inverter and inverter to AC)	< 20 ms	< 20 ms
Operating temperature range (full power)	- 4°F to 86°F (- 20°C to 30°C)	- 4°F to 104°F (- 20°C to 40°C)
Storage ambient temperature range	- 67°F to 167°F (- 55°C to 75°C)	- 40°F to 185°F (- 40°C to 85°C)
Unit dimensions (H x W x L)	7.75 x 13.5 x 15.25" (19.7 x 34.3 x 38.7 cm)	7.75 x 13.5 x 15.25" (19.7 x 34.3 x 38.7 cm)
Unit weight	27.5 kg (60.5 lbs)	31.5 kg (69.4 lbs)
Warranty	2 years	2 years
Master carton quantity	1	1
Master carton dimensions (H x W x L)	11.8 x 17.1 x 20.5" (30 x 43.5 x 52.2 cm)	11.8 x 17.1 x 20.5" (30 x 43.5 x 52.2 cm)
Master carton weight	30 kg (66 lbs)	35 kg (77 lbs)
Part Number	815-2024	815-3024
Accessories		
Battery temperature sensor	Part# 809-0946 - INCLUDED	
	Part# 809-0946 - INCLUDED Part# 808-9002 - SOLD SEPARATELY	
Battery temperature sensor Freedom SW On/Off Remote Panel Automatic Generator Start (AGS)		
Battery temperature sensor Freedom SW On/Off Remote Panel Automatic Generator Start (AGS) System control panel (SCP)	Part# 808-9002 - SOLD SEPARATELY	
Battery temperature sensor Freedom SW On/Off Remote Panel Automatic Generator Start (AGS) System control panel (SCP) 25' network cable for system control panel	Part# 808-9002 - SOLD SEPARATELY Part# 809-0915 - SOLD SEPARATELY	
Battery temperature sensor Freedom SW On/Off Remote Panel Automatic Generator Start (AGS) System control panel (SCP)	Part# 808-9002 - SOLD SEPARATELY Part# 809-0915 - SOLD SEPARATELY Part# 809-0921 - SOLD SEPARATELY	

### Note: Specifications subject to change without notice