

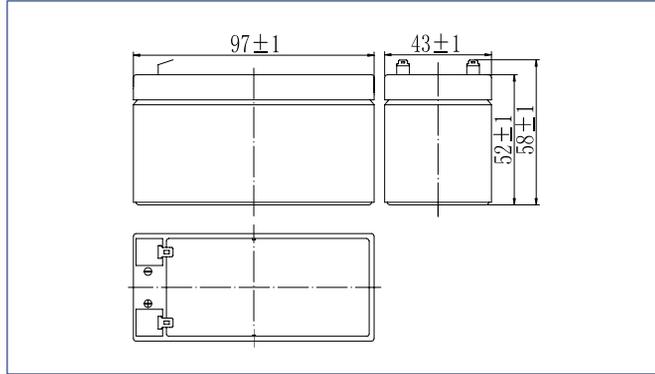
12V
1.3AH

viotech
battery

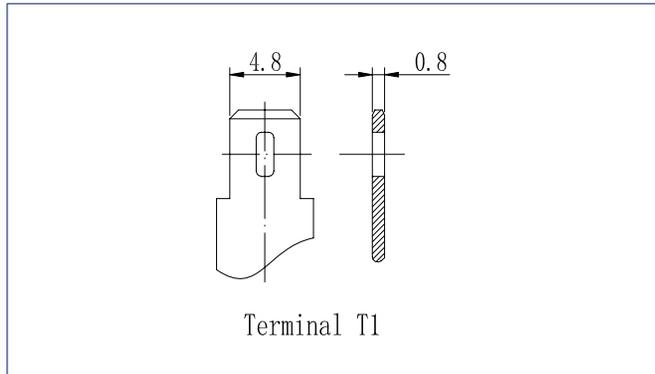
SPECIFICATIONS

Model	VT 1.3-12	
Nominal Voltage	12V	
Rated capacity (20 hour rate)	1.3Ah	
Dimensions	Length	97±1mm(3.82inch)
	Width	43±1mm(1.69inch)
	Height	52±1mm(2.05inch)
	Total Height	58±1mm(2.28inch)
Approx. Weight	0.52kg(1.15lbs)±5%	

OUTER DIMENSIONS (MM)



TERMINAL TYPE (MM)



CHARACTERISTICS

Capacity (25 °C)	20HR(10.2V)	1.3Ah
	10HR(10.5V)	1.12Ah
	1HR(9.60V)	0.78Ah
Terminal type		T1
Internal resistance (Fully charged,25 °C)		Approx.90m Ω
Capacity affected by temperature (20HR)	40 °C	102%
	25 °C	100%
	0 °C	85%
	-15 °C	65%
Self-discharge (25 °C)	3 months	Remaining Capacity:91%
	6 months	Remaining Capacity:82%
	12 months	Remaining Capacity:65%
Nominal operating temperature		25°C± 3°C(77°F± 5°F)
Operating temperature range	Discharge	-15°C~50°C(5°F~122°F)
	Charge	-10°C~50°C(14°F~122°F)
	Storage	-20°C~50°C(-4°F~122°F)
Float charging voltage(25°C)		13.60 to 13.80V Temperature compensation: -18mV/°C
Cyclic charging voltage(25°C)		14.50 to 14.90V Temperature compensation: -30mV/°C
Maximum charging current		0.36A
Terminal material		Copper
Maximum discharge current		18A(5 sec.)
Designed floating life(20°C)		10 years

CONSTANT CURRENT DISCHARGE CHARACTERISTICS UNIT: A (25°C)

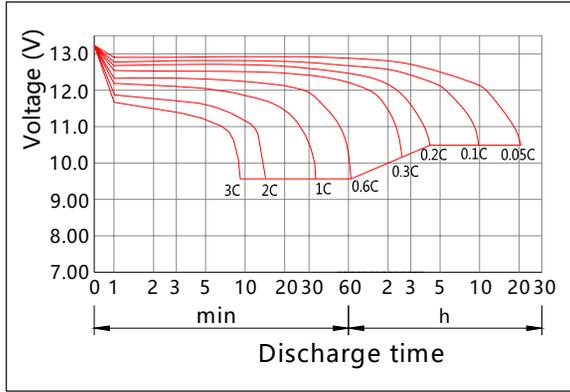
F.V/Time	5min	10min	15min	30min	60min	2h	3h	4h	5h	10h	20h
9.60V	4.56	2.88	2.28	1.27	0.78	0.43	0.306	0.245	0.208	0.113	0.061
9.90V	4.42	2.79	2.23	1.25	0.77	0.42	0.304	0.243	0.207	0.113	0.061
10.2V	4.24	2.68	2.14	1.21	0.75	0.42	0.302	0.242	0.205	0.112	0.060
10.5V	4.06	2.56	2.07	1.18	0.73	0.41	0.300	0.240	0.204	0.112	0.060
10.8V	3.83	2.42	1.96	1.14	0.71	0.40	0.291	0.233	0.198	0.109	0.059

CONSTANT POWER DISCHARGE CHARACTERISTICS UNIT: W (25°C)

