

Uninterruptible Power Supply

**Battery** Performance Specifications







#### **Features and Benefits**

- Suitable for Uninteruppted Power Supply (UPS) and switchgear applications
- Multi-cell constructions
- Cover made from flame retardant
- · Container made from Styrene Acrylonitrile (SAN); optional flame retardant Polycarbonate (PC)

#### Construction

- Capacity range 0.626 5.446 kW per cell Plate thickness: Positive 0.20 in (5.0 mm); Float voltage settings (1.215) -Negative 0.12 in (3.1 mm)
  - Plate suspension type: Positive Bridge hung; Negative Bottom supported
  - Cover Flame retardant PVC, UL94-VO/L.O.I. 28%
  - Container SAN or optional flame retardant PC
  - Electrolyte over plates 2.88 in. (73.1mm)
  - Sediment space 1.04 in. (26.4 mm)
  - Long life Slide-Lock<sup>™</sup> post seal
  - Specific gravity 1.215 standard; 1.250 (B) available upon request

#### **Installation and Operation**

- Acceptable min/max 2.17/2.26 Vpc recommended average - 2.21 v/c @ 77°F (25°C); Float voltage settings (1.250): Acceptable min/max 2.21/2.30 Vpc recommended average = 2.25 v/c @ 77°F (25°C)
- · Vent type Flame Arrestor, Fused Alumina
- Bolt Connectors 316 Stainless Steel, English measure, Hex-head
- Intercell connectors Tin plated copper, optional lead plated copper

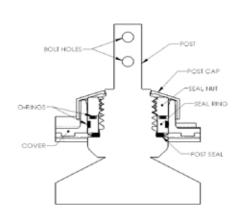
#### **Standards**

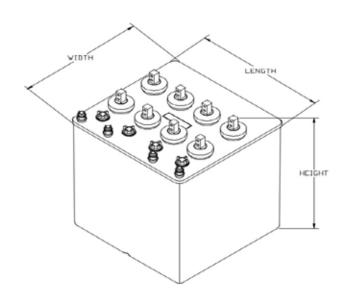
- The management systems governing the manufacture of this product are ISO 9001:2008 and ISO 14001:2004 certified
- Available testing to IEEE 450 standards as well as customer specific applications

neral Specifications

Gene	ral Spe	CIIICa	10115																	
				Watts					Nomina	l Dimens	sions					Weigl	its and Voli	umes		
Battery Type	# of Cells	Nominal Voltage	15 min. rate to 1.67Vpc @ 77° (25°C) (1.215 S.G.)	15 min. rate to 1.67Vpc @ 77° (25°C) (1.250 S.G.)	8 hr. rate to 1.75pc @ 77° (25°C) (1.215 S.G.)	8 hr. rate to 1.75Vpc @ 77° (25°C) (1.250 S.G.)	Ler in	igth* mm	W in	idth mm	He in	ight mm	Unpa We Ib	icked ight kg		cked eight kg	lbs	Electroly (1.215 kg		lit
4DX-5	4	8	626	702	265	300	9.5	241	16.0	406	22.0	558	256	116	263	119	76.2	34.6	7.5	28.4
4DX-7	4	8	937	1034	360	400	9.5	241	16.0	406	22.0	558	303	137	312	141	68.1	30.9	6.7	25.4
4DX-9	4	8	1212	1353	415	465	9.5	241	16.0	406	22.0	558	353	160	363	152	61.0	27.7	6.0	22.7
4DX-11	4	8	1527	1732	650	730	16.7	424	16.0	406	22.6	576	507	230	522	237	142.0	64.5	14.0	53.0
4DX-13	4	8	1838	2035	715	800	16.7	424	16.0	406	22.6	576	557	253	573	260	132.0	59.0	13.0	49.2
4DX-15	i 4	8	2121	2334	790	865	16.7	424	16.0	406	22.6	576	606	275	624	283	127.0	57.6	12.5	47.3
4DX-17	4	8	2381	2639	820	915	16.7	424	16.0	406	22.6	576	656	298	675	306	120.0	54.4	11.8	44.7
4DX-19	4	8	2635	2920	990	1105	20.2	513	16.0	406	22.6	576	781	354	800	363	138.0	62.7	13.6	51.5
4DX-21	4	8	3003	3290	1050	1180	20.2	513	16.0	406	22.6	576	830	376	849	385	131.0	59.5	12.9	48.8
2DX-23	2	4	3235	3577	1175	1325	12.1	308	16.0	406	22.6	576	473	215	489	222	87.4	39.6	8.6	32.6
2DX-25	i 2	4	3501	3852	1225	1375	12.1	308	16.0	406	22.6	576	499	227	515	234	83.4	37.8	8.2	31.0
2DX-27	2	4	3896	4283	1530	1715	16.7	424	16.0	406	22.6	576	587	266	604	274	139.0	63.2	13.7	51.9
2DX-29	2	4	4162	4584	1580	1785	16.7	424	16.0	406	22.6	576	613	278	632	287	135.0	61.3	13.3	50.3
2DX-31	2	4	4417	4873	1610	1835	16.7	424	16.0	406	22.6	576	638	290	657	298	131.0	59.5	12.9	48.8
2DX-33	2	4	4672	5164	1640	1880	16.7	424	16.0	406	22.6	576	663	301	682	310	127.0	57.6	12.5	47.3
2DX-35	2	4	4920	5448	1660	1915	16.7	424	16.0	406	22.6	576	680	309	700	318	123.0	55.8	12.1	45.8

<sup>\* 0.25</sup> inches must be added between units for spacing purposes when calculating total battery length.





