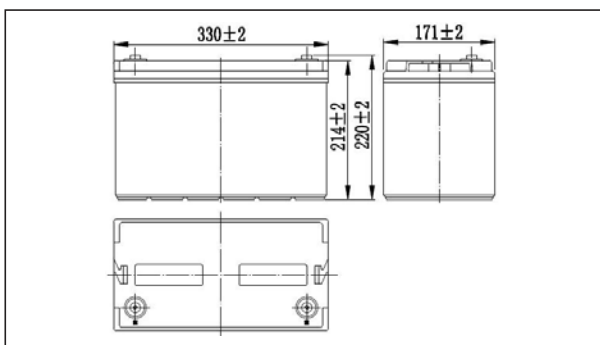


TYG12-100Ah 12V100Ah

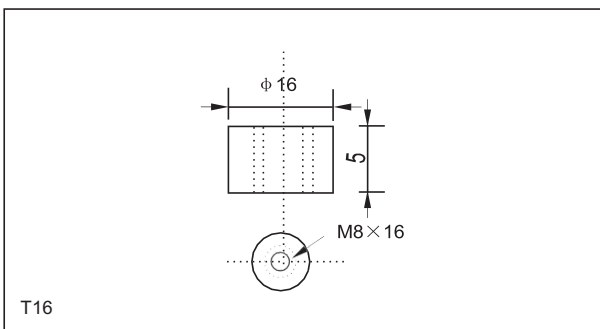
Specifications

Nominal Voltage		12V
Rated capacity (10 hour rate)		100Ah
Dimensions	Length	330±2mm(12.99inch)
	Width	171±2mm(6.73inch)
	Height	214±2mm(8.43inch)
	Total Height	220±2mm(8.66inch)
Approx. Weight		28.5kg(62.7lbs)±3%

Outer dimensions (mm)



Terminal Type (mm)



Characteristics

Capacity (25°C)	20HR(10.8V)	100Ah
	10HR(10.8V)	93Ah
	1HR(10.5V)	53Ah
Terminal type		T16
Internal resistance (Fully charged, 25°C)		Approx. 5mΩ
Capacity affected by temperature (10HR)	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)		13.50 to 13.80V Temperature compensation: -18mV/°C
Cyclic charging voltage (25°C)		14.40 to 14.70V Temperature compensation: -30mV/°C
Maximum charging current		20A
Maximum discharge current		755A (5 sec.)
Designed floating life (20°C)		12 years

Construction

Component	Positive plate	Negative plate	Container	Cover	Separator	Electrolyte	Safety valve	Terminal
Raw material	Lead dioxide	Lead	ABS	ABS	AGM	Gel	Rubber	Copper

Constant Current Discharge Characteristics Unit: A (25°C, 77°F)

F.V/Time	10min	15min	30min	60min	2h	3h	4h	5h	8h	10h	20h
9.60V	184	151	91.6	56.6	34.4	24.5	19.3	16.3	11.5	9.6	5.10
9.90V	178	147	89.8	55.8	34.2	24.4	19.2	16.2	11.5	9.6	5.08
10.2V	171	142	87.1	54.4	33.9	24.3	19.0	16.1	11.4	9.5	5.07
10.5V	164	137	84.9	52.7	33.5	24.1	18.9	16.0	11.3	9.5	5.04
10.8V	155	130	81.8	50.0	32.7	23.6	18.3	15.6	10.9	9.4	5.00

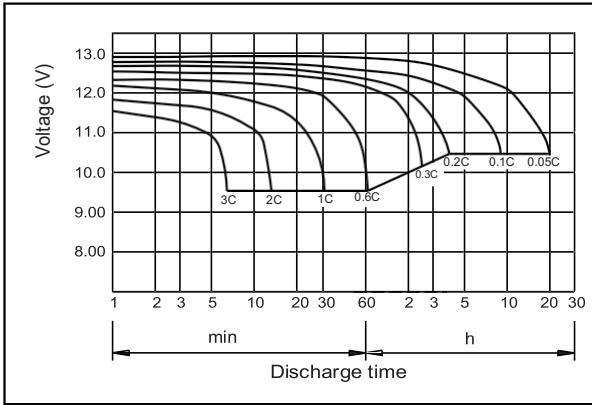
Constant Power Discharge Characteristics Unit: W (25°C, 77°F)

F.V/Time	10min	15min	30min	60min	2h	3h	4h	5h	8h	10h	20h
9.60V	1988	1659	1027	646	399	289	226	194	137	115	61.1
9.90V	1929	1619	1007	636	397	287	225	193	137	114	60.9
10.2V	1849	1559	976	620	394	285	224	190	136	114	60.8
10.5V	1769	1506	952	600	388	283	222	189	135	113	60.4
10.8V	1670	1426	918	582	378	278	215	184	130	112	60.0

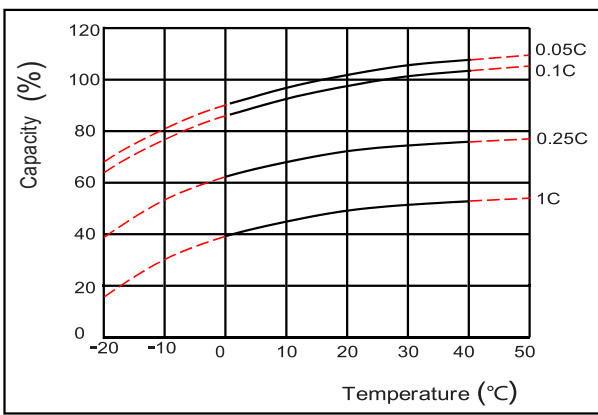
Note: The above characteristics data can be obtained within three charge or discharge cycles.

