

Scaled data based on original data using  
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State  
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: NEO-RAY

Report Number: P333004-830

Luminaire Tested: **SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1**

Issue Date: 10/7/2019

**Test Information**

Test Method: LM-79-08  
Report Number: P333004-830  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-10,  
Test Lab: INNOVATION CENTER  
Issue Date: 10/7/2019  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: NEO-RAY  
Catalog Number: SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1  
Description: DEFINE 4 DIRECT-INDIRECT PENDANT LED LUMINAIRE  
DOWNLIGHT 1195 LUMENS PER FOOT, ASYMMETRIC DIFFUSER, REGRESSED HOUSING  
UPLIGHT 1035 LUMENS PER FOOT, FLUSH SATIN WHITE DIFFUSER  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

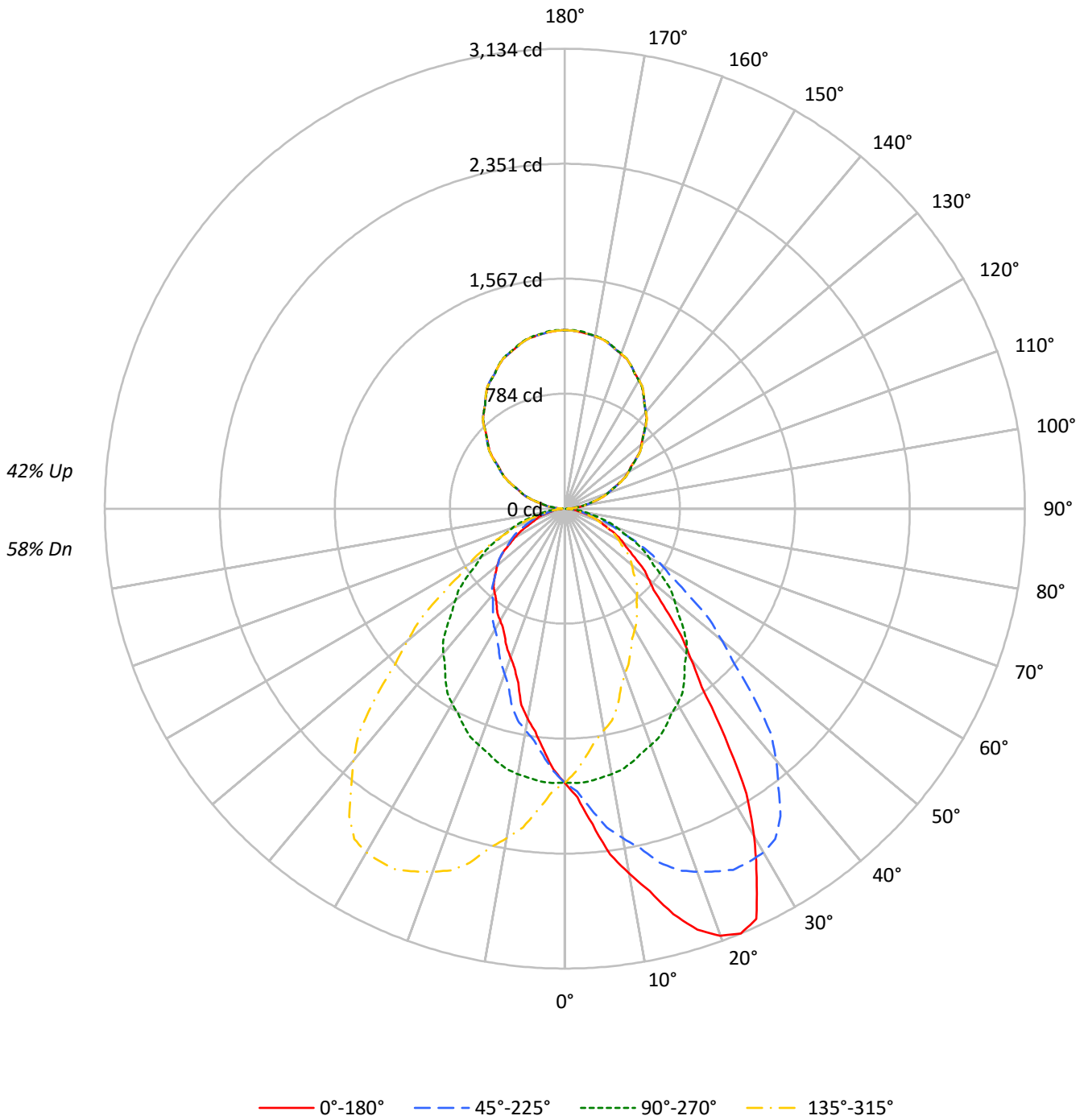
Lumens per Lamp: N/A  
Luminaire Lumens: 8099.9 lumens  
Efficiency: N/A  
Efficacy: 121.3 lumens/watt  
Spacing Criteria (0/90/45): 1.28 / 1.23 / 1.39  
Luminous Opening: Rectangular (W 4' x L: 0.33' x H: 0')  
CIE Type: General Diffuse

Input Watts (W): 66.8  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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### Luminous Intensity Polar Plot





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**COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:**

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	109	109	109	109	102	102	102	102	88	88	88	75	75	75	64	64	64	58
1	100	96	92	89	93	90	87	84	78	76	73	67	65	64	57	56	55	50
2	92	84	79	74	85	79	74	69	69	65	62	60	57	54	51	49	47	43
3	84	75	68	62	78	70	64	59	61	56	52	53	50	46	46	43	41	37
4	77	66	59	53	72	62	56	50	55	49	45	48	44	40	41	38	35	32
5	71	59	51	46	66	56	49	43	49	44	39	43	39	35	37	34	31	28
6	66	54	46	40	61	50	43	38	45	39	35	39	35	31	34	30	28	25
7	61	49	41	35	57	46	39	34	41	35	31	36	31	28	31	27	25	22
8	56	44	37	31	53	42	35	30	37	31	27	33	28	25	29	25	22	20
9	53	40	33	28	49	38	31	27	34	29	25	30	26	22	26	23	20	18
10	49	37	30	25	46	35	29	24	31	26	22	28	23	20	25	21	18	16

**AVERAGE LUMINANCE (cd/sqm):**

	0°	90°	180°	270°
0°	15079	15079	15079	15079
5°	17490	15124	13367	15124
10°	20690	15058	11931	15058
15°	23901	14919	10252	14919
20°	26611	14728	9271	14728
25°	27470	14539	8607	14539
30°	24047	14311	8207	14311
35°	18719	13973	7965	13973
40°	14037	13585	7835	13585
45°	11082	12965	7767	12965
50°	9357	12248	7542	12248
55°	8156	11461	7139	11461
60°	7338	10643	6318	10643
65°	6470	9761	5435	9761
70°	5828	8847	4902	8847
75°	4885	7842	4177	7842
80°	4128	6681	3919	6681
85°	3483	5233	3483	5233



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	181.0	2.2
10°-20°	545.9	6.7
20°-30°	853.8	10.5
30°-40°	949.2	11.7
40°-50°	842.2	10.4
50°-60°	656.2	8.1
60°-70°	429.6	5.3
70°-80°	211.3	2.6
80°-90°	55.8	0.7
90°-100°	80.2	1.0
100°-110°	237.7	2.9
110°-120°	403.4	5.0
120°-130°	531.9	6.6
130°-140°	597.4	7.4
140°-150°	587.0	7.2
150°-160°	493.7	6.1
160°-170°	328.5	4.1
170°-180°	115.0	1.4
0°-30°	1580.7	19.5
0°-40°	2529.9	31.2
0°-60°	4028.3	49.7
0°-90°	4725.0	58.3
90°-120°	721.3	8.9
90°-150°	2437.7	30.1
90°-180°	3375.0	41.7
0°-180°	8099.9	100.0

**CANDELA DISTRIBUTION:**

	0°	90°	180°	270°	360°	Flux
0°	1868	1868	1868	1868	1868	
5°	2158	1866	1650	1866	2158	218
15°	2860	1785	1227	1785	2860	813
25°	3084	1632	966	1632	3084	1368
35°	1899	1418	808	1418	1899	1191
45°	971	1136	680	1136	971	769
55°	580	814	507	814	580	527
65°	339	511	284	511	339	341
75°	157	251	134	251	157	172
85°	38	56	38	56	38	43
90°	28	3	28	3	28	16
95°	74	56	74	56	74	77
105°	230	219	230	219	230	242
115°	406	410	406	410	406	402
125°	593	597	593	597	593	529
135°	772	770	772	770	772	596
145°	937	936	937	936	937	586
155°	1072	1072	1072	1072	1072	493
165°	1165	1168	1165	1168	1165	328
175°	1209	1215	1209	1215	1209	115
180°	1216	1216	1216	1216	1216	



