

# UP-OPzS Series

## 22 OPzS 2750

O P z S C E L L



### Main Features

- **Design Life**  
20 years at 20°C.
- **Water Refilling**  
More than 2 years at 20°C.
- **IIEC 896-1**  
2300 cycles.
- **Self Discharge**  
Approx. 2% per month at 20°C.
- **Operating Temperature Range**  
-20°C to 55°C, recommended 10°C to 30°C.
- **Full Conformity with**  
DIN 40737-1, IIEC 896-11 and EN 50272-2.

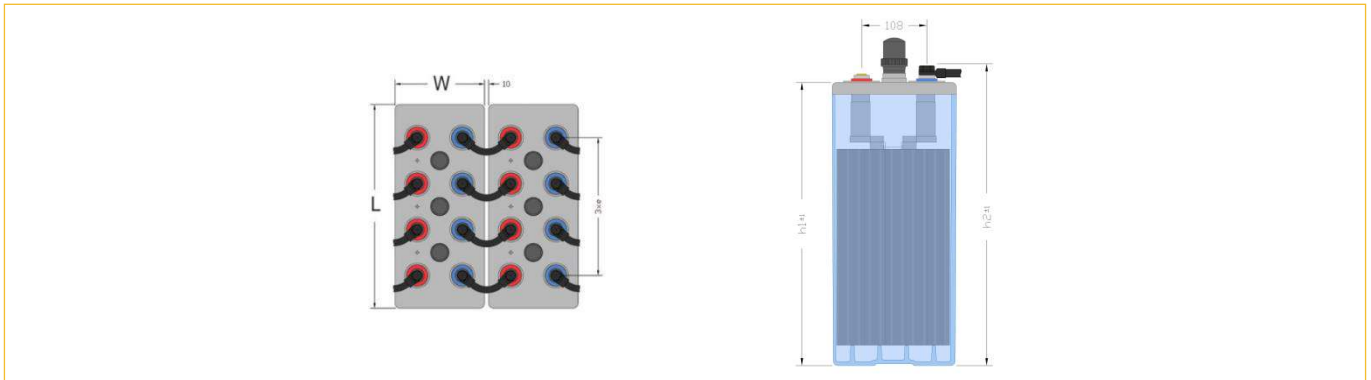
### Technical Specifications

Capacity (Ah), C100 (1,85 V/cell, 20°C)	4775
Capacity (Ah), C10 (1,80 V/cell, 20°C)	3276
Number of Plates (+) per Cell	22
Floating Voltage Set Point (V/cell)	2.23
Maximum Initial Charge Current (A)	0.3 C10
Recommended Boost Charge Voltage (V/cell)	2.40
Recommended End of Discharge Voltage (10-hr rate) (V/cell)	1.80
Short Circuit Current (A)	17700
Internal Resistance (mOhm)	0.114
Number of Cycles at 60% Depth of Discharge (20°C)	2300
Self-Discharge Rate per Month at 20°C	Approx. 2.5%
Dimensions in mm (L x W x H1 / H2) H1 = Height to the lid H2 = Height including connectors & bolts	576 x 212 x 772 x 800
Weight (kg)	Wet: 219.7 / Dry: 153.8
Type and Number of Poles	M10 / 8
Operating Temperature / Recommended Temperature	-20°C-55°C / 10°C-30°C

\* All dimensions and weights shown are subject to manufacturing tolerances.



Dimensions



Constant Current Discharge in A (at 20°C)

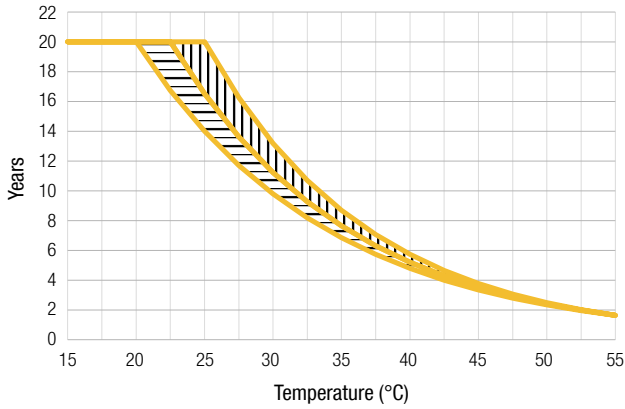
End Voltage (V/cell)	Discharge Time														
	10min	15min	30min	45min	1h	2h	3h	4h	5h	6h	7h	8h	10h	12h	20h
1.60 V	3057.3	2908.9	2507.4	2169.5	1894.7	1231.3	917.9	738.7	622.0	539.2	477.1	428.7	357.7	307.9	200.5
1.65 V	2726.5	2601.3	2276.0	2001.6	1774.3	1196.5	901.4	728.2	614.3	533.2	472.1	424.4	354.4	305.2	198.9
1.70 V	2392.3	2289.6	2025.4	1807.3	1623.9	1138.6	873.9	711.6	602.5	524.1	464.8	418.3	349.7	301.4	196.7
1.75 V	2023.2	1970.6	1761.3	1590.4	1446.5	1051.8	825.6	681.5	581.7	508.5	452.4	408.0	342.1	295.3	193.4
1.80 V	1639.8	1630.4	1486.1	1354.4	1244.3	936.5	751.4	629.5	543.1	478.5	428.3	388.1	327.6	284.0	187.6
1.83 V	1409.9	1402.3	1315.9	1206.0	1113.1	853.7	694.2	586.8	509.5	451.1	405.4	368.5	312.6	272.2	181.4
1.85 V	1256.9	1247.1	1201.6	1103.9	1022.4	793.1	650.6	553.3	482.6	428.7	386.2	351.9	299.5	261.4	175.4
1.87 V	1103.8	1098.4	1070.1	1000.6	929.2	728.4	602.5	515.6	451.7	402.8	363.9	332.3	283.9	248.4	167.9
1.90 V	869.4	863.4	853.3	837.2	786.0	624.8	522.6	451.1	398.0	356.8	323.8	296.8	255.1	224.2	153.3