## **Constant Power Discharge Performance Data**

1.250 Specific Gravity Discharge Rates (kW per cell\*) to 1.75Vpc at 77°F (25°C)\*\*

Battery										/linutes										
Туре	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05B	0.904	0.735	0.710	0.688	0.667	0.647	0.629	0.613	0.597	0.583	0.569	0.556	0.498	0.454	0.362	0.304	0.235	0.195	0.147	0.121
DX-07B	1.307	1.077	1.041	1.009	0.979	0.951	0.924	0.900	0.877	0.856	0.835	0.815	0.729	0.662	0.522	0.436	0.333	0.274	0.203	0.165
DX-09B	1.684	1.402	1.357	1.316	1.277	1.241	1.206	1.174	1.144	1.116	1.088	1.062	0.947	0.857	0.670	0.553	0.417	0.338	0.246	0.198
DX-11B	2.093	1.775	1.725	1.676	1.633	1.591	1.553	1.516	1.482	1.448	1.417	1.387	1.253	1.149	0.920	0.774	0.596	0.492	0.367	0.298
DX-13B	2.440	2.081	2.023	1.968	1.918	1.869	1.823	1.779	1.738	1.699	1.661	1.625	1.467	1.341	1.067	0.892	0.680	0.557	0.412	0.333
DX-15B	2.781	2.381	2.315	2.254	2.197	2.141	2.088	2.037	1.989	1.943	1.900	1.858	1.675	1.528	1.208	1.005	0.760	0.619	0.454	0.364
DX-17B	3.174	2.716	2.639	2.566	2.501	2.437	2.376	2.317	2.262	2.210	2.160	2.112	1.902	1.730	1.363	1.129	0.849	0.687	0.498	0.396
DX-19B	3.533	3.018	2.934	2.853	2.780	2.708	2.642	2.579	2.520	2.462	2.408	2.355	2.125	1.939	1.536	1.280	0.970	0.793	0.582	0.468
DX-21B	3.998	3.399	3.300	3.208	3.121	3.037	2.961	2.887	2.816	2.749	2.686	2.625	2.361	2.148	1.697	1.410	1.064	0.865	0.633	0.505
DX-23B	4.261	3.648	3.547	3.454	3.366	3.281	3.199	3.121	3.047	2.978	2.912	2.847	2.566	2.341	1.852	1.539	1.164	0.948	0.696	0.558
DX-25B	4.474	3.873	3.779	3.679	3.590	3.506	3.423	3.344	3.269	3.196	3.127	3.062	2.770	2.532	2.010	1.672	1.261	1.024	0.743	0.589
DX-27B	5.092	4.332	4.210	4.091	3.988	3.884	3.789	3.699	3.614	3.533	3.455	3.381	3.056	2.794	2.228	1.866	1.430	1.177	0.870	0.708
DX-29B	5.444	4.636	4.507	4.382	4.269	4.159	4.057	3.961	3.869	3.782	3.698	3.619	3.269	2.986	2.375	1.985	1.515	1.244	0.917	0.743
DX-31B	5.780	4.930	4.793	4.663	4.541	4.424	4.317	4.213	4.115	4.022	3.932	3.848	3.474	3.169	2.513	2.095	1.592	1.302	0.955	0.770
DX-33B	6.118	5.225	5.081	4.945	4.813	4.690	4.577	4.467	4.362	4.262	4.167	4.077	3.679	3.353	2.652	2.205	1.668	1.360	0.994	0.798
DX-35B	6.448	5.513	5.362	5.222	5.081	4.951	4.833	4.715	4.604	4.498	4.397	4.302	3.880	3.532	2.785	2.310	1.740	1.413	1.029	0.822

