





THE m·s· endur ® ^{II} SERIES VRLA BATTERY THE TRUE LONG LIFE BATTERY[™]

For SwitchGear and Control

E TECHNOLOGIES, INC.

CAPACITIES FROM 345 TO 2180 Ampere-Hours

The msEndur II is the latest advancement in battery technology with enhanced features for Utility applications.

By combining the service life reliability of a flooded battery with the performance energy density of a valve-regulated battery, C&D has created the msEndur II — The True Long-Life Battery™.

The msEndur II series of batteries are unmatched in power density with space saving modular designs and have a 20-year design life to reduce the total cost of ownership.

With its much lower float current, the msEndur II yields significant electrical costs savings over its life making it more environmentally friendly than other 2V VRLA batteries.

APPLICATIONS

- Electric Utility Substations
- Telephone Backup
- Microwave Sites
- Signaling Sites
- Offshore Platforms
- Mines

FEATURES & BENEFITS

ADVANCED SYSTEM FEATURES

- Modular design for ease of installation and stacking flexibility
- Space saving design for the greatest amount of power in a small footprint
- Exceeds 1997 UBC Zone 4 seismic requirements for at or below grade installations
- Certified as NEBS Level 3 and compliant to Earthquake Risk Zone 4 in various system configurations
- Exceeds 2006 IBC requirements for 125% g level
- Tin-plated copper alloy connectors minimize maintenance
- New Ohmic Ring™ for ease of maintenance readings. With specially adapted probes only one technician is required to take readings.

ADVANCED MATERIALS

- Advanced micro-porous <u>Absorbed</u> <u>**G**</u>lass <u>M</u>at separators for ultra-low float current — reduces grid corrosion for a long, usable service life
- Proprietary calcium alloys to minimize positive grid corrosion and growth maximizes battery life
- Robust polypropylene container and cover — enhances product quality and improves strength of materials for safe operation with flammability rating UL94 VO, LOI>28%

 Highly efficient, proprietary plate processing for high utilization of active material — results in high energy density and low float current

ADVANCED PROCESSES

- Advanced formation process results in a narrow float voltage window making on-site float matching unnecessary
- Highly controlled manufacturing Highly processes for exceptional and consistent plate quality

ADVANCED SERVICE LIFE & WARRANTY

- Proprietary cell design and manufacturing process provides for 20 year design life and documented long-lasting service life
- Best 2V VRLA Warranty in the Market: 7 years full warranty for float service applications

ADVANCED EXPERIENCE

- Over 100 years of experience in the battery industry
- The only producer and marketer of complete battery and electronics systems for total power solutions
- Fully backed by a worldwide network for local service

