

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: P332483-840

Luminaire Tested: **S123RDIW-S1165D1320U840-4F0-1E-UDD-A1**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P332483-840
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-9,
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: S123RDIW-S1165D1320U840-4F0-1E-UDD-A1
Description: DEFINE 3 DIRECT-INDIRECT WALL MOUNT LED LUMINAIRE
DOWNLIGHT 1165 LUMENS PER FOOT, ASYMMETRIC DIFFUSER, REGRESSED HOUSING
UPLIGHT 1320 LUMENS PER FOOT, FLUSH SATIN WHITE DIFFUSER
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 9241.0 lumens
Efficiency: N/A
Efficacy: 121.3 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.22 / 1.36
Luminous Opening: Rectangular (W 4' x L: 0.25' x H: 0')
CIE Type: General Diffuse

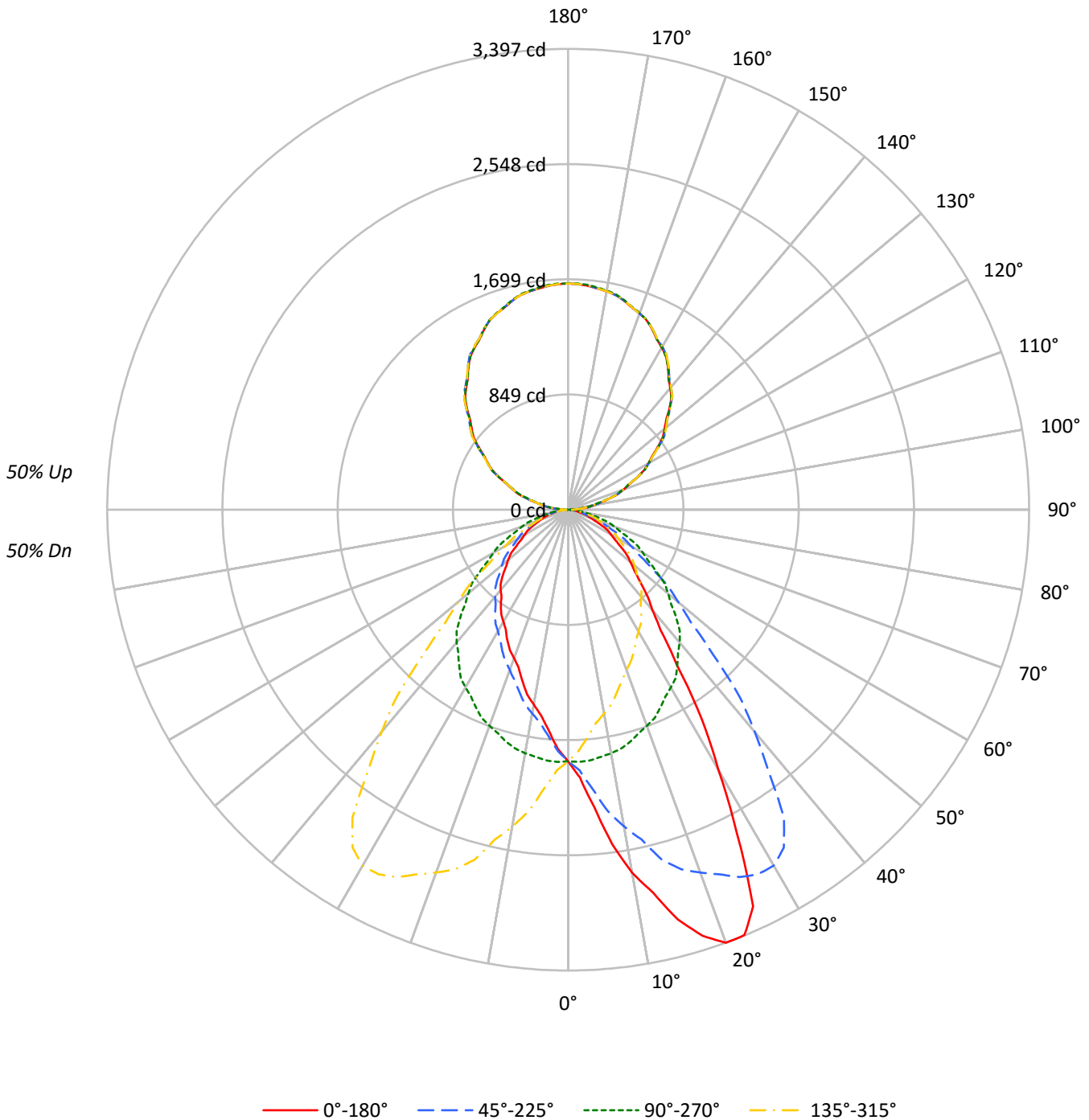
Input Watts (W): 76.2
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	107	107	107	107	99	99	99	99	83	83	83	69	69	69	56	56	56	50
1	98	94	91	87	91	87	84	81	74	72	70	62	60	59	51	49	49	43
2	90	83	77	72	83	77	72	68	65	62	59	55	52	50	45	43	42	37
3	83	73	66	61	76	68	62	57	58	54	50	49	46	43	41	38	36	32
4	76	65	58	52	70	61	54	49	52	47	43	44	40	37	37	34	32	28
5	70	59	51	45	64	54	48	42	47	42	37	40	36	33	33	30	28	25
6	64	53	45	39	59	49	42	37	42	37	33	36	32	29	30	27	25	22
7	60	48	40	35	55	45	38	33	39	33	29	33	29	26	28	25	22	20
8	55	43	36	31	51	41	34	29	35	30	26	30	26	23	26	22	20	18
9	52	40	32	27	48	37	31	26	32	27	23	28	24	21	24	21	18	16
10	48	37	29	25	45	34	28	24	30	25	21	26	22	19	22	19	17	15

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	19957	19957	19957	19957
5°	23791	20042	17650	20042
10°	29704	19928	15946	19928
15°	34867	19724	14540	19724
20°	38913	19420	13347	19420
25°	38292	19099	12613	19099
30°	27524	18804	11857	18804
35°	18378	18419	11369	18419
40°	13540	17956	10863	17956
45°	11357	17145	10368	17145
50°	10021	16083	9676	16083
55°	8788	14865	8728	14865
60°	7828	13702	7995	13702
65°	6872	12455	7440	12455
70°	5397	11339	6795	11339
75°	4754	9902	6209	9902
80°	4135	8412	6106	8412
85°	3335	6756	6472	6756



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	182.3	2.0
10°-20°	569.6	6.2
20°-30°	894.9	9.7
30°-40°	933.7	10.1
40°-50°	799.0	8.6
50°-60°	609.0	6.6
60°-70°	390.4	4.2
70°-80°	187.8	2.0
80°-90°	54.6	0.6
90°-100°	108.6	1.2
100°-110°	325.1	3.5
110°-120°	553.0	6.0
120°-130°	727.3	7.9
130°-140°	817.5	8.8
140°-150°	803.6	8.7
150°-160°	676.5	7.3
160°-170°	450.3	4.9
170°-180°	157.7	1.7
0°-30°	1646.9	17.8
0°-40°	2580.6	27.9
0°-60°	3988.6	43.2
0°-90°	4621.4	50.0
90°-120°	986.7	10.7
90°-150°	3335.1	36.1
90°-180°	4620.0	50.0
0°-180°	9241.0	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	1854	1854	1854	1854	1854	
5°	2202	1855	1634	1855	2202	227
15°	3129	1770	1305	1770	3129	887
25°	3224	1608	1062	1608	3224	1386
35°	1399	1402	865	1402	1399	917
45°	746	1126	681	1126	746	587
55°	468	792	465	792	468	423
65°	270	489	292	489	270	265
75°	114	238	149	238	114	123
85°	27	55	52	55	27	32
90°	39	1	39	1	39	20
95°	102	77	102	77	102	105
105°	312	295	312	295	312	331
115°	558	557	558	557	558	552
125°	806	815	806	815	806	720
135°	1056	1057	1056	1057	1056	812
145°	1282	1282	1282	1282	1282	800
155°	1466	1468	1466	1468	1466	675
165°	1594	1599	1594	1599	1594	450
175°	1657	1663	1657	1663	1657	157
