



### HR Series

HR(High-Rate) Series of valve regulated lead acid (VRLA) batteries have been developed with high efficiency active materials to stimulate inside the battery with higher power output when the battery is discharged to a extent level of discharging. Along with high-density structure design for relatively smaller Inner resistance which will significantly improve the performance for high rate discharging when high power output service is needed.

### Application

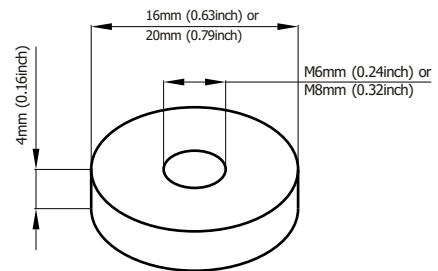
- Alarm System
- Cable Television
- Communication Equipment
- Control Equipment
- Security System
- Medical Equipment
- Toys
- UPS
- Emergency Power System

### General Features

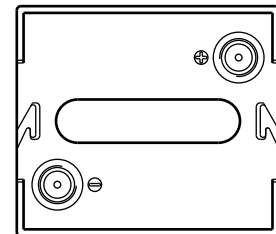
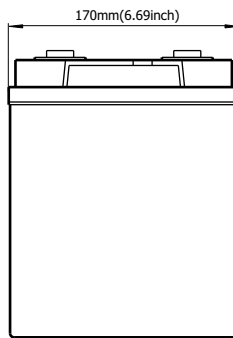
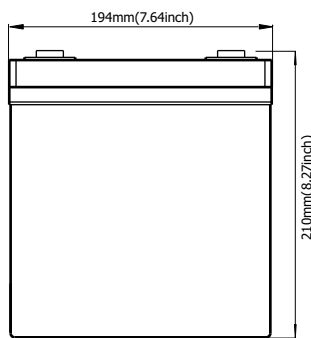
- Sealed and maintenance free operation.
- Non-Spillable construction design.
- ABS containers and covers(UL94HB, UL94V-0) optional.
- Safety valve installation for explosion proof.
- High quality and high reliability.
- Exceptional deep discharge recovery performance.
- Low self discharge characteristic.
- Flexibility design for multiple install positions.

### Construction

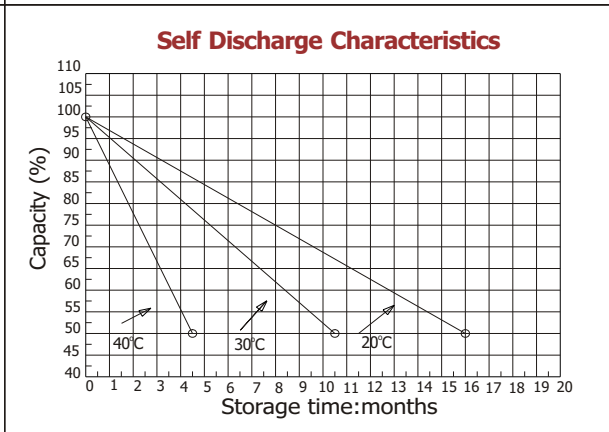
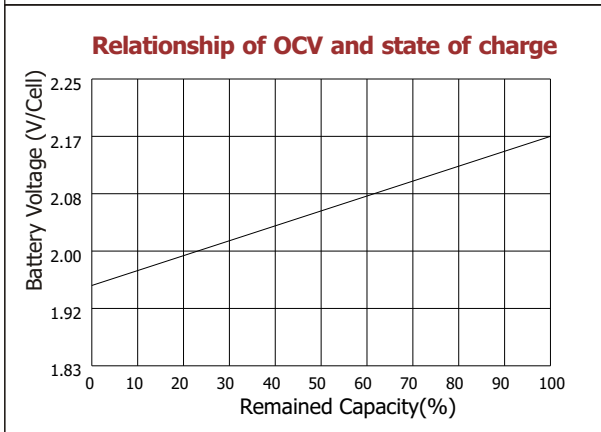
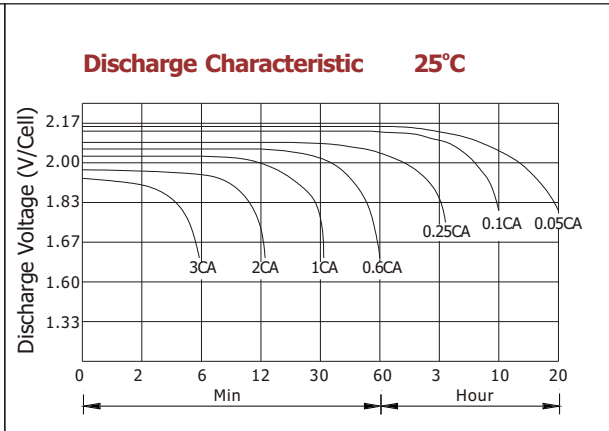
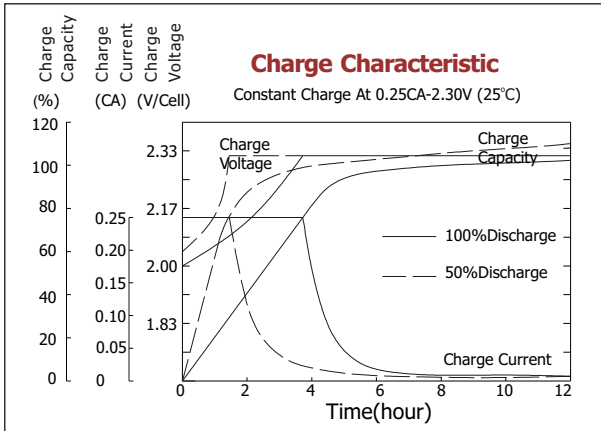
- Component .....Raw material
- Positive .....Lead dioxide
- Negative .....Lead
- Container .....ABS
- Cover .....ABS
- Sealant .....Epoxy Resin
- Safety valve ....EPDR
- Terminal .....Copper
- Separator .....Fibre glass
- Electrolyte .....Sulfuric acid