CONSTANT CURRENT DISCHARGE RATINGS

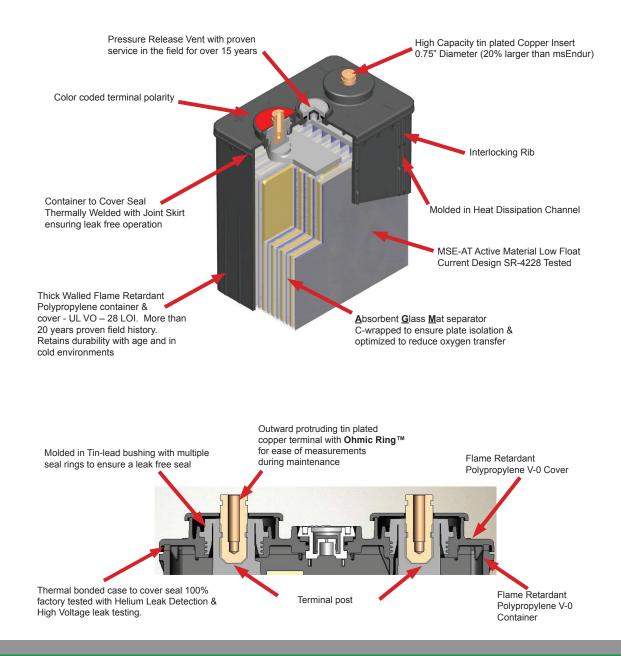
NPCENomeN													
Arrop No.9 No.9 <t< th=""><th>FV/Cell</th><th>Model</th><th>1 min</th><th>1 hr</th><th>2 hr</th><th>3 hr</th><th>4 hr</th><th>5 hr</th><th>6 hr</th><th>8 hr</th><th>10 hr</th><th>12 hr</th><th>24 hr</th></t<>	FV/Cell	Model	1 min	1 hr	2 hr	3 hr	4 hr	5 hr	6 hr	8 hr	10 hr	12 hr	24 hr
ArtifyArtifySight <t< th=""><th></th><th>AT-07P</th><th>396.6</th><th>189.3</th><th>122.7</th><th>92.5</th><th>74.8</th><th>63.0</th><th>54.5</th><th>43.1</th><th>35.6</th><th>30.4</th><th>16.2</th></t<>		AT-07P	396.6	189.3	122.7	92.5	74.8	63.0	54.5	43.1	35.6	30.4	16.2
Arr.38Arr.38Arr.38Arr.39Arr.39Arr.49Arr.49Arr.49Arr.40Arr.4		AT-09P	529.7	259.3	170.2	128.7	104.2	87.8	75.9	60.0	49.6	42.3	22.6
Ar-16 No. No. </th <th>AT-11P</th> <th>662.1</th> <th>324.1</th> <th>212.7</th> <th>160.9</th> <th>130.2</th> <th>109.7</th> <th>94.9</th> <th>74.9</th> <th>62.0</th> <th>52.9</th> <th>28.2</th>		AT-11P	662.1	324.1	212.7	160.9	130.2	109.7	94.9	74.9	62.0	52.9	28.2
N170 1070 69.48 222 29.48 109.6 108.1 114.8 104.0 101.4 43.3 116 M230 1031.0 4030 208.6 201.4 107.0 103.0 101.4 51.1 117.0 112.0 631.1 400.0 208.5 241.4 209.5 124.1 201.5 110.4 110.4 64.1 117.00 110.0 77.2 400.0 308.0 208.1 20.15 20.10 110.1 77.0 40.0 30.2 24.5 20.00 10.10 77.0 40.0 30.2 24.5 20.00 10.10 10.1 10.0 77.2 60.1 30.0 10.2 77.0 40.0 30.2 24.5 20.00 10.10 10.1 10.0 10.1 20.0 10.0 10.1 20.0 10.0 10.1 20.0 10.0 10.1 20.0 10.0 10.1 10.0 10.1 20.0 10.0 10.0 10.0 10.0		AT-13P	737.1	352.1	228.2	172.1	139.2	117.2	101.4	80.1	66.3	56.6	30.2
AT-19 1110 9824 392.8 292.4 107.5 107.5 104.9 118.6 108.6 103.4 101.6 50.2 AT-29 14807 713.0 407.0 308.5 204.5 201.1 118.1 118.6 326.6 224.6 221.6 118.6 326.7 AT39 0 118.0 07.72 08.6 70.7 118.6 392.6 71.7 118.6 392.7 118.7 120.7		AT-15P	927.0	453.7	297.8	225.3	182.3	153.6	132.9	104.9	86.3	74.1	39.5
AT-21P 52.20 63.11 0.000 30.80 24.95 20.11 10.15 10.35 10.46 F1.14 AT-22P 1680.4 77.3 440.7 38.0 20.95. 22.11 21.81 17.22 142.5 12.01 64.0 37.30 AT-22P 1880.4 77.3 400.8 37.01 47.02 22.85 24.85 140.0 17.20 17.10 77.3 67.1 44.28 37.30 22.52 20.60 17.08 17.09 07.00 17.09 07.00 </th <th></th> <th>AT-17P</th> <th>1057.6</th> <th>504.8</th> <th>327.2</th> <th>246.8</th> <th>199.6</th> <th>168.1</th> <th>145.4</th> <th>114.8</th> <th>95.0</th> <th>81.1</th> <th>43.3</th>		AT-17P	1057.6	504.8	327.2	246.8	199.6	168.1	145.4	114.8	95.0	81.1	43.3
AT24P 132.0 031.1 0400 306.0 249.5 201.1 101.6 143.5 118.4 101.4 64:1 AT23P 168.6 773.0 409.0 354.0 256.1 218.1 102.2 128.6 104.4 64.9 AT23P 168.0 757.3 409.0 370.0 234.0 248.0 128.5 200.9 166.3 141.0 75.8 AT23P 178.0 877.7 431.9 349.2 234.1 254.5 200.9 166.3 141.9 75.8 AT39 1199.0 777.2 588.1 474.0 399.2 345.4 272.7 25.6 100.7 <t< th=""><th>1.67</th><th>AT-19P</th><th>1191.9</th><th>583.4</th><th>382.8</th><th>289.6</th><th>234.4</th><th>197.5</th><th>170.9</th><th>134.9</th><th>111.6</th><th>95.2</th><th>50.8</th></t<>	1.67	AT-19P	1191.9	583.4	382.8	289.6	234.4	197.5	170.9	134.9	111.6	95.2	50.8
No.e No.e <th< th=""><th>1.07</th><th>AT-21P</th><th>1322.0</th><th>631.1</th><th>409.0</th><th>308.5</th><th>249.5</th><th>201.1</th><th>181.9</th><th>143.5</th><th>118.8</th><th>101.4</th><th>54.1</th></th<>	1.07	AT-21P	1322.0	631.1	409.0	308.5	249.5	201.1	181.9	143.5	118.8	101.4	54.1
Name Name <th< th=""><th></th><th>AT-23P</th><th>1456.7</th><th>713.0</th><th>467.9</th><th>354.0</th><th>286.5</th><th>241.4</th><th>208.9</th><th>164.9</th><th>136.4</th><th>116.4</th><th>62.1</th></th<>		AT-23P	1456.7	713.0	467.9	354.0	286.5	241.4	208.9	164.9	136.4	116.4	62.1
Image Image <th< th=""><th></th><th>AT-25P</th><th>1586.4</th><th>757.3</th><th>490.8</th><th>370.2</th><th>299.3</th><th>252.1</th><th>218.1</th><th>172.2</th><th>142.5</th><th>121.6</th><th>64.9</th></th<>		AT-25P	1586.4	757.3	490.8	370.2	299.3	252.1	218.1	172.2	142.5	121.6	64.9
Ar399IntityIntity77.294.094.2093.092.892.892.892.892.9897.9893.00FVCetModelIntityIntity97.798.097.798.098.097.798.097.798.097.798.097.798.097.798.097.797.0		AT-27P	1721.6	842.6	553.0	418.4	338.6	285.3	246.8	194.9	161.2	137.6	73.4
AT-39PImageImageImageNo. </th <th></th> <th>AT-29P</th> <th>1850.8</th> <th>883.5</th> <th>572.7</th> <th>431.9</th> <th>349.2</th> <th>294.1</th> <th>254.5</th> <th>200.9</th> <th>166.3</th> <th>141.9</th> <th>75.8</th>		AT-29P	1850.8	883.5	572.7	431.9	349.2	294.1	254.5	200.9	166.3	141.9	75.8
FVicell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 12 hr 24 hr AT-07P 357.6 181.0 116.1 895. 72.7 61.4 53.3 42.3 35.1 30.0 162.2 AT-19P 896.8 30.95. 204.6 105.7 126.6 170.0 92.8 73.6 61.1 62.3 28.1 AT-19P 835.6 433.3 206.6 218.0 177.2 144.8 130.0 103.1 65.5 73.2 39.3 AT-19P 835.6 433.3 206.6 227.8 192.6 167.1 132.5 100.0 44.1 50.6 AT-24P 1192.1 603.3 393.7 288.4 242.4 204.8 177.7 141.0 117.0 100.1 63.9 AT-24P 159.1 804.8 552.3 404.8 320.1 276.2 143.1 140.2 164.6 65.7 73.0		AT-35P		1101.9	723.3	547.1	442.8	373.0	322.8	254.8	210.8	179.9	96.0