180°	1667	1667	1667	1667	1667	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1
2.5°	1974.8	1977.3	1969.0	1967.8	1958.2	1955.7	1955.7	1942.4	1934.1	1923.4	1917.0
5°	2201.8	2214.5	2208.2	2193.8	2170.0	2164.4	2149.4	2125.6	2098.6	2065.3	2049.4
7.5°	2485.3	2502.6	2496.0	2473.9	2448.9	2428.8	2386.2	2346.7	2291.3	2242.7	2201.1
10°	2717.7	2699.5	2685.1	2663.7	2640.7	2603.4	2559.0	2497.8	2427.2	2371.7	2309.8
12.5°	2891.6	2888.7	2870.5	2848.5	2816.0	2780.6	2725.9	2651.5	2569.4	2489.1	2418.3
15°	3128.9	3133.6	3121.7	3098.7	3052.6	2989.9	2907.4	2876.5	2759.0	2671.7	2584.3
17.5°	3293.0	3292.1	3290.4	3258.5	3211.6	3166.9	3090.4	3009.0	2902.7	2779.7	2662.0
20°	3397.1	3389.2	3390.8	3355.1	3320.1	3268.5	3193.9	3075.6	2988.4	2846.3	2724.8
22.5°	3394.6	3393.0	3399.0	3386.8	3361.4	3321.8	3263.2	3163.3	3051.9	2908.5	2771.9
25°	3224.1	3217.7	3255.1	3265.4	3305.9	3313.0	3295.5	3240.8	3135.2	2987.6	2818.5
27.5°	2698.4	2694.8	2764.1	2850.7	2960.6	3046.0	3128.6	3168.4	3135.2	3029.5	2860.1
30°	2214.5	2289.1	2324.0	2449.4	2589.1	2755.8	2901.8	3040.7	3074.8	3028.9	2889.9
32.5°	1838.6	1903.7	1932.9	2040.5	2170.7	2365.9	2585.0	2781.7	2920.6	2955.8	2872.2
35°	1398.6	1399.4	1466.0	1513.6	1634.3	1835.1	2047.8	2311.3	2573.2	2771.7	2792.3
37.5°	1116.0	1119.9	1160.2	1207.7	1298.2	1404.4	1591.7	1810.8	2113.3	2418.0	2596.6
40°	963.6	970.7	1000.9	1047.7	1112.8	1193.0	1339.0	1545.4	1797.8	2136.7	2413.7
42.5°	865.8	877.4	892.9	929.0	969.3	1044.4	1162.5	1321.9	1551.5	1871.9	2191.5
45°	746.1	752.5	764.4	781.0	817.5	869.9	949.3	1056.4	1247.0	1504.9	1824.7
47.5°	658.1	654.8	667.3	680.9	705.2	740.8	794.1	881.5	1017.4	1224.4	1495.7
50°	598.4	597.6	606.4	616.7	639.7	665.9	709.6	775.5	883.4	1054.9	1303.3
52.5°	542.6	545.6	551.8	564.6	581.3	602.5	641.7	689.1	781.8	929.8	1136.9
55°	468.3	470.7	479.4	486.6	498.5	519.9	544.5	584.2	647.7	750.8	921.5
57.5°	405.5	404.3	412.7	414.4	428.0	445.5	464.4	495.2	541.3	618.0	733.0
60°	363.6	361.1	368.3	373.9	381.0	395.3	411.1	441.3	477.9	534.2	632.6
62.5°	325.4	324.3	329.5	335.1	341.0	354.0	367.3	390.5	419.4	466.9	544.9
65°	269.8	272.3	274.6	277.0	280.1	288.1	300.8	316.7	336.6	369.9	426.3
67.5°	212.1	214.5	215.3	220.2	227.0	232.0	239.7	253.9	267.6	295.8	327.8
70°	171.5	170.7	171.5	173.8	182.6	191.3	201.6	212.0	220.7	240.4	267.5
72.5°	147.3	145.9	147.9	148.5	152.7	155.1	161.6	171.3	182.6	196.0	215.4
75°	114.3	114.3	114.3	114.3	117.4	119.1	121.5	123.8	127.7	134.1	148.5
77.5°	84.4	84.6	85.7	86.5	87.2	88.1	89.6	91.9	93.3	96.6	102.9
80°	66.7	67.5	66.7	67.5	67.5	69.1	69.9	72.2	73.0	77.0	79.4
82.5°	50.2	49.7	50.2	51.0	51.0	52.5	52.7	54.4	54.6	56.7	59.1
85°	27.0	25.4	27.0	26.2	27.8	26.2	27.0	28.6	28.6	29.4	32.5
87.5°	14.2	15.3	13.9	14.5	14.3	14.8	14.6	14.3	15.5	14.5	14.4
90°	39.3	38.7	38.2	37.6	37.0	36.1	34.9	33.7	32.6	31.4	27.7
92.5°	52.9	53.2	53.6	53.9	54.3	54.0	53.1	52.1	51.2	50.3	48.2
95°	102.2	102.2	102.2	102.2	102.2	101.6	100.4	99.3	98.1	96.9	94.6
97.5°	157.1	157.3	157.4	157.5	157.6	157.0	155.7	154.3	153.0	151.7	150.0
100°	199.0	198.5	197.9	197.3	196.7	196.0	195.1	194.3	193.4	192.6	191.1
102.5°	242.1	242.2	242.3	242.4	242.5	242.2	241.3	240.3	239.5	238.6	236.7
105°	311.7	311.1	310.5	310.0	309.4	309.1	309.1	309.1	309.1	309.1	306.5
107.5°	384.3	384.7	385.0	385.4	385.7	385.4	384.5	383.5	382.6	381.6	380.6
110°	433.5	434.1	434.7	435.3	435.9	435.6	434.4	433.2	432.1	430.9	430.3