1.250 Specific Gravity Discharge Rates (kW per cell\*) to 1.70Vpc at 77°F (25°C)\*\*

Battery										<b>Vinutes</b>										
Туре	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05B	1.010	0.807	0.777	0.750	0.725	0.702	0.680	0.659	0.641	0.623	0.607	0.591	0.526	0.474	0.372	0.310	0.237	0.196	0.147	0.121
DX-07B	1.459	1.183	1.141	1.102	1.066	1.032	1.000	0.970	0.942	0.916	0.891	0.869	0.770	0.692	0.538	0.445	0.335	0.274	0.203	0.165
DX-09B	1.879	1.542	1.490	1.440	1.393	1.349	1.308	1.269	1.232	1.197	1.164	1.134	1.003	0.898	0.691	0.565	0.419	0.338	0.246	0.198
DX-11B	2.332	1.942	1.883	1.826	1.773	1.725	1.677	1.633	1.591	1.552	1.516	1.481	1.328	1.204	0.951	0.793	0.603	0.494	0.367	0.298
DX-13B	2.720	2.280	2.210	2.144	2.083	2.025	1.970	1.918	1.868	1.821	1.778	1.736	1.553	1.405	1.102	0.913	0.688	0.560	0.412	0.333
DX-15B	3.101	2.612	2.533	2.456	2.387	2.321	2.257	2.197	2.140	2.086	2.036	1.987	1.774	1.601	1.248	1.029	0.769	0.623	0.454	0.364
DX-17B	3.518	2.959	2.869	2.785	2.703	2.628	2.557	2.489	2.424	2.362	2.304	2.249	2.005	1.809	1.405	1.153	0.855	0.688	0.498	0.396
DX-19B	3.915	3.283	3.182	3.087	2.998	2.916	2.838	2.762	2.691	2.623	2.560	2.500	2.237	2.020	1.575	1.302	0.978	0.794	0.582	0.468
DX-21B	4.434	3.704	3.588	3.478	3.375	3.278	3.185	3.098	3.017	2.939	2.866	2.797	2.494	2.251	1.753	1.444	1.078	0.870	0.633	0.505
DX-23B	4.751	4.002	3.881	3.764	3.657	3.555	3.457	3.366	3.279	3.196	3.119	3.044	2.717	2.453	1.912	1.576	1.179	0.954	0.696	0.558
DX-25B	4.977	4.258	4.135	4.021	3.914	3.812	3.712	3.618	3.530	3.448	3.367	3.290	2.950	2.671	2.086	1.718	1.274	1.026	0.743	0.589
DX-27B	5.703	4.776	4.626	4.488	4.360	4.236	4.124	4.014	3.911	3.815	3.724	3.638	3.254	2.944	2.311	1.915	1.442	1.178	0.870	0.708
DX-29B	6.091	5.108	4.950	4.803	4.666	4.535	4.415	4.297	4.187	4.084	3.986	3.893	3.480	3.147	2.464	2.039	1.530	1.246	0.917	0.743
DX-31B	6.461	5.428	5.262	5.107	4.962	4.824	4.695	4.571	4.454	4.342	4.238	4.139	3.697	3.342	2.609	2.153	1.610	1.305	0.955	0.770
DX-33B	6.833	5.748	5.574	5.412	5.258	5.113	4.976	4.845	4.721	4.602	4.490	4.385	3.915	3.537	2.754	2.268	1.690	1.365	0.994	0.798
DX-35B	7.194	6.062	5.880	5.711	5.549	5.397	5.251	5.114	4.983	4.856	4.738	4.626	4.128	3.727	2.895	2.378	1.765	1.420	1.029	0.822

1.250 Specific Gravity Discharge Rates (kW per cell\*) to 1.67Vpc at 77°F (25°C)\*\*

Battery									ı	/linutes										
Туре	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05B	1.062	0.841	0.808	0.778	0.750	0.725	0.702	0.679	0.659	0.640	0.622	0.605	0.536	0.481	0.375	0.311	0.237	0.196	0.147	0.121
DX-07B	1.535	1.233	1.187	1.144	1.105	1.068	1.034	1.001	0.971	0.942	0.915	0.890	0.785	0.703	0.543	0.445	0.335	0.274	0.203	0.165
DX-09B	1.975	1.607	1.550	1.496	1.447	1.399	1.353	1.311	1.270	1.233	1.197	1.163	1.023	0.913	0.696	0.565	0.419	0.338	0.246	0.198
DX-11B	2.449	2.023	1.958	1.894	1.837	1.783	1.732	1.684	1.639	1.597	1.556	1.518	1.355	1.224	0.960	0.795	0.603	0.494	0.367	0.298
DX-13B	2.866	2.378	2.300	2.227	2.160	2.096	2.035	1.979	1.925	1.874	1.826	1.780	1.585	1.428	1.112	0.915	0.688	0.560	0.412	0.333
DX-15B	3.272	2.726	2.638	2.555	2.477	2.404	2.334	2.269	2.206	2.147	2.091	2.038	1.811	1.628	1.259	1.031	0.769	0.623	0.454	0.364
DX-17B	3.696	3.080	2.980	2.887	2.800	2.718	2.639	2.565	2.494	2.427	2.363	2.303	2.045	1.837	1.414	1.153	0.855	0.688	0.498	0.396
DX-19B	4.110	3.410	3.299	3.195	3.097	3.007	2.920	2.839	2.763	2.690	2.621	2.555	2.270	2.042	1.583	1.302	0.978	0.794	0.582	0.468
DX-21B	4.658	3.857	3.728	3.608	3.494	3.389	3.290	3.196	3.106	3.021	2.941	2.866	2.545	2.288	1.770	1.448	1.078	0.870	0.633	0.505
DX-23B	5.013	4.177	4.042	3.915	3.794	3.684	3.577	3.476	3.381	3.289	3.204	3.122	2.774	2.494	1.929	1.580	1.179	0.954	0.696	0.558
DX-25B	5.249	4.447	4.317	4.191	4.071	3.958	3.852	3.751	3.654	3.561	3.474	3.390	3.023	2.723	2.109	1.720	1.274	1.026	0.743	0.589
DX-27B	6.024	4.995	4.834	4.684	4.543	4.408	4.283	4.164	4.051	3.945	3.843	3.748	3.337	3.003	2.337	1.920	1.442	1.178	0.870	0.708
DX-29B	6.433	5.343	5.172	5.012	4.861	4.718	4.584	4.456	4.336	4.222	4.113	4.011	3.570	3.210	2.493	2.044	1.530	1.246	0.917	0.743
DX-31B	6.822	5.677	5.497	5.328	5.167	5.016	4.873	4.738	4.610	4.490	4.373	4.264	3.793	3.409	2.640	2.160	1.610	1.305	0.955	0.770
DX-33B	7.213	6.012	5.823	5.644	5.475	5.315	5.164	5.020	4.886	4.758	4.634	4.518	4.016	3.608	2.787	2.276	1.690	1.365	0.994	0.798
DX-35B	7.592	6.339	6.142	5.954	5.775	5.607	5.448	5.297	5.155	5.021	4.889	4.766	4.235	3.802	2.930	2.388	1.765	1.420	1.029	0.822

<sup>\*</sup>kW values listed represent 100% of the initial capacity. \*\* At 77°F (25° C) includes intercell connector drop.