Constant Power Discharge in W/cell (at 20°C)

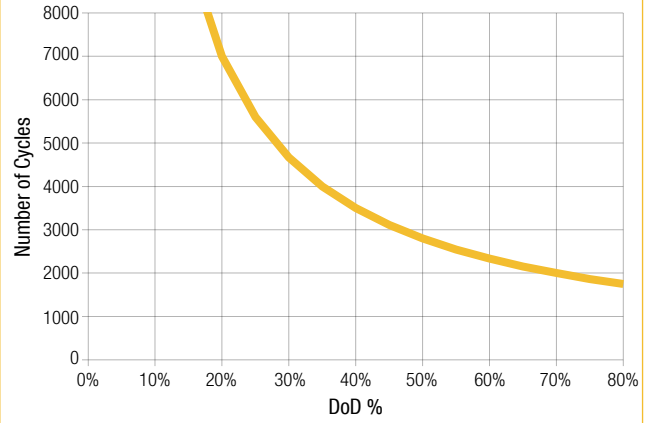
End Voltage (V/cell)	Discharge Time														
	10min	15min	30min	45min	1h	2h	3h	4h	5h	6h	7h	8h	10h	12h	20h
1.60 V	4835.9	4615.9	4035.3	3552.5	3158.0	2160.9	1651.6	1348.2	1145.9	1000.2	889.6	802.6	673.8	582.5	383.3
1.65 V	4449.3	4256.7	3754.5	3341.5	2999.2	2107.5	1625.7	1331.8	1133.9	990.6	881.7	795.8	668.5	578.2	380.7
1.70 V	4026.9	3857.8	3432.1	3084.8	2794.6	2018.9	1581.3	1304.6	1114.6	975.8	869.7	785.7	660.8	572.0	377.2
1.75 V	3538.6	3421.6	3066.4	2780.2	2541.3	1886.2	1503.4	1254.6	1079.5	949.3	848.6	768.3	647.9	561.7	371.6
1.80 V	2953.9	2932.9	2659.4	2429.2	2237.1	1705.5	1383.1	1168.2	1014.2	898.1	807.1	733.8	622.6	541.9	361.4
1.83 V	2581.9	2544.0	2393.6	2195.8	2030.7	1571.4	1288.6	1096.4	957.0	850.9	767.3	699.6	596.3	520.9	350.3
1.85 V	2291.9	2286.0	2209.6	2031.2	1883.9	1471.2	1215.3	1039.4	910.6	812.0	733.9	670.4	573.1	501.8	339.5
1.87 V	2065.4	2043.4	2006.2	1860.2	1729.1	1362.5	1133.2	974.3	856.9	766.5	694.4	635.6	545.1	478.4	325.7
1.90 V	1666.1	1658.8	1625.0	1591.2	1484.3	1184.0	993.9	860.9	761.7	684.6	622.7	571.8	493.0	434.5	299.1

\* Upower reserves the right to change or revise without notice any information or detail given in this publication.

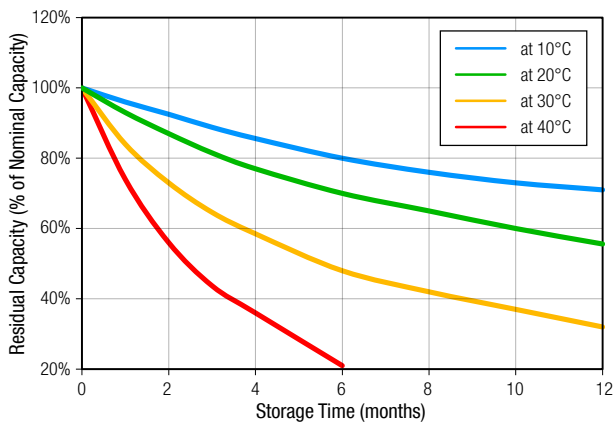
Expected Service Life vs. Operating Temperature



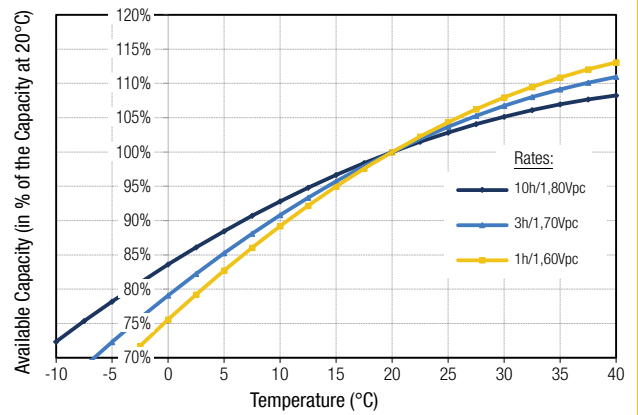
Number of Cycles vs. DOD



Self-Discharge Characteristics



Capacity vs. Temperature



Float Voltage Setting vs. Operating Temperature

