

stored energy solutions for a demanding world

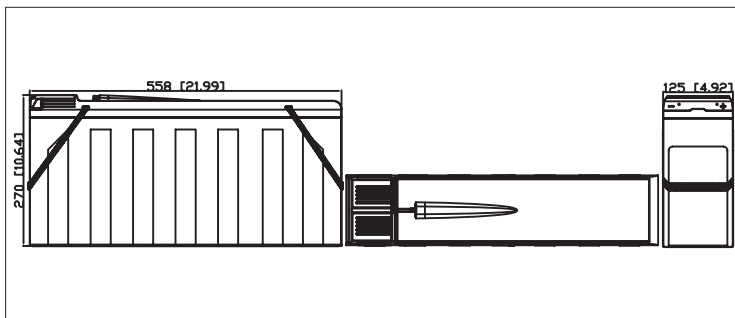
NARADA

Model: **AG12V155F**

AcmeG Series

The AcmeG range front access valve regulated lead acid batteries is designed based on the Acme series. Using the polymer gel electrolyte with real front access structure. The state of the art internal and external design ensures AcmeG the high reliability and makes the installations quite simple and safe when placed on a standard relay rack tray or in a closed cabinet. The design float life is 12 years at 20°C (68°F).

Dimensions—mm[inch]



Specifications

Battery Model	AG12V155F
Nominal Voltage	12V
Rated Capacity	155Ah (10 hour rate) to 1.80V/cell @25°C(77°F)
Typical Weight	54kg
Internal Resistance	Approx 4. 30mΩ
Temperature Ranges	Operation (maximum): -40°C to 55°C(-40°F to 131°F)
	Operation (recommended): 15°C to 25°C(59°F to 77°F)
	Storage: -20°C to 40°C(-4°F to 104°F)
Float Voltage	2.25V/cell@25°C(77°F)
Recommended Maximum Charging Current Limit	38. 75A
Equalize and Cycle Service	2.35V~2.40V/cell@25°C(77°F)
Self Discharge	The residual capacity is above 90% after 90 days storage(25°C/77°F)
Terminal	M6 Female
Terminal Hardware Torque	10 ± 1. 0Nm
Container Material	ABS (V0 optional)

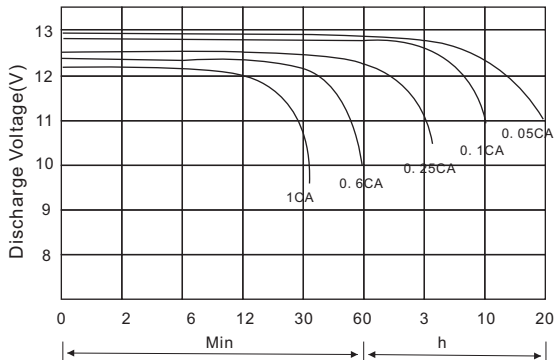
Constant Current Discharge Characteristics Units: Amperes (25°C, 77°F)

End voltage per cell	5MIN	15MIN	30MIN	45MIN	1HR	2HR	3HR	4HR	5HR	6HR	8HR	10HR	12HR	20HR	24HR
1.60V	506.6	272.2	165.6	119.7	96.8	55.5	40.3	33.0	28.8	25.0	19.1	15.9	13.5	8.46	7.06
1.67V	475.7	262.4	162.8	118.7	96.2	55.2	39.6	32.9	28.7	24.8	19.0	15.7	13.5	8.38	7.00
1.70V	471.5	258.2	160.0	117.9	95.5	54.8	39.3	32.7	28.2	24.5	19.0	15.7	13.3	8.36	7.00
1.75V	433.6	249.8	158.6	117.0	94.1	53.4	38.9	32.3	28.0	24.3	18.8	15.6	13.3	8.35	7.00
1.80V	388.7	233.0	151.6	112.3	91.7	53.0	38.6	32.2	27.4	23.9	18.7	15.5	13.2	8.26	6.98
1.83V	370.5	213.3	148.8	108.5	87.7	52.3	37.4	30.7	26.5	23.1	18.2	14.8	12.6	8.24	6.87
1.85V	346.6	207.7	138.4	104.3	85.0	50.3	36.4	30.4	25.9	22.5	17.6	14.7	12.4	8.08	6.81

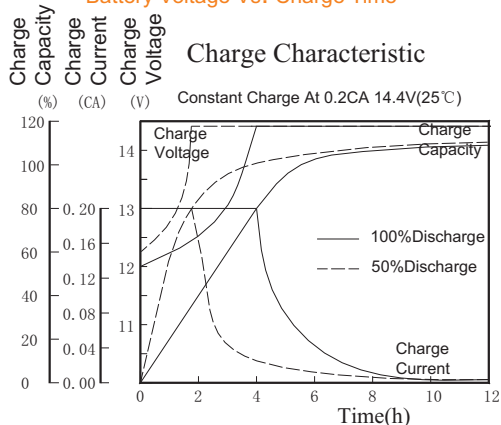
Discharge Data with Constant Power Units: Watts per cell (25°C, 77°F)

