

SEC-2TLA Sealed Lead Acid VRLA 2 Volt Flat Pasted Plate Battery Range Capacities: 50Ah to 3850Ah



SEC -TLA 2 Volt sealed valve regulated rechargeable batteries are maintenance free. SEC -TLA 2 Volt range advanced AGM absorbed electrolyte technology ensures reliable performance, safety, outstanding battery life and value. Batteries have a design life of 15 years at 20°C and comply with BS 6290 Part 4 (with flame retardant V-0 case) EUROBAT (draft IEC 896-2) standards and is a recognized component of UL 1989 under Standby Battery Category.

SPECIFICATION:

- * **POSITIVE PLATE:** Calcium flat plate grid
- * **NEGATIVE PLATE:** Flat pasted grid
- * **ELECTROLYTE:** Dilute sulphuric acid
- * **CONTAINER:** Grade 6 ABS - V-0 (optional)
- * **SEPARATORS:** Absorptive glass matt separator
- * **FLOAT VOLTAGE:** 2.25 vpc +/- 1% at 20/25°C
- * **MAX CHARGE VOLTAGE:** 2.35 vpc at 20/25°C
- * **SAFETY ONE WAY VALVE:** 1-3 p.s.i. self-resealing
- * **TERMINALS:** Integral brass insert
- * **INTERCONNECTS:** Copper bar or insulated cable

APPLICATIONS

- * Telecommunications
- * UPS
- * Emergency Lighting
- * Fire & Security
- * Standby Power
- * Switchgear
- * Control Systems
- * Cellular Radio
- * Photovoltaic

Introduction

SEC TLA 2 Volt batteries are of the absorbed electrolyte type. The cells are designed so that a controlled amount of electrolyte, dilute sulphuric acid, is contained within an absorbent non woven separator material that also separates the battery plates. This type of separator construction allows full wetting of the plates with the available electrolyte and also allows the free passage of the oxygen generated during charging. This construction is generally referred to as absorbed glass mat (AGM) type.

Valve regulated batteries are fully sealed with the exception of a one way valve that opens when excess pressure builds up inside the battery and closes when the pressure is released. The recombination of charge gases is accomplished by allowing oxygen produced at the positive plate to pass through the separator material to the negative plate where the recombination reaction occurs. The safety valve controls the internal pressure of the battery to optimize the efficiency of the recombination reaction and minimize the possible loss of water.

SEC's **CELLYTE 2TLA** batteries are manufactured using modern technology in a new battery manufacturing facility. SEC has been able to draw on a wealth of international experience and knowledge to produce high quality reliable lead acid batteries. The continuing installation of the most modern production equipment in the world makes continuous product improvement possible.

* **Valve Regulated Construction (sealed)**

The SEC valve regulated AGM (Absorbed Glass Mat) rechargeable lead acid battery for safe, trouble free operation in Vertical or Horizontal position. The acid is suspended in a specially formulated non woven glass mat separator. All the acid is absorbed in this manner and it provides a safe non-spillable battery.

* **Gas Recombination System.**

The gasses generated in the normal charge/discharge use of the battery is recombined during normal operation. In normal operation more than 99% of the gases generated are efficiently recombined.

* **SEC-CAT Catvent™ Catalyst Vent Plug**

SEC's VRLA cells incorporate the Philadelphia Scientific precious metal catalyst **Catvent™** to enhance the water recombination process within the cell, reduce cell dry out, reduces float current by 50%, positive plate corrosion, thermal runaway, and capacity loss due to negative plate polarisation.

* **Maintenance.**

The battery has been designed and built such that no addition of water is needed for the life of the battery thus there is no need to add water or take specific gravity readings.

* **Battery Life - Float Service.**

The SEC **CELLYTE 2TLA** cell is designed for float /standby service with design life of 15 years at 20°C

* **Safety Valve.**

If excess pressure builds up within the battery, the safety valve automatically opens and re closes, releasing the gas at 1-3 p.s.i. The valve does not allow the ingress of oxygen which is harmful and reduces the life expectation of the battery.

* **Temperature Range for Normal Operation.**

The SEC **CELLYTE 2TLA** battery range has a wide operating temperature range. However for maximum life and safety, continuous operation over 45 Deg C is not recommended, in fact this is not recommended for any valve regulated battery.

* **Grid Design and Paste Formulation.**

SEC has optimized the grid design and paste formulation to maximize the operating and storage life of the battery. This optimized design provides the following advantages:- Excellent recovery from deep discharge or over discharge. Low self discharge to ensure maximum storage time when not in use. Excellent cycling capability for an AGM battery. Adequate safety margins in tough operating conditions.

* **Recommended Charging Voltages;**

Float/Boost 2.25 ±1% Vpc at 20/25C

Cycle Service 2.35 ±1% Vpc at 20/25C

CELLYTE Bloc 2TLA Ampere Hour Data @ 20 C.