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	485.9	486.0	486.1	486.3	486.4	485.7	484.3	482.9	481.6	480.2	480.1
115°	558.0	558.3	558.6	558.9	559.2	559.2	558.9	558.6	558.3	558.0	558.6
117.5°	631.1	631.9	632.7	633.5	634.3	634.7	634.8	634.9	634.9	635.0	635.7
120°	682.4	683.0	683.6	684.2	684.7	685.2	685.5	685.7	686.0	686.3	687.8
122.5°	731.6	732.5	733.3	734.1	734.9	735.7	736.4	737.2	737.9	738.7	739.4
125°	805.5	806.7	807.8	809.0	810.2	811.3	812.5	813.6	814.9	816.0	816.6
127.5°	879.1	880.5	881.8	883.1	884.4	886.0	887.6	889.2	890.8	892.5	893.1
130°	927.4	929.4	931.4	933.4	935.4	937.1	938.3	939.4	940.6	941.7	942.6
132.5°	977.7	979.2	980.8	982.3	983.9	985.4	986.7	988.2	989.6	991.0	991.6
135°	1055.7	1056.2	1056.8	1057.4	1058.0	1058.8	1060.1	1061.2	1062.4	1063.5	1063.8
137.5°	1124.6	1125.7	1126.8	1127.9	1129.0	1130.1	1131.4	1132.6	1133.8	1135.1	1134.3
140°	1169.6	1171.6	1173.7	1175.8	1177.8	1178.9	1179.2	1179.5	1179.8	1180.1	1179.8
142.5°	1215.8	1217.3	1218.9	1220.4	1222.0	1222.9	1223.2	1223.6	1223.9	1224.2	1223.6
145°	1282.2	1283.4	1284.5	1285.8	1287.0	1287.7	1288.0	1288.2	1288.5	1288.8	1288.0
147.5°	1341.5	1343.2	1344.9	1346.8	1348.5	1349.3	1349.3	1349.3	1349.3	1349.3	1348.5
150°	1379.2	1380.9	1382.7	1384.4	1386.1	1387.0	1387.0	1387.0	1387.0	1387.0	1386.4
152.5°	1415.8	1417.3	1418.9	1420.4	1421.9	1422.4	1422.0	1421.5	1421.1	1420.6	1420.3
155°	1465.6	1467.6	1469.8	1471.8	1473.8	1474.2	1473.1	1471.9	1470.8	1469.6	1469.3
157.5°	1511.0	1512.6	1514.2	1515.8	1517.4	1517.7	1516.4	1515.2	1514.0	1512.8	1512.6
160°	1540.2	1541.5	1542.7	1543.8	1545.0	1544.8	1543.4	1541.9	1540.4	1538.9	1538.9
162.5°	1562.3	1564.2	1566.0	1567.9	1569.7	1569.9	1568.5	1567.0	1565.6	1564.1	1563.9
165°	1594.0	1596.0	1598.1	1600.1	1602.2	1602.3	1600.5	1598.8	1597.0	1595.3	1595.3
167.5°	1620.9	1622.8	1624.6	1626.4	1628.2	1628.2	1626.4	1624.6	1622.8	1620.9	1620.7
170°	1634.6	1636.6	1638.7	1640.7	1642.7	1642.7	1640.7	1638.7	1636.6	1634.6	1634.6
172.5°	1645.1	1647.1	1649.1	1651.2	1653.3	1653.4	1651.5	1649.7	1647.9	1646.1	1646.1
175°	1656.9	1658.9	1660.9	1662.9	1665.0	1665.2	1663.4	1661.6	1659.9	1658.2	1658.2
177.5°	1663.1	1664.8	1666.4	1668.0	1669.7	1669.8	1668.4	1667.0	1665.6	1664.2	1664.2
180°	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1
2.5°	1914.5	1912.6	1903.7	1893.5	1880.2	1871.3	1864.3	1860.5	1849.1	1835.1	1825.5
5°	2032.8	2008.9	1983.5	1952.6	1924.0	1894.6	1876.3	1854.9	1828.8	1799.4	1778.8
7.5°	2159.4	2112.7	2062.4	2010.5	1959.2	1913.2	1872.6	1837.8	1796.0	1753.9	1724.4
10°	2256.5	2188.3	2117.7	2045.4	1979.5	1917.6	1870.0	1823.2	1773.2	1724.7	1688.3
12.5°	2344.8	2254.9	2173.5	2084.8	2000.5	1926.5	1857.9	1802.8	1742.7	1691.1	1649.5
15°	2456.6	2364.5	2266.0	2131.1	2019.2	1925.6	1842.2	1770.0	1697.0	1633.5	1593.0
17.5°	2561.0	2422.5	2290.2	2177.7	2032.3	1915.2	1813.5	1727.2	1647.0	1579.6	1529.8
20°	2604.2	2470.0	2326.4	2182.7	2039.8	1908.9	1790.6	1695.4	1612.0	1535.8	1489.9
22.5°	2630.2	2478.3	2327.0	2172.6	2020.8	1884.8	1767.8	1663.0	1572.7	1500.3	1443.5
25°	2660.6	2479.6	2312.9	2160.5	2005.7	1858.2	1719.2	1608.1	1510.5	1433.5	1373.1
27.5°	2680.6	2467.7	2270.7	2101.3	1944.3	1797.3	1670.0	1552.2	1453.2	1371.7	1307.0
30°	2684.3	2458.1	2238.3	2055.0	1895.4	1760.5	1625.6	1512.9	1408.1	1321.5	1261.2