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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8
2.5°	1970.1	1975.6	1970.1	1969.5	1963.5	1961.7	1959.3	1951.4	1937.0	1928.6	1930.4
5°	2158.2	2177.1	2166.5	2165.0	2148.5	2131.9	2121.4	2097.3	2071.7	2054.5	2040.1
7.5°	2375.9	2386.7	2380.1	2369.6	2342.8	2327.6	2303.2	2271.4	2225.5	2190.5	2158.4
10°	2524.0	2533.0	2530.1	2510.5	2490.9	2451.0	2428.5	2384.1	2326.1	2280.2	2237.3
12.5°	2669.7	2679.4	2652.9	2653.7	2616.7	2585.3	2549.5	2493.6	2426.7	2367.5	2313.8
15°	2859.7	2847.6	2847.6	2832.5	2791.2	2747.5	2710.7	2651.9	2567.7	2496.9	2422.4
17.5°	3008.3	3012.6	3006.3	2970.9	2938.4	2893.2	2825.6	2757.1	2678.9	2583.9	2507.7
20°	3097.5	3097.5	3090.7	3066.6	3024.4	2976.3	2903.3	2828.8	2729.4	2633.8	2548.1
22.5°	3133.6	3135.9	3128.0	3108.1	3070.2	3023.2	2961.1	2885.4	2783.0	2675.4	2569.2
25°	3083.9	3098.2	3099.6	3094.5	3083.2	3054.5	3001.1	2923.6	2831.8	2715.2	2600.8
27.5°	2831.3	2849.4	2865.2	2891.2	2925.8	2943.9	2946.3	2906.9	2826.8	2714.5	2599.4
30°	2579.6	2594.7	2643.6	2707.6	2757.3	2802.5	2841.6	2852.1	2807.0	2706.1	2584.9
32.5°	2300.4	2320.8	2369.7	2438.5	2521.3	2597.7	2685.7	2730.5	2729.3	2668.8	2556.6
35°	1899.4	1914.5	1959.6	2031.8	2131.2	2244.9	2384.1	2492.4	2566.2	2560.9	2492.4
37.5°	1531.8	1548.9	1594.5	1654.4	1750.7	1891.4	2026.1	2175.4	2311.8	2388.4	2365.5
40°	1332.0	1332.8	1377.1	1438.9	1529.2	1651.8	1798.6	1964.1	2116.1	2240.3	2264.4
42.5°	1174.2	1174.4	1203.7	1270.3	1335.3	1450.8	1590.8	1755.2	1933.2	2076.5	2140.3
45°	970.7	977.5	1001.6	1041.5	1092.7	1190.5	1302.6	1455.4	1654.8	1824.9	1931.0
47.5°	822.1	832.0	847.3	879.9	920.7	985.8	1078.6	1215.8	1378.0	1565.1	1716.1
50°	745.0	746.5	766.1	784.1	819.5	871.5	952.7	1067.1	1216.1	1395.9	1563.8
52.5°	678.8	678.4	690.2	713.1	741.9	782.3	847.9	952.1	1084.2	1245.5	1418.7
55°	579.5	583.2	592.2	610.3	632.2	660.7	712.7	790.9	894.8	1032.5	1189.8
57.5°	503.9	505.9	512.9	520.6	540.6	561.4	600.4	654.7	742.3	855.1	1001.6
60°	454.5	455.2	457.5	468.8	484.7	504.2	530.6	576.5	650.2	753.3	869.2
62.5°	406.3	407.7	411.2	419.4	431.7	445.2	472.8	509.6	570.7	658.7	763.2
65°	338.7	339.4	344.7	347.7	357.4	369.5	389.8	414.6	456.8	530.6	609.5
67.5°	283.0	283.0	283.2	287.3	294.1	302.1	314.2	334.1	365.9	411.2	480.9
70°	246.9	246.9	248.4	250.6	254.4	261.1	267.9	283.0	306.3	343.2	396.6
72.5°	213.1	213.7	215.2	215.7	217.6	223.2	228.2	237.8	255.1	283.0	326.1
75°	156.6	158.8	162.6	165.6	169.3	168.5	173.8	179.8	185.1	201.7	226.5
77.5°	116.5	115.3	115.7	118.3	118.8	119.5	123.3	127.9	131.9	139.7	148.5
80°	88.8	88.8	91.0	91.8	91.0	91.8	95.6	97.8	99.3	102.4	110.7
82.5°	67.1	68.3	67.6	68.3	68.8	69.6	72.7	73.1	74.6	75.9	79.4
85°	37.6	38.4	39.1	37.6	37.6	37.6	39.1	39.9	41.4	40.6	42.1
87.5°	18.9	18.2	18.8	18.7	19.1	18.4	18.8	19.7	18.2	18.6	18.3
90°	28.2	27.8	27.4	27.0	26.6	25.7	24.5	23.2	22.0	20.7	19.0
92.5°	41.8	41.6	41.3	41.0	40.8	40.2	39.5	38.7	38.0	37.2	36.1
95°	74.4	74.4	74.4	74.4	74.4	74.0	73.4	72.8	72.1	71.5	70.0
97.5°	116.5	116.5	116.5	116.5	116.5	116.1	115.4	114.6	113.9	113.1	111.4
100°	145.8	145.8	145.8	145.8	145.8	145.6	145.2	144.8	144.4	143.9	142.0
102.5°	178.9	178.8	178.6	178.4	178.2	177.9	177.3	176.7	176.2	175.6	173.8
105°	229.5	228.9	228.3	227.6	227.1	226.4	225.8	225.2	224.5	223.9	223.1
107.5°	278.8	278.9	278.9	279.0	279.0	278.7	278.1	277.6	277.0	276.4	276.3
110°	314.2	313.6	312.9	312.4	311.7	311.6	312.0	312.5	312.8	313.3	313.5



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**CANDELA DISTRIBUTION (continued):**

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	350.3	350.2	350.1	350.0	349.9	349.9	349.9	350.0	350.1	350.2	350.5
115°	406.4	406.6	406.8	407.1	407.3	407.5	407.6	407.8	408.1	408.3	408.7
117.5°	459.9	460.2	460.7	461.1	461.6	462.1	462.8	463.5	464.2	465.0	465.2
120°	500.5	500.1	499.6	499.3	498.8	499.2	500.2	501.2	502.3	503.3	504.0
122.5°	534.3	535.1	535.8	536.6	537.3	538.1	538.9	539.5	540.3	540.9	541.2
125°	592.7	593.1	593.5	594.0	594.4	594.7	595.2	595.6	596.1	596.4	596.6
127.5°	646.7	647.1	647.3	647.7	648.0	648.4	648.8	649.2	649.7	650.1	650.4
130°	682.0	682.9	683.7	684.6	685.4	686.1	686.5	686.9	687.3	687.7	687.7
132.5°	719.7	720.0	720.4	720.7	721.0	721.4	721.8	722.3	722.6	723.1	723.2
135°	771.5	772.0	772.7	773.4	773.9	774.5	774.9	775.3	775.7	776.2	776.2
137.5°	825.9	825.7	825.6	825.5	825.3	825.6	826.0	826.6	827.2	827.7	827.4
140°	858.9	859.1	859.3	859.6	859.8	860.0	860.2	860.4	860.6	860.8	860.8
142.5°	892.0	892.1	892.1	892.2	892.2	892.3	892.3	892.3	892.4	892.4	892.6
145°	937.0	937.6	938.3	938.9	939.5	939.9	940.2	940.4	940.6	940.8	940.6
147.5°	982.6	982.8	983.0	983.2	983.4	983.5	983.7	983.9	984.1	984.3	984.4
150°	1010.4	1010.6	1010.8	1011.1	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3
152.5°	1035.9	1036.5	1037.1	1037.6	1038.2	1038.2	1037.6	1037.2	1036.7	1036.1	1036.0
155°	1071.6	1072.4	1073.3	1074.0	1074.9	1074.9	1074.0	1073.3	1072.4	1071.6	1071.8
157.5°	1103.3	1104.1	1104.8	1105.5	1106.2	1106.3	1105.6	1104.9	1104.4	1103.7	1103.8
160°	1121.4	1122.5	1123.5	1124.5	1125.6	1125.8	1125.2	1124.5	1123.9	1123.3	1123.5
162.5°	1140.2	1141.3	1142.4	1143.4	1144.4	1144.3	1143.2	1142.1	1140.9	1139.8	1140.1
165°	1164.7	1165.5	1166.4	1167.2	1168.0	1167.8	1166.6	1165.4	1164.0	1162.8	1163.2
167.5°	1182.2	1183.5	1184.8	1186.1	1187.4	1187.4	1186.2	1184.9	1183.6	1182.4	1182.3
170°	1191.9	1193.4	1194.9	1196.4	1197.8	1198.0	1196.7	1195.4	1194.2	1192.9	1192.7
172.5°	1200.2	1201.7	1203.2	1204.7	1206.1	1206.2	1204.7	1203.2	1201.8	1200.4	1200.4
175°	1208.9	1210.4	1211.8	1213.3	1214.7	1214.7	1213.3	1211.8	1210.4	1208.9	1209.1
177.5°	1213.4	1214.7	1216.1	1217.5	1218.8	1218.9	1217.7	1216.5	1215.3	1214.2	1214.2
180°	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4



