

# RICO

## PLANTÉ

### STATIONARY

### BATTERIES



## PRODUCT HIGHLIGHTS

**RICO PLANTÉ** Battery Containers are moulded of toughduty Transparent Styrene Acrylonitrile (SAN) Plastic along with shock resistant, Non-Staining ABS Cell Closure for easy maintenance and periodic inspection.

German make **DARAK** Phenol Formaldehyde Resin Separators provides Uniform porosity with deep ribs, it provide better electrolyte circulation, low acid displacement and very low electrical resistance resulting maximum current delivery. It resists cracking under the mechanical forces for superior physical characteristics. Chlorine Contamination free.

**RICO PLANTÉ** Cell Superior High Rate Discharge performance characteristic i.e. capability to deliver high current for short duration required in SiteCritical Application.

**RICO PLANTÉ** Cell's High Ampere-Hour and Watt-Hour efficiency enable optimized sizing of PLANTE Battery Bank compared with Tubular Batteries for all critical and non-critical Auxilary Power Applications.

High charging current acceptance capability of **RICO PLANTÉ** cells ensures quick boost charging of the Battery Bank, in case of its higher use or higher DOD level, as it may be required in case of emergencies.

**RICO PLANTÉ** Cells require very low maintenance - water topping-up frequency once in 12-24 months for best service life, when maintained as per our O&M Manual and float voltage and float current levels.

Designed service life expectancy is over 20 years on normal float or trickle charge operation at 25°C ambient temperature

**RICO PLANTÉ** Cells offer maximum efficiency and reliability for the widest range variety of applications of Industrial Power as most dependable power source.