SEC 2 Volt Cell TYPE	END Volts / CELL	DISCHARGE DATA AMPS @ 20 C						END Volts / CELL	DISCHARGE DATA AMPERE HOURS @ 20 C									
		DISCHARGE TIME IN MINUTES							DISCHARGE TIME IN HOURS									
		5	10	15	30	45	60		1.5	2	3	4	5	6	8	10	12	24
2TLA 50	1.80	123	92.2	76.8	50.4	37.8	30.7	1.85	30.6	33.8	37.6	39.0	40.4	42.3	45.6	47.0	47.9	52.4
	1.75	127	95.6	79.6	52.2	39.2	31.9	1.80	31.2	34.6	38.4	39.8	41.3	43.2	46.6	48.0	49.0	53.5
	1.67	138	103	87.3	53.7	40.1	32.3	1.75	31.9	35.3	39.2	40.7	42.1	44.1	47.5	49.0	50.0	54.6
2TLA 100	1.80	256	192	160	105	78.7	64.0	1.85	61.1	67.7	75.2	78.0	80.8	84.6	91.2	94.0	95.9	105
	1.75	270	203	169	111	83.1	67.6	1.80	65.0	72.0	80.0	83.0	86.0	90.0	97.0	100	102	111
	1.67	292	219	185	114	85.1	68.6	1.75	67.6	74.9	83.2	86.3	89.4	93.6	101	104	106	116
2TLA 150	1.80	366	275	229	150	113	91.5	1.85	91.7	102	113	117	121	127	137	141	144	157
	1.75	387	290	242	159	119	96.7	1.80	97.5	108	120	125	129	135	146	150	153	167
	1.67	418	313	265	163	122	98.3	1.75	101	112	125	129	134	140	151	156	159	174
2TLA 200	1.80	342	293	244	188	148	122	1.85	123	136	151	157	163	170	183	189	193	211
	1.75	402	324	277	200	157	130	1.80	130	144	160	166	172	180	194	200	204	223
	1.67	448	375	308	207	161	132	1.75	136	150	167	173	180	188	203	209	213	233
2TLA 250	1.80	427	366	305	235	185	153	1.85	153	170	189	196	203	212	229	236	241	263
	1.75	502	405	346	249	196	162	1.80	163	180	200	208	215	225	243	250	255	279
	1.67	559	469	385	258	201	164	1.75	170	188	209	217	224	235	253	261	266	291
2TLA 300	1.80	512	439	366	282	221	183	1.85	184	204	226	235	243	255	275	283	289	315
	1.75	602	485	415	299	235	194	1.80	195	216	240	249	258	270	291	300	306	334
	1.67	670	562	461	310	241	197	1.75	203	225	250	260	269	282	304	313	319	349
2TLA 375	1.80	641	549	458	352	277	229	1.85	230	255	283	294	304	319	343	354	361	394
	1.75	752	606	519	373	293	242	1.80	244	270	300	311	323	338	364	375	383	418
	1.67	838	702	576	387	301	246	1.75	254	282	313	325	336	352	379	391	399	436
2TLA 400	1.80	683	586	488	376	295	244	1.85	245	271	302	313	324	339	366	377	385	420
	1.75	801	646	553	398	313	259	1.80	260	288	320	332	344	360	388	400	408	446
	1.67	893	749	615	412	321	263	1.75	271	300	334	346	359	375	404	417	425	465
2TLA 420	1.80	717	615	512	395	310	256	1.85	257	285	317	329	340	356	384	396	404	441
	1.75	842	679	581	418	328	271	1.80	273	302	336	349	361	378	407	420	428	468
	1.67	938	786	645	433	337	276	1.75	285	315	350	363	377	394	425	438	447	488
2TLA 450	1.80	769	659	549	423	332	275	1.85	276	305	339	352	365	382	411	424	432	472
	1.75	901	727	622	448	352	291	1.80	293	324	360	374	387	405	437	450	459	501
	1.67	1005	842	691	464	360	295	1.75	305	338	375	389	403	422	455	469	478	522
2TLA 500	1.80	854	732	610	470	369	305	1.85	307	340	378	392	406	425	458	472	481	526
	1.75	1003	809	693	498	392	324	1.80	325	360	400	415	430	450	485	500	510	557
	1.67	1118	937	770	516	401	329	1.75	339	376	418	433	449	470	506	522	532	582
2TLA 570	1.80	974	834	695	535	421	348	1.85	349	387	430	446	462	484	521	538	548	599
	1.75	1144	922	789	568	446	369	1.80	371	410	456	473	490	513	553	570	581	635
	1.67	1274	1068	877	589	457	375	1.75	387	428	476	494	512	536	577	595	607	663
2TLA 600	1.80	1025	878	732	564	443	366	1.85	368	408	453	470	487	509	549	566	577	631
	1.75	1203	970	831	598	470	388	1.80	390	432	480	498	516	540	582	600	612	668
	1.67	1341	1124	923	619	481	394	1.75	407	451	501	520	538	563	607	626	639	697
2TLA 625	1.80	1068	915	763	587	461	381	1.85	384	425	472	490	507	531	572	590	602	657
	1.75	1253	1011	865	623	489	404	1.80	406	450	500	519	538	563	606	625	638	696
	1.67	1397	1171	961	645	501	411	1.75	424	469	522	541	561	587	632	652	665	726
2TLA 750	1.80	1281	1098	915	705	554	458	1.85	460	509	566	587	608	636	686	707	721	788
	1.75	1503	1212	1038	747	587	485	1.80	488	540	600	623	645	675	728	750	765	836
	1.67	1675	1404	1153	773	601	493	1.75	508	563	626	649	673	704	759	782	798	871
2TLA 800	1.80	1366	1171	976	752	590	488	1.85	491	544	604	627	649	680	732	755	770	841
	1.75	1605	1294	1108	797	626	518	1.80	520	576	640	664	688	720	776	800	816	891
	1.67	1789	1499	1231	826	642	526	1.75	543	601	668	693	718	752	810	835	852	930
2TLA 1000	1.80	1708	1464	1220	939	738	610	1.85	613	679	754	783	811	849	915	943	962	1051
	1.75	2005	1617	1384	996	782	647	1.80	650	720	800	830	860	900	970	1000	1020	1114
	1.67	2234	1873	1538	1032	802	657	1.75	678	751	834	866	897	939	1012	1043	1064	1162
2TLA 1250	1.80	2135	1830	1525	1174	923	763	1.85	766	849	943	979	1014	1061	1144	1179	1203	1313
	1.75	2506	2021	1730	1245	978	808	1.80	813	900	1000	1038	1075	1125	1213	1250	1275	1393
	1.67	2793	2341	1922	1290	1002	822	1.75	848	939	1043	1082	1121	1174	1265	1304	1330	1453
2TLA 1500	1.80	2562	2196	1830	1409	1107	915	1.85	920	1019	1132	1174	1217	1274	1373	1415	1443	1576
	1.75	3002	2421	2072	1491	1172	968	1.80	975	1080	1200	1245	1290	1350	1455	1500	1530	1671
	1.67	3346	2805	2303	1545	1201	984	1.75	1015	1125	1250	1296	1343	1406	1515	1562	1593	1740
2TLA 1850	1.80	3160	2708	2257	1738	1365	1129	1.85	1150	1274	1415	1468	1521	1592	1716	1769	1804	1971
	1.75	3759	3032	2595	1868	1467	1213	1.80	1203	1332	1480	1536	1591	1665	1795	1850	1887	2061
	1.67	4190	3512	2884	1935	1503	1232	1.75	1271	1408	1565	1623	1682	1760	1897	1956	1995	2179
2TLA 2000	1.80	3416	2928	2440	1879	1476	1220	1.85	1227	1359	1510	1566	1623	1698	1830	1887	1925	2102
	1.75	4011	3235	2769	1993	1566	1294	1.80	1300	1440	1600	1660	1720	1800	1940	2000	2040	2228
	1.67	4470	3747	3077	2064	1604	1315	1.75	1357	1503	1670	1732	1795	1878	2024	2087	2129	2325
2TLA 2500	1.80	4270	3660	3050	2349	1845	<											