AT-07P S7:76 181.0 181.1 89.5 72.7 61.4 53.3 42.3 95.1 90.00 162.2 AT-08P 47.75 247.8 163.8 124.6 101.2 85.6 74.3 88.9 48.9 44.8 22.5 AT-18P 665.2 33.6 24.4 155.7 126.6 175.2 114.3 99.2 77.8 65.3 65.9 30.1 AT-18P 665.2 33.6 23.0 177.2 148.8 190.0 103.1 65.7 73.2 93.3 AT-17P 95.7 442.6 314.9 23.84 103.9 143.2 112.8 93.6 03.1 43.1 AT-27P 191.0 68.1 457.2 28.8 22.8 127.4 143.0 110.1 110.1 63.6 AT-37P 151.8 08.8 57.2 34.6 22.8 27.4 35.1 12.7 95.5 FVICeI Model 1mm 1r		AT-39P		1199.0	777.2	586.1	474.0	399.2	345.4	272.7	225.6	192.9	102.8
AT.09PAT.75247.6163.8124.6101.285.674.358.949.941.822.5AT.1P506.8300.520.46155.7126.0107.002.573.661.152.328.1AT.49662.2336.6218.7165.5113.2114.390.278.7663.550.313.1AT.49663.5433.3286.6218.0177.2148.8130.0103.185.573.293.3AT.49107.43557.2386.5280.2227.8192.6107.1132.5110.094.150.6AT.29113.1661.0450.4424.527.8423.84204.2161.913.44115.061.8AT.29113.0681.0450.4424.527.8423.84204.2161.913.44115.061.8AT.29109.0844.6651.1417.8339.3286.8243.8107.4163.8135.073.0AT.39109.0105.2120.4430.3338.3315.625.020.717.795.5FVCetModel1m1m2m52.443.0338.8315.625.020.717.795.5AT.49644.9244.0152.212.4105.117.715.620.017.795.5FVCetModel1m1m2m52.443.033.3286.821.411.834.	FV/Cell	Model	1 min	1 hr	2 hr	3 hr	4 hr	5 hr	6 hr	8 hr	10 hr	12 hr	24 hr
A7.19590.6303.620.46118.712.0107.092.873.661.162.328.1AT.13P665.2333.621.97166.5113.2114.399.277.765.355.930.1AT.17P95.7482.631.49238.8139.9163.9142.2112.893.680.143.1AT.17P95.7482.631.49238.8139.9163.9142.2112.893.680.143.1AT.21P119.21603.3383.7298.4242.4204.8177.7141.0117.0100.153.9AT.23P131.3681.0460.4342.5277.823.8203.8245.8213.3169.914.4150.061.8AT.29P1551.8804.853.2.3404.8329.1278.2241.4191.4158.8135.973.0AT.27P1551.8804.853.2.3404.8329.1278.2241.4191.4158.8135.973.0AT.39P20.91062.4096.0529.4430.3363.8316.6250.3207.7177.795.5FVCellModel1mm1m2mSm5m6m8m1m1m2m2mAT.39P331.9175.7150.6121.790.284.173.148.444.522.4AT.41P553.730.5159.2152.2172.8173.484.7 </th <th></th> <th>AT-07P</th> <th>357.6</th> <th>181.0</th> <th>118.1</th> <th>89.5</th> <th>72.7</th> <th>61.4</th> <th>53.3</th> <th>42.3</th> <th>35.1</th> <th>30.0</th> <th>16.2</th>		AT-07P	357.6	181.0	118.1	89.5	72.7	61.4	53.3	42.3	35.1	30.0	16.2
AT-39686233.6219.7196.5195.2114.399.278.766.365.930.1AT-15P63.6433.3266.6218.0177.2149.8130.0103.165.573.239.3AT-17P95.7482.631.49238.6193.9163.9142.2112.6100.094.100.6AT-19P1074.3557.2386.5280.2227.8192.6107.1113.25110.094.100.6AT-23P131.3681.0450.4424.224.8177.7141.0110.4153.9AT-23P131.3681.0450.4328.1270.8245.8213.3119.2140.4110.264.6AT-23P168.084.6551.1417.8339.3286.8248.8197.4168.8135.973.0AT-23P168.084.6551.1417.8339.3286.8248.8197.4168.8140.275.4AT-39P160.7110.087.571.260.462.541.834.729.816.1AT-39P107.7110.087.571.260.462.541.844.729.816.1AT-39P107.7110.087.571.260.461.781.715.087.512.214.415.027.774.415.0AT-39P107.730.5190.517.2100.415.214.416.0		AT-09P	477.5	247.6	163.8	124.6	101.2	85.6	74.3	58.9	48.9	41.8	22.5
AT-15P835.6433.3286.6218.0177.2149.8130.0103.185.573.2393.3AT-17P963.7482.6314.9238.8193.9163.9142.2101.893.680.143.1AT-17P963.7482.6314.9238.8193.9163.9142.2112.893.680.143.1AT-17P197.1650.3355.7238.6227.6192.6107.1112.8103.110.115.061.8AT-27P1192.1603.3393.7298.4242.4204.8211.3169.2134.4115.061.8AT-27P1551.8804.8552.3404.8329.1270.2241.4191.4158.8135.073.0FV/C01Model1min1mi2m3m4m5m5m6m8m100.7177.795.5FV/C01Model1min1mi2m2m3min4m5m5m6m8m10m12m2mAT-39P175.7115.087.571.260.465.541.834.722m28.1612.3AT-19P175.7115.087.571.260.465.541.834.722m28.1612.3AT-19P175.7115.087.571.260.465.734.834.722.424.4AT-19P175.712.020.612.2112.813.62		AT-11P	596.8	309.5	204.6	155.7	126.6	107.0	92.8	73.6	61.1	52.3	28.1
AT-7P953.7482.6314.9238.8193.9163.9142.2112.893.680.143.1AT-191074.3657.2366.5280.2227.8192.6107.1132.5110.094.160.6AT-391313.0681.0450.4393.7294.2224.4204.8177.7141.0117.010.10153.9AT-391313.0723.9472.4358.1290.8245.8213.3169.2140.4115.064.6AT-29P1660.0844.6551.1417.8339.3286.8241.8197.4158.8140.275.4AT-39P1060.0529.4430.3363.8116.6207.717.795.5FV(celModel1mi1r.1r.3r.4r.5r.6r.8r.10.1770.5AT-79P331.917.7115.087.571.260.452.541.834.728.816.1AT-79P331.917.7115.087.571.260.452.541.834.728.816.1AT-79P331.9175.7115.087.571.260.452.541.834.728.816.1AT-79P331.9175.7115.087.571.260.452.541.834.728.816.1AT-79P331.9175.717.087.773.142.085.773.287.887.839.0 <td< th=""><th></th><th>AT-13P</th><th>665.2</th><th>336.6</th><th>219.7</th><th>166.5</th><th>135.2</th><th>114.3</th><th>99.2</th><th>78.7</th><th>65.3</th><th>55.9</th><th>30.1</th></td<>		AT-13P	665.2	336.6	219.7	166.5	135.2	114.3	99.2	78.7	65.3	55.9	30.1
A7-9P 1074.3 557.2 368.5 280.2 227.8 192.6 167.1 132.5 110.0 94.1 50.6 A7.2P 1192.1 603.3 393.7 296.4 242.4 204.8 177.7 141.0 117.0 100.1 53.9 A7.2P 1350.5 723.9 472.4 356.1 290.8 245.8 213.3 169.2 140.4 120.2 64.6 A7.2P 1551.8 80.4.8 523.3 400.4 323.1 272.2 241.4 191.4 158.8 136.9 73.0 A7.3P 1551.1 417.7 333.3 286.8 248.8 197.4 158.8 160.2 75.4 A7.3P 1757 155.1 711.5 37.5 71.4 48.4 44.5 24.4 161 27.4 24.4 161 27.4 24.4 161.7 132.5 44.8 44.5 24.4 161.4 132.4 48.4 44.5 22.4 24.4 17.7		AT-15P	835.6	433.3	286.6	218.0	177.2	149.8	130.0	103.1	85.5	73.2	39.3