**RICO PLANTÉ** Cells are Type Tested & manufactured conforming to IS:1652-2013, IEC-896 and also BS:6290, Part-II.

## CHARGING INSTRUCTION

### BATTERY INITIAL CHARGING

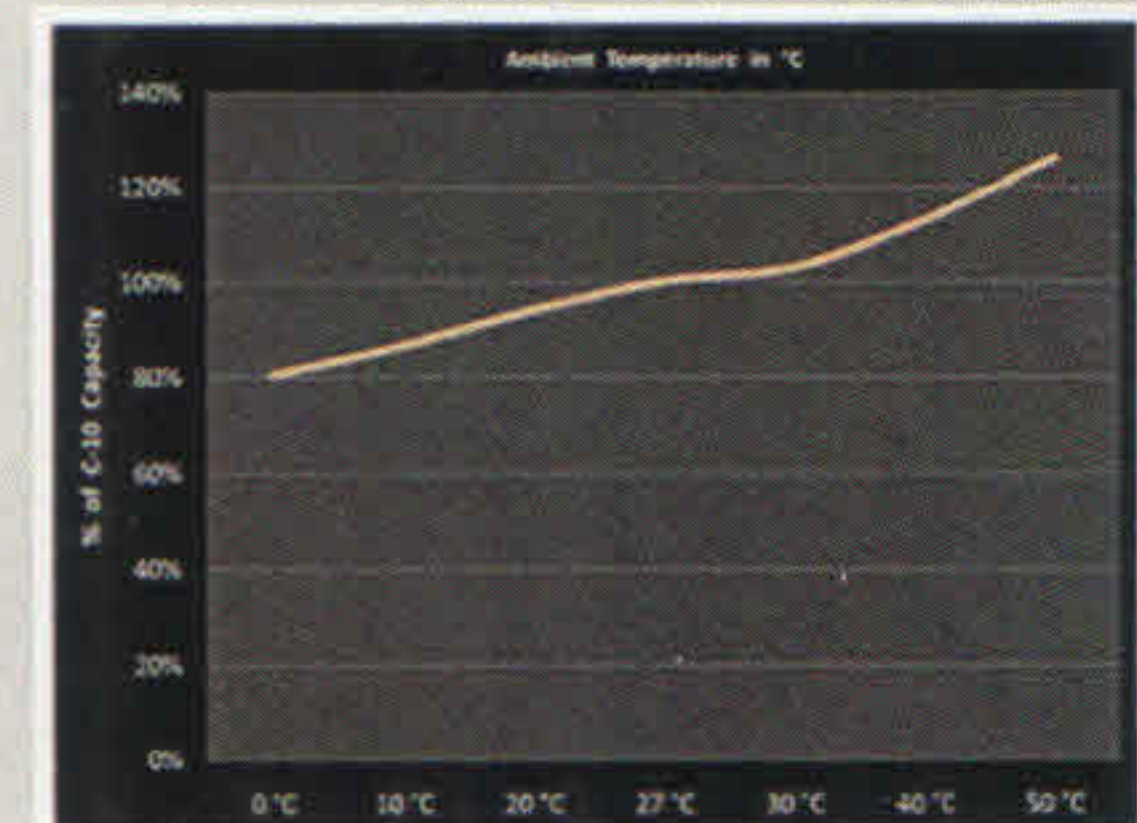
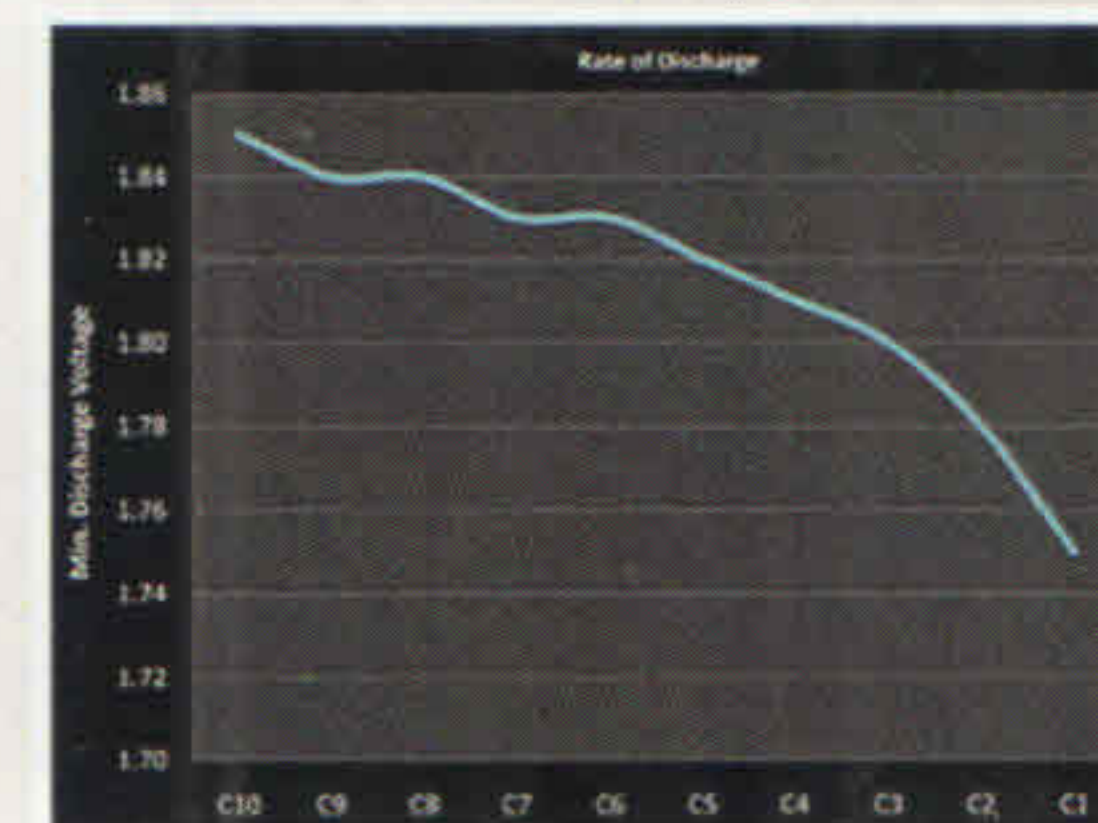
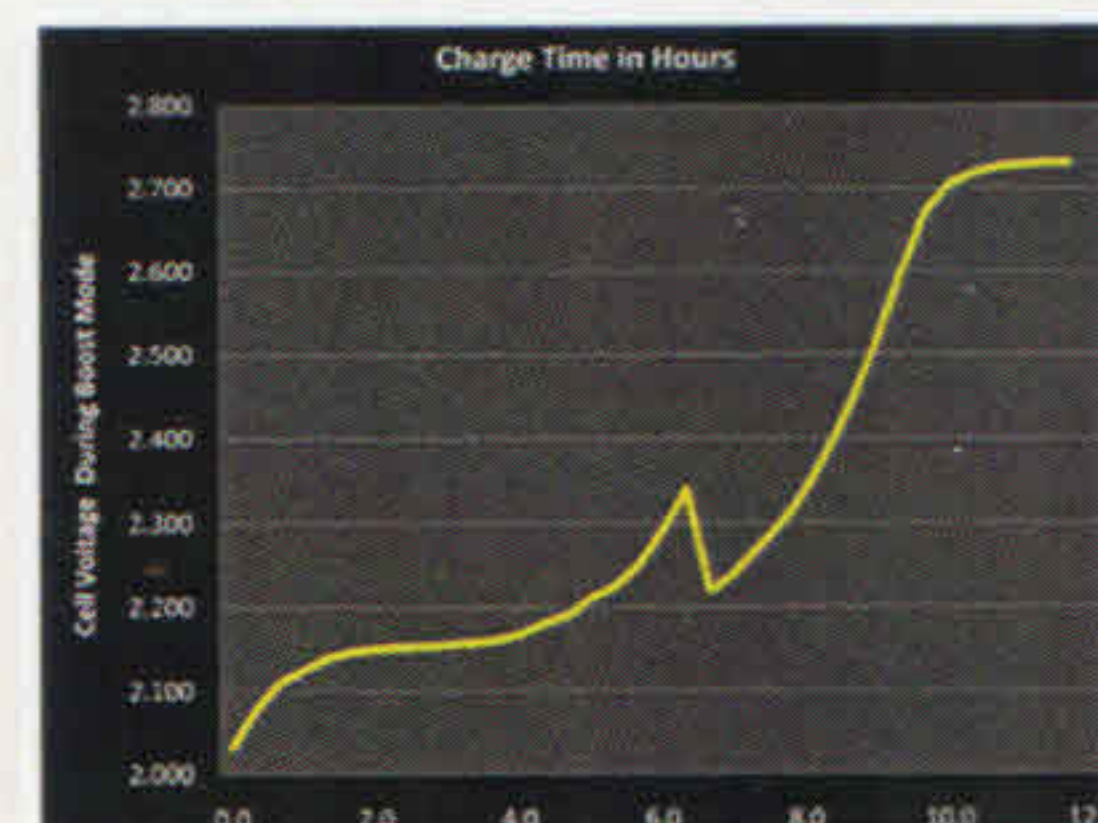
Batteries/Cells are supplied at dry & uncharged condition. These should be filled with electrolyte of proper specific gravity and given an initial charge before putting them into use. The following procedure may be followed for initial charging.

