

Data Sheet

Model No.: GP50NH

`Type : Rechargeable Nickel Metal Hydride

Cylindrical Cell

Nominal Dimension : Φ = 11.65 mm (with Sleeve) H = 29.4 mm

Applications : Recommended discharge current

50 to 1500mA

Nominal Voltage : 1.2V

Capacity : Minimum: 500mAh

Typical: 520mAh

when discharged at 0.2C to 1.0V at 20°C

Charging Condition : 50mA for 16 hrs at 20°C

Fast Charge : 250mA to 500mA (0.5 to 1C)

charge termination control recommended

control parameters: $-\Delta V$: 0 - 5mV

DT/dt **: 0.8°C/min (0.5 to 0.9C)

: 0.8 - 1°C/min (1C)

TCO ** : 45 - 50°C

Timer **: 105% nominal input

** For reference only

Service Life : >500 cycles (IEC standard)

Continuous : 50 mA maximum current for 1 year

Overcharge No conspicuous deformation

And/or leakage

Weight : 9.8 g

Internal Resistance : Average 80 m Ω upon fully charged

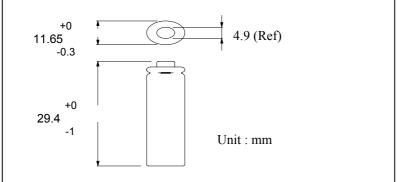
(Range 75 – 86 m Ω) at 1000HZ

Max. Charging Voltage: 1.5V at 50 mA charging

Ambient Temperature : Standard Charging : 0 to 45°C Range Fast Charging : 10 to 45°C

Fast Charging : 10 to 45°C Discharging : -20 to 50°C

Discharging : -20 to 50°C Storage : -20 to 35°C

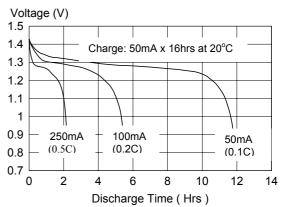


Fast Charge (charge control required)

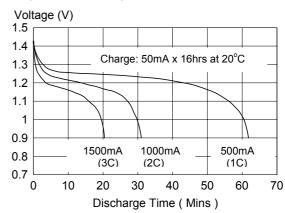
Voltage (V) 1.6 500mA 1.5 (1C)1.4 250mA 1.3 (0.5C)1.2 1.1 100 120 20 40 60 80 140

Capacity Input (%)

Low rate discharge



High Rate Discharge



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