AT-21P1192.1603.3393.7298.4242.4204.8177.7141.0117.0100.153.9AT-23P131.3681.0450.4342.5278.4235.4204.2161.9114.4115.061.8AT-23P151.8804.8552.3404.8328.1278.2241.4191.4118.8135.973.0AT-23P1660.0844.6551.1417.8339.3288.8248.8197.4168.8140.275.4AT-39P1062.4660.5551.1417.8339.3268.8248.8197.4168.8140.275.4FV/CellModel1min1hr2hr3hr4hr5hr6hr8hr10hr12hr24hrAT-07P331.9175.7115.087.571.260.452.541.834.728.816.1AT-109442.9240.4159.6152.2124.0105.191.460.560.551.822.4AT-13P617.4320.621.117.3147.2127.984.173.144.7444.444.522.4AT-13P617.4320.821.117.3147.2127.984.784.772.630.2AT-13P617.442.8273.9123.117.3147.2127.984.150.551.823.330.0AT-13P617.442.832.4149.9122.9126.7 <td< th=""><th></th><th>AT-17P</th><th>953.7</th><th>482.6</th><th>314.9</th><th>238.8</th><th>193.9</th><th>163.9</th><th>142.2</th><th>112.8</th><th>93.6</th><th>80.1</th><th>43.1</th></td<>		AT-17P	953.7	482.6	314.9	238.8	193.9	163.9	142.2	112.8	93.6	80.1	43.1
AT-32P1313.0681.0450.4342.5278.4235.4204.2161.9134.4115.061.8AT-25P1430.5723.9472.4358.1200.8245.8213.3169.2140.4120.264.6AT-29P1669.0844.6551.1417.8339.3286.8241.4191.4158.8135.973.0AT-29P1669.0844.6551.1417.8339.3286.8248.8197.4163.8140.275.4AT-39P176.7711.060.662.9430.3363.831.6250.3207.717.795.5FV/CellModel1 min1 hr2 hr3 hr4 hr5 hr6 hr8 hr10 hr12 hr24 hrAT-39P175.7115.08 hr5 hr6 hr8 hr10 hr12 hr24 hrAT-39P175.7115.08 hr10 hr11 hr2 hr2 hr11 hr11 hr2 hr2 hrAT-19P553.7300.5199.5152.2112.010 hr6 h6 h6 h5 h3 hr2 hr12 hr3 hr14 hr15.813 hr2 hrAT-19P955.1468.630 hr12 hr12 hr14 hr15.815 hr3 hr2 hrAT-39617.432 hr12 hr13 hr14 hr15 hr13 hr14 hr15 hrAT-19P96.6540.630 hr2 hr2 hr12	1.78	AT-19P	1074.3	557.2	368.5	280.2	227.8	192.6	167.1	132.5	110.0	94.1	50.6
AT-25P 1430.5 723.9 472.4 358.1 290.8 245.8 213.3 169.2 140.4 120.2 64.6 AT-27P 1551.8 804.8 532.3 404.8 329.1 278.2 241.4 191.4 155.8 135.9 73.0 AT-35P 106524 696.0 529.4 430.3 368.8 315.6 250.3 207.7 177.7 95.5 FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 2 hr 2 hr AT-07P 331.9 175.7 115.0 87.7 71.2 60.4 65.5 41.8 34.4 44.5 2 2.8 161.1 AT-17P 030.5 199.5 152.2 112.0 97.6 64.6 64.6 55.4 30.0 30.1 AT-15P 75.1 420.6 273.3 213.1 173.7 147.2 17.9 64.6 64.6 55.4 30.0 <		AT-21P	1192.1	603.3	393.7	298.4	242.4	204.8	177.7	141.0	117.0	100.1	53.9
AT-27P 1551.8 804.8 532.3 404.8 329.1 278.2 241.4 191.4 158.8 135.9 73.0 AT-29P 1669.0 84.46 551.1 417.8 339.3 286.8 248.8 197.4 165.3 140.2 75.4 FViCell Model 1min 1m 2m.7 84.3 363.8 315.6 20.5 20.7 177.7 95.5 FViCell Model 1min 1m.7 2m.7 97.5 60.4 52.5 41.8 34.7 29.8 16.1 AT-07P 331.9 175.7 115.2 124.0 105.1 61.4 43.5 22.4 AT-19P 617.4 326.8 214.0 162.7 132.5 112.3 97.6 64.6 64.6 55.4 30.0 AT-19P 617.4 326.8 214.0 162.7 132.5 112.3 97.6 64.6 65.4 30.0 AT-19P 956.6 54.0.8 3		AT-23P	1313.0	681.0	450.4	342.5	278.4	235.4	204.2	161.9	134.4	115.0	61.8
AT-29P 1669.0 844.6 551.1 417.8 339.3 286.8 248.8 197.4 163.8 140.2 75.4 AT-35P 1052.4 696.0 529.4 430.3 363.8 315.6 250.3 207.7 177.7 95.5 FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 12 hr 24.4 AT-09P 442.9 240.4 159.6 121.7 99.2 84.1 73.1 48.4 48.4 41.5 22.4 AT-17P 310.5 199.5 152.2 124.0 105.1 91.4 60.5 60.5 51.8 28.0 AT-17P 1420.6 279.3 213.1 173.7 147.2 127.9 84.7 74.6 39.2 AT-17P 996.6 540.8 306.8 233.3 190.0 160.9 139.9 92.7 79.4 43.0 AT-27P 1430.6 761.2		AT-25P	1430.5	723.9	472.4	358.1	290.8	245.8	213.3	169.2	140.4	120.2	64.6
AT.35P 1052.4 696.0 529.4 430.3 363.8 315.6 250.3 207.7 177.7 95.5 FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 12 hr 24 hr AT-07P 331.9 175.7 115.0 87.5 71.2 60.4 52.5 41.8 34.7 29.8 16.1 AT-07P 331.9 175.7 119.5 112.7 99.2 84.1 73.1 48.4 48.4 44.5 22.4 AT-19P 617.4 326.8 214.0 162.7 132.5 112.3 97.6 64.6 64.6 55.4 30.0 AT-19P 996.6 540.8 39.1 27.3.9 123.1 177.7 147.2 127.9 84.7 72.6 39.2 AT-17P 855.1 468.6 30.6.8 233.3 100.0 103.9 10.14.0 61.6 AT-21P 1106.4 <td< th=""><th>AT-27P</th><th>1551.8</th><th>804.8</th><th>532.3</th><th>404.8</th><th>329.1</th><th>278.2</th><th>241.4</th><th>191.4</th><th>158.8</th><th>135.9</th><th>73.0</th></td<>		AT-27P	1551.8	804.8	532.3	404.8	329.1	278.2	241.4	191.4	158.8	135.9	73.0
FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 12 hr 24 hr AT-07P 331.9 175.7 115.0 87.5 71.2 60.4 52.5 41.8 34.7 29.8 16.1 AT-09P 442.9 240.4 159.6 121.7 99.2 84.1 73.1 48.4 48.4 44.5 22.4 AT-17P 553.7 30.05 199.5 152.2 124.0 105.1 914.4 60.5 65.4 30.0 AT-17P 617.4 326.8 214.0 162.7 132.5 112.3 97.6 64.6 64.6 55.4 30.0 AT-17P 885.1 468.6 306.8 233.3 190.0 160.9 139.9 92.7 92.7 79.4 43.0 AT-17P 885.1 468.6 306.8 237.5 201.2 174.9 115.8 118.8 99.3 53.7 AT-23P <th>AT-29P</th> <th>1669.0</th> <th>844.6</th> <th>551.1</th> <th>417.8</th> <th>339.3</th> <th>286.8</th> <th>248.8</th> <th>197.4</th> <th>163.8</th> <th>140.2</th> <th>75.4</th>		AT-29P	1669.0	844.6	551.1	417.8	339.3	286.8	248.8	197.4	163.8	140.2	75.4
AT-07P 331.9 175.7 115.0 87.5 71.2 60.4 52.5 41.8 34.7 29.8 16.1 AT-09P 442.9 240.4 159.6 121.7 99.2 84.1 73.1 48.4 48.4 44.5 22.4 AT-11P 553.7 300.5 199.5 152.2 124.0 105.1 91.4 60.5 65.8 28.0 AT-13P 617.4 326.8 214.0 182.2 122.3 97.6 64.6 64.6 55.4 39.2 AT-17P 885.1 468.6 306.8 233.3 190.0 160.9 139.9 92.7 92.7 79.4 43.0 AT-17P 106.4 585.7 383.5 291.6 237.5 201.2 174.9 118.8 198.9 93.3 50.44 AT-23P 193.6 712.8 499.9 285.0 241.4 209.9 139.0 119.1 64.5 AT-23P 139.6 712.4 518		AT-35P		1052.4	696.0	529.4	430.3	363.8	315.6	250.3	207.7	177.7	95.5
