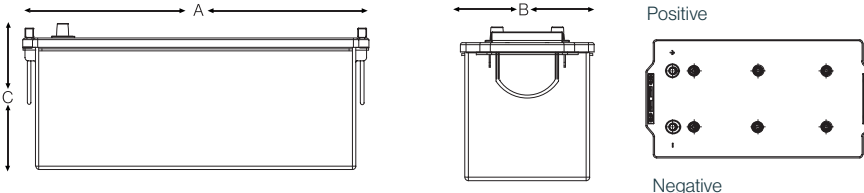


EQM-Type C

Carbon Nano Gel Battery



Benefits:

- Cost savings due to increased efficiency in charging
- Reduced Temperature gives longer life
- Long life, high reliability
- Reduces drying out – extends life
- Sulphation reduction, less need to top charge
- Can be installed in tight spaces
- Almost Totally Green – recycled – scrap value
- Reduced premature failure, extended life
- Suitable for extreme temperature variants

Electrical Specifications

Voltage	12V
M.R.C. 25 Amps	430
80% DOD Voltage Cutoff	11.2V
Low Voltage Cutoff	10.8V
Self Discharge	Less than 3% per month (20°C/68°F)
Charge Temperature	Min: -10°C (14°F) / Max: 50°C (122°F)
Discharge Temperature**	Min: -40°C (-40°F) / Max: 50°C (122°F)
Storage	Min: -20°C (-4°F) / Max: 60°C (140°F)

Cell Type Ue (100%) / VPC Ref Temp	C5 1.70 25°C	C10 1.75 25°C	C20 1.75 25°C	C100 1.80 25°C
EQM-TYPE C	177	200	212	230

** CAUTION: Depths of discharge, operating voltages and currents, when designing systems for use at maximum temperatures, will vary.

Mechanical Specifications

Industry Reference	DIN C / BCI 8D (Reverse Polarity)	
Length (A)	20.4 in	518 mm
Width (B)	10.8 in	274 mm
Height (C)	8 in	215 mm
Weight	150 lbs	68 kgs
0°C MCA (EN)	1200	
Terminal (Opt'l)*	DUAL	
Cell(s)	6	
Electrolyte	Gel	
Terminal Torque Nm	n/a	

NOTE: There is a tolerance of +/-2%.

ET/DATAQUASAR MARINE EQM TYPE C V1 0224

Features:

Carbon Nano Tube - Ultra energy efficiency due to low resistance

Solid Silica Gel Electrolyte (25% more Electrolyte)

Up to 2 x Faster charging – allows for opportunity charging

PSOC operation – between 40% - 90% SOC

High Specification Materials

Maintenance Free – no topping up required

98% Manufactured Material is recycled

Robust Construction – Vibration resistant

Cycle Life - up to 1500 cycles (EQM) & up to 2000 cycles (LFT)

Design life 12-15 years

High Starting Power

Applications:

Ocean & offshore:

River

Inland waterways

Electric Propulsion

RV

Motorhome & Caravan

All off grid applications:

Utility vehicle

Vehicle conversions

Ambulances & blue light

Solar & renewable energy storage systems

CCTV

Lighting

Traffic Management

Mobility

Compliant with EN60254-1&2 and IEC254-1/2

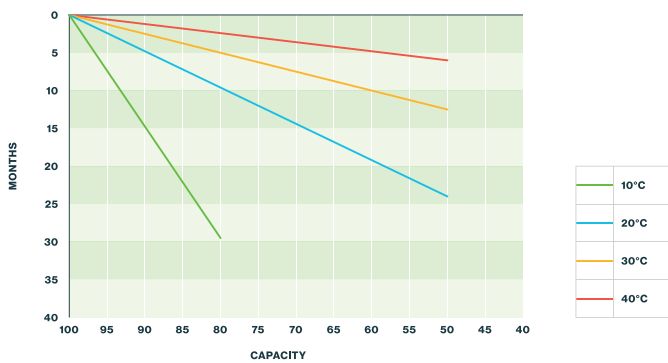
Charging profile

IU Charging I = min. 12% C₅ max. 30% C₅
U = 2.4 V per cell

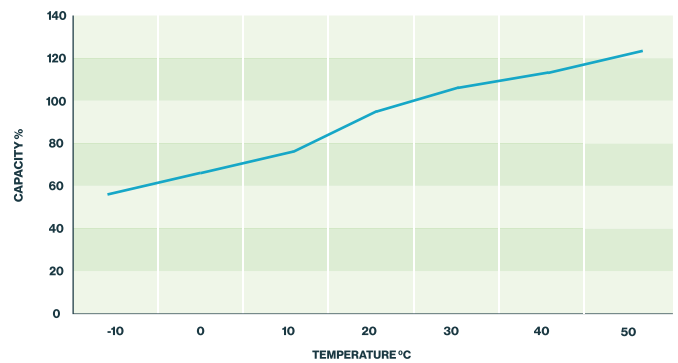
IUI Charging I₁ = min. 12% C₅ max. 40% C₅
U = 2.35 V per cell
I₂ = 1.5% C₅ for max. 4 hours

Select either AGM or GEL setting (GEL setting does increase lifespan)

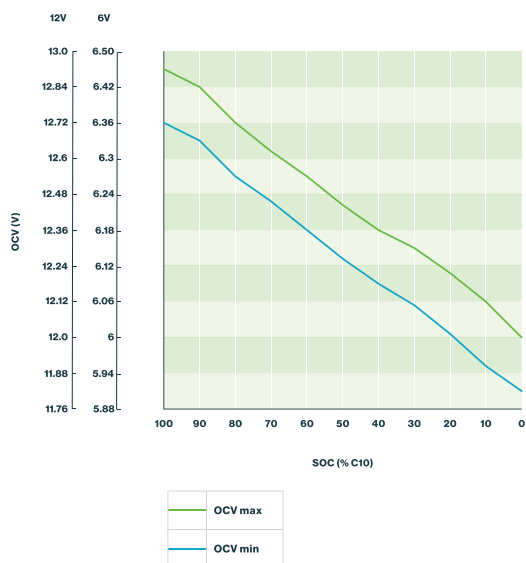
Self discharge at different temperatures



Capacity vs. temperature



Storage: Determine the state of charge



Relation between charging, voltage and temperature