## **Constant Power Discharge Performance Data Continued**

1.250 Specific Gravity Discharge Rates (kW per cell\*) to 1.63Vpc at 77°F (25°C)\*\*

Battery								,		Vinutes										
Type	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05B	1.125	0.875	0.840	0.806	0.776	0.748	0.721	0.697	0.675	0.655	0.635	0.617	0.543	0.486	0.375	0.311	0.237	0.196	0.147	0.121
DX-07B	1.623	1.286	1.235	1.188	1.144	1.103	1.065	1.030	0.997	0.966	0.937	0.909	0.797	0.711	0.543	0.445	0.335	0.274	0.203	0.165
DX-09B	2.085	1.680	1.616	1.556	1.500	1.447	1.398	1.351	1.307	1.266	1.227	1.191	1.040	0.924	0.696	0.565	0.419	0.338	0.246	0.198
DX-11B	2.585	2.109	2.035	1.965	1.902	1.842	1.785	1.732	1.683	1.636	1.592	1.550	1.376	1.238	0.961	0.795	0.603	0.494	0.367	0.298
DX-13B	3.030	2.483	2.396	2.315	2.238	2.167	2.100	2.037	1.978	1.922	1.870	1.820	1.610	1.445	1.113	0.915	0.688	0.560	0.412	0.333
DX-15B	3.465	2.851	2.751	2.658	2.570	2.487	2.409	2.337	2.268	2.203	2.142	2.085	1.839	1.647	1.260	1.031	0.769	0.623	0.454	0.364
DX-17B	3.900	3.213	3.101	2.997	2.899	2.806	2.720	2.638	2.561	2.487	2.418	2.353	2.075	1.856	1.414	1.153	0.855	0.688	0.498	0.396
DX-19B	4.333	3.541	3.417	3.301	3.194	3.092	2.995	2.907	2.822	2.742	2.666	2.594	2.290	2.053	1.583	1.302	0.978	0.794	0.582	0.468
DX-21B	4.915	4.020	3.878	3.745	3.619	3.501	3.390	3.287	3.191	3.098	3.012	2.930	2.585	2.315	1.771	1.448	1.078	0.870	0.633	0.505
DX-23B	5.310	4.368	4.216	4.072	3.937	3.810	3.691	3.580	3.475	3.376	3.282	3.194	2.818	2.523	1.931	1.580	1.179	0.954	0.696	0.558
DX-25B	5.574	4.665	4.516	4.376	4.243	4.119	4.001	3.885	3.778	3.675	3.577	3.485	3.085	2.766	2.112	1.720	1.274	1.026	0.743	0.589
DX-27B	6.395	5.244	5.064	4.897	4.738	4.590	4.448	4.316	4.191	4.074	3.963	3.855	3.409	3.054	2.343	1.920	1.442	1.178	0.870	0.708
DX-29B	6.830	5.609	5.417	5.239	5.069	4.911	4.760	4.619	4.485	4.360	4.241	4.126	3.647	3.266	2.500	2.044	1.530	1.246	0.917	0.743
DX-31B	7.242	5.960	5.756	5.568	5.387	5.220	5.061	4.911	4.769	4.635	4.510	4.387	3.874	3.468	2.648	2.160	1.610	1.305	0.955	0.770
DX-33B	7.656	6.312	6.096	5.897	5.707	5.530	5.362	5.203	5.053	4.912	4.779	4.648	4.103	3.670	2.797	2.276	1.690	1.365	0.994	0.798
DX-35B	8.059	6.655	6.429	6.220	6.020	5.834	5.658	5.490	5.331	5.182	5.042	4.905	4.326	3.868	2.941	2.388	1.765	1.420	1.029	0.822