AT-09P 442.9 240.4 159.6 121.7 99.2 84.1 73.1 48.4 48.4 41.5 22.4 AT-11P 553.7 300.5 199.5 152.2 124.0 105.1 91.4 60.5 60.5 51.8 28.0 AT-13P 617.4 326.8 214.0 162.7 132.5 112.3 97.6 64.6 64.6 65.4 30.0 AT-15P 775.1 420.6 273.9 223.3 190.0 160.9 139.9 92.7 92.7 79.4 43.0 AT-17P 885.1 468.6 306.8 233.3 190.0 160.9 139.9 92.7 92.7 79.4 43.0 AT-21P 101.64 565.7 333.5 291.6 237.5 201.2 101.1 133.0 113.0 113.0 113.0 113.0 113.0 113.0 113.0 113.0 134.7 72.8 AT-25P 143.9 781.2 518.7 392.5	FV/Cell	Model	1 min	1 hr	2 hr	3 hr	4 hr	5 hr	6 hr	8 hr	10 hr	12 hr	24 hr
AT-11P 553.7 300.5 199.5 152.2 124.0 105.1 91.4 60.5 60.5 51.8 28.0 AT-13P 617.4 326.8 214.0 162.7 132.5 112.3 97.6 64.6 64.6 55.4 30.0 AT-13P 617.4 420.6 279.3 213.1 173.7 147.2 127.9 84.7 84.7 72.6 39.2 AT-13P 855.1 460.6 306.8 233.3 190.0 160.9 108.9 90.7 97.4 43.0 AT-24P 1106.4 557.7 383.5 291.6 237.5 201.2 174.9 115.8 199.3 53.7 AT-24P 1106.4 650.7 383.5 291.6 237.5 201.2 174.9 115.8 193.0 119.0 64.5 AT-24P 143.6 678.7 383.5 291.6 231.2 201.1 133.0 130.0 139.0 139.0 139.0 139.0 139.0		AT-07P	331.9	175.7	115.0	87.5	71.2	60.4	52.5	41.8	34.7	29.8	16.1
AT-13P 617.4 326.8 214.0 162.7 132.5 112.3 97.6 64.6 64.6 55.4 30.0 AT-15P 775.1 420.6 279.3 213.1 173.7 147.2 127.9 84.7 84.7 72.6 39.2 AT-15P 885.1 468.6 306.8 233.3 190.0 160.9 139.9 92.7 92.7 79.4 43.0 AT-15P 996.6 540.8 359.1 273.9 223.3 169.2 174.9 115.8 193.9 93.3 50.4 AT-21P 1106.4 585.7 335.5 201.6 237.5 201.2 174.9 158.9 111.0 61.6 AT-23P 122.6 702.8 460.2 349.9 225.0 241.4 209.9 139.0 119.0 140.0 61.6 AT-23P 154.9 820.0 536.9 408.3 332.5 281.7 244.9 162.2 139.0 75.2 AT-35P		AT-09P	442.9	240.4	159.6	121.7	99.2	84.1	73.1	48.4	48.4	41.5	22.4
AT-15P 775.1 420.6 279.3 213.1 173.7 147.2 127.9 84.7 84.7 72.6 39.2 AT-17P 885.1 466.6 306.8 233.3 190.0 160.9 139.9 92.7 92.7 79.4 43.0 AT-18P 190.6 50.8 359.1 273.9 223.3 189.2 164.5 108.9 93.3 50.4 AT-21P 1106.4 585.7 383.5 291.6 237.5 201.2 174.9 115.8 115.8 99.3 53.7 AT-23P 1218.1 661.0 438.9 334.8 272.9 231.2 201.1 133.0 133.0 114.0 64.5 AT-23P 1218.6 702.8 460.2 349.9 285.0 241.4 209.9 139.0 119.1 64.5 AT-37P 143.6 787.4 421.8 357.4 310.7 220.1 183.7 72.8 AT-37P 149.5 728.6 554.1 <th>AT-11P</th> <th>553.7</th> <th>300.5</th> <th>199.5</th> <th>152.2</th> <th>124.0</th> <th>105.1</th> <th>91.4</th> <th>60.5</th> <th>60.5</th> <th>51.8</th> <th>28.0</th>		AT-11P	553.7	300.5	199.5	152.2	124.0	105.1	91.4	60.5	60.5	51.8	28.0
AT-17P 885.1 468.6 306.8 233.3 190.0 160.9 139.9 92.7 92.7 79.4 43.0 AT-19P 996.6 540.8 359.1 273.9 223.3 189.2 164.5 108.9 108.9 93.3 50.4 AT-21P 1016.4 585.7 383.5 291.6 237.5 201.2 174.9 115.8 115.8 99.3.3 53.7 AT-23P 1218.1 661.0 438.9 334.8 272.9 231.2 201.1 133.0 113.0 114.0 616.6 AT-27P 1439.6 781.2 518.7 395.7 322.5 273.3 237.6 157.2 134.7 72.8 AT-3P 1548.9 820.0 536.9 406.3 332.5 281.7 244.9 162.2 162.2 139.0 175.2 AT-3P 157.6 67.4 451.8 382.2 332.4 200.1 220.1 188.7 102.1 102.1 FV/		AT-13P	617.4	326.8	214.0	162.7	132.5	112.3	97.6	64.6	64.6	55.4	30.0
AT-19P996.6540.8359.1273.9223.3189.2164.5108.9108.993.350.4AT-21P1106.4585.7383.5291.6237.5201.2174.9115.8115.899.355.7AT-23P1218.1661.0438.9334.8272.9231.2201.1133.0133.0114.061.6AT-23P1327.6702.8460.2349.9285.0241.4209.9130.0130.0119.0164.5AT-29P1439.6781.2518.7395.7322.5273.3237.6157.2152.2132.772.8AT-29P1439.6781.2518.7395.7322.5281.7244.9162.2162.2139.075.2AT-39P1021.6678.3517.4421.8357.4310.7205.6205.6176.295.3AT-39P1112.8728.6554.1451.8382.2332.420.120.11188.7102.1FVCellModel1 min1 hr2 hr3 hr4 hr5 hr6 hr8 hr10 hr12 hr24 hrAT-39P31.5172.7113.786.570.459.751.941.334.329.415.9FVCellModel1 min1 hr2 hr3 hr1 hr5 hr6 hr8 hr10 hr12 hr24 hrFV31.5172.7113.786.570.459.751.9 </th <th></th> <th>AT-15P</th> <th>775.1</th> <th>420.6</th> <th>279.3</th> <th>213.1</th> <th>173.7</th> <th>147.2</th> <th>127.9</th> <th>84.7</th> <th>84.7</th> <th>72.6</th> <th>39.2</th>		AT-15P	775.1	420.6	279.3	213.1	173.7	147.2	127.9	84.7	84.7	72.6	39.2
H.80 AT-21P 1106.4 585.7 383.5 291.6 237.5 201.2 174.9 115.8 115.8 99.3 53.7 AT-23P 1218.1 661.0 438.9 334.8 272.9 231.2 201.1 133.0 133.0 114.0 661.6 AT-23P 128.7 702.8 460.2 349.9 285.0 241.4 209.9 139.0 139.0 119.1 64.5 AT-23P 143.96 781.2 518.7 395.7 322.5 281.7 244.9 162.2 162.2 139.0 75.2 AT-39P 1021.6 678.3 517.4 421.8 387.4 310.7 205.6 205.6 176.2 95.3 AT-39P 1021.6 678.3 517.4 421.8 387.4 310.7 205.6 205.6 176.2 95.3 AT-39P 1312.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 159.7		AT-17P	885.1	468.6	306.8	233.3	190.0	160.9	139.9	92.7	92.7	79.4	43.0
AT-21P 1106.4 585.7 383.5 291.6 237.5 201.2 174.9 115.8 115.8 99.3 53.7 AT-23P 1218.1 661.0 438.9 334.8 272.9 231.2 201.1 133.0 133.0 114.0 61.6 AT-23P 1218.1 661.0 438.9 334.8 272.9 231.2 201.1 133.0 133.0 114.0 61.6 AT-23P 1238.6 702.8 460.2 349.9 285.0 241.4 209.9 139.0 139.0 119.1 64.5 AT-23P 1548.9 820.0 536.9 408.3 332.5 281.7 244.9 162.2 162.2 139.0 130.0 176.2 AT-33P 1112.8 728.6 554.1 451.8 382.2 332.4 220.1 20.1 188.7 102.1 FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr <th< th=""><th>1 00</th><th>AT-19P</th><th>996.6</th><th>540.8</th><th>359.1</th><th>273.9</th><th>223.3</th><th>189.2</th><th>164.5</th><th>108.9</th><th>108.9</th><th>93.3</th><th>50.4</th></th<>	1 00	AT-19P	996.6	540.8	359.1	273.9	223.3	189.2	164.5	108.9	108.9	93.3	50.4