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**CANDELA DISTRIBUTION (continued):**

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8
2.5°	1924.4	1916.0	1911.8	1902.1	1890.6	1884.6	1879.2	1871.4	1861.1	1850.3	1842.5
5°	2022.0	2004.0	1981.4	1954.4	1930.2	1907.0	1886.6	1866.3	1843.0	1818.9	1794.8
7.5°	2122.3	2086.8	2048.4	2004.0	1960.8	1921.6	1885.4	1850.8	1811.7	1776.6	1744.6
10°	2192.2	2144.0	2090.6	2034.1	1977.6	1928.7	1880.6	1836.9	1788.8	1745.9	1709.8
12.5°	2248.7	2192.2	2127.9	2057.6	1989.7	1930.5	1875.2	1818.3	1763.5	1717.0	1668.9
15°	2342.6	2265.1	2178.6	2094.3	2006.3	1925.7	1851.2	1785.0	1722.6	1657.1	1611.2
17.5°	2407.3	2315.3	2210.1	2108.8	2004.8	1909.8	1823.8	1745.0	1672.9	1606.1	1551.4
20°	2445.7	2344.1	2227.5	2112.3	1995.7	1894.1	1801.6	1714.3	1639.7	1567.5	1511.1
22.5°	2467.4	2354.9	2227.5	2107.0	1986.1	1876.0	1774.4	1683.6	1602.4	1530.2	1467.7
25°	2474.4	2353.9	2223.7	2085.3	1952.9	1836.2	1730.8	1632.2	1541.9	1469.7	1403.4
27.5°	2464.7	2322.9	2189.6	2047.5	1910.8	1787.9	1677.3	1573.7	1483.3	1405.7	1337.8
30°	2450.2	2298.2	2155.2	2007.8	1869.3	1751.1	1634.5	1535.2	1441.1	1360.6	1292.1
32.5°	2418.9	2268.1	2114.3	1963.2	1823.0	1701.2	1590.5	1490.6	1398.4	1316.1	1243.3
35°	2356.9	2204.1	2037.1	1882.1	1744.4	1618.0	1514.1	1417.8	1329.7	1241.7	1164.9
37.5°	2275.2	2119.1	1952.9	1783.2	1645.3	1526.0	1430.7	1340.3	1254.3	1173.9	1088.9
40°	2198.2	2056.0	1884.3	1715.8	1574.3	1459.2	1371.1	1289.1	1202.6	1122.8	1037.7
42.5°	2104.9	1983.7	1810.3	1641.2	1501.5	1390.5	1308.5	1228.3	1149.6	1072.2	983.5
45°	1949.1	1857.3	1694.7	1532.2	1391.5	1281.6	1206.4	1135.6	1066.3	992.6	909.1
47.5°	1770.6	1708.4	1568.1	1401.7	1271.5	1172.6	1099.9	1042.1	983.5	909.8	836.5
50°	1646.5	1606.7	1471.2	1319.2	1195.0	1104.0	1029.4	975.2	926.3	855.6	790.1
52.5°	1514.1	1492.9	1378.5	1233.1	1113.1	1023.9	960.3	911.4	862.0	803.2	742.0
55°	1312.4	1323.7	1226.6	1101.0	988.1	912.9	854.9	814.3	772.1	722.5	675.0
57.5°	1106.3	1147.5	1082.3	971.9	866.2	796.6	753.0	718.8	683.4	642.2	601.7
60°	982.8	1017.4	980.5	883.4	790.9	726.2	685.6	659.2	623.9	586.3	555.3
62.5°	862.4	899.5	877.6	799.2	713.2	657.6	621.7	597.2	570.9	538.1	506.1
65°	711.1	735.2	724.7	670.5	609.5	562.1	529.0	511.0	486.9	462.8	434.2
67.5°	544.7	591.2	585.0	556.3	503.6	466.6	444.9	429.0	407.0	389.1	369.7
70°	447.8	490.7	489.9	466.6	438.0	403.3	388.3	374.8	355.2	337.9	322.1
72.5°	366.5	405.8	411.6	393.7	374.2	348.0	333.6	324.2	305.2	293.3	280.5
75°	256.7	285.2	292.8	292.8	283.7	270.1	257.4	251.4	237.8	227.2	219.7
77.5°	168.2	186.3	198.0	200.8	202.2	197.7	187.1	182.9	172.5	168.7	161.5
80°	118.9	130.9	144.5	149.0	152.8	151.3	146.8	143.7	133.9	130.2	127.1
82.5°	82.2	88.8	99.9	109.9	108.8	112.7	108.8	106.4	99.1	97.6	94.6
85°	42.9	43.6	45.1	51.9	55.7	57.2	58.0	56.5	54.2	54.2	48.9
87.5°	17.9	17.0	17.8	17.4	17.6	19.5	20.9	21.0	19.7	18.4	17.0
90°	17.3	15.6	14.0	12.1	9.7	7.4	5.1	2.8	5.1	7.4	9.7
92.5°	34.9	33.7	32.6	30.6	28.0	25.4	22.8	20.2	22.8	25.4	28.0
95°	68.6	67.1	65.6	64.0	62.1	60.2	58.3	56.5	58.3	60.2	62.1
97.5°	109.6	107.9	106.2	104.6	103.1	101.6	100.1	98.6	100.1	101.6	103.1
100°	140.2	138.3	136.4	135.1	134.2	133.4	132.5	131.7	132.5	133.4	134.2
102.5°	172.1	170.4	168.7	167.7	167.3	167.0	166.6	166.4	166.6	167.0	167.3
105°	222.3	221.4	220.6	220.1	219.8	219.6	219.4	219.2	219.4	219.6	219.8
107.5°	276.2	276.1	275.9	275.7	275.5	275.2	274.9	274.8	274.9	275.2	275.5
110°	313.7	313.9	314.1	314.1	313.6	313.2	312.7	312.4	312.7	313.2	313.6





TEST NUMBER: P333004-830

CATALOG NUMBER: SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1

**CANDELA DISTRIBUTION (continued):**

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	350.9	351.3	351.7	351.9	351.8	351.7	351.6	351.5	351.6	351.7	351.8
115°	409.2	409.5	410.0	410.2	410.2	410.2	410.2	410.2	410.2	410.2	410.2
117.5°	465.5	465.8	466.1	466.2	466.0	465.8	465.7	465.5	465.7	465.8	466.0
120°	504.5	505.2	505.9	505.8	504.9	504.1	503.2	502.4	503.2	504.1	504.9
122.5°	541.5	541.9	542.2	542.1	541.8	541.4	541.1	540.7	541.1	541.4	541.8
125°	596.9	597.1	597.3	597.4	597.4	597.4	597.4	597.4	597.4	597.4	597.4
127.5°	650.7	651.1	651.4	651.3	650.6	650.0	649.4	648.8	649.4	650.0	650.6
130°	687.7	687.7	687.7	687.4	686.7	686.2	685.5	684.9	685.5	686.2	686.7
132.5°	723.4	723.6	723.8	723.6	723.1	722.6	722.3	721.8	722.3	722.6	723.1
135°	776.2	776.2	776.2	775.5	774.3	773.0	771.8	770.5	771.8	773.0	774.3
137.5°	827.1	826.7	826.3	826.0	825.3	824.7	824.2	823.6	824.2	824.7	825.3
140°	860.8	860.8	860.8	860.6	860.2	859.8	859.3	858.9	859.3	859.8	860.2
142.5°	892.8	893.0	893.1	893.0	892.6	892.1	891.7	891.3	891.7	892.1	892.6
145°	940.4	940.2	939.9	939.4	938.6	937.7	936.9	936.0	936.9	937.7	938.6
147.5°	984.6	984.8	985.0	984.5	983.5	982.5	981.5	980.5	981.5	982.5	983.5
150°	1011.3	1011.3	1011.3	1011.0	1010.1	1009.3	1008.4	1007.6	1008.4	1009.3	1010.1
152.5°	1035.9	1035.7	1035.5	1035.2	1034.7	1034.2	1033.7	1033.2	1033.7	1034.2	1034.7
155°	1072.0	1072.1	1072.4	1072.5	1072.5	1072.5	1072.5	1072.5	1072.5	1072.5	1072.5
157.5°	1103.8	1103.8	1103.9	1104.1	1104.5	1104.8	1105.2	1105.6	1105.2	1104.8	1104.5
160°	1123.7	1123.9	1124.2	1124.4	1124.5	1124.7	1124.9	1125.2	1124.9	1124.7	1124.5
162.5°	1140.3	1140.5	1140.7	1141.0	1141.6	1142.2	1142.7	1143.2	1142.7	1142.2	1141.6
165°	1163.7	1164.0	1164.5	1165.0	1165.6	1166.3	1166.9	1167.5	1166.9	1166.3	1165.6
167.5°	1182.3	1182.2	1182.2	1182.6	1183.6	1184.4	1185.2	1186.2	1185.2	1184.4	1183.6
170°	1192.5	1192.3	1192.0	1192.5	1193.5	1194.6	1195.6	1196.7	1195.6	1194.6	1193.5
172.5°	1200.3	1200.3	1200.2	1200.7	1201.6	1202.5	1203.3	1204.2	1203.3	1202.5	1201.6
175°	1209.3	1209.6	1209.8	1210.4	1211.4	1212.5	1213.5	1214.6	1213.5	1212.5	1211.4
177.5°	1214.2	1214.2	1214.2	1214.6	1215.4	1216.3	1217.1	1218.0	1217.1	1216.3	1215.4
180°	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4