1.250 Specific Gravity Discharge Rates (kW per cell\*) to 1.60Vpc at 77°F (25°C)\*\*

Battery	рсспп	CGIUV	ity Dis	charge	Hates	, (1244	JCI CCI	, 10		Vinutes	1 (23	U,								
Туре	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05B	1.165	0.895	0.857	0.821	0.789	0.759	0.731	0.706	0.683	0.661	0.641	0.622	0.545	0.486	0.375	0.311	0.237	0.196	0.147	0.121
DX-07B	1.680	1.317	1.262	1.212	1.165	1.122	1.081	1.044	1.009	0.977	0.947	0.918	0.801	0.711	0.543	0.445	0.335	0.274	0.203	0.165
DX-09B	2.160	1.723	1.653	1.589	1.529	1.473	1.420	1.371	1.325	1.282	1.242	1.204	1.046	0.924	0.696	0.565	0.419	0.338	0.246	0.198
DX-11B	2.672	2.157	2.078	2.005	1.935	1.871	1.810	1.754	1.702	1.654	1.608	1.564	1.383	1.240	0.961	0.795	0.603	0.494	0.367	0.298
DX-13B	3.138	2.544	2.450	2.363	2.281	2.204	2.132	2.065	2.002	1.944	1.889	1.837	1.619	1.447	1.113	0.915	0.688	0.560	0.412	0.333
DX-15B	3.596	2.925	2.817	2.715	2.621	2.532	2.448	2.371	2.298	2.230	2.165	2.104	1.850	1.649	1.260	1.031	0.769	0.623	0.454	0.364
DX-17B	4.034	3.290	3.170	3.058	2.953	2.854	2.760	2.673	2.592	2.516	2.443	2.374	2.084	1.856	1.414	1.153	0.855	0.688	0.498	0.396
DX-19B	4.477	3.613	3.480	3.357	3.241	3.132	3.030	2.933	2.843	2.760	2.680	2.606	2.294	2.053	1.583	1.302	0.978	0.794	0.582	0.468
DX-21B	5.087	4.117	3.964	3.820	3.685	3.560	3.441	3.332	3.230	3.134	3.044	2.958	2.600	2.319	1.771	1.448	1.078	0.870	0.633	0.505
DX-23B	5.510	4.482	4.315	4.160	4.016	3.879	3.750	3.632	3.521	3.417	3.318	3.224	2.834	2.526	1.931	1.580	1.179	0.954	0.696	0.558
DX-25B	5.775	4.802	4.640	4.489	4.345	4.209	4.081	3.959	3.844	3.734	3.631	3.532	3.112	2.776	2.112	1.720	1.274	1.026	0.743	0.589
DX-27B	6.624	5.399	5.206	5.025	4.853	4.692	4.543	4.403	4.269	4.144	4.025	3.913	3.442	3.072	2.343	1.920	1.442	1.178	0.870	0.708
DX-29B	7.075	5.775	5.569	5.375	5.192	5.021	4.861	4.712	4.569	4.435	4.307	4.188	3.682	3.285	2.500	2.044	1.530	1.246	0.917	0.743
DX-31B	7.505	6.136	5.917	5.713	5.519	5.337	5.168	5.010	4.858	4.715	4.579	4.452	3.912	3.488	2.648	2.160	1.610	1.305	0.955	0.770
DX-33B	7.936	6.497	6.266	6.051	5.847	5.655	5.475	5.308	5.147	4.996	4.852	4.717	4.143	3.692	2.797	2.276	1.690	1.365	0.994	0.798
DX-35B	8.354	6.851	6.607	6.381	6.168	5.966	5.777	5.600	5.431	5.272	5.119	4.977	4.369	3.891	2.941	2.388	1.765	1.420	1.029	0.822

<sup>\*</sup>kW values listed represent 100% of the initial capacity. \*\* At 77°F (25° C) includes intercell connector drop.

# **Constant Power Discharge Performance Data**

#### 1.215 Specific Gravity Discharge Rates (kW per cell\*) to 1.75Vpc at 77°F (25°C)\*\*

Battery										<b>Vinutes</b>										
Туре	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05	0.754	0.646	0.628	0.611	0.594	0.579	0.564	0.551	0.538	0.525	0.513	0.502	0.451	0.410	0.323	0.269	0.208	0.172	0.129	0.106
DX-07	1.114	0.957	0.931	0.906	0.883	0.860	0.837	0.816	0.796	0.776	0.758	0.741	0.663	0.603	0.477	0.397	0.301	0.247	0.182	0.148
DX-09	1.447	1.251	1.218	1.186	1.155	1.126	1.099	1.070	1.043	1.017	0.992	0.968	0.865	0.782	0.611	0.504	0.375	0.304	0.222	0.178
DX-11	1.832	1.570	1.526	1.485	1.446	1.409	1.374	1.341	1.309	1.278	1.249	1.222	1.099	0.999	0.788	0.660	0.514	0.426	0.319	0.262
DX-13	2.178	1.872	1.822	1.774	1.728	1.684	1.642	1.602	1.564	1.527	1.493	1.460	1.313	1.196	0.946	0.788	0.599	0.492	0.362	0.294
DX-15	2.548	2.182	2.121	2.064	2.009	1.957	1.908	1.861	1.816	1.774	1.733	1.695	1.523	1.383	1.085	0.901	0.682	0.556	0.408	0.330
DX-17	2.870	2.453	2.383	2.318	2.255	2.196	2.140	2.086	2.035	1.987	1.941	1.897	1.700	1.541	1.202	0.993	0.746	0.603	0.438	0.350
DX-19	3.125	2.668	2.594	2.521	2.453	2.387	2.328	2.271	2.216	2.165	2.116	2.069	1.861	1.696	1.343	1.119	0.850	0.695	0.512	0.413
DX-21	3.496	2.997	2.915	2.834	2.758	2.686	2.617	2.555	2.493	2.434	2.378	2.325	2.093	1.906	1.507	1.251	0.942	0.766	0.559	0.447
DX-23	3.864	3.274	3.179	3.088	3.004	2.923	2.847	2.776	2.708	2.643	2.581	2.523	2.266	2.062	1.627	1.352	1.024	0.836	0.612	0.492
DX-25	4.188	3.547	3.441	3.342	3.250	3.162	3.080	3.002	2.928	2.857	2.790	2.726	2.446	2.223	1.750	1.451	1.095	0.891	0.650	0.520
DX-27	4.634	3.935	3.824	3.717	3.617	3.522	3.433	3.349	3.268	3.191	3.118	3.049	2.744	2.504	1.986	1.659	1.267	1.043	0.771	0.626
DX-29	4.960	4.208	4.088	3.972	3.865	3.762	3.666	3.575	3.489	3.406	3.327	3.253	2.925	2.666	2.110	1.759	1.339	1.098	0.809	0.654
DX-31	5.274	4.470	4.340	4.216	4.101	3.990	3.888	3.791	3.698	3.609	3.525	3.446	3.094	2.816	2.223	1.848	1.401	1.144	0.839	0.675
DX-33	5.588	4.733	4.592	4.460	4.338	4.220	4.110	4.007	3.908	3.813	3.723	3.639	3.265	2.968	2.337	1.938	1.463	1.191	0.869	0.695
DX-35	5.897	4.990	4.838	4.689	4.568	4.442	4.326	4.217	4.112	4.011	3916	3.826	3.429	3.113	2.444	2.022	1.520	1.232	0.894	0.712