AT-25P 1327.6 702.8 460.2 349.9 285.0 241.4 209.9 139.0 139.0 119.1 64.5 AT-27P 1439.6 781.2 518.7 395.7 322.5 273.3 237.6 157.2 157.2 134.7 72.8 AT-29P 1548.9 820.0 536.9 408.3 332.5 281.7 244.9 162.2 162.2 139.0 175.2 AT-35P 1021.6 678.3 517.4 421.8 357.4 310.7 205.6 205.6 176.2 95.3 AT-39P 1112.8 728.6 554.1 451.8 382.2 332.4 20.1 22.01 188.7 102.1 FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 2 hr 2 hr AT-37P 319.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 15.9	1.00	AT-21P	1106.4	585.7	383.5	291.6	237.5	201.2	174.9	115.8	115.8	99.3	53.7
AT-27P 1439.6 781.2 518.7 395.7 322.5 273.3 237.6 157.2 157.2 134.7 72.8 AT-29P 1548.9 820.0 536.9 408.3 332.5 281.7 244.9 162.2 162.2 139.0 75.2 AT-39P 1021.6 678.3 517.4 421.8 357.4 310.7 205.6 205.6 176.2 95.3 AT-39P 1112.8 728.6 554.1 451.8 382.2 332.4 220.1 220.1 188.7 102.1 FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 2 hr 2 hr AT-07P 319.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 15.9 AT-19P 391.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 29.1 <			1218.1	661.0	438.9	334.8	272.9	231.2	201.1	133.0	133.0	114.0	61.6
AT-29P 1548.9 820.0 536.9 408.3 332.5 281.7 244.9 162.2 162.2 139.0 75.2 AT-38P 1021.6 678.3 517.4 421.8 357.4 310.7 205.6 205.6 176.2 95.3 AT-39P 1112.8 728.6 554.1 451.8 382.2 332.4 220.1 220.1 188.7 102.1 FV/Cell Model 1min 1hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 12 hr 24 hr AT-07P 319.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 15.9 AT-07P 319.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 15.9 AT-17P 353.1 294.7 196.9 150.4 122.6 103.9 90.3 71.9 59.8 51.2 27.7 AT		AT-25P	1327.6	702.8	460.2	349.9	285.0	241.4	209.9	139.0	139.0	119.1	64.5
AT-35P 10021.6 678.3 517.4 421.8 357.4 310.7 205.6 205.6 176.2 95.3 AT-39P 1112.8 728.6 554.1 451.8 382.2 332.4 220.1 220.1 188.7 102.1 FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 12 hr 24 hr AT-07P 319.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 15.9 AT-07P 342.5 235.8 157.5 120.3 98.1 83.1 72.3 57.5 47.8 41.0 22.1 AT-17P 533.1 294.7 196.9 150.4 122.6 103.9 90.3 71.9 59.8 51.2 27.7 AT-17P 594.3 321.2 211.4 160.9 131.0 111.0 96.5 76.8 63.9 54.8 29.6 AT-		AT-27P	1439.6	781.2	518.7	395.7	322.5	273.3	237.6	157.2	157.2	134.7	72.8
AT-39PI112.8728.6554.1451.8382.2332.4220.1220.1188.7102.1FV/CellModel1 min1 hr2 hr3 hr4 hr5 hr6 hr8 hr10 hr12 hr24 hrAT-07P319.5172.7113.786.570.459.751.941.334.329.415.9AT-09P426.5235.8157.5120.398.183.172.357.547.841.022.1AT-11P533.1294.7196.9150.4122.6103.990.371.959.851.227.7AT-13P594.3321.2211.4160.9131.0111.096.576.863.954.829.6AT-15P746.3412.6275.7210.5171.7145.5126.5100.683.771.738.8AT-17P852.0460.5303.1230.6187.8159.1138.4110.191.678.542.5AT-17P959.6530.5354.4270.7220.7187.0162.6129.3107.692.249.8AT-17P959.6530.5354.4270.7220.7187.0162.6129.3107.698.153.1AT-17P959.6530.5354.4270.7220.7187.0162.6129.3107.698.153.1AT-17P1065.0575.6378.9288.3234.8198.9172.9			1548.9										
FV/Cell Model 1 min 1 hr 2 hr 3 hr 4 hr 5 hr 6 hr 8 hr 10 hr 12 hr 24 hr AT-07P 319.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 15.9 AT-09P 426.5 235.8 157.5 120.3 98.1 83.1 72.3 57.5 47.8 41.0 22.1 AT-17P 533.1 294.7 196.9 150.4 122.6 103.9 90.3 71.9 59.8 51.2 27.7 AT-13P 594.3 321.2 211.4 160.9 131.0 111.0 96.5 76.8 63.9 54.8 29.6 AT-15P 746.3 412.6 275.7 210.5 171.7 145.5 126.5 100.6 83.7 71.7 38.8 AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 </th <th></th>													
AT-07P 319.5 172.7 113.7 86.5 70.4 59.7 51.9 41.3 34.3 29.4 15.9 AT-09P 426.5 235.8 157.5 120.3 98.1 83.1 72.3 57.5 47.8 41.0 22.1 AT-11P 533.1 294.7 196.9 150.4 122.6 103.9 90.3 71.9 59.8 51.2 27.7 AT-13P 594.3 321.2 211.4 160.9 131.0 111.0 96.5 76.8 63.9 54.8 29.6 AT-15P 746.3 412.6 275.7 210.5 171.7 145.5 126.5 100.6 83.7 71.7 38.8 AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 <t< th=""><th>AT-39P</th><th></th><th>1112.8</th><th>728.6</th><th>554.1</th><th>451.8</th><th>382.2</th><th>332.4</th><th>220.1</th><th>220.1</th><th>188.7</th><th>102.1</th></t<>		AT-39P		1112.8	728.6	554.1	451.8	382.2	332.4	220.1	220.1	188.7	102.1
AT-09P 426.5 235.8 157.5 120.3 98.1 83.1 72.3 57.5 47.8 41.0 22.1 AT-11P 533.1 294.7 196.9 150.4 122.6 103.9 90.3 71.9 59.8 51.2 27.7 AT-13P 594.3 321.2 211.4 160.9 131.0 111.0 96.5 76.8 63.9 54.8 29.6 AT-15P 746.3 412.6 275.7 210.5 171.7 145.5 126.5 100.6 83.7 71.7 38.8 AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 AT-17P 852.0 460.5 378.9 288.3 234.8 198.9 172.9 137.6 114.5 98.1 53.1	FV/Cell	Model	1 min	1 hr	2 hr	3 hr	4 hr	5 hr	6 hr	8 hr	10 hr	12 hr	24 hr
AT-11P 533.1 294.7 196.9 150.4 122.6 103.9 90.3 71.9 59.8 51.2 27.7 AT-13P 594.3 321.2 211.4 160.9 131.0 111.0 96.5 76.8 63.9 54.8 29.6 AT-15P 746.3 412.6 275.7 210.5 171.7 145.5 126.5 100.6 83.7 71.7 38.8 AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 AT-19P 959.6 530.5 354.4 270.7 220.7 187.0 162.6 129.3 107.6 92.2 49.8 AT-21P 1065.0 575.6 378.9 288.3 234.8 198.9 172.9 137.6 114.5 98.1 53.1 AT-23P 1172.8 648.4 433.2 330.8 269.8 228.6 198.8 158.1 131.5 112.7 60.9	1.81	AT-07P	319.5	172.7	113.7	86.5	70.4	59.7	51.9	41.3	34.3	29.4	15.9