CELLYTE Bloc 2TLA Amps Data @ 20 C.

SEC 2 Volt Cell TYPE	END Volts / CELL	DISCHARGE DATA AMPS @ 20 C						END Volts / CELL	DISCHARGE DATA AMPS @ 20 C									
		DISCHARGE TIME IN MINUTES							DISCHARGE TIME IN HOURS									
		5	10	15	30	45	60		1.5	2	3	4	5	6	8	10	12	24
2TLA 50	1.80	123	92.2	76.8	50.4	37.8	30.7	1.85	20.4	16.9	12.5	9.75	8.08	7.05	5.70	4.70	4.00	2.18
	1.75	127	95.6	79.6	52.2	39.2	31.9	1.80	20.8	17.3	12.8	10.0	8.26	7.20	5.82	4.80	4.08	2.23
	1.67	138	103.2	87.3	53.7	40.1	32.3	1.75	21.2	17.6	13.1	10.2	8.43	7.35	5.94	4.90	4.17	2.27
2TLA 100	1.80	256	192	160	105	78.7	64.0	1.85	40.7	33.8	25.1	19.5	16.2	14.1	11.4	9.40	7.99	4.36
	1.75	270	203	169	111	83.1	67.6	1.80	43.3	36.0	26.7	20.8	17.2	15.0	12.1	10.0	8.50	4.64
	1.67	292	219	185	114	85.1	68.6	1.75	45.1	37.4	27.7	21.6	17.9	15.6	12.6	10.4	8.84	4.83
2TLA 150	1.80	366	275	229	150	113	91.5	1.85	61.1	50.8	37.6	29.3	24.3	21.2	17.1	14.1	12.0	6.54
	1.75	387	290	242	159	119	96.7	1.80	65.0	54.0	40.0	31.1	25.8	22.5	18.2	15.0	12.8	6.96
	1.67	418	313	265	163	122	98.3	1.75	67.6	56.2	41.6	32.4	26.8	23.4	18.9	15.6	13.3	7.24
2TLA 200	1.80	342	293	244	188	148	122	1.85	81.9	68.0	50.4	39.2	32.5	28.4	22.9	18.9	16.1	8.77
	1.75	402	324	277	200	157	130	1.80	86.7	72.0	53.3	41.5	34.4	30.0	24.3	20.0	17.0	9.28
	1.67	448	375	308	207	161	132	1.75	90.6	75.2	55.7	43.4	35.9	31.4	25.3	20.9	17.8	9.70
2TLA 250	1.80	427	366	305	235	185	153	1.85	102	85.0	62.9	49.0	40.6	35.4	28.6	23.6	20.1	11.0
	1.75	502	405	346	249	196	162	1.80	108	90.0	66.7	51.9	43.0	37.5	30.3	25.0	21.3	11.6
	1.67	559	469	385	258	201	164	1.75	113	94.0	69.6	54.2	44.9	39.2	31.6	26.1	22.2	12.1
2TLA 300	1.80	512	439	366	282	221	183	1.85	123	102	75.5	58.7	48.7	42.5	34.3	28.3	24.1	13.1
	1.75	602	485	415	299	235	194	1.80	130	108	80.0	62.3	51.6	45.0	36.4	30.0	25.5	13.9
	1.67	670	562	461	310	241	197	1.75	136	113	83.5	64.9	53.8	47.0	38.0	31.3	26.6	14.5
2TLA 375	1.80	641	549	458	352	277	229	1.85	153	127	94.4	73.5	60.9	53.1	42.9	35.4	30.1	16.4
	1.75	752	606	519	373	293	242	1.80	163	135	100	77.8	64.5	56.3	45.5	37.5	31.9	17.4
	1.67	838	702	576	387	301	246	1.75	169	141	104	81.1	67.3	58.7	47.4	39.1	33.2	18.1
2TLA 400	1.80	683	586	488	376	295	244	1.85	163	136	101	78.2	64.8	56.6	45.7	37.7	32.0	17.5
	1.75	801	646	553	398	313	259	1.80	173	144	107	83.0	68.8	60.0	48.5	40.0	34.0	18.6
	1.67	893	749	615	412	321	263	1.75	181	150	111	86.5	71.7	62.6	50.6	41.7	35.4	19.4
2TLA 420	1.80	717	615	512	395	310	256	1.85	172	143	106	82.1	68.1	59.4	48.0	39.6	33.6	18.4
	1.75	842	679	581	418	328	271	1.80	182	151	112	87.2	72.2	63.0	50.9	42.0	35.7	19.5
	1.67	938	786	645	433	337	276	1.75	190	158	117	90.9	75.3	65.7	53.1	43.8	37.2	20.3
2TLA 450	1.80	769	659	549	423	332	275	1.85	184	153	113	88.0	72.9	63.6	51.4	42.4	36.0	19.7
	1.75	901	727	622	448	352	291	1.80	195	162	120	93.4	77.4	67.5	54.6	45.0	38.3	20.9