# 1.215 Specific Gravity Discharge Rates (kW per cell\*) to 1.70Vpc at 77°F (25°C)\*\*

Battery									М	inutes										
Туре	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05	0.840	0.705	0.683	0.663	0.643	0.625	0.607	0.591	0.574	0.559	0.545	0.532	0.474	0.426	0.331	0.273	0.209	0.172	0.129	0.106
DX-07	1.243	1.049	1.018	0.988	0.959	0.932	0.906	0.882	0.859	0.836	0.814	0.793	0.704	0.632	0.492	0.405	0.303	0.247	0.182	0.148
DX-09	1.596	1.358	1.319	1.280	1.244	1.210	1.176	1.145	1.115	1.085	1.058	1.030	0.911	0.816	0.628	0.512	0.376	0.304	0.222	0.178
DX-11	2.043	1.716	1.664	1.614	1.567	1.523	1.480	1.440	1.401	1.364	1.330	1.298	1.157	1.041	0.809	0.670	0.515	0.426	0.319	0.262
DX-13	2.443	2.056	1.994	1.935	1.880	1.827	1.778	1.731	1.685	1.641	1.600	1.561	1.391	1.254	0.977	0.806	0.603	0.492	0.362	0.294
DX-15	2.842	2.386	2.313	2.243	2.177	2.115	2.056	2.000	1.945	1.894	1.846	1.801	1.604	1.442	1.117	0.916	0.684	0.556	0.408	0.330
DX-17	3.201	2.683	2.600	2.521	2.445	2.374	2.306	2.243	2.181	2.123	2.069	2.018	1.792	1.609	1.239	1.011	0.749	0.603	0.438	0.350
DX-19	3.536	2.958	2.863	2.774	2.692	2.615	2.542	2.472	2.404	2.342	2.284	2.229	1.986	1.791	1.398	1.154	0.867	0.703	0.514	0.413
DX-21	3.981	3.346	3.240	3.142	3.050	2.964	2.879	2.801	2.728	2.659	2.594	2.532	2.255	2.035	1.580	1.298	0.967	0.776	0.561	0.447
DX-23	4.379	3.637	3.519	3.409	3.305	3.207	3.115	3.027	2.944	2.867	2.793	2.723	2.422	2.179	1.692	1.393	1.038	0.840	0.612	0.492
DX-25	4.747	3.940	3.811	3.690	3.578	3.471	3.371	3.274	3.183	3.100	3.020	2.944	2.615	2.351	1.821	1.495	1.110	0.895	0.650	0.520
DX-27	5.253	4.372	4.231	4.100	3.977	3.861	3.752	3.648	3.551	3.458	3.370	3.287	2.929	2.642	2.063	1.706	1.283	1.046	0.771	0.626
DX-29	5.622	4.675	4.524	4.383	4.251	4.126	4.009	3.896	3.791	3.692	3.598	3.509	3.124	2.815	2.193	1.810	1.356	1.102	0.809	0.654
DX-31	5.978	4.966	4.805	4.653	4.512	4.379	4.253	4.132	4.019	3.915	3.814	3.718	3.307	2.977	2.312	1.903	1.419	1.149	0.839	0.675
DX-33	6.334	5.257	5.086	4.925	4.774	4.632	4.499	4.369	4.249	4.138	4.031	3.929	3.491	3.139	2.431	1.997	1.483	1.196	0.869	0.695
DX-35	6.682	5.541	5.360	5.189	5.030	4.879	4.737	4.599	4.471	4.354	4.241	4.133	3.668	3.295	2.545	2.086	1.542	1.239	0.894	0.712