AT-13P 594.3 321.2 211.4 160.9 131.0 111.0 96.5 76.8 63.9 54.8 29.6 AT-15P 746.3 412.6 275.7 210.5 171.7 145.5 126.5 100.6 83.7 71.7 38.8 AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 AT-19P 959.6 530.5 354.4 270.7 220.7 187.0 162.6 129.3 107.6 92.2 49.8 AT-21P 1065.0 575.6 378.9 288.3 234.8 198.9 172.9 137.6 114.5 98.1 53.1 AT-23P 1172.8 648.4 433.2 330.8 269.8 228.6 198.8 158.1 131.5 112.7 60.9 AT-23P 1172.8 648.4 433.2 330.8 281.8 238.7 207.5 165.1 137.4 117.7 63.7 </th <th>AT-09P</th> <th>426.5</th> <th>235.8</th> <th>157.5</th> <th>120.3</th> <th>98.1</th> <th>83.1</th> <th>72.3</th> <th>57.5</th> <th>47.8</th> <th>41.0</th> <th>22.1</th>		AT-09P	426.5	235.8	157.5	120.3	98.1	83.1	72.3	57.5	47.8	41.0	22.1
AT-15P 746.3 412.6 275.7 210.5 171.7 145.5 126.5 100.6 83.7 71.7 38.8 AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 AT-19P 959.6 530.5 354.4 270.7 220.7 187.0 162.6 129.3 107.6 92.2 49.8 AT-21P 1065.0 575.6 378.9 288.3 234.8 198.9 172.9 137.6 114.5 98.1 53.1 AT-23P 1172.8 648.4 433.2 330.8 269.8 228.6 198.8 158.1 131.5 112.7 60.9 AT-25P 1278.0 960.7 454.7 346.0 281.8 238.7 207.5 165.1 137.4 117.7 63.7 AT-25P 1278.0 960.7 454.7 346.0 281.8 238.7 207.5 165.1 137.4 117.7 6		AT-11P	533.1	294.7	196.9	150.4	122.6	103.9	90.3	71.9	59.8	51.2	27.7
AT-17P 852.0 460.5 303.1 230.6 187.8 159.1 138.4 110.1 91.6 78.5 42.5 AT-19P 959.6 530.5 354.4 270.7 220.7 187.0 162.6 129.3 107.6 92.2 49.8 AT-21P 1065.0 575.6 378.9 288.3 234.8 198.9 172.9 137.6 114.5 98.1 53.1 AT-23P 1172.8 648.4 433.2 330.8 269.8 228.6 198.8 158.1 131.5 112.7 60.9 AT-25P 1278.0 960.7 454.7 346.0 281.8 238.7 207.5 165.1 137.4 117.7 63.7 AT-25P 1278.0 960.7 454.7 346.0 281.8 238.7 207.5 165.1 137.4 117.7 63.7 AT-27P 1386.0 766.3 511.9 391.0 318.8 270.2 234.9 186.8 155.4 133.2 <t< th=""><th>AT-13P</th><th>594.3</th><th>321.2</th><th>211.4</th><th>160.9</th><th>131.0</th><th>111.0</th><th>96.5</th><th>76.8</th><th>63.9</th><th>54.8</th><th>29.6</th></t<>		AT-13P	594.3	321.2	211.4	160.9	131.0	111.0	96.5	76.8	63.9	54.8	29.6
AT-19P 959.6 530.5 354.4 270.7 220.7 187.0 162.6 129.3 107.6 92.2 49.8 AT-21P 1065.0 575.6 378.9 288.3 234.8 198.9 172.9 137.6 114.5 98.1 53.1 AT-23P 1172.8 648.4 433.2 330.8 269.8 228.6 198.8 158.1 131.5 112.7 60.9 AT-25P 1278.0 960.7 454.7 346.0 281.8 238.7 207.5 165.1 137.4 117.7 63.7 AT-27P 1386.0 766.3 511.9 391.0 318.8 270.2 234.9 186.8 155.4 133.2 72.0 AT-29P 1491.0 805.8 530.4 403.6 328.7 278.5 242.1 192.6 160.3 137.4 74.3 AT-35P 1491.0 805.8 530.4 403.6 328.7 278.5 242.1 192.6 160.3 137.4		AT-15P	746.3	412.6	275.7	210.5	171.7	145.5	126.5	100.6	83.7	71.7	38.8
AT-21P 1065.0 575.6 378.9 288.3 234.8 198.9 172.9 137.6 114.5 98.1 53.1 AT-23P 1172.8 648.4 433.2 330.8 269.8 228.6 198.8 158.1 131.5 112.7 60.9 AT-25P 1278.0 960.7 454.7 346.0 281.8 238.7 207.5 165.1 137.4 117.7 63.7 AT-27P 1386.0 766.3 511.9 391.0 318.8 270.2 234.9 186.8 155.4 133.2 72.0 AT-29P 1491.0 805.8 530.4 403.6 328.7 278.5 242.1 192.6 160.3 137.4 74.3 AT-35P 1002.1 669.5 511.3 416.9 353.3 307.2 244.3 203.2 174.1 94.1		AT-17P	852.0	460.5	303.1	230.6	187.8	159.1	138.4	110.1	91.6	78.5	42.5
AT-21P 1065.0 575.6 378.9 288.3 234.8 198.9 172.9 137.6 114.5 98.1 53.1 AT-23P 1172.8 648.4 433.2 330.8 269.8 228.6 198.8 158.1 131.5 112.7 60.9 AT-23P 1278.0 960.7 454.7 346.0 281.8 238.7 207.5 165.1 137.4 117.7 63.7 AT-27P 1386.0 766.3 511.9 391.0 318.8 270.2 234.9 186.8 155.4 133.2 72.0 AT-29P 1491.0 805.8 530.4 403.6 328.7 278.5 242.1 192.6 160.3 137.4 74.3 AT-35P 1002.1 669.5 511.3 416.9 353.3 307.2 244.3 203.2 174.1 94.1		AT-19P	959.6	530.5	354.4	270.7	220.7	187.0	162.6	129.3	107.6	92.2	49.8
AT-25P 1278.0 960.7 454.7 346.0 281.8 238.7 207.5 165.1 137.4 117.7 63.7 AT-27P 1386.0 766.3 511.9 391.0 318.8 270.2 234.9 186.8 155.4 133.2 72.0 AT-29P 1491.0 805.8 530.4 403.6 328.7 278.5 242.1 192.6 160.3 137.4 74.3 AT-35P 1002.1 669.5 511.3 416.9 353.3 307.2 244.3 203.2 174.1 94.1		AT-21P	1065.0	575.6	378.9	288.3	234.8	198.9	172.9	137.6	114.5	98.1	53.1
AT-27P 1386.0 766.3 511.9 391.0 318.8 270.2 234.9 186.8 155.4 133.2 72.0 AT-29P 1491.0 805.8 530.4 403.6 328.7 278.5 242.1 192.6 160.3 137.4 74.3 AT-35P 1002.1 669.5 511.3 416.9 353.3 307.2 244.3 203.2 174.1 94.1		AT-23P	1172.8	648.4	433.2	330.8	269.8	228.6	198.8	158.1	131.5	112.7	60.9
AT-29P 1491.0 805.8 530.4 403.6 328.7 278.5 242.1 192.6 160.3 137.4 74.3 AT-35P 1002.1 669.5 511.3 416.9 353.3 307.2 244.3 203.2 174.1 94.1		AT-25P	1278.0	960.7	454.7	346.0	281.8	238.7	207.5	165.1	137.4	117.7	63.7
AT-35P 1002.1 669.5 511.3 416.9 353.3 307.2 244.3 203.2 174.1 94.1		AT-27P	1386.0	766.3	511.9	391.0	318.8	270.2	234.9	186.8	155.4	133.2	72.0
		AT-29P	1491.0	805.8	530.4	403.6	328.7	278.5	242.1	192.6	160.3	137.4	74.3
AT-39P 1093.6 719.9 547.8 446.1 377.9 328.6 261.4 217.5 186.4 100.9					669.5				307.2	244.3	203.2		
		AT-39P		1093.6	719.9	547.8	446.1	377.9	328.6	261.4	217.5	186.4	100.9