TEST NUMBER: P333004-830

CATALOG NUMBER: SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1

**CANDELA DISTRIBUTION (continued):**

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8
2.5°	1834.1	1828.1	1820.2	1811.2	1800.4	1790.7	1786.5	1790.2	1792.0	1787.2	1786.5
5°	1778.2	1759.4	1744.4	1721.8	1703.7	1688.7	1678.2	1673.7	1675.2	1663.1	1660.1
7.5°	1715.5	1693.2	1668.5	1641.7	1616.7	1594.6	1583.0	1576.7	1564.0	1558.5	1549.4
10°	1675.2	1645.0	1621.0	1589.3	1560.8	1534.5	1521.6	1511.1	1498.3	1492.2	1479.5
12.5°	1633.6	1598.6	1572.2	1539.4	1510.1	1478.5	1466.2	1446.7	1426.6	1414.0	1397.6
15°	1575.1	1533.0	1500.5	1461.4	1426.8	1390.7	1358.3	1322.2	1308.6	1280.1	1263.5
17.5°	1506.6	1463.9	1423.8	1371.3	1317.9	1273.0	1238.5	1203.9	1183.2	1164.9	1156.5
20°	1461.4	1422.3	1366.6	1305.6	1246.2	1196.6	1168.7	1146.1	1123.5	1110.8	1101.7
22.5°	1418.7	1368.7	1304.0	1238.2	1178.7	1139.9	1116.3	1093.2	1074.8	1062.6	1050.6
25°	1347.1	1281.6	1213.1	1137.8	1097.2	1063.4	1037.7	1018.9	1007.7	991.8	985.8
27.5°	1273.5	1194.1	1118.6	1068.0	1025.7	994.7	972.4	958.3	944.0	933.9	926.0
30°	1216.8	1136.3	1068.6	1020.4	977.5	952.0	933.9	917.4	906.1	897.8	891.7
32.5°	1160.8	1080.3	1023.4	971.7	937.8	912.9	893.5	881.2	872.3	861.7	858.0
35°	1079.9	1008.4	958.8	912.1	877.4	854.9	839.8	827.1	819.5	816.5	814.3
37.5°	1002.1	943.5	890.1	851.9	821.0	803.2	785.5	779.2	774.0	768.6	771.1
40°	952.7	897.8	850.4	809.7	784.9	765.3	754.8	747.2	742.7	742.7	742.7
42.5°	909.9	856.2	810.0	773.6	748.8	732.3	720.5	714.2	712.7	712.1	715.7
45°	843.6	793.9	747.2	717.2	696.1	679.6	672.8	667.5	667.5	670.5	671.3
47.5°	777.8	731.3	693.8	660.2	640.8	630.5	624.6	621.9	622.2	625.2	628.7
50°	737.4	691.5	654.7	624.6	606.5	596.7	591.4	590.0	591.4	591.4	596.7
52.5°	693.5	652.4	616.1	590.9	570.4	561.3	558.4	556.3	557.1	559.6	561.8
55°	629.1	592.2	557.6	533.6	518.5	512.5	505.7	506.4	504.9	506.4	506.4
57.5°	564.6	531.4	499.3	480.1	466.8	458.2	450.7	452.9	450.6	450.3	449.1
60°	523.0	486.9	461.3	444.0	429.0	421.4	414.6	416.1	413.9	412.4	409.3
62.5°	477.9	447.8	423.4	406.7	394.6	385.9	379.1	377.6	372.4	367.2	360.6
65°	412.4	387.6	365.7	350.0	338.7	331.9	326.6	322.1	310.8	298.8	292.8
67.5°	348.7	330.8	310.5	297.1	287.9	279.1	269.0	261.3	250.7	244.1	240.3
70°	307.7	290.5	273.1	260.3	250.6	242.3	231.0	225.7	218.2	215.2	211.5
72.5°	268.6	252.5	236.5	224.9	214.4	208.0	199.2	193.9	190.6	189.4	185.6
75°	209.2	196.4	184.4	173.8	165.6	161.1	157.3	153.5	152.0	145.2	141.5
77.5°	152.6	144.2	136.7	129.1	123.3	120.3	113.0	108.7	106.1	102.9	102.2
80°	118.9	112.9	105.4	100.9	92.6	89.5	86.5	85.8	85.0	84.3	83.5
82.5°	89.4	83.4	75.9	73.1	70.9	69.1	67.3	66.5	65.8	66.3	66.1
85°	45.1	42.1	42.1	41.4	40.6	39.9	39.1	39.1	38.4	39.1	38.4
87.5°	17.4	17.2	17.6	16.7	17.6	18.0	17.6	17.9	18.8	17.8	17.9
90°	12.1	14.0	15.6	17.3	19.0	20.7	22.0	23.2	24.5	25.7	26.6
92.5°	30.6	32.6	33.7	34.9	36.1	37.2	38.0	38.7	39.5	40.2	40.8
95°	64.0	65.6	67.1	68.6	70.0	71.5	72.1	72.8	73.4	74.0	74.4
97.5°	104.6	106.2	107.9	109.6	111.4	113.1	113.9	114.6	115.4	116.1	116.5
100°	135.1	136.4	138.3	140.2	142.0	143.9	144.4	144.8	145.2	145.6	145.8
102.5°	167.7	168.7	170.4	172.1	173.8	175.6	176.2	176.7	177.3	177.9	178.2
105°	220.1	220.6	221.4	222.3	223.1	223.9	224.5	225.2	225.8	226.4	227.1
107.5°	275.7	275.9	276.1	276.2	276.3	276.4	277.0	277.6	278.1	278.7	279.0
110°	314.1	314.1	313.9	313.7	313.5	313.3	312.8	312.5	312.0	311.6	311.7



TEST NUMBER: P333004-830

CATALOG NUMBER: SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1

**CANDELA DISTRIBUTION (continued):**

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	351.9	351.7	351.3	350.9	350.5	350.2	350.1	350.0	349.9	349.9	349.9
115°	410.2	410.0	409.5	409.2	408.7	408.3	408.1	407.8	407.6	407.5	407.3
117.5°	466.2	466.1	465.8	465.5	465.2	465.0	464.2	463.5	462.8	462.1	461.6
120°	505.8	505.9	505.2	504.5	504.0	503.3	502.3	501.2	500.2	499.2	498.8
122.5°	542.1	542.2	541.9	541.5	541.2	540.9	540.3	539.5	538.9	538.1	537.3
125°	597.4	597.3	597.1	596.9	596.6	596.4	596.1	595.6	595.2	594.7	594.4
127.5°	651.3	651.4	651.1	650.7	650.4	650.1	649.7	649.2	648.8	648.4	648.0
130°	687.4	687.7	687.7	687.7	687.7	687.7	687.3	686.9	686.5	686.1	685.4
132.5°	723.6	723.8	723.6	723.4	723.2	723.1	722.6	722.3	721.8	721.4	721.0
135°	775.5	776.2	776.2	776.2	776.2	776.2	775.7	775.3	774.9	774.5	773.9
137.5°	826.0	826.3	826.7	827.1	827.4	827.7	827.2	826.6	826.0	825.6	825.3
140°	860.6	860.8	860.8	860.8	860.8	860.8	860.6	860.4	860.2	860.0	859.8
142.5°	893.0	893.1	893.0	892.8	892.6	892.4	892.4	892.3	892.3	892.3	892.2
145°	939.4	939.9	940.2	940.4	940.6	940.8	940.6	940.4	940.2	939.9	939.5
147.5°	984.5	985.0	984.8	984.6	984.4	984.3	984.1	983.9	983.7	983.5	983.4
150°	1011.0	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3
152.5°	1035.2	1035.5	1035.7	1035.9	1036.0	1036.1	1036.7	1037.2	1037.6	1038.2	1038.2
155°	1072.5	1072.4	1072.1	1072.0	1071.8	1071.6	1072.4	1073.3	1074.0	1074.9	1074.9
157.5°	1104.1	1103.9	1103.8	1103.8	1103.8	1103.7	1104.4	1104.9	1105.6	1106.3	1106.2
160°	1124.4	1124.2	1123.9	1123.7	1123.5	1123.3	1123.9	1124.5	1125.2	1125.8	1125.6
162.5°	1141.0	1140.7	1140.5	1140.3	1140.1	1139.8	1140.9	1142.1	1143.2	1144.3	1144.4
165°	1165.0	1164.5	1164.0	1163.7	1163.2	1162.8	1164.0	1165.4	1166.6	1167.8	1168.0
167.5°	1182.6	1182.2	1182.2	1182.3	1182.3	1182.4	1183.6	1184.9	1186.2	1187.4	1187.4
170°	1192.5	1192.0	1192.3	1192.5	1192.7	1192.9	1194.2	1195.4	1196.7	1198.0	1197.8
172.5°	1200.7	1200.2	1200.3	1200.3	1200.4	1200.4	1201.8	1203.2	1204.7	1206.2	1206.1
175°	1210.4	1209.8	1209.6	1209.3	1209.1	1208.9	1210.4	1211.8	1213.3	1214.7	1214.7
177.5°	1214.6	1214.2	1214.2	1214.2	1214.2	1214.2	1215.3	1216.5	1217.7	1218.9	1218.8
180°	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4



