

PS RANGE (10yr Design Life in Float Service at 20°C)

Dimensions (mm)

Standard Terminal (mm)

T6 Threaded Insert 6mm Stud

Torque 3.9 ~5.4 Nm

Physical Specification

Nominal Voltage	12V	
Nominal Capacity (20HR)	45.0 AH	
Dimension	Length	197 ± 2 mm
	Width	165 ± 2 mm
	Container Height	156 ± 2 mm
	Total Height (with terminal)	170 ± 2 mm
Weight	Approx 14.5kg	
Standard Terminal	T6	
Case and Cover Material	ABS (UL94-HB)	

PS-12450 12V 45AH

Operating Temperature Range

Storage (In fully charged condition)	- 20°C to + 60°C
Charge	- 15°C to + 50°C
Discharge	- 20°C to + 60°C

Discharge Characteristics (25°C, 77°F)

Rated Capacity	20h Rate (1.80V/cell)				10h Rate (1.80V/cell)				5h Rate (1.75V/cell)				3h Rate (1.75V/cell)				1h Rate (1.60V/cell)			
	45.0AH	42.0AH	36.6AH	32.7AH	26.0AH	45.0AH	42.0AH	36.6AH	32.7AH	26.0AH	45.0AH	42.0AH	36.6AH	32.7AH	26.0AH	45.0AH	42.0AH	36.6AH	32.7AH	26.0AH
Capacity Affected by Temperature	40°C (104°F)	103%	Constant Voltage Charge	Cycle	Initial Charging Current Less than 11.25A Voltage 14.4V ~ 15.0V at 25°C (77°F)	25°C (77°F)	100%	Standby	Recommended Charge Current less than 12.02A Voltage 13.5V ~ 13.8V at 25°C (77°F)	0°C (32°F)	86%									

Internal Resistance mΩ

Approx 9.0 mΩ

Constant Current Discharge (Amperes) at 25°C (77°F)

F.V/Time	10min	15min	20min	30min	45min	1h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	49.1	41.3	36.7	30.4	23.5	20.1	13.0	9.77	8.01	6.74	5.90	4.73	4.07	2.17
1.80V/cell	56.2	46.4	40.5	33.0	25.3	21.2	14.0	10.5	8.51	7.14	6.25	4.98	4.20	2.25
1.75V/cell	63.9	52.3	44.8	35.9	27.6	23.1	14.5	10.9	8.80	7.31	6.45	5.15	4.31	2.30
1.70V/cell	72.1	58.0	49.5	39.2	29.7	24.4	15.3	11.5	9.20	7.73	6.76	5.37	4.48	2.36
1.65V/cell	77.5	62.1	52.6	41.4	31.5	25.3	15.9	12.0	9.56	7.97	6.99	5.55	4.60	2.44
1.60V/cell	85.2	68.1	57.1	44.1	32.7	26.0	16.3	12.3	9.77	8.17	7.14	5.64	4.70	2.48

Constant Power Discharge (Watts/cell) at 25°C (77°F)

F.V/Time	10min	15min	20min	30min	45min	1h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	91.8	77.9	69.8	58.6	45.6	39.1	25.5	19.2	15.8	13.3	11.7	9.44	8.14	4.34
1.80V/cell	103.8	86.4	76.1	62.6	48.8	41.1	27.2	20.6	16.7	14.1	12.4	9.91	8.38	4.49
1.75V/cell	116.0	96.2	83.3	67.5	52.7	44.6	28.2	21.3	17.2	14.4	12.7	10.2	8.60	4.60
1.70V/cell	128.1	105.2	91.3	73.3	56.6	47.0	29.7	22.4	18.0	15.2	13.3	10.6	8.92	4.71
1.65V/cell	136.3	111.8	96.4	76.7	59.3	48.3	30.6	23.2	18.6	15.6	13.7	11.0	9.16	4.85
1.60V/cell	146.5	120.4	103.6	81.3	61.3	49.5	31.2	23.7	19.0	15.9	14.0	11.1	9.33	4.92