	1.67	1005	842	691	464	360	295	1.75	203	169	125	97.3	80.7	70.4	56.9	46.9	39.9	21.8
2TLA 500	1.80	854	732	610	470	369	305	1.85	205	170	126	97.9	81.2	70.8	57.2	47.2	40.1	21.9
	1.75	1003	809	693	498	392	324	1.80	217	180	133	104	86.0	75.0	60.6	50.0	42.5	23.2
	1.67	1118	937	770	516	401	329	1.75	226	188	139	108	89.8	78.3	63.3	52.2	44.4	24.2
2TLA 570	1.80	974	834	695	535	421	348	1.85	233	194	143	112	92.5	80.6	65.2	53.8	45.7	24.9
	1.75	1144	922	789	568	446	369	1.80	247	205	152	118	98.0	85.5	69.1	57.0	48.5	26.5
	1.67	1274	1068	877	589	457	375	1.75	258	214	159	123	102	89.3	72.1	59.5	50.6	27.6
2TLA 600	1.80	1025	878	732	564	443	366	1.85	245	204	151	117	97.4	84.9	68.6	56.6	48.1	26.3
	1.75	1203	970	831	598	470	388	1.80	260	216	160	125	103	90.0	72.8	60.0	51.0	27.9
	1.67	1341	1124	923	619	481	394	1.75	271	225	167	130	108	93.9	75.9	62.6	53.2	29.1
2TLA 625	1.80	1068	915	763	587	461	381	1.85	256	212	157	122	101	88.5	71.5	59.0	50.2	27.4
	1.75	1253	1011	865	623	489	404	1.80	271	225	167	130	108	93.8	75.8	62.5	53.1	29.0
	1.67	1397	1171	961	645	501	411	1.75	283	235	174	135	112	97.8	79.1	65.2	55.4	30.3
2TLA 750	1.80	1281	1098	915	705	554	458	1.85	306	255	189	147	122	106	85.7	70.7	60.1	32.8
	1.75	1503	1212	1038	747	587	485	1.80	325	270	200	156	129	113	90.9	75.0	63.8	34.8
	1.67	1675	1404	1153	773	601	493	1.75	339	282	209	162	135	117	94.8	78.2	66.5	36.3
2TLA 800	1.80	1366	1171	976	752	590	488	1.85	327	272	201	157	130	113	91.5	75.5	64.2	35.0
	1.75	1605	1294	1108	797	626	518	1.80	347	288	213	166	138	120	97.0	80.0	68.0	37.1
	1.67	1789	1499	1231	826	642	526	1.75	362	301	223	173	144	125	101	83.5	71.0	38.8
2TLA 1000	1.80	1708	1464	1220	939	738	610	1.85	409	339	251	196	162	141	114	94.3	80.2	43.8
	1.75	2005	1617	1384	996	782	647	1.80	433	360	267	208	172	150	121	100	85.0	46.4
	1.67	2234	1873	1538	1032	802	657	1.75	452	375	278	216	179	156	126	104	88.7	48.4
2TLA 1250	1.80	2135	1830	1525	1174	923	763	1.85	511	424	314	245	203	177	143	118	100	54.7
	1.75	2506	2021	1730	1245	978	808	1.80	542	450	333	259	215	188	152	125	106	58.0
	1.67	2793	2341	1922	1290	1002	822	1.75	565	469	348	271	224	196	158	130	111	60.5
2TLA 1500	1.80	2562	2196	1830	1409	1107	915	1.85	613	509	377	294	243	212	172	142	120	65.7
	1.75	3002	2421	2072	1491	1172	968	1.80	650	540	400	311	258	225	182	150	128	69.6
	1.67	3346	2805	2303	1545	1201	984	1.75	677	562	417	324	269	234	189	156	133	72.5
2TLA 1850	1.80	3160	2708	2257	1738	1365	1129	1.85	767	637	472	367	304	265	214	177	150	82.1
	1.75	3759	3032	2595	1868	1467	1213	1.80	802	666	493	384	318	278	224	185	157	85.9
	1.67	4190	3512	2884	1935	1503	1232	1.75	848	704	522	406	336	293	237	196	166	90.8
2TLA 2000	1.80	3416	2928	2440	1879	1476	1220	1.85	818	679	503	392	325	283	229	189	160	87.6
	1.75	4011	3235	2769	1993	1566	1294	1.80	867	720	533	415	344	300	243	<		

CELLYTE 2TLA Watts per Cell @ 20 C.