32.5°	2689.5	2434.7	2194.4	1999.7	1836.3	1702.7	1580.4	1472.8	1365.5	1280.3	1218.7
35°	2668.5	2421.7	2128.0	1904.1	1740.6	1611.2	1501.0	1401.7	1296.2	1213.6	1150.9
37.5°	2578.3	2370.1	2059.1	1796.5	1625.6	1505.7	1415.8	1329.3	1232.5	1143.5	1084.4
40°	2487.5	2319.3	2005.7	1731.1	1552.6	1429.5	1348.6	1277.9	1184.3	1100.9	1037.4
42.5°	2352.3	2250.1	1954.9	1662.5	1470.0	1351.4	1283.1	1216.9	1134.7	1050.1	990.4
45°	2104.2	2117.7	1851.0	1553.3	1355.6	1236.6	1172.4	1126.3	1053.3	983.4	922.3
47.5°	1793.0	1919.2	1728.9	1436.9	1235.2	1123.5	1067.2	1027.0	977.9	909.3	853.5
50°	1589.8	1770.0	1631.1	1358.9	1159.6	1048.5	992.9	960.4	917.6	863.5	810.4
52.5°	1402.5	1596.0	1513.0	1271.8	1077.7	976.1	921.8	895.0	861.0	810.2	762.1
55°	1143.8	1339.8	1320.8	1140.5	954.8	863.5	822.3	792.1	769.1	731.0	693.0
57.5°	925.1	1111.1	1120.8	994.5	846.6	756.4	720.8	698.1	683.1	654.4	619.1
60°	787.4	958.1	991.4	896.2	769.1	689.7	654.8	636.5	624.7	601.7	574.6
62.5°	673.1	818.3	856.1	787.5	694.8	620.6	593.2	575.6	567.5	547.6	523.8
65°	515.1	635.8	672.3	634.2	585.7	526.2	504.0	489.0	481.8	470.7	453.2
67.5°	387.4	475.2	515.3	488.5	471.0	433.3	419.2	411.1	404.8	397.2	382.5
70°	311.1	376.2	417.5	410.3	396.1	376.2	365.9	360.3	354.0	347.7	335.0
72.5°	250.1	295.0	333.7	337.3	325.6	321.6	312.6	310.2	306.4	298.7	291.8
75°	165.9	196.8	223.8	234.2	238.9	242.9	238.9	238.1	237.3	231.0	227.0
77.5°	108.8	125.4	142.4	160.1	167.4	172.9	174.1	177.0	174.9	171.6	169.7
80°	83.3	87.4	99.2	114.3	126.2	131.0	134.1	135.7	134.9	134.1	131.0
82.5°	60.5	63.8	69.4	80.0	90.0	98.0	99.9	99.6	101.3	101.8	99.2
85°	32.5	33.3	34.9	36.6	42.1	50.8	53.2	54.7	56.4	56.4	51.6
87.5°	14.9	13.5	14.0	13.4	14.7	14.7	18.0	20.6	21.8	19.8	20.4
90°	23.8	20.1	16.3	12.9	10.0	7.2	4.2	1.3	4.2	7.2	10.0
92.5°	45.9	43.8	41.7	39.6	37.7	35.6	33.6	31.7	33.6	35.6	37.7
95°	92.3	90.0	87.7	85.4	83.4	81.4	79.3	77.3	79.3	81.4	83.4
97.5°	148.2	146.6	144.9	143.3	141.8	140.3	138.8	137.2	138.8	140.3	141.8
100°	189.7	188.1	186.7	185.1	183.4	181.6	179.9	178.1	179.9	181.6	183.4
102.5°	234.8	232.9	231.0	229.4	228.4	227.4	226.3	225.3	226.3	227.4	228.4
105°	303.9	301.2	298.6	297.0	296.4	295.9	295.3	294.7	295.3	295.9	296.4
107.5°	379.6	378.5	377.5	376.8	376.5	376.1	375.8	375.4	375.8	376.1	376.5
110°	429.8	429.2	428.6	428.0	427.4	426.9	426.3	425.7	426.3	426.9	427.4



TEST NUMBER: P332483-840

CATALOG NUMBER: S123RDIW-S1165D1320U840-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	479.9	479.8	479.7	479.5	479.1	478.8	478.4	478.1	478.4	478.8	479.1
115°	559.2	559.7	560.3	560.2	559.3	558.4	557.5	556.6	557.5	558.4	559.3
117.5°	636.5	637.2	638.0	638.1	637.5	636.9	636.3	635.8	636.3	636.9	637.5
120°	689.2	690.6	692.2	692.0	690.2	688.5	686.7	685.0	686.7	688.5	690.2
122.5°	740.2	740.9	741.7	741.4	740.2	738.9	737.6	736.4	737.6	738.9	740.2
125°	817.2	817.7	818.3	818.2	817.3	816.4	815.6	814.7	815.6	816.4	817.3
127.5°	893.7	894.4	895.0	894.4	892.5	890.7	888.9	887.0	888.9	890.7	892.5
130°	943.5	944.3	945.2	944.5	942.2	939.9	937.5	935.1	937.5	939.9	942.2
132.5°	992.3	992.9	993.5	992.7	990.4	988.1	985.7	983.4	985.7	988.1	990.4
135°	1064.1	1064.4	1064.7	1064.0	1062.2	1060.5	1058.7	1057.0	1058.7	1060.5	1062.2
137.5°	1133.6	1132.8	1132.1	1130.9	1129.4	1128.0	1126.5	1125.1	1126.5	1128.0	1129.4
140°	1179.5	1179.2	1178.9	1178.1	1176.6	1175.2	1173.7	1172.3	1173.7	1175.2	1176.6