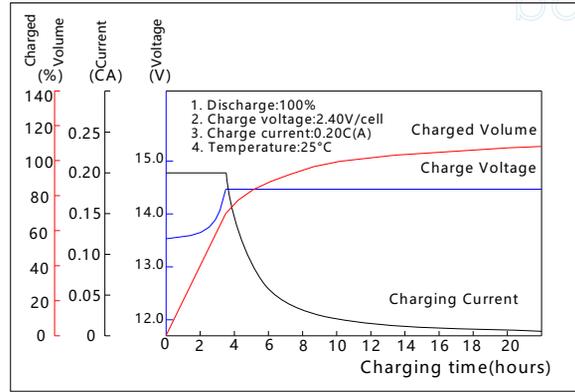
F.V/Time	5min	10min	15min	30min	60min	2h	3h	4h	5h	10h	20h
9.60V	50.9	32.5	26.0	14.6	9.0	4.99	3.64	2.92	2.48	1.36	0.73
9.90V	49.4	31.5	25.4	14.3	8.9	4.96	3.61	2.90	2.47	1.35	0.73
10.2V	47.3	30.2	24.4	13.8	8.7	4.91	3.59	2.88	2.45	1.35	0.72
10.5V	45.3	28.9	23.6	13.5	8.5	4.84	3.56	2.86	2.44	1.34	0.72
10.8V	42.7	27.3	22.4	13.0	8.2	4.72	3.46	2.77	2.36	1.31	0.71

Note: The above characteristics data can be obtained within three charge/discharge cycles

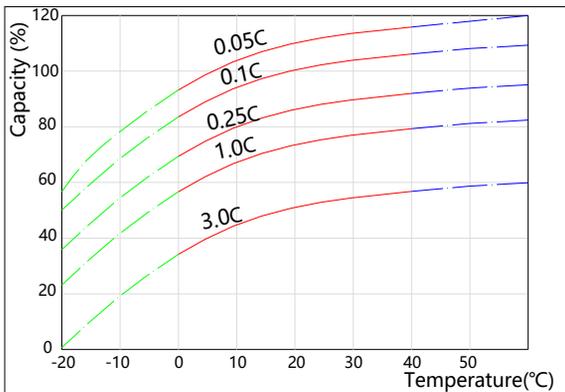
DISCHARGE CHARACTERISTICS (25°C)



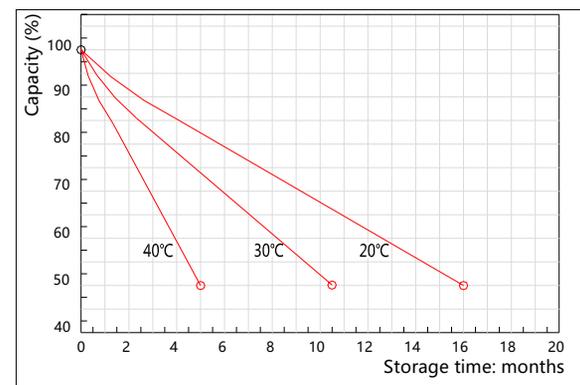
CHARGING CHARACTERISTICS (25°C)



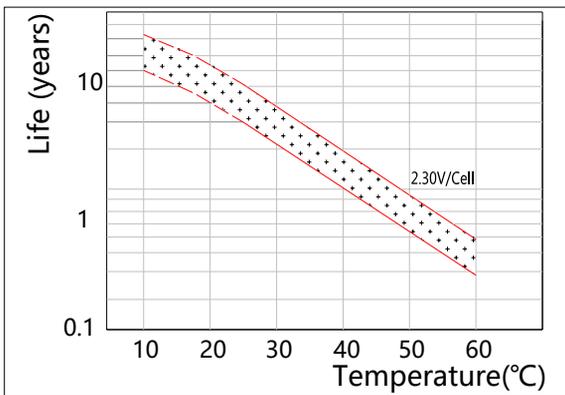
TEMPERATURE EFFECTS ON CAPACITY



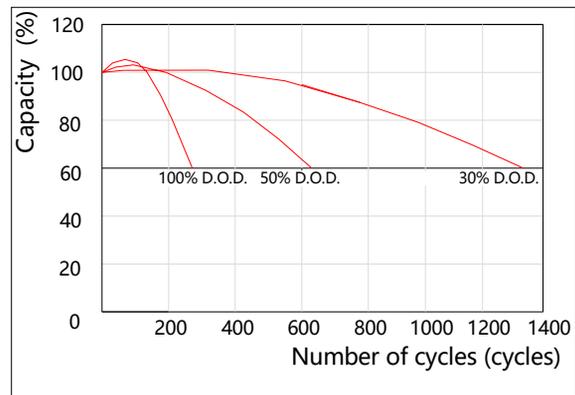
SELF-DISCHARGE CHARACTERISTICS



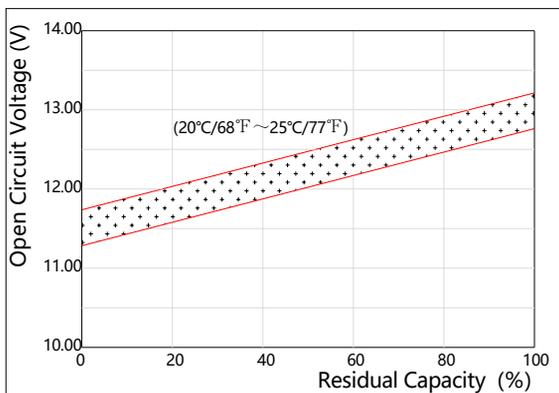
FLOATING LIFE ON TEMPERATURE



CYCLE LIFE ON D.O.D (25°C)



THE RELATIONSHIP FOR OPEN CIRCUIT VOLTAGE AND RESIDUAL CAPACITY (25°C)



THE RELATIONSHIP FOR CHARGING VOLTAGE AND TEMPERATURE