SEC 2 Volt Cell TYPE	END Volts / CELL	DISCHARGE W P C @ 20 C						END Volts / CELL	DISCHARGE DATA Watts Per Cell AT 20 C									
		DISCHARGE TIME IN MINUTES							DISCHARGE TIME IN HOURS									
		5	10	15	30	45	60		1.5	2	3	4	5	6	8	10	12	24
2TLA 50	1.80	221	168	141	93.2	71.8	59.0	1.85	39.2	32.7	24.4	19.1	15.9	13.9	11.3	9.37	7.99	4.38
	1.75	227	172	144	96.6	72.9	61.2	1.80	39.7	33.2	24.8	19.4	16.2	14.2	11.5	9.52	8.12	4.46
	1.67	237	181	156	98.2	74.6	61.8	1.75	40.0	33.5	25.1	19.6	16.4	14.3	11.6	9.64	8.22	4.52
2TLA 100	1.80	461	349	294	194	150	123	1.85	78.4	65.4	48.9	38.3	31.9	27.9	22.6	18.7	16.0	8.76
	1.75	481	365	306	205	155	130	1.80	82.7	69.1	51.7	40.5	33.7	29.5	24.0	19.8	16.9	9.28
	1.67	502	383	332	209	158	131	1.75	85.0	71.1	53.2	41.7	34.7	30.4	24.7	20.5	17.4	9.59
2TLA 150	1.80	659	500	420	278	214	176	1.85	118	98.1	73.3	57.4	47.8	41.8	34.0	28.1	24.0	13.1
	1.75	689	522	438	293	221	186	1.80	124	104	77.5	60.7	50.5	44.2	36.0	29.8	25.4	13.9
	1.67	719	548	475	299	227	188	1.75	127	107	79.8	62.5	52.1	45.6	37.1	30.7	26.2	14.4
2TLA 200	1.80	615	533	448	348	280	234	1.85	158	132	98.2	76.9	64.0	56.0	45.5	37.7	32.1	17.6
	1.75	715	583	502	369	292	249	1.80	165	138	103	80.9	67.4	59.0	47.9	39.7	33.8	18.6
	1.67	770	657	552	378	299	251	1.75	171	143	107	83.8	69.8	61.1	49.7	41.1	35.1	19.3
2TLA 250	1.80	769	666	560	434	351	293	1.85	197	164	123	96.1	80.0	70.0	56.9	47.1	40.1	22.0
	1.75	893	728	627	461	364	311	1.80	207	173	129	101	84.2	73.7	59.9	49.6	42.3	23.2
	1.67	962	820	689	472	373	314	1.75	213	178	133	105	87.2	76.3	62.0	51.4	43.8	24.1
2TLA 300	1.80	922	799	672	521	421	351	1.85	236	197	147	115	95.9	83.9	68.2	56.4	48.1	26.4
	1.75	1071	873	752	553	437	373	1.80	248	207	155	121	101	88.5	71.9	59.5	50.7	27.9
	1.67	1153	983	826	567	447	377	1.75	256	214	160	125	105	91.5	74.4	61.6	52.5	28.9
2TLA 375	1.80	1153	999	840	652	526	439	1.85	295	246	184	144	120	105	85.3	70.6	60.1	33.0
	1.75	1338	1091	939	691	546	465	1.80	310	259	194	152	126	111	89.9	74.4	63.4	34.8
	1.67	1441	1229	1032	708	559	470	1.75	319	267	200	157	131	114	92.9	76.9	65.6	36.0
2TLA 400	1.80	1230	1066	895	695	561	468	1.85	314	262	196	153	128	112	90.8	75.2	64.1	35.1
	1.75	1427	1163	1001	737	582	496	1.80	331	276	207	162	135	118	95.9	79.4	67.6	37.1
	1.67	1536	1310	1100	755	596	502	1.75	341	285	213	167	139	122	99.1	82.1	69.9	38.4
2TLA 420	1.80	1291	1119	940	730	589	492	1.85	330	275	206	161	134	117	95.4	78.9	67.3	36.9
	1.75	1498	1222	1052	773	611	521	1.80	347	290	217	170	142	124	101	83.3	71.0	39.0
	1.67	1613	1376	1155	793	626	527	1.75	358	299	224	176	146	128	104	86.2	73.4	40.4
2TLA 450	1.80	1383	1199	1007	782	631	527	1.85	354	295	220	173	144	126	102	84.5	72.0	39.5
	1.75	1605	1309	1126	828	654	558	1.80	372	311	232	182	152	133	108	89.3	76.1	41.8
	1.67	1728	1474	1238	849	670	564	1.75	383	320	240	188	157	137	111	92.3	78.7	43.2
