



Uninterruptible Power Supply

Battery Performance Specification



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Features and Benefits

- Front terminal 1010, 1109 and 1150 Watts per cell sizes (five minute rate to 1.67 Vpc)
- Top terminal 763 and 1040 Watts per cell sizes (five minute rate to 1.67Vpc)
- Specifically designed for five minutes or less high-rate discharge applications
- Pure lead technology for longer life at elevated temperatures
- 12 year design life at 77°F (25°C)
- Up to 17 months shelf life at 77°F (25°C) for maximum flexibility in project deployment
- Outstanding power density in industry-standard footprints at 77°F (25°C)
- Fast recharge times to support multiple AC outages
- Lower energy consumption compared to traditional VRLA batteries
- Front terminal design for ease of installation and maintenance
- Top terminal for upgrades to existing applications

Construction

- High performance Thin Plate Pure Lead (TPPL) grids for optimized corrosion resistance at high operating temperatures
- Active material specifically engineered for maximum performance at sub five minute discharge rates
- Enhanced internal connections designed for high rate Uninterruptible Power Supply (UPS) loads
- Superior quality microporous glass mat separator with high absorption and stability
- Containers and lids in UL94 V-0 rated flame retardant material, highly resistant to shock and vibration
- High grade sulphuric acid electrolyte absorbed into separator material
- High integrity leak resistant dual-seal terminal design
- Self-regulating pressure relief valves prevent ingress of oxygen
- Flame arrestors built into each bloc for increased operational safety
- Robust handles for ease of handling

Installation and Operation

- Monoblocs are designed for installation in cabinets or on racks, close to the point of use. A separate battery room is not necessary
- It is recommended that DataSafe® XE blocs are installed upright
- Recommended float charge voltage:
2.27Vpc at 77°F (25°C)
2.29Vpc at 68°F (20°C)
- Low maintenance: no water addition required
- Wide operating temperature range: -40°F (-40°C) to 122°F (50°C)
- Front terminal connection torque: 9Nm – 80 lbf in;
Top terminal connection torque: 6.8Nm - 60lbf in

Standards

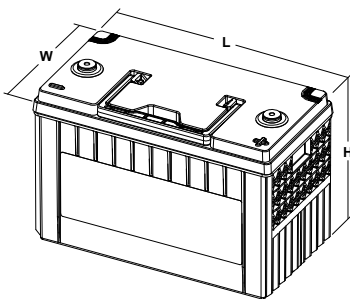
- Designed to be compliant with the requirements of international standard IEC 60896-21/22
- UL recognized component
- Classified as non-spillable and approved as non-hazardous cargo for ground, sea and air transportation in accordance with the requirements of International Maritime code for Dangerous Goods (IMDG) and International Civil Aviation Organization (ICAO)
- The management systems governing the manufacture of DataSafe XE batteries are ISO 9001:2008, ISO 14001:2004 and OHSAS 18001:2007* certified

* OHSAS 18001:2007 certification not applicable to 12XE760F-FR

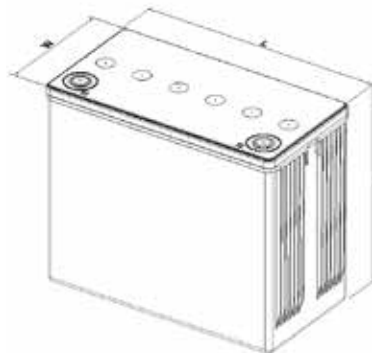
General Specifications

Battery Type	Nominal Voltage (V)	Watts/Cell (Wpc)		Nominal Capacity (Ah)		Nominal Dimensions						Typical Weight (lbs)	Typical Weight (kg)	Short Circuit Current (A) ¹	Internal Resistance (mΩ) ¹	Terminals
		5min/1.67Vpc 77°F/25°C	15min/1.67Vpc 77°F/25°C	C10/1.80Vpc 68°F/20°C	C8/1.75Vpc 77°F/25°C	Length (in)	Length (mm)	Width (in)	Width (mm)	Overall Height (in)	Overall Height (mm)					
12XE760-FR	12	763	390	92	93	13.0	330	6.8	173	8.6	218	77.4	35.1	3100	4.0	M6 female
12XE1040-FR	12	1040	560	124	129	13.3	338	6.8	173	10.7	273	97.0	44.0	4150	3.3	M6 female
12XE1010F-FR	12	1010	566	155	158	22.9	581	4.9	125	11.1	283	107.4	48.7	3498	3.6	M6 male
12XE1110F-FR	12	1109	649	165	167	22.9	581	4.9	125	11.1	283	114.0	51.7	3916	3.2	M6 male
12XE1150F-FR	12	1150	706	180	181	22.9	581	4.9	125	12.4	316	129.2	58.6	4081	3.1	M6 male

