NAPEL POWER NPL24000 (2V400Ah)

NPL General Series Battery

NPL General Series VRLA batteries are designed with AGM (Absorbent Glass Mat) technology,
High performance plates and electrolyte to give extra power output for common power backup system.
NPL series Batteries are the general purpose batteries with 18 years floating design life at 25℃.
Meet with IEC, BS,JIS and Eurobat standard.

Application

*Emergency Power System
*Communication equipment
*Telecommunication systems
*Uninterruptible power supplies
*Solar power and wind power systems, etc.
*Power tools
*Power station
*Marine equipment
*Fire and Security System

General Features

*Safety Sealing
*Non-spillable construction
*High Reliability and Stability
*Sealed and Maintenance-free
*Safety and Quality certification
*Long Life and low self-discharge design

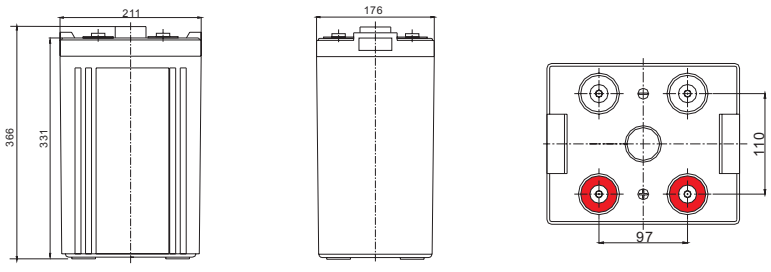
Construction

*Positive .....Lead dioxide
*Electrolyte .....Sulfuric acid
*Separator .....Fiber glass
*Container .....ABS(UL94-HB), Flammability Resistance of UL94-V2 can be available upon request
*Negative .....Lead
*Safety Valve .....EPDR
*Terminal .....Copper

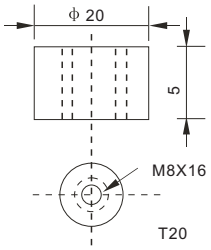
Specification

Battery Model	Nominal Voltage	2V		
	Rated capacity(10 Hour rate)	400Ah		
Dimensions	Length	Width	Height	Total Height
	211mm (8.31 inches)	176mm(6.93 inches)	331mm(13.03 inches)	366mm (14.41 inches)
Approx Weight	26.70kg(58.86lbs)±3%			
Capacity 25℃ (77℉)	10 Hour rate (40A,1.8V)	5 Hour rate (64A,1.75V)	3 Hour rate (100A,1.7V)	1 Hour rate (240A,1.6V)
	400Ah	320Ah	300Ah	240Ah
Max.discharge current	2000A(5Sec.)			
Internal Resistance	Full charged at 25 ℃ (77℉): Approx 0.40mΩ			
Capacity affected by Temp. (10 HR)	40℃ (104 ℉)	25℃ (77℉)	0℃ (32℉)	-15℃ (5℉)
	102%	100%	85%	65%
Self Discharge at 25℃ (77℉)	After 3 months storage		After 6 months storage	After 12 months storage
	91%		82%	64%
Charge method 25℃ (77℉)	Cycle Use		Float Use	
	2.35-2.40V (Initial charging current less than 160A)		2.25-2.30V	

Outer dimensions (mm)



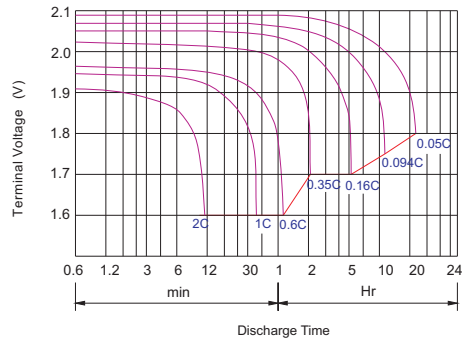
Terminal Type (mm)



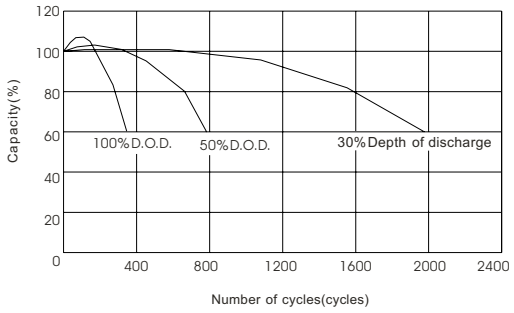
Constant Current(Amp) and Constant Power(Watt) Discharge Table at 25℃(77℉)