142.5°	1223.0	1222.5	1222.0	1221.0	1219.6	1218.1	1216.7	1215.2	1216.7	1218.1	1219.6
145°	1287.1	1286.2	1285.4	1284.5	1284.0	1283.4	1282.8	1282.2	1282.8	1283.4	1284.0
147.5°	1347.7	1346.9	1346.0	1345.1	1344.1	1343.0	1342.0	1340.9	1342.0	1343.0	1344.1
150°	1385.8	1385.3	1384.7	1384.1	1383.5	1383.0	1382.4	1381.8	1382.4	1383.0	1383.5
152.5°	1419.9	1419.6	1419.2	1418.6	1417.7	1416.9	1416.1	1415.3	1416.1	1416.9	1417.7
155°	1468.9	1468.6	1468.4	1468.2	1468.2	1468.2	1468.2	1468.2	1468.2	1468.2	1468.2
157.5°	1512.3	1512.1	1511.9	1511.9	1512.3	1512.6	1513.0	1513.3	1513.0	1512.6	1512.3
160°	1538.9	1538.9	1538.9	1539.2	1539.8	1540.4	1541.1	1541.6	1541.1	1540.4	1539.8
162.5°	1563.7	1563.5	1563.2	1563.5	1564.3	1565.1	1565.9	1566.7	1565.9	1565.1	1564.3
165°	1595.3	1595.3	1595.3	1595.8	1596.6	1597.5	1598.3	1599.2	1598.3	1597.5	1596.6
167.5°	1620.5	1620.2	1620.0	1620.5	1621.6	1622.9	1624.0	1625.2	1624.0	1622.9	1621.6
170°	1634.6	1634.6	1634.6	1635.2	1636.4	1637.5	1638.7	1639.8	1638.7	1637.5	1636.4
172.5°	1646.1	1646.1	1646.1	1646.7	1647.9	1649.0	1650.2	1651.3	1650.2	1649.0	1647.9
175°	1658.2	1658.2	1658.2	1658.7	1659.9	1661.1	1662.2	1663.4	1662.2	1661.1	1659.9
177.5°	1664.2	1664.2	1664.2	1664.7	1665.6	1666.5	1667.5	1668.4	1667.5	1666.5	1665.6
180°	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4



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CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1
2.5°	1822.4	1814.1	1808.5	1795.7	1787.5	1778.6	1769.7	1775.4	1774.7	1774.1	1774.1
5°	1761.3	1743.0	1726.4	1705.0	1691.4	1674.8	1662.0	1660.4	1663.7	1652.5	1646.2
7.5°	1700.6	1675.7	1652.0	1628.4	1603.4	1583.4	1570.7	1564.9	1556.8	1549.9	1542.9
10°	1658.1	1628.7	1605.7	1576.3	1549.3	1525.5	1510.5	1500.2	1494.6	1489.0	1478.7
12.5°	1614.3	1585.6	1556.2	1523.0	1497.3	1469.7	1458.3	1446.8	1436.1	1430.0	1415.8
15°	1550.1	1512.9	1481.9	1446.9	1418.4	1391.4	1375.5	1352.5	1349.3	1341.4	1327.1
17.5°	1485.8	1445.3	1402.7	1376.7	1344.5	1316.5	1292.3	1284.5	1261.8	1253.2	1240.9
20°	1435.0	1397.8	1365.2	1331.1	1284.2	1258.1	1239.0	1228.7	1210.4	1199.3	1191.3
22.5°	1391.2	1353.3	1315.7	1275.9	1237.3	1207.9	1194.0	1177.9	1167.9	1152.4	1143.8
25°	1328.7	1287.4	1242.1	1199.3	1171.5	1149.3	1127.1	1112.8	1098.5	1091.4	1075.5
27.5°	1256.0	1212.8	1170.5	1138.0	1103.9	1082.0	1061.9	1049.1	1032.0	1020.0	1011.2
30°	1216.0	1165.2	1128.6	1099.3	1055.6	1035.0	1020.0	1004.1	991.4	978.7	970.0
32.5°	1169.6	1123.3	1088.6	1052.3	1018.9	996.2	976.7	962.8	952.0	939.9	931.2
35°	1096.9	1058.0	1022.3	985.8	961.2	938.2	915.1	903.2	892.9	881.8	873.9
37.5°	1031.2	994.8	960.9	926.2	895.8	877.1	858.5	849.4	835.5	828.0	819.9
40°	990.6	954.8	918.4	885.0	853.2	839.0	822.3	808.8	796.1	790.5	781.8
42.5°	946.1	910.4	879.6	843.7	817.7	798.3	782.9	768.2	758.6	750.5	745.6
45°	880.2	848.5	818.3	782.6	758.0	741.3	723.9	710.3	701.7	696.1	687.3
47.5°	816.3	784.6	753.9	722.8	698.9	679.9	662.5	653.1	641.5	634.7	628.7
50°	769.9	741.3	708.8	680.2	656.4	637.3	623.1	611.2	600.9	592.1	588.1
52.5°	727.4	696.9	668.8	642.1	617.0	595.4	582.4	569.9	562.1	552.1	547.5
55°	657.2	627.8	604.0	577.8	553.2	534.9	519.1	508.0	500.1	489.0	482.6
57.5°	591.3	565.0	536.5	513.8	488.5	473.0	459.9	444.8	435.2	426.4	420.2
60°	546.8	516.7	492.1	470.7	448.5	428.6	416.7	404.8	394.5	385.8	380.2