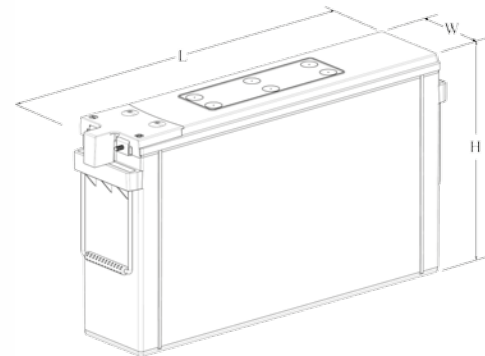
Note:
¹ Figures obtained via IEC method.



12XE760-FR



12XE1040-FR



12XE1010F-FR
12XE1110F-FR
12XE1150F-FR

Constant Power Discharge Performance Data

Constant Power (Watts per cell) at 77°F (25°C) to 1.75Vpc

Battery Type	Standby Time (Minutes)																			
	0.5	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	20	30	45	60
12XE760-FR	1243	1147	975	859	772	702	643	593	550	513	483	456	432	410	390	373	309	230	170	136
12XE1040-FR	1259	1259	1187	1101	1022	930	845	772	727	692	660	630	602	577	551	527	436	328	241	193
12XE1010F-FR	1178	1178	1127	1038	963	897	840	789	744	704	672	643	617	592	570	548	462	353	266	214
12XE1110F-FR	1262	1262	1228	1141	1066	1000	942	890	843	802	766	733	703	675	649	626	530	410	308	246
12XE1150F-FR	1262	1262	1227	1156	1095	1042	996	954	907	863	822	785	750	718	688	665	569	439	329	264

Constant Power (Watts per cell) at 77°F (25°C) to 1.70Vpc

Battery Type	Standby Time (Minutes)																			
	0.5	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	20	30	45	60
12XE760-FR	1385	1279	1073	930	823	744	678	623	576	536	501	472	447	424	403	384	316	234	173	137
12XE1040-FR	1417	1407	1292	1198	1091	987	904	834	773	730	694	660	629	601	575	550	451	337	246	196
12XE1010F-FR	1278	1278	1216	1146	1051	972	904	844	791	743	701	667	637	610	585	562	470	357	266	214
12XE1110F-FR	1388	1388	1312	1243	1152	1073	1005	945	891	843	799	761	728	697	669	643	540	413	308	246
12XE1150F-FR	1440	1440	1337	1248	1175	1112	1059	1010	966	926	879	835	795	759	725	694	586	449	333	265

Constant Power (Watts per cell) at 77°F (25°C) to 1.67Vpc

Battery Type	Standby Time (Minutes)																			
	0.5	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	20	30	45	60
12XE760-FR	1425	1327	1121	967	851	763	695	637	589	547	510	480	454	430	409	389	319	236	174	138
12XE1040-FR	1524	1485	1358	1256	1145	1040	951	875	809	751	711	676	643	613	585	560	458	340	248	197
12XE1010F-FR	1329	1322	1244	1177	1097	1010	935	869	812	761	716	676	644	616	590	566	472	357	266	214
12XE1110F-FR	1457	1432	1343	1270	1195	1109	1035	970	913	860	814	772	737	705	676	649	541	413	308	246
12XE1150F-FR	1524	1514	1397	1298	1218	1150	1091	1038	992	947	905	858	814	775	739	706	592	452	333	265