### 1.215 Specific Gravity Discharge Rates (kW per cell\*) to 1.67Vpc at 77°F (25°C)\*\*

Battery										Minutes										
Туре	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05	0.885	0.734	0.710	0.687	0.666	0.645	0.626	0.608	0.590	0.574	0.559	0.544	0.482	0.432	0.332	0.273	0.209	0.172	0.129	0.106
DX-07	1.313	1.095	1.060	1.027	0.995	0.965	0.937	0.910	0.885	0.860	0.837	0.815	0.719	0.643	0.495	0.405	0.303	0.247	0.182	0.148
DX-09	1.676	1.409	1.366	1.325	1.286	1.248	1.212	1.177	1.144	1.113	1.083	1.054	0.928	0.828	0.630	0.512	0.376	0.304	0.222	0.178
DX-11	2.157	1.790	1.731	1.676	1.623	1.574	1.527	1.483	1.441	1.402	1.364	1.329	1.177	1.056	0.812	0.670	0.515	0.426	0.319	0.262
DX-13	2.585	2.149	2.079	2.014	1.951	1.893	1.838	1.786	1.737	1.689	1.645	1.603	1.420	1.275	0.984	0.806	0.603	0.492	0.362	0.294
DX-15	2.999	2.488	2.406	2.329	2.255	2.187	2.121	2.060	2.001	1.946	1.894	1.844	1.633	1.463	1.122	0.916	0.684	0.556	0.408	0.330
DX-17	3.375	2.797	2.705	2.616	2.533	2.455	2.381	2.311	2.245	2.182	2.122	2.066	1.825	1.633	1.245	1.011	0.749	0.603	0.438	0.350
DX-19	3.746	3.096	2.994	2.894	2.801	2.716	2.635	2.558	2.484	2.415	2.351	2.291	2.032	1.826	1.413	1.161	0.867	0.703	0.514	0.413
DX-21	4.238	3.518	3.403	3.292	3.189	3.092	3.003	2.917	2.837	2.760	2.686	2.617	2.320	2.083	1.603	1.310	0.967	0.776	0.561	0.447
DX-23	4.653	3.816	3.685	3.562	3.445	3.337	3.235	3.138	3.047	2.962	2.881	2.805	2.482	2.223	1.711	1.396	1.038	0.840	0.612	0.492
DX-25	5.042	4.133	3.990	3.857	3.729	3.612	3.501	3.396	3.297	3.204	3.115	3.033	2.680	2.399	1.842	1.499	1.110	0.895	0.650	0.520
DX-27	5.584	4.586	4.430	4.284	4.145	4.017	3.896	3.781	3.672	3.571	3.474	3.385	3.002	2.693	2.085	1.710	1.283	1.046	0.771	0.626
DX-29	5.975	4.904	4.737	4.580	4.431	4.293	4.162	4.039	3.923	3.814	3.710	3.614	3.201	2.870	2.217	1.814	1.356	1.102	0.809	0.654
DX-31	6.351	5.209	5.031	4.863	4.703	4.556	4.417	4.285	4.161	4.045	3.933	3.831	3.389	3.036	2.338	1.908	1.419	1.149	0.839	0.675
DX-33	6.727	5.515	5.325	5.147	4.977	4.820	4.672	4.532	4.400	4.276	4.158	4.049	3.578	3.202	2.460	2.003	1.483	1.196	0.869	0.695
DX-35	7.096	5.813	5.612	5.424	5.243	5.077	4.920	4.771	4.632	4.501	4.376	4.260	3.760	3.362	2.576	2.092	1.542	1.239	0.894	0.712

<sup>\*</sup>kW values listed represent 100% of the initial capacity. \*\* At 77°F (25° C) includes intercell connector drop.

## **Constant Power Discharge Performance Data Continued**

1.215 Specific Gravity Discharge Rates (kW per cell\*) to 1.63Vpc at 77°F (25°C)\*\*

Battery										Minutes										
Туре	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05	0.933	0.766	0.739	0.713	0.689	0.666	0.645	0.625	0.606	0.588	0.571	0.555	0.488	0.435	0.332	0.273	0.209	0.172	0.129	0.106
DX-07	1.386	1.145	1.105	1.068	1.032	0.998	0.967	0.937	0.909	0.883	0.858	0.834	0.731	0.650	0.495	0.405	0.303	0.247	0.182	0.148
DX-09	1.767	1.465	1.416	1.370	1.327	1.286	1.247	1.209	1.173	1.138	1.106	1.075	0.941	0.834	0.630	0.512	0.376	0.304	0.222	0.178
DX-11	2.274	1.870	1.803	1.741	1.681	1.626	1.574	1.525	1.480	1.436	1.395	1.356	1.194	1.065	0.812	0.670	0.515	0.426	0.319	0.262
DX-13	2.735	2.251	2.171	2.097	2.026	1.960	1.899	1.842	1.787	1.735	1.686	1.639	1.443	1.290	0.984	0.806	0.603	0.492	0.362	0.294
DX-15	3.162	2.599	2.506	2.419	2.336	2.259	2.187	2.119	2.055	1.994	1.937	1.882	1.655	1.475	1.122	0.916	0.684	0.556	0.408	0.330
DX-17	3.560	2.922	2.817	2.718	2.625	2.537	2.454	2.377	2.305	2.236	2.171	2.109	1.851	1.647	1.245	1.011	0.749	0.603	0.438	0.350
DX-19	3.983	3.247	3.129	3.016	2.910	2.812	2.722	2.637	2.557	2.483	2.412	2.345	2.069	1.851	1.419	1.161	0.867	0.703	0.514	0.413
DX-21	4.521	3.703	3.571	3.449	3.334	3.226	3.126	3.029	2.939	2.854	2.774	2.697	2.375	2.121	1.614	1.310	0.967	0.776	0.561	0.447
DX-23	4.945	4.008	3.858	3.720	3.589	3.466	3.353	3.247	3.147	3.053	2.963	2.879	2.529	2.256	1.713	1.396	1.038	0.840	0.612	0.492
DX-25	5.360	4.341	4.178	4.028	3.886	3.752	3.628	3.513	3.404	3.302	3.205	3.113	2.732	2.435	1.845	1.499	1.110	0.895	0.650	0.520
DX-27	5.931	4.817	4.639	4.474	4.318	4.172	4.037	3.911	3.792	3.680	3.574	3.473	3.058	2.732	2.087	1.710	1.283	1.046	0.771	0.626
DX-29	6.348	5.151	4.960	4.783	4.615	4.458	4.314	4.178	4.051	3.930	3.816	3.708	3.262	2.912	2.220	1.814	1.356	1.102	0.809	0.654
DX-31	6.749	5.471	5.267	5.078	4.900	4.732	4.578	4.433	4.296	4.168	4.046	3.931	3.454	3.081	2.341	1.908	1.419	1.149	0.839	0.675
DX-33	7.152	5.792	5.576	5.375	5.185	5.007	4.842	4.688	4.543	4.407	4.277	4.155	3.647	3.251	2.463	2.003	1.483	1.196	0.869	0.695
DX-35	7.546	6.106	5.877	5.663	5.464	5.274	5.099	4.937	4.783	4.638	4.502	4.372	3.834	3.414	2.579	2.092	1.542	1.239	0.894	0.712