Terminal Dimensions



Battery Model	HR6-370 (370W to 1.67V, 15min)			
Designed Floating Life	5 Years			
Capacity(25°C)	20HR(5.85A,1.75V)	10HR(11.3A,1.75V)	5HR(19.8A,1.75V)	1HR(71.5A,1.75V)
	117AH	113AH	99AH	71.5AH
Dimensions	Length	Width	Height	Total Height
	194mm(7.64inch)	170mm(6.69inch)	207mm(8.07inch)	210mm(8.27inch)
Approx. Weight	16Kg (35.28 lbs)			
Internal Resistance	Full charged at 25°C: 0.01 Ohm			
Self Discharge	3% of capacity declined per month at (25°C)			
Capacity Affected by Temp.(20HR)	40°C	25°C	0°C	-15°C
	102%	100%	85%	65%
Charge Voltage(25°C)	Cycle use		Float use	
	7.2-7.5V(-15mV/ °C), max. Current: 27.5A		6.8-6.9V(-10mV/ °C)	



**Constant current discharge ratings-amperes at 25°C**

F.V/Time	5MIN	10MIN	15MIN	30MIN	1HR	3HR	5HR	10HR	20HR
1.60V	437.3	272.1	205.2	125.1	82.44	36.19	22.12	12.04	6.51
1.67V	410.4	258.1	197.4	119.7	81.35	34.80	21.65	11.93	6.28
1.70V	376.1	248.7	192.8	108.8	78.88	32.48	21.19	11.88	6.18
1.75V	368.6	241.0	186.6	103.4	75.17	31.40	20.73	11.84	6.02
1.80V	329.8	230.1	169.5	95.8	70.37	30.16	19.49	11.60	5.86
1.85V	291.0	219.2	152.4	88.1	65.58	29.08	18.25	11.44	5.70

**Constant power discharge ratings-watts at 25°C**

F.V/Time	5MIN	10MIN	15MIN	30MIN	1HR	3HR	5HR	10HR	20HR
1.60V	767.1	491.3	374.7	225.4	148.8	64.19	37.38	24.75	12.99
1.67V	740.2	478.8	370.0	220.8	147.9	62.18	37.22	24.59	12.53
1.70V	697.0	474.2	366.9	206.8	145.1	59.39	36.73	24.44	12.37
1.75V	701.4	472.6	363.8	200.5	142.6	58.00	36.41	24.13	12.06
1.80V	641.7	465.6	337.4	191.2	134.4	56.30	35.28	23.82	11.75
1.85V	582.1	441.8	305.9	179.1	126.4	54.60	34.16	23.06	11.39

