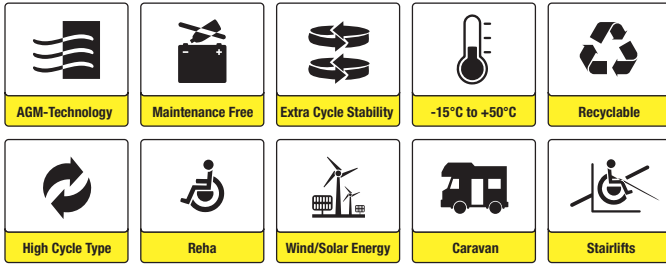




⊕⊖ **sunbattery**®

HC12-22 M5 (12V22Ah)



Applications

- Electric tools
- Vehicle in place of walking
- Lawn mowers
- Golf trolleys
- Portable apparatus, lights and instruments
- Electric toys
- Portable power
- Wheelchairs
- Medical equipments
- Wind/Solar energy
- Electric boats
- Caravan



Certificates



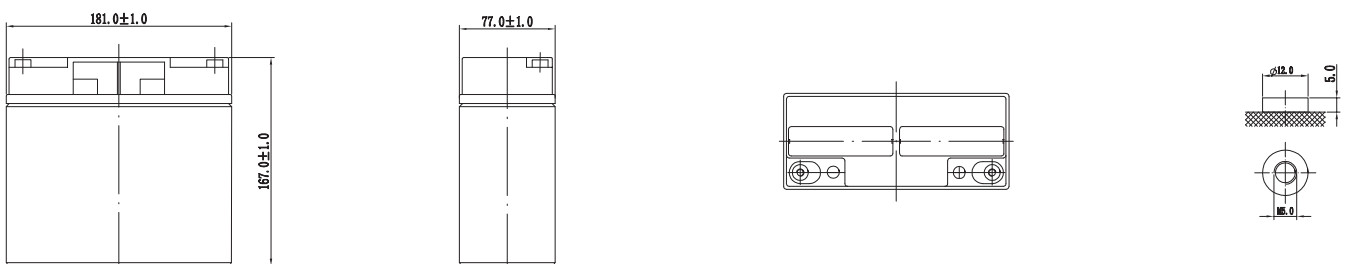
Specifications

Nominal Voltage	12V	Nominal Oper. Temp. R.	25±3°C
Nominal Capacity	22Ah (C ₂₀ , 1.75V/cell)	Cycle Use	Initial Charging Current less than 3.6A. Voltage 14.4V~14.7V at 25°C. Temperature Coefficient -30mV/°C.
Approx. Weight	5.9kg	Standby Use	Initial Charging Current less than 3.6A. Voltage 13.5V~13.8V at 25°C Temp. Coefficient -20mV/°C
Terminal	M5	Capacity affected by Temp.	40°C 103% 25°C 100% 0°C 86%
Container Material	ABS UL94 HB (Optional: V0)	Self Discharge	HC batteries may be stored for up to 6 months at 25°C and then a freshening charge is required. For higher temperatures the time interval will be shorter.
Rated Capacity (25°C)	22.00Ah/1.10A, 20hr, 1.75V/cell 21.00Ah/2.10A, 10hr, 1.75V/cell 18.70Ah/3.74A, 5hr, 1.75V/cell 16.83Ah, 5.61A, 3hr, 1.60V/cell 13.2Ah/13.2A, 1hr, 1.60V/cell	Cycle Life	Approx. 450 cycles at 50% DOD
Max. Discharge Current	225A (5s)		
Internal Resistance	Approx. 15mΩ		
Operating Temp. Range	Discharge: -15~50°C Charge: 0~40°C Storage: -15~40°C		

Dimensions

■ M5 Terminal

Unit: mm [inches]





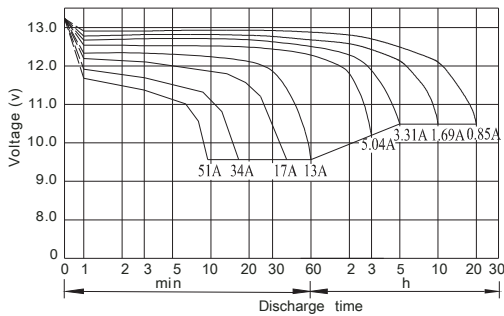
Constant Current Discharge (Amperes) at 25°C