1. Remove the caps and fill the cells with electrolyte of specific gravity 1.195(+0.005) or 1.200(+0.005) with plastic jugs and funnel. Fill the cells upto the level indicated as 'Maximum' level marked on the transparent SAN Container.
  2. Allow the battery to stand for 12 to 24 hrs to enable the electrolyte to soak into the plates and electrolyte temperature to come down to normal ambient temp.
  3. After initial filling electrolyte will soak into the plates and separators and the level may fall. The level should be restored with more electrolyte of same Sp.Gr.
  4. The battery must be charged by a DC source only and the positive and negative terminals to be connected correctly. Wrong connection will damage cells of the battery.
  5. Now give the battery the first charge at the rate specified for initial charging in the table over leaf maintaining correct polarity of cells with charger output. Continue the charge till the cells are gassing freely and specific gravity and the voltage of each cell remain constant for 3/4 hrs. Total first charge time will be about 100/120 hrs. at the specified rate. Slower the charging rate and longer the charging duration, better is the service life.
  6. Observe the temperature of the electrolyte during charging. If the temperature reaches 52°C-54°C reduce the charging current to bring down the temperature to 40°C-45°C and then increase the charging current to normal.
  7. At the end of initial charging the on-line cell voltage will be above 2.57Volt/Cell to 2.70V/Cell depending charging current flowing at that time. Also the specific gravity of electrolyte should be between 1.205 to 1.210 corrected at 27°C.
- The battery is now ready for service.