TYG12-100Ah 12V100Ah

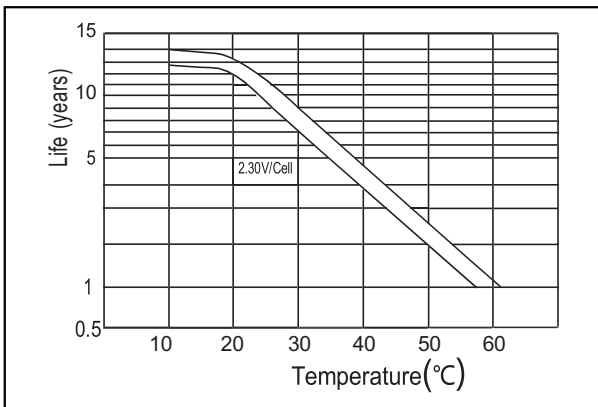
Discharge characteristics(25°C)



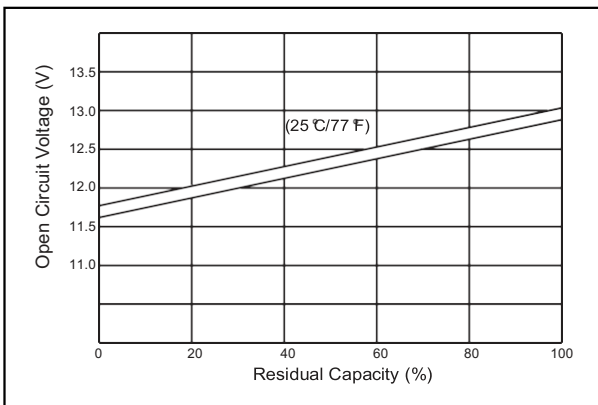
Temperature effects on Capacity



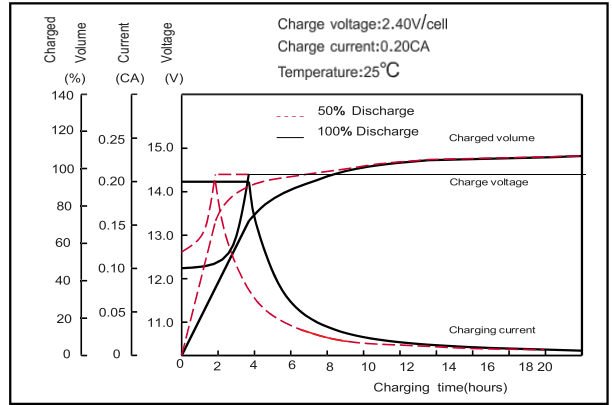
Floating life on Temperature



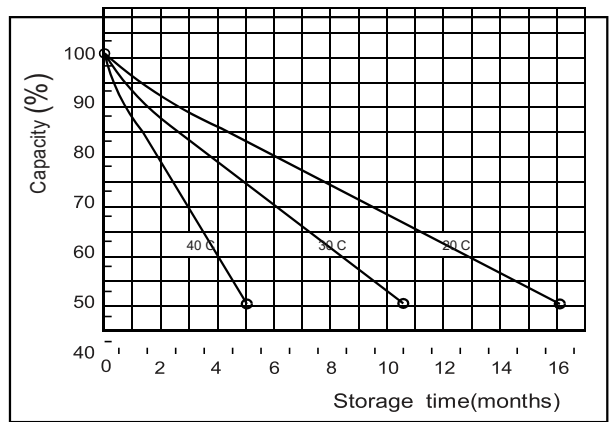
The relationship for OCV and Capacity (25°C)



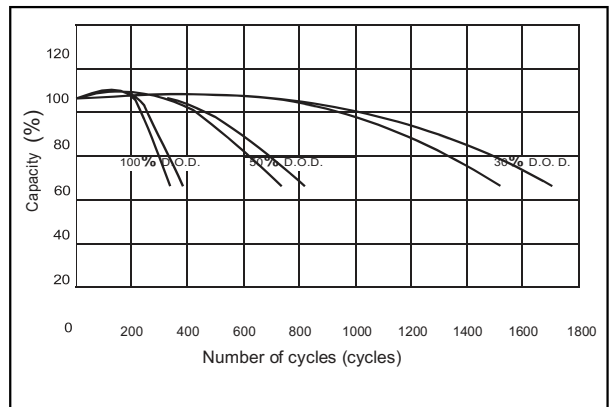
Charging characteristics (25°C)



Self-discharge characteristics



Cycle life on D.O.D (25°C)



The relationship for Charging voltage and Temperature