62.5°	500.5	474.1	450.8	427.5	407.2	389.9	376.1	366.1	357.0	351.4	345.9
65°	429.4	408.8	385.0	365.9	346.9	334.2	323.1	314.3	308.0	304.0	299.2
67.5°	364.0	344.0	323.2	304.5	291.8	282.1	274.8	267.3	264.2	259.0	255.9
70°	321.4	300.8	282.6	268.3	255.6	248.4	243.7	238.1	234.9	228.6	225.4
72.5°	275.1	260.1	247.0	235.3	225.1	218.6	212.6	205.7	200.7	193.7	190.5
75°	216.7	203.2	192.9	184.9	178.5	169.9	161.2	154.0	151.6	149.3	148.5
77.5°	160.5	151.9	144.4	137.7	129.9	123.5	121.6	120.0	119.6	118.3	118.3
80°	126.2	118.3	112.7	104.7	100.0	100.0	100.0	98.5	99.2	99.2	99.2
82.5°	93.8	86.5	83.5	80.7	79.7	80.3	80.3	80.7	80.2	81.4	80.8
85°	48.4	49.2	50.8	50.0	50.8	50.8	52.4	51.6	52.4	50.8	52.4
87.5°	20.4	22.9	24.3	25.8	27.2	27.3	28.1	28.4	29.2	29.5	29.6
90°	12.9	16.3	20.1	23.8	27.7	31.4	32.6	33.7	34.9	36.1	37.0
92.5°	39.6	41.7	43.8	45.9	48.2	50.3	51.2	52.1	53.1	54.0	54.3
95°	85.4	87.7	90.0	92.3	94.6	96.9	98.1	99.3	100.4	101.6	102.2
97.5°	143.3	144.9	146.6	148.2	150.0	151.7	153.0	154.3	155.7	157.0	157.6
100°	185.1	186.7	188.1	189.7	191.1	192.6	193.4	194.3	195.1	196.0	196.7
102.5°	229.4	231.0	232.9	234.8	236.7	238.6	239.5	240.3	241.3	242.2	242.5
105°	297.0	298.6	301.2	303.9	306.5	309.1	309.1	309.1	309.1	309.1	309.4
107.5°	376.8	377.5	378.5	379.6	380.6	381.6	382.6	383.5	384.5	385.4	385.7
110°	428.0	428.6	429.2	429.8	430.3	430.9	432.1	433.2	434.4	435.6	435.9



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CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	479.5	479.7	479.8	479.9	480.1	480.2	481.6	482.9	484.3	485.7	486.4
115°	560.2	560.3	559.7	559.2	558.6	558.0	558.3	558.6	558.9	559.2	559.2
117.5°	638.1	638.0	637.2	636.5	635.7	635.0	634.9	634.9	634.8	634.7	634.3
120°	692.0	692.2	690.6	689.2	687.8	686.3	686.0	685.7	685.5	685.2	684.7
122.5°	741.4	741.7	740.9	740.2	739.4	738.7	737.9	737.2	736.4	735.7	734.9
125°	818.2	818.3	817.7	817.2	816.6	816.0	814.9	813.6	812.5	811.3	810.2
127.5°	894.4	895.0	894.4	893.7	893.1	892.5	890.8	889.2	887.6	886.0	884.4
130°	944.5	945.2	944.3	943.5	942.6	941.7	940.6	939.4	938.3	937.1	935.4
132.5°	992.7	993.5	992.9	992.3	991.6	991.0	989.6	988.2	986.7	985.4	983.9
135°	1064.0	1064.7	1064.4	1064.1	1063.8	1063.5	1062.4	1061.2	1060.1	1058.8	1058.0
137.5°	1130.9	1132.1	1132.8	1133.6	1134.3	1135.1	1133.8	1132.6	1131.4	1130.1	1129.0
140°	1178.1	1178.9	1179.2	1179.5	1179.8	1180.1	1179.8	1179.5	1179.2	1178.9	1177.8
142.5°	1221.0	1222.0	1222.5	1223.0	1223.6	1224.2	1223.9	1223.6	1223.2	1222.9	1222.0
145°	1284.5	1285.4	1286.2	1287.1	1288.0	1288.8	1288.5	1288.2	1288.0	1287.7	1287.0
147.5°	1345.1	1346.0	1346.9	1347.7	1348.5	1349.3	1349.3	1349.3	1349.3	1349.3	1348.5
150°	1384.1	1384.7	1385.3	1385.8	1386.4	1387.0	1387.0	1387.0	1387.0	1387.0	1386.1
152.5°	1418.6	1419.2	1419.6	1419.9	1420.3	1420.6	1421.1	1421.5	1422.0	1422.4	1421.9
155°	1468.2	1468.4	1468.6	1468.9	1469.3	1469.6	1470.8	1471.9	1473.1	1474.2	1473.8
157.5°	1511.9	1511.9	1512.1	1512.3	1512.6	1512.8	1514.0	1515.2	1516.4	1517.7	1517.4
160°	1539.2	1538.9	1538.9	1538.9	1538.9	1538.9	1540.4	1541.9	1543.4	1544.8	1545.0
162.5°	1563.5	1563.2	1563.5	1563.7	1563.9	1564.1	1565.6	1567.0	1568.5	1569.9	1569.7
165°	1595.8	1595.3	1595.3	1595.3	1595.3	1595.3	1597.0	1598.8	1600.5	1602.3	1602.2
167.5°	1620.5	1620.0	1620.2	1620.5	1620.7	1620.9	1622.8	1624.6	1626.4	1628.2	1628.2
