

Overview

The new VISION HP/HF series batteries are specially designed for applications where need high power output. By optimum design of battery grids and plate paste formula, the HP/HF series can deliver up to 40% more power than VISION standard CP/FM series.



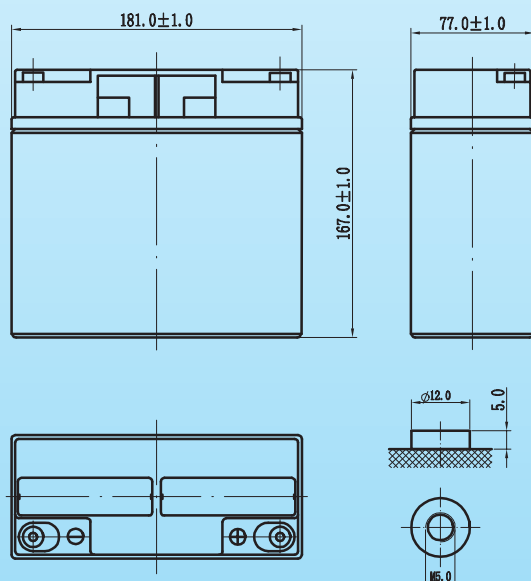
General Features

- Positive and negative plates in lead-calcium tin alloy;
- Superior energy density;
- Operates at a low internal pressure;
- Gas Recombination;
- Usable in any orientation;
- A recognized component of UL;
- Very high power output;
- Application specific designs;
- A couple Range from 13W to 890W per cell for 10'@1.60V/pc;
- Six months shelf life at 20°C;
- Design life 5 years.

Dimensions and Weight

Length(mm / inch)	181 / 7.13
Width(mm / inch)	77 / 3.03
Height(mm / inch)	167/ 6.57
Total Height(mm / inch)	167/ 6.57
Approx. Weight(Kg / lbs)	6.20/ 13.7

* Weight deviation: ± 3%



Battery Specification

Performance Characteristics	
Nominal Voltage	12V
Number of cell	6
Design Life	5 years
Nominal Capacity 77°F(25°C)	
10 min wattage @1.6V	116W/cell
Nominal Capacity 77°F(25°C)	
20 hour rate (1.00A, 10.5V)	20Ah
Internal Resistance	
Fully Charged battery 77°F(25°C)	≤9.0 mOhms
Self-Discharge	
3% of capacity declined per month at 20°C(average)	
Operating Temperature Range	
Discharge	-20~60°C
Charge	-10~60°C
Storage	-20~60°C
Max. Discharge Current 77°F(25°C)	280A(5s)
Short Circuit Current	1700A
Charge Methods: Constant Voltage Charge 77°F(25°C)	
Cycle use	2.40~2.45V/PC
Maximum charging current	7.0A
Temperature compensation	-30mV/°C
Standby use	2.23~2.30V/PC
Temperature compensation	-20mV/°C

Discharge Constant Current (Amperes at 77°F25°C)

End Point						
Volts/Cell	5min	10min	15min	30min	45min	60min
1.60V	98.6	68.3	53.3	30.7	22.5	17.4
1.65V	92.8	64.6	50.5	29.2	21.4	16.6
1.70V	86.9	60.9	47.8	27.6	20.3	15.8
1.75V	81.0	57.2	45.0	26.0	19.2	15.0
1.80V	77.6	55.1	43.4	25.3	18.7	14.6

Discharge Constant Power (Watts at 77°F25°C)

End Point						
Volts/Cell	5min	10min	15min	30min	45min	60min
1.60V	167	116	90.8	53.2	38.6	30.8
1.65V	160	112	87.6	51.5	37.4	30.0
1.70V	153	107	84.4	49.8	36.2	29.1
1.75V	146	103	81.3	48.0	35.1	28.3
1.80V	139	98.6	78.1	46.3	33.9	27.4

(Note)The above characteristics data are average values obtained within three charge/discharge cycles not the minimum values. All data shall be changed without notice, Vision reserves the right to explain and update the information contained hereinto.



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HP12-116W-X

12V 20Ah