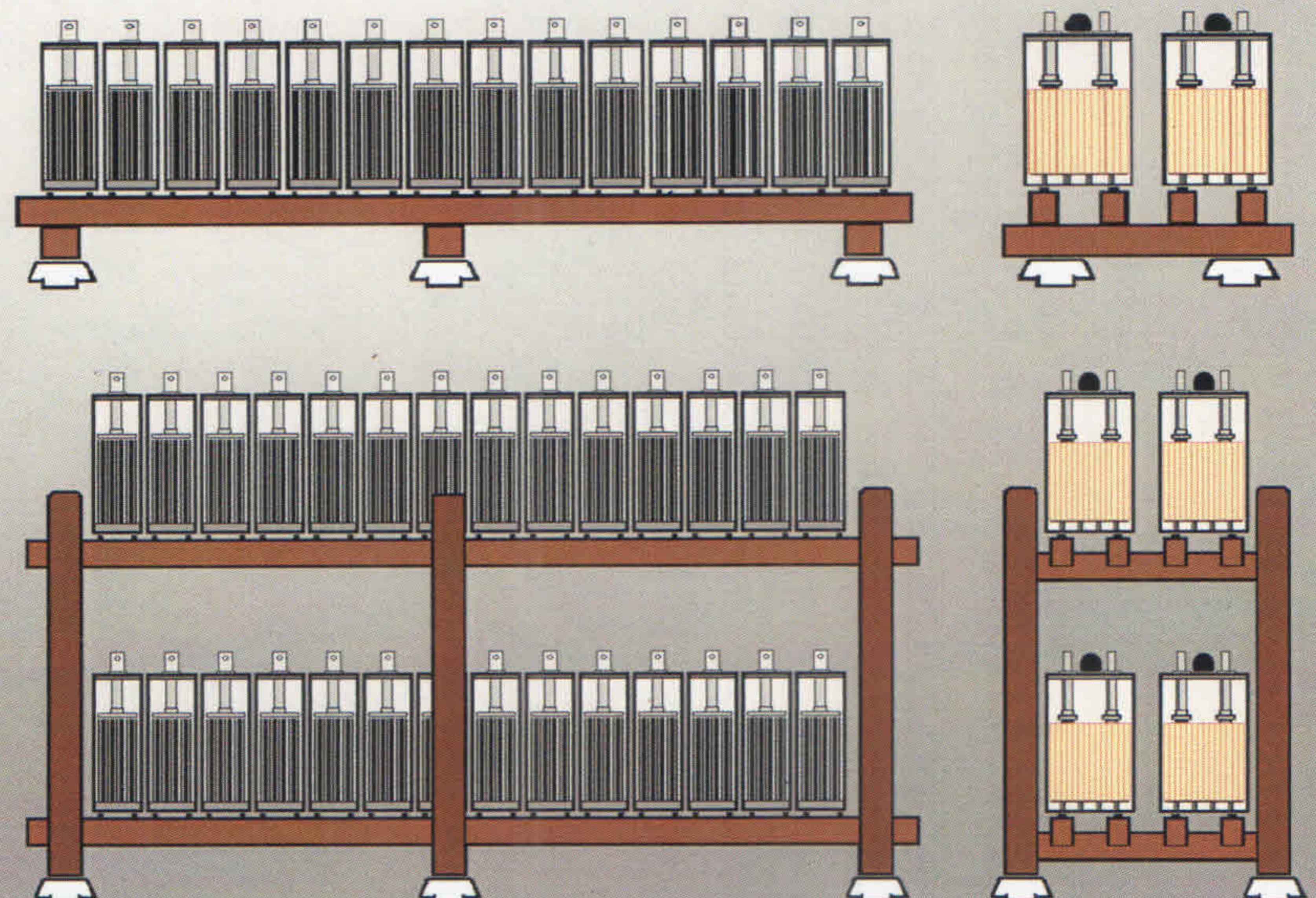
### BATTERY NORMAL CHARGING

Normal charging should be given at the rate specified in the table. This should continue till voltage and Sp. Gr. of the cells have reached their maximum and remain steady for about 2 hrs. Sp.Gr of full charged cells will be between 1.205 +0.005 and on line cell voltage will be between 2.57 to 2.70 Volt/cell. Cells should gas freely under such conditions of cell voltage and gravity. Care should be taken during normal charging not to overcharge the battery beyond limiting float/trickle charging current mentioned over-leaf.