170°	1635.2	1634.6	1634.6	1634.6	1634.6	1634.6	1636.6	1638.7	1640.7	1642.7	1642.7
172.5°	1646.7	1646.1	1646.1	1646.1	1646.1	1646.1	1647.9	1649.7	1651.5	1653.4	1653.3
175°	1658.7	1658.2	1658.2	1658.2	1658.2	1658.2	1659.9	1661.6	1663.4	1665.2	1665.0
177.5°	1664.7	1664.2	1664.2	1664.2	1664.2	1664.2	1665.6	1667.0	1668.4	1669.8	1669.7
180°	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4



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CATALOG NUMBER: S123RDIW-S1165D1320U840-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
0°	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1
2.5°	1766.6	1765.8	1766.6	1763.9	1766.6	1765.8	1766.6	1774.1	1774.1	1774.7	1775.4
5°	1643.8	1643.1	1640.6	1633.5	1640.6	1643.1	1643.8	1646.2	1652.5	1663.7	1660.4
7.5°	1536.6	1535.5	1528.5	1528.7	1528.5	1535.5	1536.6	1542.9	1549.9	1556.8	1564.9
10°	1473.2	1473.9	1464.4	1458.9	1464.4	1473.9	1473.2	1478.7	1489.0	1494.6	1500.2
12.5°	1411.6	1408.0	1400.3	1394.1	1400.3	1408.0	1411.6	1415.8	1430.0	1436.1	1446.8
15°	1330.3	1322.3	1303.3	1304.8	1303.3	1322.3	1330.3	1327.1	1341.4	1349.3	1352.5
17.5°	1234.6	1228.7	1228.4	1217.3	1228.4	1228.7	1234.6	1240.9	1253.2	1261.8	1284.5
20°	1178.7	1174.7	1176.3	1165.2	1176.3	1174.7	1178.7	1191.3	1199.3	1210.4	1228.7
22.5°	1134.9	1130.8	1124.2	1120.7	1124.2	1130.8	1134.9	1143.8	1152.4	1167.9	1177.9
25°	1070.8	1064.4	1058.0	1062.0	1058.0	1064.4	1070.8	1075.5	1091.4	1098.5	1112.8
27.5°	1006.6	1001.9	995.5	994.7	995.5	1001.9	1006.6	1011.2	1020.0	1032.0	1049.1
30°	965.9	961.2	958.1	954.0	958.1	961.2	965.9	970.0	978.7	991.4	1004.1
32.5°	924.7	923.7	918.1	917.3	918.1	923.7	924.7	931.2	939.9	952.0	962.8
35°	870.7	866.0	864.3	865.2	864.3	866.0	870.7	873.9	881.8	892.9	903.2
37.5°	819.4	813.0	810.2	807.4	810.2	813.0	819.4	819.9	828.0	835.5	849.4
40°	782.6	776.3	774.7	773.1	774.7	776.3	782.6	781.8	790.5	796.1	808.8
42.5°	741.3	738.8	737.8	735.0	737.8	738.8	741.3	745.6	750.5	758.6	768.2
45°	685.0	684.2	679.4	681.1	679.4	684.2	685.0	687.3	696.1	701.7	710.3
47.5°	625.6	622.1	618.7	621.0	618.7	622.1	625.6	628.7	634.7	641.5	653.1
50°	585.0	583.4	576.2	577.8	576.2	583.4	585.0	588.1	592.1	600.9	611.2
52.5°	544.3	538.3	535.6	534.6	535.6	538.3	544.3	547.5	552.1	562.1	569.9
55°	477.1	469.9	466.7	465.1	466.7	469.9	477.1	482.6	489.0	500.1	508.0
57.5°	411.0	409.1	406.6	408.3	406.6	409.1	411.0	420.2	426.4	435.2	444.8
60°	372.2	372.2	372.2	371.4	372.2	372.2	372.2	380.2	385.8	394.5	404.8
62.5°	342.4	340.5	339.9	341.0	339.9	340.5	342.4	345.9	351.4	357.0	366.1
65°	296.9	296.1	292.9	292.1	292.9	296.1	296.9	299.2	304.0	308.0	314.3
67.5°	253.9	251.0	250.0	248.9	250.0	251.0	253.9	255.9	259.0	264.2	267.3
70°	221.5	219.8	215.1	215.9	215.1	219.8	221.5	225.4	228.6	234.9	238.1
72.5°	186.5	184.9	184.0	182.9	184.0	184.9	186.5	190.5	193.7	200.7	205.7
75°	147.6	146.8	146.0	149.3	146.0	146.8	147.6	148.5	149.3	151.6	154.0
77.5°	118.3	118.3	118.8	117.4	118.8	118.3	118.3	118.3	118.3	119.6	120.0
80°	99.2	99.2	98.5	98.5	98.5	99.2	99.2	99.2	99.2	99.2	98.5
82.5°	79.6	80.2	80.7	79.4	80.7	80.2	79.6	80.8	81.4	80.2	80.7
85°	52.4	51.6	53.2	52.4	53.2	51.6	52.4	52.4	50.8	52.4	51.6
87.5°	31.0	29.9	30.0	30.7	30.0	29.9	31.0	29.6	29.5	29.2	28.4
90°	37.6	38.2	38.7	39.3	38.7	38.2	37.6	37.0	36.1	34.9	33.7
92.5°	53.9	53.6	53.2	52.9	53.2	53.6	53.9	54.3	54.0	53.1	52.1
