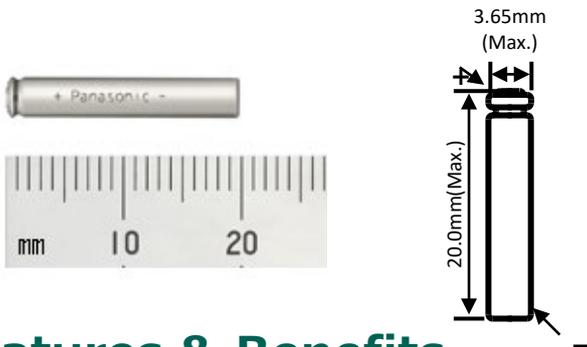


# CG-320B

## Pin-type Lithium-ion Battery



## Features & Benefits

- A 3.6mm diameter pin-shaped Lithium-ion battery which expands design options for micro devices.
- A rechargeable battery that can be used repeatedly and has the output capability required for Near Field Communications.
- A high-strength metal exterior case provides excellent reliability.

## Applications

Hearing aids, small medical devices, wireless earphones, stylus pens, smart glasses, wristband devices and others.

## Specifications

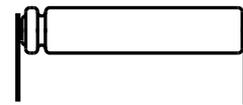
Maximum charging voltage		4.35V
Nominal Voltage		3.8V
Typical Capacity		16.0mAh
Rated Capacity		15.0mAh
Dimensions*	Diameter(Max.)	3.65mm
	Height(Max.)	20.0mm
Weight*		Approx. 0.5g
Operating Temperature	Charge	0°C to +60°C
	Discharge	-20°C to +60°C
Maximum continuous discharging current		30.0mA(2C)
Maximum charging current		11.2mA(0.75C)
Certifications		IEC62133, UL1642

\* Without tabs.

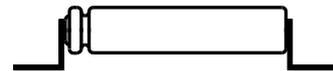
## Terminal types

Panasonic offers batteries with tabs. All models have stainless steel tab with tin (Sn) plating.

