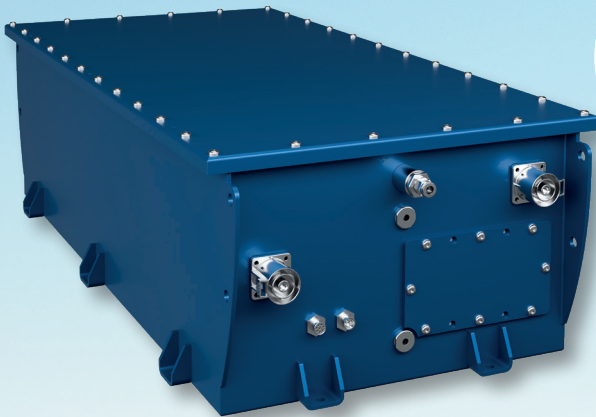


First-ever DNV - approved

# Solid-State Tech. Battery

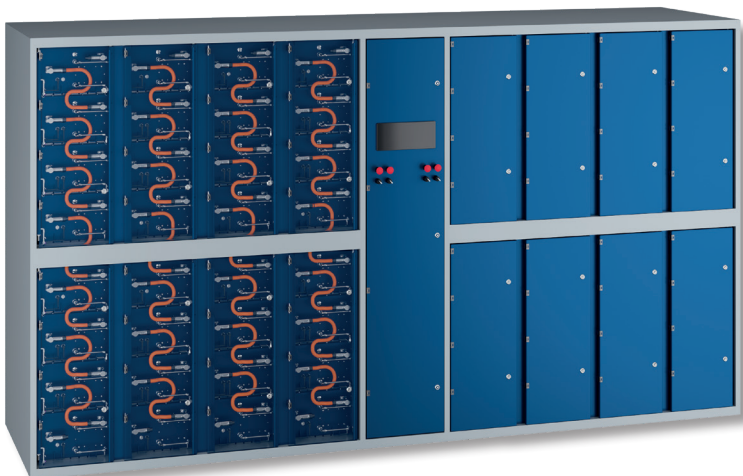
DNV Class approved: NR TAE000054J



## SVENNER II

A marine battery that doesn't just power vessels - it **safeguards** them.

- Withstands **6x overcharge & 8 mm nail puncture**: no thermic reaction
- **10'000+ life cycles** easily achievable maximizing material efficiency and reducing lifecycle costs
- **Dual-core lockstep CPU BMS** ensures redundancy and continuous monitoring **HIVIL Interlock & internal water-leak detection** for module-level protection
- **DNV Design Option 1**: No propagation - no module gas ducting needed; any fire fully contained within the module
- Remote **Data Monitoring**
- **Rack System**



### CONTACT US:

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# Solid-State Tech. Battery

DNV Class approved: NR TAE000054J

- At the heart of the Svenner Battery lies the solid-state cell technology, replacing most liquid electrolytes with advanced solid materials.
- Heat resistant: stable operation under elevated temperatures
- Enhanced safety: minimal fire or explosion risk — even under extreme stress.
- Hardware override switch: allows manual override of some protections in critical emergencies
- Level 2 Model: expected in January. 12% increased performance

Estimated cycle life assuming that:	DOD	Est. cycle life	BMS-Level Protection
• Never below 10% SOC, better 20%	50%	15'000	<ul style="list-style-type: none"> <li>• SIL-C certified – highest functional safety</li> <li>• Precision sensing – optimized cell balance &amp; energy use</li> <li>• Dual sensors &amp; overcharge protection per module</li> <li>• Manual isolation &amp; real-time fault monitoring</li> </ul>
• Never above 95% SOC, better 85%	60%	13'000	
• Average temp at 25°C, never above 45°C	70%	12'000	
• Normally max 0.6C discharge	80%	10'000	

VOLTAGE & CAPACITY	
Nominal voltage	51.2 V
Nominal capacity @ 25°C	314 Ah
Nominal energy @ 25°C	16077 Wh

GENERAL	
Weight:	111 kg
Dimensions	810 x 425 x 250 mm
Max modules per string controller	15 modules
Max strings in parallel per master pack controller	16 strings
Battery firmware / software updates	by EPT only
Repairable	Yes

OPERATING CONDITIONS	
Operating temperature	Discharge -10 to 50°C / Charge 0 to 50°C
Storage temperature	Extreme -30 to 60°C / Ideal 0 to 30°C
Optional water cooling	Glycool 50%/50% 1 l/min
Humidity (non-condensing)	95%
Protection class	IP 55
Mounting options	Must stand upright, self-racking

DISCHARGE*	
Voltage Min	44.8V (2.8V cell)
Voltage Min recommended	49.6V (3.1V cell)
Voltage cell Min "disconnection"	2.5V cell
Recommended discharge current	190A (0.6C) / 250A (0.8C) W**
Max continuous discharge current (C-rate)	250A (0.8C) / 314A (1.0C) W**
Max pulse discharge current 15 min (C-rate)	390A (1.25C)
Max pulse discharge current 30s / 0.01s / 0.001s	450A / 550A / 750A

CHARGE	
Voltage Max	56.00V (3.50V cell)
Voltage recommended	54.50V (3.40V cell)
Voltage cell Max "disconnection"	58.40V (3.65V cell)
Float voltage	53.45V (3.34V cell)
Recommended charge current (C-rate)	100A (0.33C) / 160A (0.5C) W**
Max continuous charge current (C-rate)	125A (0.4C) / 220A (0.7C) W**
Max pulse charge current 15min	250A (0.8C)
Max pulse charge current 30s	314A

\* All data with star at 25°C and 0.5C/0.5C on the Voltage recommendations

\*\* For batteries with 50%/50% water / glycol cooling option, needs 1.5 l/m flow, max cooling fluid temp 20°C