End voltage per cell	5MIN	15MIN	30MIN	45MIN	1HR	2HR	3HR	4HR	5HR	6HR	8HR	10HR	12HR	20HR	24HR
1.60V	846.5	477.9	298.5	224.2	183.2	105.1	76.8	64.2	55.8	48.4	37.6	31.2	26.2	16.9	14.08
1.67V	814.3	469.5	295.7	222.8	181.8	104.8	75.8	64.1	55.8	48.1	37.4	30.9	26.2	16.7	14.08
1.70V	810.1	463.9	295.7	222.8	181.8	104.4	75.8	63.8	55.0	47.8	37.1	30.6	26.1	16.7	14.05
1.75V	755.4	461.1	294.3	221.4	179.0	103.8	75.0	63.8	55.0	47.6	36.8	30.6	25.9	16.7	14.05
1.80V	693.7	435.9	287.3	217.2	177.5	103.6	74.8	63.6	54.1	47.1	36.6	30.6	25.9	16.7	14.02
1.83V	662.9	399.4	284.5	210.2	170.5	102.3	73.0	61.2	52.9	45.8	36.3	29.8	25.1	16.7	13.92
1.85V	619.5	389.6	263.5	201.8	164.9	98.9	71.0	60.5	51.7	44.8	35.2	29.5	24.8	16.4	13.81

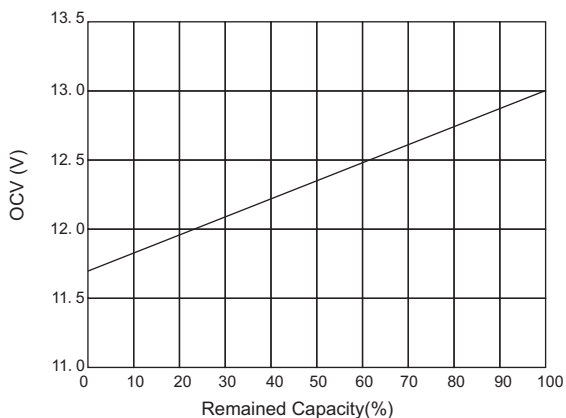
Terminal Voltage(V) Vs. Discharge Time (25°C, 77°F)



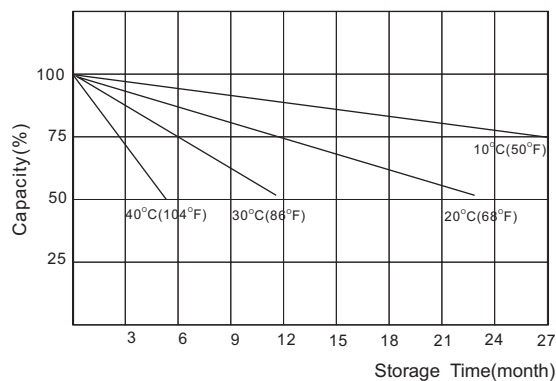
Battery Voltage Vs. Charge Time



Relationship of OCV Vs. State of Charge



Capacity Retention Characteristic



Charging Procedures

Application	Charge Voltage (V/Cell)			Max. Charge Current
	Temperature	Set Point	Allowable Range	
Cycle	25°C	2.40	2.35~2.45	0.25C
Standby	25°C	2.25	2.23~2.27	

Discharge Current VS. Discharge Voltage

Final Discharge Voltage V/Cell	1.80	1.70	1.55	1.30
Discharge Current (A)	0.2C ≥ (A)	0.2C < (A) < 0.5C	0.5C < (A) < 1.0C	(A) > 1.0C

NARADA POWER SOURCE CO., LTD.
 No.459 Wensan Road, Hangzhou, Zhejiang, P.R.China
 Tel:+86-571-28827013 Fax:+86-571-85126942
 Website:www.naradabattery.com E-mail:intl@narada.biz

NARADA EUROPE (UK) LTD.
 Spectrum House, Dunstable Road, Redbourn,
 St.Albans, Herts AL3 7PR, UK
 Tel: +44 (0)845 371 7095 Fax:+44 (0)845 612 2031
 E-mail: sales@naradaeurope.com

NARADA ASIA PACIFIC PTE. LTD.
 65 Ubi Crescent HOLA centre #08-02 Singapore
 Tel:+65-68481191/+65-67421208 Fax:+65-67493498
 E-mail: Sales@narada.com.sg