TEST NUMBER: P333004-830

CATALOG NUMBER: SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1

**CANDELA DISTRIBUTION (continued):**

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
0°	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8
2.5°	1782.9	1784.1	1779.9	1778.7	1779.9	1784.1	1782.9	1786.5	1787.2	1792.0	1790.2
5°	1654.1	1652.6	1648.8	1649.5	1648.8	1652.6	1654.1	1660.1	1663.1	1675.2	1673.7
7.5°	1543.9	1538.0	1539.6	1533.7	1539.6	1538.0	1543.9	1549.4	1558.5	1564.0	1576.7
10°	1476.5	1468.2	1461.4	1455.4	1461.4	1468.2	1476.5	1479.5	1492.2	1498.3	1511.1
12.5°	1384.4	1377.2	1368.1	1369.9	1368.1	1377.2	1384.4	1397.6	1414.0	1426.6	1446.7
15°	1253.7	1242.5	1224.4	1226.6	1224.4	1242.5	1253.7	1263.5	1280.1	1308.6	1322.2
17.5°	1143.1	1143.2	1135.0	1136.9	1135.0	1143.2	1143.1	1156.5	1164.9	1183.2	1203.9
20°	1085.9	1080.6	1081.4	1079.1	1081.4	1080.6	1085.9	1101.7	1110.8	1123.5	1146.1
22.5°	1046.1	1039.7	1034.4	1029.7	1034.4	1039.7	1046.1	1050.6	1062.6	1074.8	1093.2
25°	979.0	974.5	967.8	966.3	967.8	974.5	979.0	985.8	991.8	1007.7	1018.9
27.5°	920.0	919.2	916.4	912.9	916.4	919.2	920.0	926.0	933.9	944.0	958.3
30°	885.7	884.2	882.7	880.4	882.7	884.2	885.7	891.7	897.8	906.1	917.4
32.5°	855.1	854.1	852.6	852.8	852.6	854.1	855.1	858.0	861.7	872.3	881.2
35°	811.2	810.5	809.0	808.2	809.0	810.5	811.2	814.3	816.5	819.5	827.1
37.5°	770.3	772.2	771.4	771.2	771.4	772.2	770.3	771.1	768.6	774.0	779.2
40°	742.0	742.7	744.2	743.5	744.2	742.7	742.0	742.7	742.7	742.7	747.2
42.5°	718.5	718.7	720.8	718.2	720.8	718.7	718.5	715.7	712.1	712.7	714.2
45°	676.6	681.1	680.3	680.3	680.3	681.1	676.6	671.3	670.5	667.5	667.5
47.5°	630.7	634.5	635.6	635.5	635.6	634.5	630.7	628.7	625.2	622.2	621.9
50°	600.5	599.0	601.2	600.5	601.2	599.0	600.5	596.7	591.4	591.4	590.0
52.5°	563.8	564.1	563.9	563.2	563.9	564.1	563.8	561.8	559.6	557.1	556.3
55°	507.2	507.9	506.4	507.2	506.4	507.9	507.2	506.4	506.4	504.9	506.4
57.5°	445.8	442.1	443.7	441.9	443.7	442.1	445.8	449.1	450.3	450.6	452.9
60°	401.9	395.9	394.4	391.3	394.4	395.9	401.9	409.3	412.4	413.9	416.1
62.5°	352.5	348.3	343.2	345.5	343.2	348.3	352.5	360.6	367.2	372.4	377.6
65°	286.7	283.7	281.4	284.5	281.4	283.7	286.7	292.8	298.8	310.8	322.1
67.5°	237.3	235.7	235.7	234.2	235.7	235.7	237.3	240.3	244.1	250.7	261.3
70°	211.5	209.2	209.2	207.7	209.2	209.2	211.5	211.5	215.2	218.2	225.7
72.5°	184.9	182.8	183.3	182.4	183.3	182.8	184.9	185.6	189.4	190.6	193.9
75°	137.0	133.2	133.2	133.9	133.2	133.2	137.0	141.5	145.2	152.0	153.5
77.5°	102.2	101.4	102.5	101.1	102.5	101.4	102.2	102.2	102.9	106.1	108.7
80°	83.5	82.8	82.0	84.3	82.0	82.8	83.5	83.5	84.3	85.0	85.8
82.5°	64.8	64.8	64.6	67.4	64.6	64.8	64.8	66.1	66.3	65.8	66.5
85°	39.1	37.6	39.1	37.6	39.1	37.6	39.1	38.4	39.1	38.4	39.1
87.5°	19.2	18.8	18.2	18.9	18.2	18.8	19.2	17.9	17.8	18.8	17.9
90°	27.0	27.4	27.8	28.2	27.8	27.4	27.0	26.6	25.7	24.5	23.2
92.5°	41.0	41.3	41.6	41.8	41.6	41.3	41.0	40.8	40.2	39.5	38.7
95°	74.4	74.4	74.4	74.4	74.4	74.4	74.4	74.4	74.0	73.4	72.8
97.5°	116.5	116.5	116.5	116.5	116.5	116.5	116.5	116.5	116.1	115.4	114.6
100°	145.8	145.8	145.8	145.8	145.8	145.8	145.8	145.8	145.6	145.2	144.8
102.5°	178.4	178.6	178.8	178.9	178.8	178.6	178.4	178.2	177.9	177.3	176.7
105°	227.6	228.3	228.9	229.5	228.9	228.3	227.6	227.1	226.4	225.8	225.2
107.5°	279.0	278.9	278.9	278.8	278.9	278.9	279.0	279.0	278.7	278.1	277.6
110°	312.4	312.9	313.6	314.2	313.6	312.9	312.4	311.7	311.6	312.0	312.5



TEST NUMBER: P333004-830

CATALOG NUMBER: SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1

**CANDELA DISTRIBUTION (continued):**

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	350.0	350.1	350.2	350.3	350.2	350.1	350.0	349.9	349.9	349.9	350.0
115°	407.1	406.8	406.6	406.4	406.6	406.8	407.1	407.3	407.5	407.6	407.8
117.5°	461.1	460.7	460.2	459.9	460.2	460.7	461.1	461.6	462.1	462.8	463.5
120°	499.3	499.6	500.1	500.5	500.1	499.6	499.3	498.8	499.2	500.2	501.2
122.5°	536.6	535.8	535.1	534.3	535.1	535.8	536.6	537.3	538.1	538.9	539.5
125°	594.0	593.5	593.1	592.7	593.1	593.5	594.0	594.4	594.7	595.2	595.6
127.5°	647.7	647.3	647.1	646.7	647.1	647.3	647.7	648.0	648.4	648.8	649.2
130°	684.6	683.7	682.9	682.0	682.9	683.7	684.6	685.4	686.1	686.5	686.9
132.5°	720.7	720.4	720.0	719.7	720.0	720.4	720.7	721.0	721.4	721.8	722.3
135°	773.4	772.7	772.0	771.5	772.0	772.7	773.4	773.9	774.5	774.9	775.3
137.5°	825.5	825.6	825.7	825.9	825.7	825.6	825.5	825.3	825.6	826.0	826.6
140°	859.6	859.3	859.1	858.9	859.1	859.3	859.6	859.8	860.0	860.2	860.4
142.5°	892.2	892.1	892.1	892.0	892.1	892.1	892.2	892.2	892.3	892.3	892.3
145°	938.9	938.3	937.6	937.0	937.6	938.3	938.9	939.5	939.9	940.2	940.4
147.5°	983.2	983.0	982.8	982.6	982.8	983.0	983.2	983.4	983.5	983.7	983.9
150°	1011.1	1010.8	1010.6	1010.4	1010.6	1010.8	1011.1	1011.3	1011.3	1011.3	1011.3
152.5°	1037.6	1037.1	1036.5	1035.9	1036.5	1037.1	1037.6	1038.2	1038.2	1037.6	1037.2
155°	1074.0	1073.3	1072.4	1071.6	1072.4	1073.3	1074.0	1074.9	1074.9	1074.0	1073.3
157.5°	1105.5	1104.8	1104.1	1103.3	1104.1	1104.8	1105.5	1106.2	1106.3	1105.6	1104.9
160°	1124.5	1123.5	1122.5	1121.4	1122.5	1123.5	1124.5	1125.6	1125.8	1125.2	1124.5
162.5°	1143.4	1142.4	1141.3	1140.2	1141.3	1142.4	1143.4	1144.4	1144.3	1143.2	1142.1
165°	1167.2	1166.4	1165.5	1164.7	1165.5	1166.4	1167.2	1168.0	1167.8	1166.6	1165.4
167.5°	1186.1	1184.8	1183.5	1182.2	1183.5	1184.8	1186.1	1187.4	1187.4	1186.2	1184.9
170°	1196.4	1194.9	1193.4	1191.9	1193.4	1194.9	1196.4	1197.8	1198.0	1196.7	1195.4
172.5°	1204.7	1203.2	1201.7	1200.2	1201.7	1203.2	1204.7	1206.1	1206.2	1204.7	1203.2
175°	1213.3	1211.8	1210.4	1208.9	1210.4	1211.8	1213.3	1214.7	1214.7	1213.3	1211.8
177.5°	1217.5	1216.1	1214.7	1213.4	1214.7	1216.1	1217.5	1218.8	1218.9	1217.7	1216.5
180°	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4