Time		5min	10min	15min	30min	1hr	2hr	3hr	4hr	5hr	8hr	10hr	20hr
1.60V	A	1281	844	680	456	240.0	140.0	102.8	80.0	66.0	46.8	42.0	22.7
	W	2204	1502	1216	817	432.0	256.2	190.7	150.0	125.1	89.4	80.9	44.0
1.70V	A	1241	762	641	436	225.6	133.6	100.0	78.0	64.8	45.6	41.2	22.0
	W	2209	1417	1195	816	425.3	256.6	193.0	151.2	125.9	88.9	80.7	43.0
1.75V	A	1200	681	560	408	218.4	130.4	97.6	76.8	64.0	45.2	40.4	22.0
	W	2185	1292	1066	783	421.5	252.1	189.5	149.8	125.1	88.6	79.7	43.3
1.80V	A	1157	642	521	376	211.2	127.2	95.2	75.6	62.4	44.0	40.0	21.6
	W	2163	1234	1000	726	409.7	248.3	187.1	148.8	122.9	86.9	79.2	42.9
1.85V	A	1118	602	481	336	204.0	124.0	92.0	73.6	60.8	42.8	38.0	20.4
	W	2113	1161	933	655	399.8	244.3	182.2	146.1	120.9	85.4	76.5	41.2

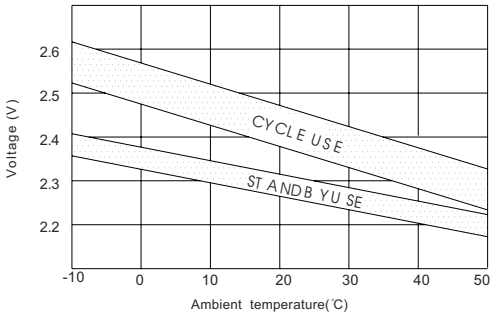
Discharge characteristic Curve



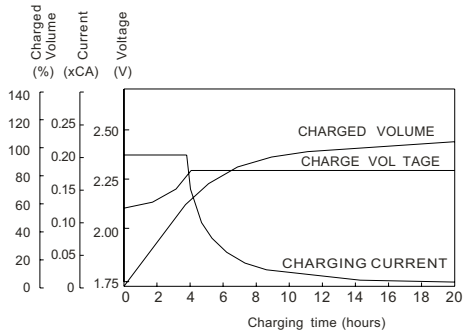
Cycle service life in relation to depth of discharge



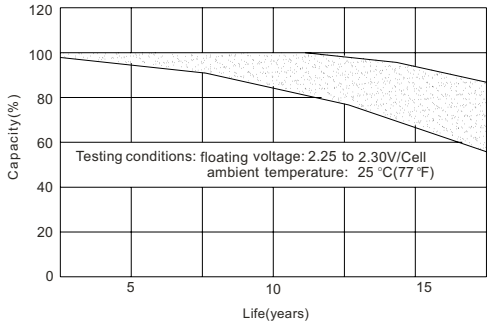
Relationship between charging voltage and temperature



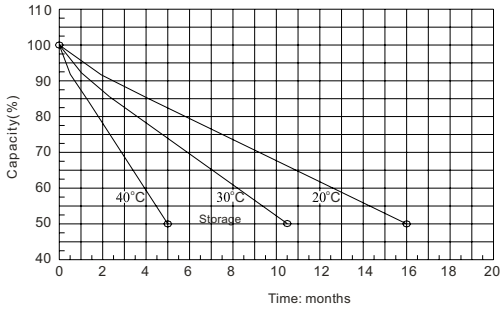
Constant voltage charging characteristic (0.25CA, at 25 C) °



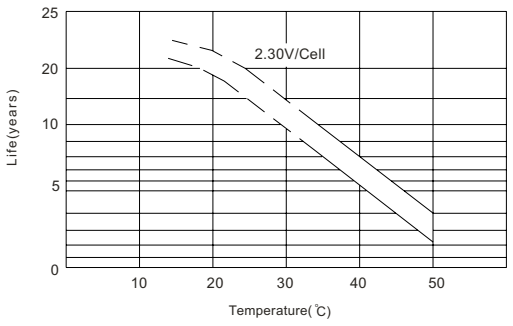
Life characteristics of standby use



Self-discharge characteristic



Temperature effects on float life



Charge characteristic Curve for standby use