2TLA 500	1.80	1537	1332	1119	869	701	586	1.85	394	328	245	192	160	140	114	94.1	80.2	44.0
	1.75	1786	1456	1254	922	728	621	1.80	414	346	258	202	168	147	120	99.2	84.5	46.4
	1.67	1923	1640	1377	945	746	628	1.75	426	357	267	209	174	153	124	103	87.5	48.1
2TLA 570	1.80	1752	1519	1276	991	799	668	1.85	448	374	279	219	182	159	129	107	91.3	50.1
	1.75	2036	1660	1429	1051	830	708	1.80	472	394	294	231	192	168	137	113	96.4	52.9
	1.67	2192	1870	1570	1077	851	716	1.75	486	407	304	239	199	174	141	117	99.8	54.8
2TLA 600	1.80	1845	1599	1343	1043	841	703	1.85	472	394	294	230	192	168	136	113	96.2	52.7
	1.75	2142	1747	1503	1106	874	745	1.80	496	415	310	243	202	177	144	119	101	55.7
	1.67	2306	1967	1652	1133	895	753	1.75	511	428	320	251	209	183	149	123	105	57.7
2TLA 625	1.80	1922	1665	1399	1086	876	732	1.85	492	411	307	240	200	175	142	118	100	55.0
	1.75	2231	1819	1566	1152	910	776	1.80	517	432	323	253	211	184	150	124	106	58.0
	1.67	2402	2049	1721	1180	932	785	1.75	533	445	333	261	218	191	155	128	109	60.1
2TLA 750	1.80	2306	1998	1679	1303	1052	878	1.85	589	492	367	288	240	210	170	141	120	65.9
	1.75	2675	2182	1878	1381	1091	931	1.80	620	518	387	303	253	221	180	149	127	69.6
	1.67	2881	2457	2064	1415	1118	941	1.75	639	534	400	313	261	229	186	154	131	72.1
2TLA 800	1.80	2460	2132	1791	1390	1122	937	1.85	629	525	392	307	256	224	182	151	128	70.3
	1.75	2857	2330	2005	1475	1165	994	1.80	662	553	413	324	270	236	192	159	135	74.3
	1.67	3076	2624	2203	1511	1194	1005	1.75	682	571	427	335	279	244	198	164	140	77.0
2TLA 1000	1.80	3074	2664	2239	1738	1402	1171	1.85	786	656	490	384	320	280	227	188	160	87.8
	1.75	3568	2910	2505	1842	1455	1242	1.80	827	691	517	405	337	295	240	198	169	92.8
	1.67	3843	3277	2752	1888	1491	1255	1.75	852	713	533	418	348	305	248	205	175	96.1
2TLA 1250	1.80	3843	3331	2798	2172	1753	1464	1.85	983	820	613	480	399	350	284	235	200	110
	1.75	4461	3638	3132	2303	1820	1552	1.80	1034	864	646	506	421	369	300	248	211	116
	1.67	4804	4097	3441	2360	1864	1569	1.75	1065	891	667	523	436	381	310	257	219	120
2TLA 1500	1.80	4612	3997	3358	2607	2104	1757	1.85	1180	985	735	576	479	420	341	282	240	132
	1.75	5344	4358	3751	2759	2180	1859	1.80	1241	1037	775	607	505	442	360	298	254	139
	1.67	5755	4908	4122	2827	2233	1880	1.75	1276	1067	799	626	522	457	371	307	262	144
2TLA 1850	1.80	5688	4929	4142	3215	2594	2167	1.85	1475	1231	919	720	599	525	426	353	301	165
	1.75	6692	5457	4697	3455	2729	2328	1.80	1530	1279	956	749	623	546	443	367	313	172
	1.67	7206	6146	5162	3540	2796	2354	1.75	1598	1336	1000	784	653	572	465	385	328	180
2TLA 2000	1.80	6149	5329	4477	3476	2805	2342	1.85	1573	1313	981	768	639	560	455	376	321	176
	1.75	7140	5823	5012	3686	2912	2484	1.80	1654	1382	1033	809	674	590	479	397	338	186
	1.67	7689	6558	5507	3778	2984	2511	1.75	1705	1426	1067	8						