TEST NUMBER: P333004-830  
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**CANDELA DISTRIBUTION (continued):**

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
0°	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8
2.5°	1786.5	1790.7	1800.4	1811.2	1820.2	1828.1	1834.1	1842.5	1850.3	1861.1	1871.4
5°	1678.2	1688.7	1703.7	1721.8	1744.4	1759.4	1778.2	1794.8	1818.9	1843.0	1866.3
7.5°	1583.0	1594.6	1616.7	1641.7	1668.5	1693.2	1715.5	1744.6	1776.6	1811.7	1850.8
10°	1521.6	1534.5	1560.8	1589.3	1621.0	1645.0	1675.2	1709.8	1745.9	1788.8	1836.9
12.5°	1466.2	1478.5	1510.1	1539.4	1572.2	1598.6	1633.6	1668.9	1717.0	1763.5	1818.3
15°	1358.3	1390.7	1426.8	1461.4	1500.5	1533.0	1575.1	1611.2	1657.1	1722.6	1785.0
17.5°	1238.5	1273.0	1317.9	1371.3	1423.8	1463.9	1506.6	1551.4	1606.1	1672.9	1745.0
20°	1168.7	1196.6	1246.2	1305.6	1366.6	1422.3	1461.4	1511.1	1567.5	1639.7	1714.3
22.5°	1116.3	1139.9	1178.7	1238.2	1304.0	1368.7	1418.7	1467.7	1530.2	1602.4	1683.6
25°	1037.7	1063.4	1097.2	1137.8	1213.1	1281.6	1347.1	1403.4	1469.7	1541.9	1632.2
27.5°	972.4	994.7	1025.7	1068.0	1118.6	1194.1	1273.5	1337.8	1405.7	1483.3	1573.7
30°	933.9	952.0	977.5	1020.4	1068.6	1136.3	1216.8	1292.1	1360.6	1441.1	1535.2
32.5°	893.5	912.9	937.8	971.7	1023.4	1080.3	1160.8	1243.3	1316.1	1398.4	1490.6
35°	839.8	854.9	877.4	912.1	958.8	1008.4	1079.9	1164.9	1241.7	1329.7	1417.8
37.5°	785.5	803.2	821.0	851.9	890.1	943.5	1002.1	1088.9	1173.9	1254.3	1340.3
40°	754.8	765.3	784.9	809.7	850.4	897.8	952.7	1037.7	1122.8	1202.6	1289.1
42.5°	720.5	732.3	748.8	773.6	810.0	856.2	909.9	983.5	1072.2	1149.6	1228.3
45°	672.8	679.6	696.1	717.2	747.2	793.9	843.6	909.1	992.6	1066.3	1135.6
47.5°	624.6	630.5	640.8	660.2	693.8	731.3	777.8	836.5	909.8	983.5	1042.1
50°	591.4	596.7	606.5	624.6	654.7	691.5	737.4	790.1	855.6	926.3	975.2
52.5°	558.4	561.3	570.4	590.9	616.1	652.4	693.5	742.0	803.2	862.0	911.4
55°	505.7	512.5	518.5	533.6	557.6	592.2	629.1	675.0	722.5	772.1	814.3
57.5°	450.7	458.2	466.8	480.1	499.3	531.4	564.6	601.7	642.2	683.4	718.8
60°	414.6	421.4	429.0	444.0	461.3	486.9	523.0	555.3	586.3	623.9	659.2
62.5°	379.1	385.9	394.6	406.7	423.4	447.8	477.9	506.1	538.1	570.9	597.2
65°	326.6	331.9	338.7	350.0	365.7	387.6	412.4	434.2	462.8	486.9	511.0
67.5°	269.0	279.1	287.9	297.1	310.5	330.8	348.7	369.7	389.1	407.0	429.0
70°	231.0	242.3	250.6	260.3	273.1	290.5	307.7	322.1	337.9	355.2	374.8
72.5°	199.2	208.0	214.4	224.9	236.5	252.5	268.6	280.5	293.3	305.2	324.2
75°	157.3	161.1	165.6	173.8	184.4	196.4	209.2	219.7	227.2	237.8	251.4
77.5°	113.0	120.3	123.3	129.1	136.7	144.2	152.6	161.5	168.7	172.5	182.9
80°	86.5	89.5	92.6	100.9	105.4	112.9	118.9	127.1	130.2	133.9	143.7
82.5°	67.3	69.1	70.9	73.1	75.9	83.4	89.4	94.6	97.6	99.1	106.4
85°	39.1	39.9	40.6	41.4	42.1	42.1	45.1	48.9	54.2	54.2	56.5
87.5°	17.6	18.0	17.6	16.7	17.6	17.2	17.4	17.0	18.4	19.7	21.0
90°	22.0	20.7	19.0	17.3	15.6	14.0	12.1	9.7	7.4	5.1	2.8
92.5°	38.0	37.2	36.1	34.9	33.7	32.6	30.6	28.0	25.4	22.8	20.2
95°	72.1	71.5	70.0	68.6	67.1	65.6	64.0	62.1	60.2	58.3	56.5
97.5°	113.9	113.1	111.4	109.6	107.9	106.2	104.6	103.1	101.6	100.1	98.6
100°	144.4	143.9	142.0	140.2	138.3	136.4	135.1	134.2	133.4	132.5	131.7
102.5°	176.2	175.6	173.8	172.1	170.4	168.7	167.7	167.3	167.0	166.6	166.4
105°	224.5	223.9	223.1	222.3	221.4	220.6	220.1	219.8	219.6	219.4	219.2
107.5°	277.0	276.4	276.3	276.2	276.1	275.9	275.7	275.5	275.2	274.9	274.8
110°	312.8	313.3	313.5	313.7	313.9	314.1	314.1	313.6	313.2	312.7	312.4



