

START STRONG™



“No more jump-starts, late loads or Monday morning scramble. For me it all starts with Maxwell.”

RELIABLE STARTS. ANYTIME. ANYWHERE. As Fleet Manager, it's on you to manage costs and ensure safe, timely deliveries. That's why we want to make sure you're up to speed on a revolutionary new technology, the ultracapacitor-based Engine Start Module (ESM) from Maxwell Technologies.

RUGGED, LIGHTWEIGHT AND LOW MAINTENANCE, the ESM provides consistent, reliable cranking performance for hundreds of thousands of starts. The ESM works in tandem with batteries, extending useable life by providing reliable burst power at ignition. Anytime. Anywhere.

ESM BENEFITS*

- ❖ One ESM performs all engine cranking
- ❖ Reliable starts from -40°F to 140°F (-40°C to 60°C)
- ❖ Reduces or eliminates costly jump starts
- ❖ Shock & vibration resistant
- ❖ Built-in overcharge protection
- ❖ Easily cranks diesel engines to 16L
- ❖ Long life - limited 4 years warranty
- ❖ Assembled in the USA

ESM FUNDAMENTALS

- ❖ Provides 1800 CCA (3 second crank)
- ❖ Industry standard BCI Group 31 form factor
- ❖ Quick installation - replaces one Group 31 battery**
- ❖ Recharges fully in less than 15 minutes (initial charge is 30 minutes or less)

*Lead acid batteries still power ECM/ECU. Results may vary. Additional terms and conditions, including the limited warranty, apply at the time of purchase. See the warranty details and enclosed information for applicable operating and use requirements.

**See user manual for full installation details.

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ENGINE START MODULE OVERVIEW



PLASTIC LID

Thermal Weld (Heat Plate) to Case



ELECTRONICS ASSEMBLY

With DC-DC Converter and Controller electronics



LASER-WELDED CELL PACK

(12 each 3000-Farad Maxwell Ultracapacitor Cells) with Plastic Spacers and Terminals



POLYPROPYLENE PLASTIC CASE

ESM INSTALLATION IN 3 AND 4 BATTERY BANKS.



ADDITIONAL REASONS TO INSTALL AN ESM

- ❖ Reliable cranks with weakened batteries - regardless of temperature
- ❖ Improve delivery times and schedules due to reduction/elimination of jump-starts
- ❖ No lead. No acid.
- ❖ Light weight - only 21 lbs.
- ❖ Low total cost of ownership
- ❖ Potential idle reduction

SEE PRODUCT AND INSTALLATION VIDEOS AT:

<http://www.maxwell.com/esm>

CONTACT:

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