Constant Power (Watts per cell) at 77°F (25°C) to 1.65Vpc

Battery Type	Standby Time (Minutes)																			
	0.5	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	20	30	45	60
12XE760-FR	1449	1346	1149	987	865	774	703	645	595	552	515	484	457	433	412	392	321	237	174	138
12XE1040-FR	1592	1533	1400	1289	1185	1074	980	900	830	770	721	684	651	620	591	565	461	341	248	197
12XE1010F-FR	1361	1347	1262	1190	1125	1031	953	884	824	771	724	682	647	618	592	568	472	357	266	214
12XE1110F-FR	1503	1460	1362	1284	1218	1130	1052	985	923	869	821	777	740	708	678	650	542	413	308	246
12XE1150F-FR	1564	1546	1436	1331	1244	1172	1111	1056	1006	960	916	869	823	782	745	712	595	452	333	265

Constant Power (Watts per cell) at 77°F (25°C) to 1.63Vpc

Battery Type	Standby Time (Minutes)																			
	0.5	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	20	30	45	60
12XE760-FR	1465	1366	1174	1005	878	783	710	651	600	557	519	486	459	435	414	394	322	238	174	138
12XE1040-FR	1592	1574	1438	1319	1218	1107	1007	922	850	786	732	693	658	625	596	569	464	342	249	198
12XE1010F-FR	1393	1369	1277	1202	1137	1051	968	897	835	779	730	687	649	620	593	569	472	357	266	214
12XE1110F-FR	1528	1486	1378	1295	1227	1149	1068	996	932	875	825	782	742	709	678	651	542	413	308	246
12XE1150F-FR	1588	1577	1468	1360	1270	1194	1129	1071	1019	970	924	877	830	788	751	717	597	452	333	265

Constant Power (Watts per cell) at 77°F (25°C) to 1.60Vpc

Battery Type	Standby Time (Minutes)																			
	0.5	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	20	30	45	60
12XE760-FR	1488	1388	1204	1025	893	794	718	656	605	561	523	490	461	437	415	395	322	238	174	138
12XE1040-FR	1592	1574	1482	1349	1247	1154	1041	949	873	807	750	704	666	633	602	574	467	344	250	198
12XE1010F-FR	1442	1403	1297	1216	1147	1077	989	913	847	789	737	692	652	621	594	569	472	357	266	214
12XE1110F-FR	1528	1501	1401	1310	1237	1172	1085	1008	940	882	831	785	744	710	679	651	542	413	308	246
12XE1150F-FR	1588	1579	1502	1402	1304	1223	1153	1092	1036	983	933	884	837	795	758	724	599	452	333	265

Constant Power Discharge Performance Data Continued

Constant Power (Watts per cell) at 77°F (25°C) to 1.55Vpc

Battery Type	Standby Time (Minutes)																			
	0.5	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	20	30	45	60
12XE760-FR	1515	1404	1234	1044	905	802	723	660	608	563	525	491	462	438	416	396	322	238	174	138
12XE1040-FR	1592	1574	1493	1364	1259	1173	1072	976	897	829	770	720	678	643	612	584	474	349	253	201
12XE1010F-FR	1496	1454	1325	1234	1159	1093	1015	933	861	799	742	694	652	621	594	569	472	357	266	214
12XE1110F-FR	1528	1501	1431	1328	1249	1179	1100	1018	948	887	834	787	745	710	679	651	542	413	308	246
12XE1150F-FR	1588	1579	1528	1447	1355	1265	1188	1119	1057	998	943	892	847	805	767	732	599	452	333	265

Constant Power (Watts per cell) at 77°F (25°C) to 1.50Vpc

Battery Type	Standby Time (Minutes)																			
	0.5	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	20	30	45	60
12XE760-FR	1516	1405	1234	1048	907	803	723	660	608	563	525	492	462	438	416	396	322	238	174	138
12XE1040-FR	1592	1574	1493	1364	1259	1173	1082	986	906	837	778	727	683	647	616	587	477	351	255	203
12XE1010F-FR	1496	1467	1350	1243	1164	1095	1032	944	865	799	742	694	652	621	594	569	472	357	266	214
12XE1110F-FR	1528	1501	1434	1339	1254	1180	1106	1022	951	888	834	787	745	710	679	651	542	413	308	246
12XE1150F-FR	1588	1579	1528	1471	1386	1298	1214	1139	1070	1007	951	900	854	810	769	732	599	452	333	265

