

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.

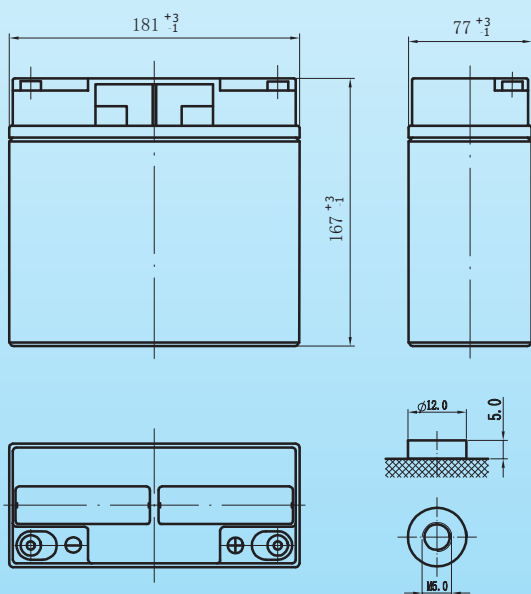
General Features

- 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 22W to 90W per cell for 15'@1.67Vpc;
- Six months shelf life at 20°C;
- Design life 5 years.
- Not recommended loading above 1h.

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)	6.80/ 15.0

* Weight deviation: $\pm 5\%$



Battery Specification

Performance Characteristics	
Nominal Voltage	12V
Number of cell	6
Design Life	5 years
Nominal Capacity 77°F(25°C)	
15 min wattage @1.67VPC	90W/cell
10hour rate (1.90A, 10.5V)	19Ah
20hour rate (1.00A, 10.8V)	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	2.40~2.45VPC
Maximum charging current	7.0A
Temperature compensation	-30mV/°C
Standby use	2.23~2.30VPC
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.



VISION GROUP
Shenzhen Center Power
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HPS12-90W-X

12V 90W