SEC TLA 2 Volt AGM Range - Battery Specification

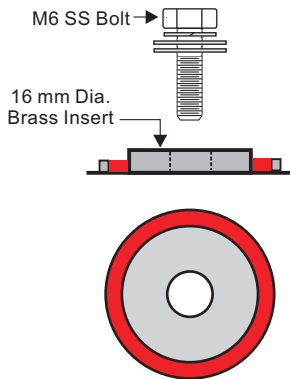
SEC CELL TYPE	CELL Volts	Nominal Capacity Amp Hour	Cell Length (L) mm	Cell Length (L) Inch	Cell Width (W) mm	Cell Width (W) Inch	Cell Height (H1) mm	Cell Height (H1) Inch	Cell Height (H2)mm	Cell Height (H2) Inch	Cell Weight KG	Cell Weight lbs	Inter. Res. m/ohms	Short Circuit Current	No. of Term.	Terminal Type
SEC 2TLA-50	2	50	161	6.34	50	1.97	166	6.54	166	6.54	4.5	9.90	0.90	509	2	FT 4
SEC 2TLA-100	2	100	171	6.73	72	2.83	205	8.07	245	9.65	8.0	17.6	0.70	1080	2	FT 4
SEC 2TLA-150	2	150	172	6.77	102	4.02	205	8.07	245	9.65	11.0	24.2	0.60	1550	2	FT 4
SEC 2TLA-200	2	200	173	6.81	111	4.37	329	12.95	365	14.37	14.0	30.8	0.50	1600	2	FT 5
SEC 2TLA-250	2	250	173	6.81	111	4.37	329	12.95	365	14.37	18.0	39.6	0.45	2000	2	FT 5
SEC 2TLA-300	2	300	171	6.73	151	5.94	330	12.99	366	14.41	21.0	46.2	0.40	2400	2	FT 5
SEC 2TLA-375	2	375	171	6.73	151	5.94	330	12.99	366	14.41	23.5	51.7	0.39	3000	2	FT 5
SEC 2TLA-400	2	400	211	8.31	176	6.93	329	12.95	367	14.45	27.0	59.4	0.36	3200	4	FT 5
SEC 2TLA-420	2	420	211	8.31	176	6.93	329	12.95	367	14.45	27.4	60.3	0.35	3300	4	FT 5
SEC 2TLA-450	2	450	223	8.78	187	7.36	351	13.82	373	14.69	30.0	66.0	0.33	3600	4	FT 5
SEC 2TLA-500	2	500	211	8.31	176	6.93	329	12.95	367	14.45	32.0	70.4	0.30	4000	4	FT 5
SEC 2TLA-570	2	570	223	8.78	187	7.36	351	13.82	373	14.69	35.0	77.0	0.29	4600	4	FT 5
SEC 2TLA-600	2	600	301	11.85	175	6.89	331	13.03	366	14.41	40.0	88.0	0.28	4800	4	FT 5
SEC 2TLA-625	2	625	241	9.49	172	6.77	331	13.03	366	14.41	47.0	103	0.25	5000	4	FT 5
SEC 2TLA-750	2	750	301	11.85	175	6.89	331	13.03	366	14.41	55.0	121	0.22	6000	4	FT 5
SEC 2TLA-800	2	800	410	16.14	175	6.89	330	12.99	365	14.37	57.0	125	0.20	6400	8	FT 5
SEC 2TLA-1000	2	1000	410	16.14	175	6.89	330	12.99	365	14.37	63.0	139	0.16	7900	8	FT 5
SEC 2TLA-1250	2	1250	475	18.70	175	6.89	328	12.91	365	14.37	78.0	172	0.13	10050	8	FT 5
SEC 2TLA-1500	2	1500	401	15.79	351	13.82	342	13.46	378	14.88	100	220	0.11	11950	8	FT 5
SEC 2TLA-1850	2	1850	401	15.79	351	13.82	342	13.46	378	14.88	125	275	0.10	15050	8	FT 5
SEC 2TLA-2000	2	2000	491	19.33	351	13.82	344	13.54	383	15.08	132	290	0.09	16100	8	FT 5
SEC 2TLA-2500	2	2500	491	19.33	351	13.82	344	13.54	383	15.08	175	385	0.08	19850	8	FT 5
SEC 2TLA-3000	2	3000	712	28.03	353	13.90	341	13.43	382	15.04	210	462	0.08	24100	8	FT 5
SEC 2TLA-3850	2	3850	712	28.03	353	13.90	341	13.43	382	15.04	261	574	0.07	30800	8	FT 5

Battery Dimensions may be changed without prior notice.

FT4 = 16 mm Diameter copper post with M6 Bolt

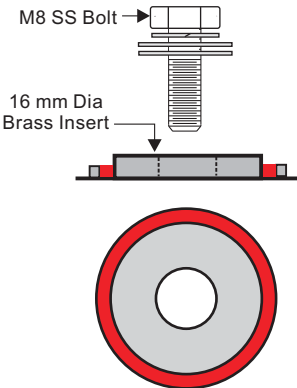
FT5 = 16 mm Diameter copper post with M8 Bolt

Terminal Type FT 4

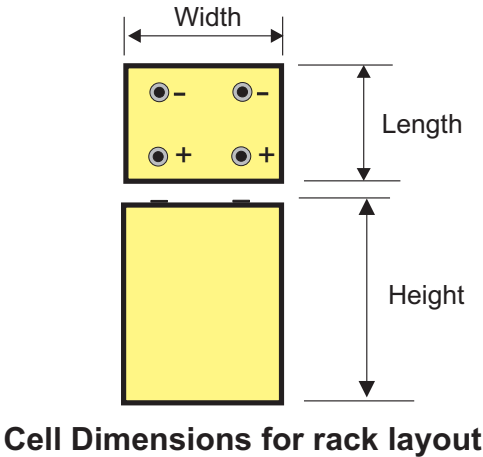


16 mm Ø Brass Insert Terminal for M6 Bolt

Terminal Type FT 5



16 mm Ø Brass Insert Terminal for M8 Bolt



Cell Dimensions for rack layout

Benefits of Catalyst in SEC VRLA Batteries

Catalyst Reduces Float Current

One of the most immediate, observable effects of installing a catalyst in a VRLA cell is a sudden drop in the float current. Typically float currents are one half or less when a catalyst is installed. Adding a catalyst to the cell prevents some of the oxygen reaching the negative plate and allows the negative plate to stay polarised. This means that less current needs to be supplied to the cell from the charging system, manifesting itself as lower float current, leading to the following benefit :-

* Minimize water loss

Gasses are recombined into water inside the cell rather than exiting the cell. Too much gas leaving the cell can lead to premature dry-out and cell failure. Cell dry is a major cause of VRLA cell failure.

* Increased life

There are many potential failure modes of VRLA cells. A number of these failure modes can be mitigated by the catalyst technology such as: Cell dry out, positive plate corrosion, thermal runaway, capacity loss due to negative plate depolarization

* Minimize positive plate corrosion

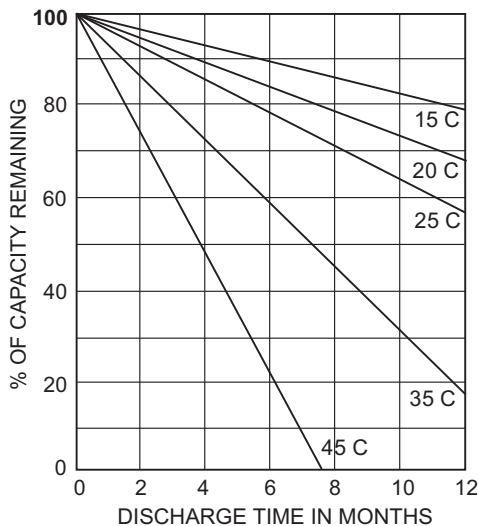
A reduction in float current reduces the amount of over-charge on the positive plate which directly impacts the corrosion rate. The design life of a lead acid cell is based on the corrosion of the plate barring any other unforeseen failure modes.