End Point	5min	10min	15min	30min	1h	3h	5h	10h	20h
1.60V/cell	105	65.6	46.5	24.5	13.2	5.61	3.81	2.25	1.17
1.65V/cell	102	64.4	45.9	24.2	13.1	5.57	3.80	2.24	1.15
1.70V/cell	96.5	62.8	45.2	23.7	13.0	5.54	3.76	2.20	1.14
1.75V/cell	89.4	60.3	43.8	23.0	12.9	5.49	3.74	2.10	1.10
1.80V/cell	82.7	57.0	41.9	21.7	12.6	5.45	3.73	2.18	1.09

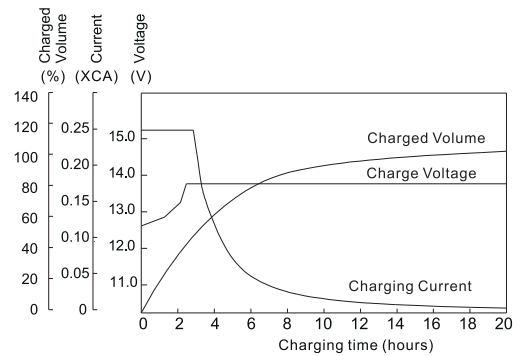
Constant Power Discharge (Watts/cell) at 25°C

End Point	5min	10min	15min	30min	1h	3h	5h	10h	20h
1.60V/cell	194.50	125.00	91.17	48.83	26.50	11.27	7.72	4.52	2.37
1.65V/cell	192.33	120.67	90.00	48.17	26.33	11.20	7.65	4.50	2.37
1.70V/cell	188.00	120.83	88.33	47.17	26.17	11.08	7.58	4.67	2.33
1.75V/cell	181.17	116.33	85.51	45.5	26.01	10.90	7.53	4.43	2.27
1.80V/cell	169.67	109.00	80.33	43.00	25.67	10.75	7.45	4.40	2.23

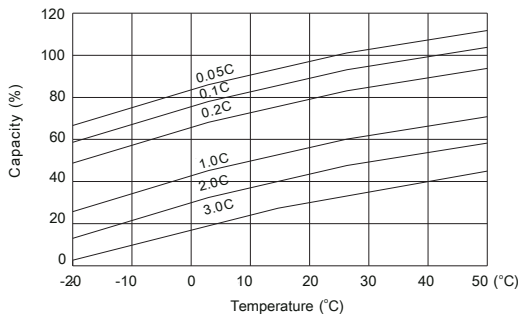
Discharge Characteristics



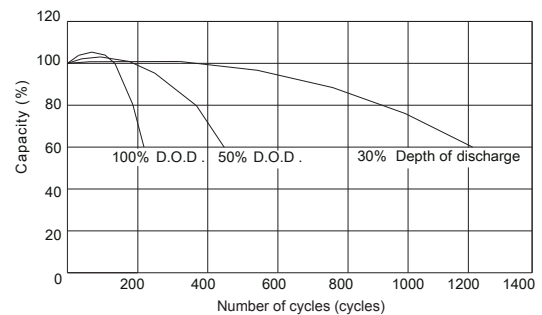
Float Charging Characteristics



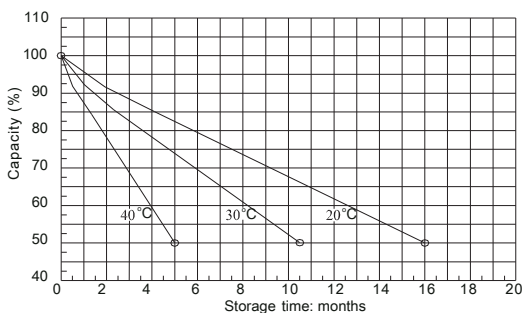
Temperature Effects in Relation to Battery Capacity



Cycle Service Life in Relation to Depth of Discharge



Self Discharge Characteristics



Temperature Effects on Float Life