### CHARGING CHARACTERISTICS



### BATTERY BANK LAYOUTS



# TECHNICAL DATA FOR RICO PLANTÉ CELLS

'S' IN RICO PLANTE CELL TYPE FORMAT STANDS FOR 'SAN' TRANSPARENT CONTAINER

TYPE	CAPACITY AH (C-10) AT 27 °C	CHARGING CURRENT (Amp.)		FLOAT CURRENT (mA)		WEIGHT in Kg (APPROX ±5%)		QTY. OF ELECTROLYTE (Litres) ± 5%	DIMNSN. OF CONTAINER (APPROX. ± 3mm)			MAX. OVERALL CELL HEIGHT (APPROX.)
		START	FINISH	MIN.	MAX.	DRY	FILL-ED		LENGTH	WIDTH	HEIGHT	
RP40 A2S	40	5	2.5	29	57	6.094	12.19	5.4	103	206	345	415
RP64 A3S	64	8	4	50	150	7.564	13.56	5.1	103	206	345	415
RP80 A4S	80	10	5	60	180	9.014	14.81	4.8	103	206	345	415
RP100 B2/1S	100	13	6.5	80	240	11.20	16.60	4.5	103	206	345	415
RP125 B2/2S	125	16	8	104	312	12.85	18.15	4.2	103	206	345	415
RP150 B4S	150	20	10	125	375	15.57	22.06	5.7	124	206	345	415
RP180 B4/1S	180	24	12	145	435	17.63	23.82	5.2	124	206	345	415
RP200 B4/2S	200	26	13	165	495	20.02	30.12	9.0	187	206	345	415
RP230 B6S	230	30	15	185	555	22.40	32.70	8.5	187	206	345	415
RP250 B6/1S	250	33	16.5	205	615	24.42	34.02	8.0	187	206	345	415
RP300 C5S	300	40	20	250	750	29.39	38.28	8.2	145	206	461	530
RP360 C6S	360	48	24	290	870	36.73	56.23	9.5	166	206	461	530
RP400 C6/1S	400	52	26	330	990	42.09	61.08	15.3	254	210	461	530
RP460 C7/1S	460	59	29.5	375	1125	47.70	67.50	15.0	254	210	461	530
RP500 C7/2S	500	66	33	415	1245	51.04	68.63	14.8	254	210	461	530
RP560 C8/2S	560	74	37	305	610	56.25	73.15	14.5	254	210	461	530
RP600 C10S	600	79	39.5	348	696	60.80	76.50	14.7	254	210	461	530
RP670 D10S	670	84	42	360	720	64.99	79.99	23.2	270	240	589	636
RP700 E8/2S	700	92	46	390	780	71.53	101.90	23.2	275	210	636	710
RP750 E10S	750	96	48	415	830	76.85	105.80	22.9	275	210	636	710
RP900 F9S	900	110	55	475	950	90.75	118.40	22.6	275	210	636	710
RP1000 F10S	1000	126	68	535	1070	100.9	153.10	22.1	275	210	636	710
RP1100 F11S	1100	141	70.5	590	1180	109.5	160.00	40.7	399	214	762	830
RP1200 F12S	1200	154	77	655	1310	118.3	167.00	40.3	399	214	762	830
RP1300 F13S	1300	170	85	715	1430	127.7	174.70	39.9	399	214	762	830
RP1470 G14S	1470	190	95	775	1550	136.5	181.50	39.2	399	214	762	830
RP1575 G15S	1575	208	104	845	1690	149.1	192.20	38.7	399	214	762	830
RP1700 F17S	1700	220	110	858	1716	159.4	214.90	49.8	487	212	762	830
RP1785 G17S	1785	230	115	905	1810	169.9	223.50	49.3	487	212	762	830
RP1890 G18S	1890	250	125	1035	2070	180.0	231.80	48.8	487	212	762	830
RP1995 G19S	1995	270	135	1095	2190	192.9	257.80	70.0	576	212	762	830
RP2100 G20S	2100	290	145	1155	2310	202.1	265.10	61.4	576	212	762	830
RP2205 G21S	2205	305	152	1212	2424	212.0	273.90	60.9	576	212	762	830
RP2310 G22S	2310	318	159	1265	2530	221.9	283.00	60.4	576	212	762	830
RP2415 G23S	2415	336	168	1332	2664	231.2	291.70	57.9	576	212	762	830

\*THIS CATALOGUE IS ISSUED TO PROVIDE GENERAL INFORMATION ONLY AND IS NOT DEEMED TO FORM PART OF AN OFFER OR CONTRACT. IN ORDER TO FURTHER DEVELOPEMENT IN PERFORMANCE OF PRODUCTS RICO RESERVE THE RIGHT TO CHANGE DETAILS WITHOUT PRIOR NOTICE

\*\*ABOVE TECHNICAL DATA BASED ON TRANSPARENT SAN CONTAINER. RICO PLANTE CELLS ALSO AVAILABLE IN ROBUST FRP CONTAINERS

# APPLICATIONS



Telecommunication Systems



Power Transmission



Power Plants & Steel Plants CPP



Distribution Substations



SG and CG Operations



UPS Backup  
Power Systems



# Reliance Storage Energy & Systems Private Limited

## REGD. OFFICE

3 & 3A Ambica Mukherjee Road, Belghoria  
Kolkata, PIN: 700056  
Phone: 033 2553 7540  
Tele-Fax: 033 2553 1964  
For Any Query E-mail us at:  
rico3589mbi@bsnl.in | reliancestorage@gmail.com

## R&D CENTRE

Nandankanan, Gopalpur  
Chandigarh, Ganganagar  
Kolkata: 700132  
Contact: 033 2564 3589

[www.ricotechnology.com](http://www.ricotechnology.com)