Through-hole type

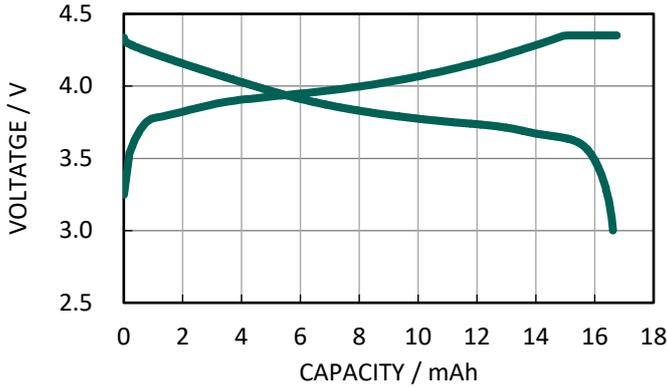


Surface mount type



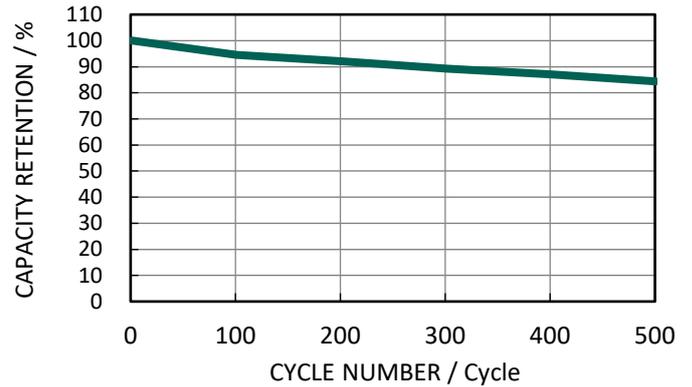
## Characteristics

### Charge and Discharge Characteristics



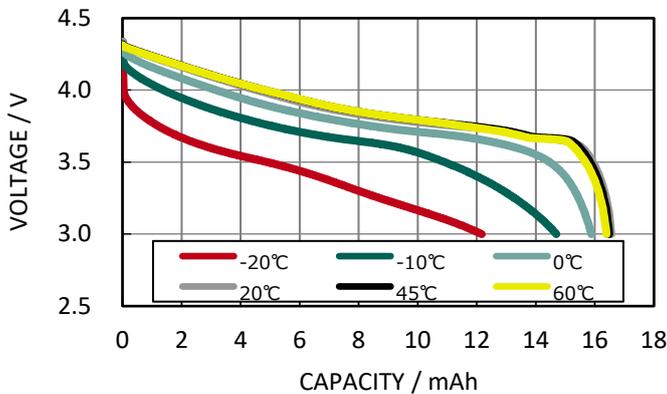
Charge Condition: CC/CV 11.2mA(0.75C) - 4.35V, 0.8mA(0.05C) cut off at 20°C  
 Discharge Condition: CC, 3.0mA(0.2C) - 3.0V cut off at 20°C

### Cycle Life Characteristics



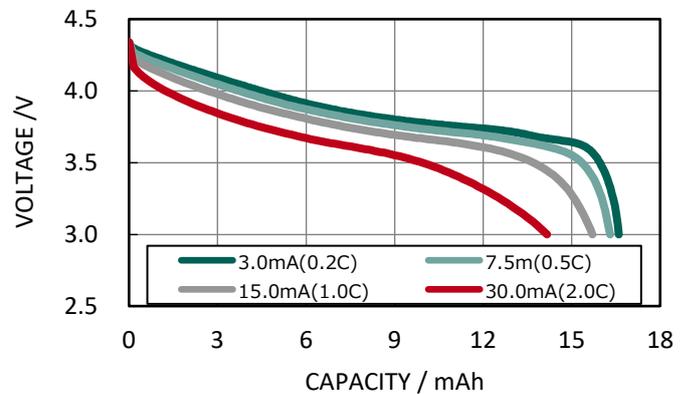
Charge Condition: CC/CV 11.2mAh(0.75C) - 4.35V, 0.8mA(0.05C) cut off at 20°C  
 Discharge Condition: CC, 11.2mAh(0.75C) - 3.0V cut off at 20°C

### Discharge Characteristics by Temperature



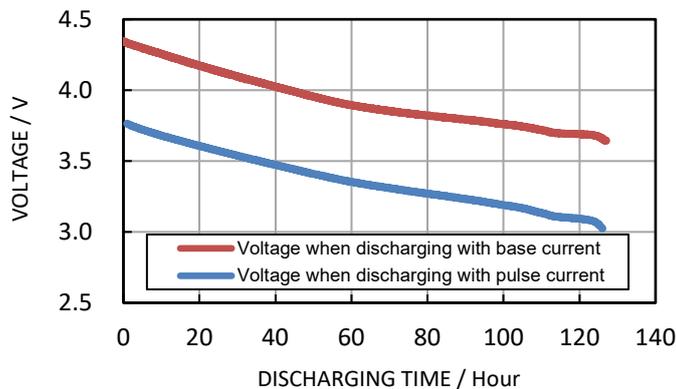
Charge Condition: CC/CV 11.2mA(0.75C) - 4.35V, 0.8mA(0.05C) cut off, 20°C  
 Discharge Condition: CC, 3.0mA(0.2C) - 3.0V cut off

### Discharge Characteristics by Rate of Discharge

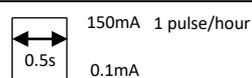


Charge Condition: CC/CV 11.2mA(0.75C) - 4.35V, 0.8mA(0.05C) cut off at 20°C  
 Discharge condition: CC 3.0V cut off at 20°C

### Pulse Discharging Characteristics



Charge Condition : CC/CV 11.2mA(0.75C) - 4.35V, 0.3mA(0.02C) cut-off at 20°C  
 Discharge Condition : Pulse current 150mA(10C) for 0.5s in every hour, Base current 0.1mA, 3.0V cut-off at 20°C



## Handling Guidelines

- Standard Voltage Range is 3.0 - 4.35V. Protection required for over-charge/over-discharge.
- In order to prevent accidental ingestion of the battery, it must be inaccessible to the individual user / customer. The battery will be shipped with tabs. Please attach the battery to the device.

Standard Voltage Range	3.0~4.35V
Do not over-charge	Stop charging at 4.45±0.05V
	Allow charging again at less than 4.25±0.05V
Do not over-discharge	Stop discharge at 2.7±0.1V
	Allow discharging again at more than 3.3±0.1V
Over Current Protection	Stop discharge in the case of an output connection short circuit.