* Maintain cell capacity

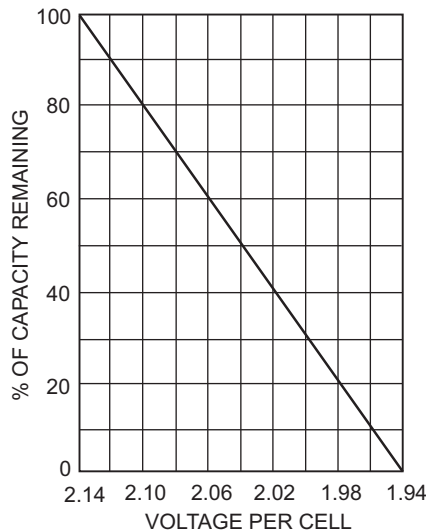
Many VRLA cells in service are failing capacity tests because their negative plates are depolarized. In fact significant capacity increases have been seen on some cells just by installing a catalyst.

CELLYTE 2TLA Cells - PERFORMANCE CURVES

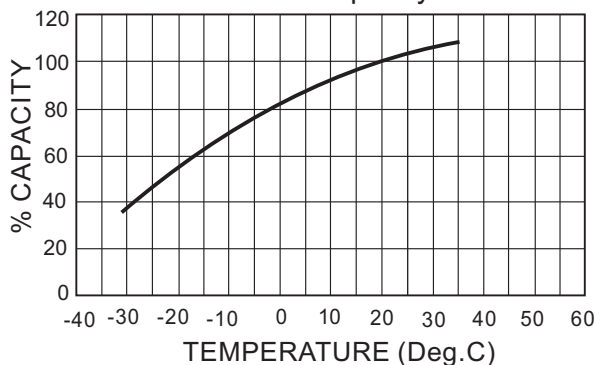
SELF DISCHARGE CHARACTERISTIC



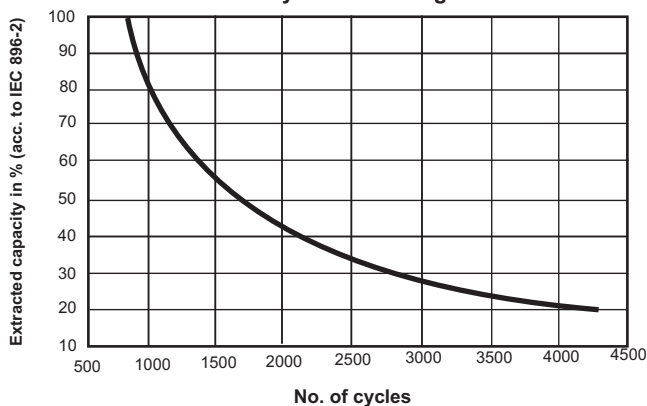
OPEN CIRCUIT VOLTAGE vs CAPACITY



NOTE :100% Capacity at 20C



Endurance in cycles according to IEC 896-2



Standards / Approvals

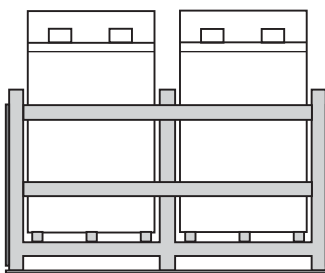
UL approval
BS 6290 Part 4 (Optional)
Eurobat (Draft IEC 896-2)
IEEE
JIS

SEC CELLYTE 2TLA Cells - Horizontal & Vertical Racking Systems.

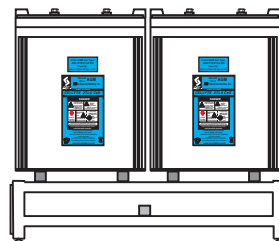
SEC2TLA Range can be mounted on/in vertical or Horizontal Racking System
It is not recommended to mount cells larger than 1000 AH in horizontal position.



Typical rack for horizontal cell configuration



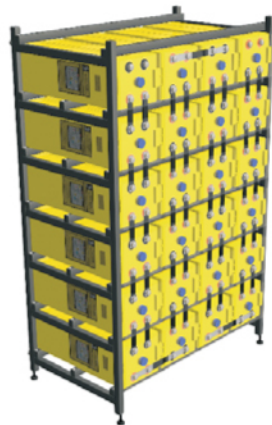
Typical anti-seismic rack for vertical cell configuration



Typical standard rack for vertical cell configuration



CELLYTE 2CMT/G Modular



CELLYTE 2TLAM/G Tubular



CELLYTE 2CMT/G, 2TLAM/G with Catalyst



CELLYTE 12FTA/G Range



CELLYTE 6-12TLA Range



CELLYTE 6-12TUA Range



CELLYTE 6-12TLG Range



CELLYTE 6-12TSG Range



MICROLYTE +Plus Range



MICROLYTE Red Top Range



CELLYTE 2TLA/G Range



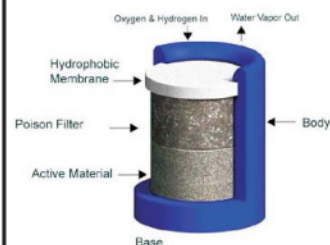
**SEC 2ETG OPzV Range
in Tubular Rack**



SEC Tubular OPzS Range



SEC Nickel Cadmium Range



Typical VRLA Catalyst