# 1.215 Specific Gravity Discharge Rates (kW per cell\*) to 1.60Vpc at 77°F (25°C)\*\*

Battery	•		•							Vinutes		<u> </u>								
Type	5	10	11	12	13	14	15	16	17	18	19	20	25	30	45	60	90	120	180	240
DX-05	0.965	0.786	0.756	0.728	0.702	0.677	0.654	0.633	0.613	0.594	0.577	0.560	0.489	0.435	0.332	0.273	0.209	0.172	0.129	0.106
DX-07	1.434	1.175	1.132	1.091	1.053	1.017	0.983	0.951	0.921	0.894	0.867	0.842	0.735	0.650	0.495	0.405	0.303	0.247	0.182	0.148
DX-09	1.828	1.498	1.445	1.395	1.349	1.305	1.264	1.224	1.186	1.151	1.116	1.084	0.943	0.834	0.630	0.512	0.376	0.304	0.222	0.178
DX-11	2.354	1.919	1.846	1.778	1.714	1.655	1.599	1.546	1.498	1.453	1.410	1.369	1.197	1.065	0.812	0.670	0.515	0.426	0.319	0.262
DX-13	2.834	2.313	2.226	2.145	2.069	1.998	1.931	1.869	1.811	1.757	1.705	1.657	1.451	1.290	0.984	0.806	0.603	0.492	0.362	0.294
DX-15	3.273	2.667	2.565	2.471	2.382	2.299	2.221	2.148	2.080	2.017	1.957	1.900	1.661	1.475	1.122	0.916	0.684	0.556	0.408	0.330
DX-17	3.683	2.997	2.882	2.775	2.676	2.582	2.493	2.410	2.334	2.262	2.194	2.129	1.857	1.647	1.245	1.011	0.749	0.603	0.438	0.350
DX-19	4.138	3.331	3.201	3.080	2.967	2.862	2.765	2.675	2.592	2.514	2.440	2.371	2.082	1.858	1.419	1.161	0.867	0.703	0.514	0.413
DX-21	4.706	3.817	3.674	3.541	3.416	3.301	3.191	3.088	2.992	2.902	2.817	2.737	2.399	2.136	1.614	1.310	0.967	0.776	0.561	0.447
DX-23	5.141	4.124	3.960	3.809	3.669	3.538	3.416	3.301	3.196	3.096	3.003	2.914	2.548	2.261	1.713	1.396	1.038	0.840	0.612	0.492
DX-25	5.572	4.466	4.289	4.124	3.972	3.829	3.697	3.572	3.458	3.349	3.248	3.152	2.753	2.440	1.845	1.499	1.110	0.895	0.650	0.520
DX-27	6.170	4.957	4.762	4.581	4.415	4.259	4.112	3.975	3.850	3.732	3.620	3.515	3.080	2.738	2.087	1.710	1.283	1.046	0.771	0.626
DX-29	6.602	5.300	5.091	4.898	4.719	4.552	4.394	4.247	4.113	3.986	3.866	3.754	3.286	2.919	2.220	1.814	1.356	1.102	0.809	0.654
DX-31	7.018	5.629	5.407	5.200	5.009	4.831	4.663	4.507	4.363	4.227	4.100	3.980	3.480	3.088	2.341	1.908	1.419	1.149	0.839	0.675
DX-33	7.435	5.959	5.723	5.503	5.300	5.110	4.933	4.767	4.614	4.469	4.334	4.206	3.675	3.258	2.463	2.003	1.483	1.196	0.869	0.695
DX-35	7.844	6.281	6.031	5.799	5.584	5.383	5.196	5.020	4.858	4.705	4.562	4.427	3.864	3.421	2.579	2.092	1.542	1.239	0.894	0.712

<sup>\*</sup>kW values listed represent 100% of the initial capacity. \*\* At 77°F (25° C) includes intercell connector drop.