TEST NUMBER: P333004-830

CATALOG NUMBER: SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1

**CANDELA DISTRIBUTION (continued):**

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	350.1	350.2	350.5	350.9	351.3	351.7	351.9	351.8	351.7	351.6	351.5
115°	408.1	408.3	408.7	409.2	409.5	410.0	410.2	410.2	410.2	410.2	410.2
117.5°	464.2	465.0	465.2	465.5	465.8	466.1	466.2	466.0	465.8	465.7	465.5
120°	502.3	503.3	504.0	504.5	505.2	505.9	505.8	504.9	504.1	503.2	502.4
122.5°	540.3	540.9	541.2	541.5	541.9	542.2	542.1	541.8	541.4	541.1	540.7
125°	596.1	596.4	596.6	596.9	597.1	597.3	597.4	597.4	597.4	597.4	597.4
127.5°	649.7	650.1	650.4	650.7	651.1	651.4	651.3	650.6	650.0	649.4	648.8
130°	687.3	687.7	687.7	687.7	687.7	687.7	687.4	686.7	686.2	685.5	684.9
132.5°	722.6	723.1	723.2	723.4	723.6	723.8	723.6	723.1	722.6	722.3	721.8
135°	775.7	776.2	776.2	776.2	776.2	776.2	775.5	774.3	773.0	771.8	770.5
137.5°	827.2	827.7	827.4	827.1	826.7	826.3	826.0	825.3	824.7	824.2	823.6
140°	860.6	860.8	860.8	860.8	860.8	860.8	860.6	860.2	859.8	859.3	858.9
142.5°	892.4	892.4	892.6	892.8	893.0	893.1	893.0	892.6	892.1	891.7	891.3
145°	940.6	940.8	940.6	940.4	940.2	939.9	939.4	938.6	937.7	936.9	936.0
147.5°	984.1	984.3	984.4	984.6	984.8	985.0	984.5	983.5	982.5	981.5	980.5
150°	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3	1011.0	1010.1	1009.3	1008.4	1007.6
152.5°	1036.7	1036.1	1036.0	1035.9	1035.7	1035.5	1035.2	1034.7	1034.2	1033.7	1033.2
155°	1072.4	1071.6	1071.8	1072.0	1072.1	1072.4	1072.5	1072.5	1072.5	1072.5	1072.5
157.5°	1104.4	1103.7	1103.8	1103.8	1103.8	1103.9	1104.1	1104.5	1104.8	1105.2	1105.6
160°	1123.9	1123.3	1123.5	1123.7	1123.9	1124.2	1124.4	1124.5	1124.7	1124.9	1125.2
162.5°	1140.9	1139.8	1140.1	1140.3	1140.5	1140.7	1141.0	1141.6	1142.2	1142.7	1143.2
165°	1164.0	1162.8	1163.2	1163.7	1164.0	1164.5	1165.0	1165.6	1166.3	1166.9	1167.5
167.5°	1183.6	1182.4	1182.3	1182.3	1182.2	1182.2	1182.6	1183.6	1184.4	1185.2	1186.2
170°	1194.2	1192.9	1192.7	1192.5	1192.3	1192.0	1192.5	1193.5	1194.6	1195.6	1196.7
172.5°	1201.8	1200.4	1200.4	1200.3	1200.3	1200.2	1200.7	1201.6	1202.5	1203.3	1204.2
175°	1210.4	1208.9	1209.1	1209.3	1209.6	1209.8	1210.4	1211.4	1212.5	1213.5	1214.6
177.5°	1215.3	1214.2	1214.2	1214.2	1214.2	1214.2	1214.6	1215.4	1216.3	1217.1	1218.0
180°	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4



TEST NUMBER: P333004-830

CATALOG NUMBER: SA4XXRDIP-C1195D1035U830-4F0-1E-UDD-A1

**CANDELA DISTRIBUTION (continued):**

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
0°	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8
2.5°	1879.2	1884.6	1890.6	1902.1	1911.8	1916.0	1924.4	1930.4	1928.6	1937.0	1951.4
5°	1886.6	1907.0	1930.2	1954.4	1981.4	2004.0	2022.0	2040.1	2054.5	2071.7	2097.3
7.5°	1885.4	1921.6	1960.8	2004.0	2048.4	2086.8	2122.3	2158.4	2190.5	2225.5	2271.4
10°	1880.6	1928.7	1977.6	2034.1	2090.6	2144.0	2192.2	2237.3	2280.2	2326.1	2384.1
12.5°	1875.2	1930.5	1989.7	2057.6	2127.9	2192.2	2248.7	2313.8	2367.5	2426.7	2493.6
15°	1851.2	1925.7	2006.3	2094.3	2178.6	2265.1	2342.6	2422.4	2496.9	2567.7	2651.9
17.5°	1823.8	1909.8	2004.8	2108.8	2210.1	2315.3	2407.3	2507.7	2583.9	2678.9	2757.1
20°	1801.6	1894.1	1995.7	2112.3	2227.5	2344.1	2445.7	2548.1	2633.8	2729.4	2828.8
22.5°	1774.4	1876.0	1986.1	2107.0	2227.5	2354.9	2467.4	2569.2	2675.4	2783.0	2885.4
25°	1730.8	1836.2	1952.9	2085.3	2223.7	2353.9	2474.4	2600.8	2715.2	2831.8	2923.6
27.5°	1677.3	1787.9	1910.8	2047.5	2189.6	2322.9	2464.7	2599.4	2714.5	2826.8	2906.9
30°	1634.5	1751.1	1869.3	2007.8	2155.2	2298.2	2450.2	2584.9	2706.1	2807.0	2852.1
32.5°	1590.5	1701.2	1823.0	1963.2	2114.3	2268.1	2418.9	2556.6	2668.8	2729.3	2730.5
35°	1514.1	1618.0	1744.4	1882.1	2037.1	2204.1	2356.9	2492.4	2560.9	2566.2	2492.4
37.5°	1430.7	1526.0	1645.3	1783.2	1952.9	2119.1	2275.2	2365.5	2388.4	2311.8	2175.4
40°	1371.1	1459.2	1574.3	1715.8	1884.3	2056.0	2198.2	2264.4	2240.3	2116.1	1964.1
42.5°	1308.5	1390.5	1501.5	1641.2	1810.3	1983.7	2104.9	2140.3	2076.5	1933.2	1755.2
45°	1206.4	1281.6	1391.5	1532.2	1694.7	1857.3	1949.1	1931.0	1824.9	1654.8	1455.4
47.5°	1099.9	1172.6	1271.5	1401.7	1568.1	1708.4	1770.6	1716.1	1565.1	1378.0	1215.8
50°	1029.4	1104.0	1195.0	1319.2	1471.2	1606.7	1646.5	1563.8	1395.9	1216.1	1067.1
52.5°	960.3	1023.9	1113.1	1233.1	1378.5	1492.9	1514.1	1418.7	1245.5	1084.2	952.1
55°	854.9	912.9	988.1	1101.0	1226.6	1323.7	1312.4	1189.8	1032.5	894.8	790.9
57.5°	753.0	796.6	866.2	971.9	1082.3	1147.5	1106.3	1001.6	855.1	742.3	654.7
60°	685.6	726.2	790.9	883.4	980.5	1017.4	982.8	869.2	753.3	650.2	576.5
62.5°	621.7	657.6	713.2	799.2	877.6	899.5	862.4	763.2	658.7	570.7	509.6
65°	529.0	562.1	609.5	670.5	724.7	735.2	711.1	609.5	530.6	456.8	414.6
67.5°	444.9	466.6	503.6	556.3	585.0	591.2	544.7	480.9	411.2	365.9	334.1
70°	388.3	403.3	438.0	466.6	489.9	490.7	447.8	396.6	343.2	306.3	283.0
72.5°	333.6	348.0	374.2	393.7	411.6	405.8	366.5	326.1	283.0	255.1	237.8
75°	257.4	270.1	283.7	292.8	292.8	285.2	256.7	226.5	201.7	185.1	179.8
77.5°	187.1	197.7	202.2	200.8	198.0	186.3	168.2	148.5	139.7	131.9	127.9
80°	146.8	151.3	152.8	149.0	144.5	130.9	118.9	110.7	102.4	99.3	97.8
82.5°	108.8	112.7	108.8	109.9	99.9	88.8	82.2	79.4	75.9	74.6	73.1
85°	58.0	57.2	55.7	51.9	45.1	43.6	42.9	42.1	40.6	41.4	39.9
87.5°	20.9	19.5	17.6	17.4	17.8	17.0	17.9	18.3	18.6	18.2	19.7
90°	5.1	7.4	9.7	12.1	14.0	15.6	17.3	19.0	20.7	22.0	23.2
92.5°	22.8	25.4	28.0	30.6	32.6	33.7	34.9	36.1	37.2	38.0	38.7
95°	58.3	60.2	62.1	64.0	65.6	67.1	68.6	70.0	71.5	72.1	72.8
97.5°	100.1	101.6	103.1	104.6	106.2	107.9	109.6	111.4	113.1	113.9	114.6
100°	132.5	133.4	134.2	135.1	136.4	138.3	140.2	142.0	143.9	144.4	144.8
102.5°	166.6	167.0	167.3	167.7	168.7	170.4	172.1	173.8	175.6	176.2	176.7
105°	219.4	219.6	219.8	220.1	220.6	221.4	222.3	223.1	223.9	224.5	225.2
107.5°	274.9	275.2	275.5	275.7	275.9	276.1	276.2	276.3	276.4	277.0	277.6
110°	312.7	313.2	313.6	314.1	314.1	313.9	313.7	313.5	313.3	312.8	312.5





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**CANDELA DISTRIBUTION (continued):**

