



# M<sup>3</sup>-44-8

## P/N 32845-001



### TECHNICAL DESCRIPTION

The model M<sup>3</sup>-44-8 (P/N 32845-001) is a 19-cell Micro-Maintenance battery, with a nominal voltage of 24V, and a nominal capacity of 44Ah, at a weight of only 81 lbs. (max). The M<sup>3</sup>-44-8 will provide an Imp (15-second discharge @ maximum power transfer) of 1335 amps at room temperature.

### STANDARD WARRANTY: 2 years

### APPLICATION

The M<sup>3</sup>-44-8 is designed as a low-maintenance replacement for our 44Ah BTSP-4445L batteries, offering both a higher capacity and lower maintenance costs.

The M<sup>3</sup>-44-8 is currently on the Embraer 145 Fleet AIPC (Aircraft Illustrated Parts Catalogue) which includes EMB-135, EMB-140 and EMB-145.

### MAINTENANCE COST SAVINGS

Current EMB-145 operators are at extended battery maintenance intervals of 2,000 Flight Hours.

### PHYSICAL SPECIFICATIONS

Length: 15.66" max  
Width: 6.5" max  
Height: 10.125" max  
Weight: 81 lbs. (80 lbs. typical)  
Connector: MS3509

### ELECTRICAL SPECIFICATIONS

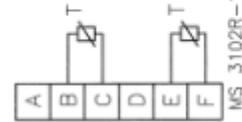
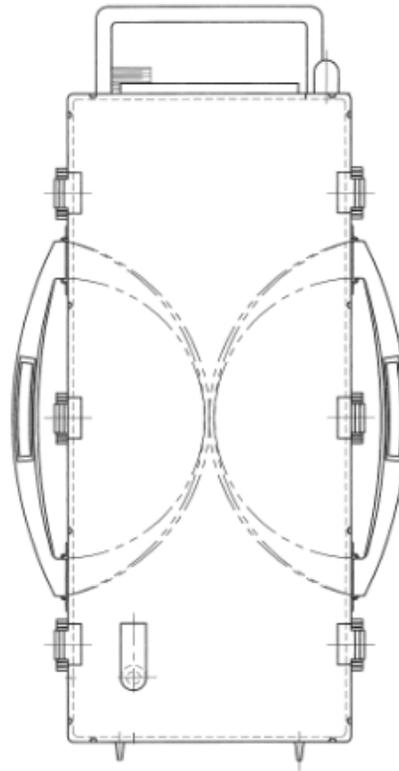
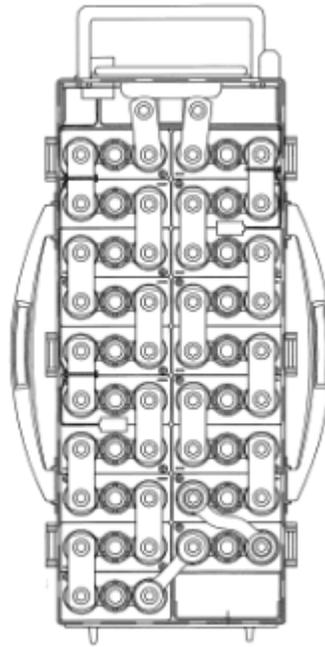
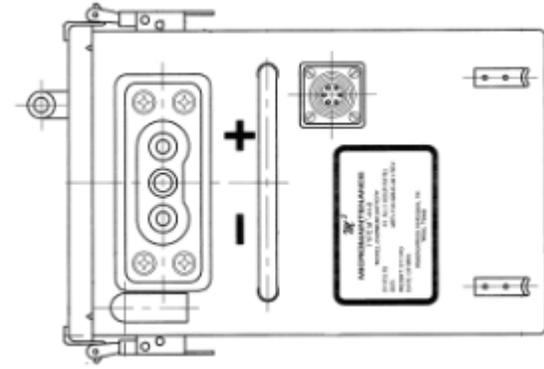
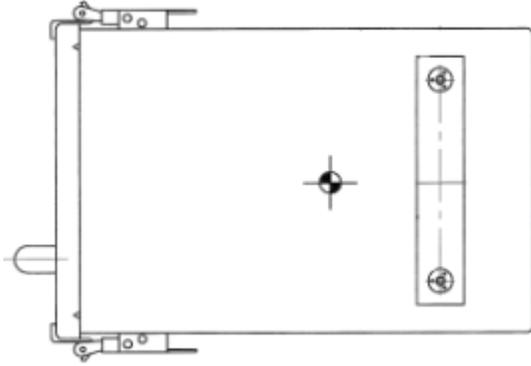
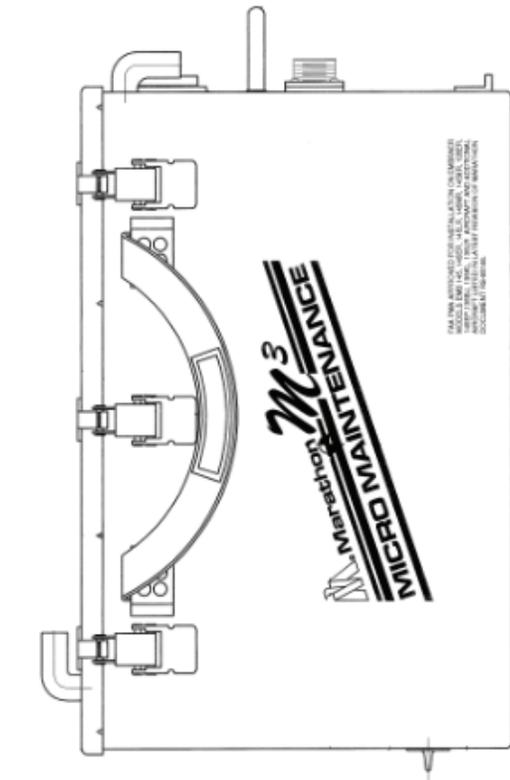
Voltage: 24.0 volts (nominal)  
Capacity: 44Ah minimum (at C-rate)  
Imp : 1335A @ 15 seconds  
*(Discharge current at maximum power transfer)*

The Marathon Micro-Maintenance M<sup>3</sup> battery is a greatly improved nickel-cadmium (Ni-Cd) battery that features:

- Significantly Increased Maintenance Intervals
- Very Low Water Consumption
- Excellent Capacity Retention During Extended Cycling
- Same Physical Size As Standard Ni-Cd
- Same Weight As Standard Ni-Cd
- Better Capacity Than Standard Ni-Cd
- Same Or Better Power Than The Standard Ni-Cd

The battery incorporates a state-of-the-art negative pasted electrode that provides high volumetric and gravimetric energy density. This, along with the standard sintered positive electrode, provides a high capacity battery with excellent power. Other characteristics of the battery include our standard, internally threaded butt terminals, long life separators, nylon cell cases and covers. The design of the battery increases the electrolyte reserve to more than two times the standard Ni-Cd battery.

The M<sup>3</sup> battery was designed to increase the battery maintenance interval. This design has reduced electrolyte consumption, coupled with an increased electrolyte reserve, results in a increased maintenance interval of two to six times.



MS 3102R-145-6P

TEMPERATURE SENSOR  
 SCHEMATIC



8301 Imperial Drive  
 Waco, TX, 76712  
 (254) 776-0650 FAX (254) 776-6558  
[www.mnaerospace.com](http://www.mnaerospace.com)