Please refer to the **msEndur II Performance Specifications Brochure**, **12-1015**, for an expanded list of constant power and constant current ratings and end voltages.

You may also access the product ratings by logging onto the **C&D Battery Sizing Program** at <u>www.cdstandbypower.net</u>

SPECIFICATIONS AND CHARACTERISTICS

Cells, Voltage per Unit	1 cell, 2 VDC Nominal				
Recommended Operating Temperature	77°F (25°C)				
Recommended Float Charging Voltage	2.25 - 2.27 VPC at 77°F (25°C)				
Charger Compensation Temperature / Voltage	-2mV/cell/°F above 77°F (-3.6mV/cell/°C above 25°C) +2mV/cell/°F below 77°F (+3.6mV/cell/°C below 25°C)				
Connection Torque	Initial: 160 in-lbs (18 N-m) Re-torque: 125 in-lbs (14 N-m)				



MODULES

msEndur II cells are designed to be mounted in stackable modules of either 3, 4, 5, 6, 8 or 10 cells.

The specific system configuration is flexible and can be configured to best match the physical requirements of the customer's site.

Detailed system dimensions and combinations are available in the **msEndur II Module Brochure** 12-1014.

SERVICE LIFE - Reliability

The msEndur II is the latest advancement in battery technology. By combining the service life reliability of a flooded battery with the performance energy density of a valve-regulated battery C&D has created the msEndur II — The True Long-Life Battery[™]. The msEndur II series of batteries are unmatched in power density with space saving modular designs and have a 20-year design life to reduce the total cost of ownership.



The msEndur II VRLA battery is the environmentally friendly battery that saves you money in normal operation.

The same low float current that ensures a twenty year life, is good for the environment and saves money

- Up to 75% lower float current
- Consumes up to 75% less electricity
- · Lower float current generates less heat
- · Less heat generated reduces required air conditioning
- Less electricity consumed in float charging and air conditioning = reduce carbon emissions



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