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	351.6	351.7	351.8	351.9	351.7	351.3	350.9	350.5	350.2	350.1	350.0
115°	410.2	410.2	410.2	410.2	410.0	409.5	409.2	408.7	408.3	408.1	407.8
117.5°	465.7	465.8	466.0	466.2	466.1	465.8	465.5	465.2	465.0	464.2	463.5
120°	503.2	504.1	504.9	505.8	505.9	505.2	504.5	504.0	503.3	502.3	501.2
122.5°	541.1	541.4	541.8	542.1	542.2	541.9	541.5	541.2	540.9	540.3	539.5
125°	597.4	597.4	597.4	597.4	597.3	597.1	596.9	596.6	596.4	596.1	595.6
127.5°	649.4	650.0	650.6	651.3	651.4	651.1	650.7	650.4	650.1	649.7	649.2
130°	685.5	686.2	686.7	687.4	687.7	687.7	687.7	687.7	687.7	687.3	686.9
132.5°	722.3	722.6	723.1	723.6	723.8	723.6	723.4	723.2	723.1	722.6	722.3
135°	771.8	773.0	774.3	775.5	776.2	776.2	776.2	776.2	776.2	775.7	775.3
137.5°	824.2	824.7	825.3	826.0	826.3	826.7	827.1	827.4	827.7	827.2	826.6
140°	859.3	859.8	860.2	860.6	860.8	860.8	860.8	860.8	860.8	860.6	860.4
142.5°	891.7	892.1	892.6	893.0	893.1	893.0	892.8	892.6	892.4	892.4	892.3
145°	936.9	937.7	938.6	939.4	939.9	940.2	940.4	940.6	940.8	940.6	940.4
147.5°	981.5	982.5	983.5	984.5	985.0	984.8	984.6	984.4	984.3	984.1	983.9
150°	1008.4	1009.3	1010.1	1011.0	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3	1011.3
152.5°	1033.7	1034.2	1034.7	1035.2	1035.5	1035.7	1035.9	1036.0	1036.1	1036.7	1037.2
155°	1072.5	1072.5	1072.5	1072.5	1072.4	1072.1	1072.0	1071.8	1071.6	1072.4	1073.3
157.5°	1105.2	1104.8	1104.5	1104.1	1103.9	1103.8	1103.8	1103.8	1103.7	1104.4	1104.9
160°	1124.9	1124.7	1124.5	1124.4	1124.2	1123.9	1123.7	1123.5	1123.3	1123.9	1124.5
162.5°	1142.7	1142.2	1141.6	1141.0	1140.7	1140.5	1140.3	1140.1	1139.8	1140.9	1142.1
165°	1166.9	1166.3	1165.6	1165.0	1164.5	1164.0	1163.7	1163.2	1162.8	1164.0	1165.4
167.5°	1185.2	1184.4	1183.6	1182.6	1182.2	1182.2	1182.3	1182.3	1182.4	1183.6	1184.9
170°	1195.6	1194.6	1193.5	1192.5	1192.0	1192.3	1192.5	1192.7	1192.9	1194.2	1195.4
172.5°	1203.3	1202.5	1201.6	1200.7	1200.2	1200.3	1200.3	1200.4	1200.4	1201.8	1203.2
175°	1213.5	1212.5	1211.4	1210.4	1209.8	1209.6	1209.3	1209.1	1208.9	1210.4	1211.8
177.5°	1217.1	1216.3	1215.4	1214.6	1214.2	1214.2	1214.2	1214.2	1214.2	1215.3	1216.5
180°	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4



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**CANDELA DISTRIBUTION (continued):**

	330°	335°	340°	345°	350°	355°	360°
0°	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8	1867.8
2.5°	1959.3	1961.7	1963.5	1969.5	1970.1	1975.6	1970.1
5°	2121.4	2131.9	2148.5	2165.0	2166.5	2177.1	2158.2
7.5°	2303.2	2327.6	2342.8	2369.6	2380.1	2386.7	2375.9
10°	2428.5	2451.0	2490.9	2510.5	2530.1	2533.0	2524.0
12.5°	2549.5	2585.3	2616.7	2653.7	2652.9	2679.4	2669.7
15°	2710.7	2747.5	2791.2	2832.5	2847.6	2847.6	2859.7
17.5°	2825.6	2893.2	2938.4	2970.9	3006.3	3012.6	3008.3
20°	2903.3	2976.3	3024.4	3066.6	3090.7	3097.5	3097.5
22.5°	2961.1	3023.2	3070.2	3108.1	3128.0	3135.9	3133.6
25°	3001.1	3054.5	3083.2	3094.5	3099.6	3098.2	3083.9
27.5°	2946.3	2943.9	2925.8	2891.2	2865.2	2849.4	2831.3
30°	2841.6	2802.5	2757.3	2707.6	2643.6	2594.7	2579.6
32.5°	2685.7	2597.7	2521.3	2438.5	2369.7	2320.8	2300.4
35°	2384.1	2244.9	2131.2	2031.8	1959.6	1914.5	1899.4
37.5°	2026.1	1891.4	1750.7	1654.4	1594.5	1548.9	1531.8
40°	1798.6	1651.8	1529.2	1438.9	1377.1	1332.8	1332.0
42.5°	1590.8	1450.8	1335.3	1270.3	1203.7	1174.4	1174.2
45°	1302.6	1190.5	1092.7	1041.5	1001.6	977.5	970.7
47.5°	1078.6	985.8	920.7	879.9	847.3	832.0	822.1
50°	952.7	871.5	819.5	784.1	766.1	746.5	745.0
52.5°	847.9	782.3	741.9	713.1	690.2	678.4	678.8
55°	712.7	660.7	632.2	610.3	592.2	583.2	579.5
57.5°	600.4	561.4	540.6	520.6	512.9	505.9	503.9
60°	530.6	504.2	484.7	468.8	457.5	455.2	454.5
62.5°	472.8	445.2	431.7	419.4	411.2	407.7	406.3
65°	389.8	369.5	357.4	347.7	344.7	339.4	338.7
67.5°	314.2	302.1	294.1	287.3	283.2	283.0	283.0
70°	267.9	261.1	254.4	250.6	248.4	246.9	246.9
72.5°	228.2	223.2	217.6	215.7	215.2	213.7	213.1
75°	173.8	168.5	169.3	165.6	162.6	158.8	156.6
77.5°	123.3	119.5	118.8	118.3	115.7	115.3	116.5
80°	95.6	91.8	91.0	91.8	91.0	88.8	88.8
82.5°	72.7	69.6	68.8	68.3	67.6	68.3	67.1
85°	39.1	37.6	37.6	37.6	39.1	38.4	37.6
87.5°	18.8	18.4	19.1	18.7	18.8	18.2	18.9
90°	24.5	25.7	26.6	27.0	27.4	27.8	28.2
92.5°	39.5	40.2	40.8	41.0	41.3	41.6	41.8
95°	73.4	74.0	74.4	74.4	74.4	74.4	74.4
97.5°	115.4	116.1	116.5	116.5	116.5	116.5	116.5
100°	145.2	145.6	145.8	145.8	145.8	145.8	145.8
102.5°	177.3	177.9	178.2	178.4	178.6	178.8	178.9
105°	225.8	226.4	227.1	227.6	228.3	228.9	229.5
107.5°	278.1	278.7	279.0	279.0	278.9	278.9	278.8
110°	312.0	311.6	311.7	312.4	312.9	313.6	314.2



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**CANDELA DISTRIBUTION (continued):**

	330°	335°	340°	345°	350°	355°	360°
112.5°	349.9	349.9	349.9	350.0	350.1	350.2	350.3
115°	407.6	407.5	407.3	407.1	406.8	406.6	406.4
117.5°	462.8	462.1	461.6	461.1	460.7	460.2	459.9
120°	500.2	499.2	498.8	499.3	499.6	500.1	500.5
122.5°	538.9	538.1	537.3	536.6	535.8	535.1	534.3
125°	595.2	594.7	594.4	594.0	593.5	593.1	592.7
127.5°	648.8	648.4	648.0	647.7	647.3	647.1	646.7
130°	686.5	686.1	685.4	684.6	683.7	682.9	682.0
132.5°	721.8	721.4	721.0	720.7	720.4	720.0	719.7
135°	774.9	774.5	773.9	773.4	772.7	772.0	771.5
137.5°	826.0	825.6	825.3	825.5	825.6	825.7	825.9
140°	860.2	860.0	859.8	859.6	859.3	859.1	858.9
142.5°	892.3	892.3	892.2	892.2	892.1	892.1	892.0
145°	940.2	939.9	939.5	938.9	938.3	937.6	937.0
147.5°	983.7	983.5	983.4	983.2	983.0	982.8	982.6
150°	1011.3	1011.3	1011.3	1011.1	1010.8	1010.6	1010.4
152.5°	1037.6	1038.2	1038.2	1037.6	1037.1	1036.5	1035.9
155°	1074.0	1074.9	1074.9	1074.0	1073.3	1072.4	1071.6
157.5°	1105.6	1106.3	1106.2	1105.5	1104.8	1104.1	1103.3
160°	1125.2	1125.8	1125.6	1124.5	1123.5	1122.5	1121.4
162.5°	1143.2	1144.3	1144.4	1143.4	1142.4	1141.3	1140.2
165°	1166.6	1167.8	1168.0	1167.2	1166.4	1165.5	1164.7
167.5°	1186.2	1187.4	1187.4	1186.1	1184.8	1183.5	1182.2
170°	1196.7	1198.0	1197.8	1196.4	1194.9	1193.4	1191.9
172.5°	1204.7	1206.2	1206.1	1204.7	1203.2	1201.7	1200.2
175°	1213.3	1214.7	1214.7	1213.3	1211.8	1210.4	1208.9
177.5°	1217.7	1218.9	1218.8	1217.5	1216.1	1214.7	1213.4
180°	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4	1216.4

(END OF REPORT)