95°	102.2	102.2	102.2	102.2	102.2	102.2	102.2	102.2	101.6	100.4	99.3
97.5°	157.5	157.4	157.3	157.1	157.3	157.4	157.5	157.6	157.0	155.7	154.3
100°	197.3	197.9	198.5	199.0	198.5	197.9	197.3	196.7	196.0	195.1	194.3
102.5°	242.4	242.3	242.2	242.1	242.2	242.3	242.4	242.5	242.2	241.3	240.3
105°	310.0	310.5	311.1	311.7	311.1	310.5	310.0	309.4	309.1	309.1	309.1
107.5°	385.4	385.0	384.7	384.3	384.7	385.0	385.4	385.7	385.4	384.5	383.5
110°	435.3	434.7	434.1	433.5	434.1	434.7	435.3	435.9	435.6	434.4	433.2



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CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	486.3	486.1	486.0	485.9	486.0	486.1	486.3	486.4	485.7	484.3	482.9
115°	558.9	558.6	558.3	558.0	558.3	558.6	558.9	559.2	559.2	558.9	558.6
117.5°	633.5	632.7	631.9	631.1	631.9	632.7	633.5	634.3	634.7	634.8	634.9
120°	684.2	683.6	683.0	682.4	683.0	683.6	684.2	684.7	685.2	685.5	685.7
122.5°	734.1	733.3	732.5	731.6	732.5	733.3	734.1	734.9	735.7	736.4	737.2
125°	809.0	807.8	806.7	805.5	806.7	807.8	809.0	810.2	811.3	812.5	813.6
127.5°	883.1	881.8	880.5	879.1	880.5	881.8	883.1	884.4	886.0	887.6	889.2
130°	933.4	931.4	929.4	927.4	929.4	931.4	933.4	935.4	937.1	938.3	939.4
132.5°	982.3	980.8	979.2	977.7	979.2	980.8	982.3	983.9	985.4	986.7	988.2
135°	1057.4	1056.8	1056.2	1055.7	1056.2	1056.8	1057.4	1058.0	1058.8	1060.1	1061.2
137.5°	1127.9	1126.8	1125.7	1124.6	1125.7	1126.8	1127.9	1129.0	1130.1	1131.4	1132.6
140°	1175.8	1173.7	1171.6	1169.6	1171.6	1173.7	1175.8	1177.8	1178.9	1179.2	1179.5
142.5°	1220.4	1218.9	1217.3	1215.8	1217.3	1218.9	1220.4	1222.0	1222.9	1223.2	1223.6
145°	1285.8	1284.5	1283.4	1282.2	1283.4	1284.5	1285.8	1287.0	1287.7	1288.0	1288.2
147.5°	1346.8	1344.9	1343.2	1341.5	1343.2	1344.9	1346.8	1348.5	1349.3	1349.3	1349.3
150°	1384.4	1382.7	1380.9	1379.2	1380.9	1382.7	1384.4	1386.1	1387.0	1387.0	1387.0
152.5°	1420.4	1418.9	1417.3	1415.8	1417.3	1418.9	1420.4	1421.9	1422.4	1422.0	1421.5
155°	1471.8	1469.8	1467.6	1465.6	1467.6	1469.8	1471.8	1473.8	1474.2	1473.1	1471.9
157.5°	1515.8	1514.2	1512.6	1511.0	1512.6	1514.2	1515.8	1517.4	1517.7	1516.4	1515.2
160°	1543.8	1542.7	1541.5	1540.2	1541.5	1542.7	1543.8	1545.0	1544.8	1543.4	1541.9
162.5°	1567.9	1566.0	1564.2	1562.3	1564.2	1566.0	1567.9	1569.7	1569.9	1568.5	1567.0
165°	1600.1	1598.1	1596.0	1594.0	1596.0	1598.1	1600.1	1602.2	1602.3	1600.5	1598.8
167.5°	1626.4	1624.6	1622.8	1620.9	1622.8	1624.6	1626.4	1628.2	1628.2	1626.4	1624.6
170°	1640.7	1638.7	1636.6	1634.6	1636.6	1638.7	1640.7	1642.7	1642.7	1640.7	1638.7
172.5°	1651.2	1649.1	1647.1	1645.1	1647.1	1649.1	1651.2	1653.3	1653.4	1651.5	1649.7
175°	1662.9	1660.9	1658.9	1656.9	1658.9	1660.9	1662.9	1665.0	1665.2	1663.4	1661.6
177.5°	1668.0	1666.4	1664.8	1663.1	1664.8	1666.4	1668.0	1669.7	1669.8	1668.4	1667.0
180°	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4



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CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
0°	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1
2.5°	1769.7	1778.6	1787.5	1795.7	1808.5	1814.1	1822.4	1825.5	1835.1	1849.1	1860.5
5°	1662.0	1674.8	1691.4	1705.0	1726.4	1743.0	1761.3	1778.8	1799.4	1828.8	1854.9
7.5°	1570.7	1583.4	1603.4	1628.4	1652.0	1675.7	1700.6	1724.4	1753.9	1796.0	1837.8
10°	1510.5	1525.5	1549.3	1576.3	1605.7	1628.7	1658.1	1688.3	1724.7	1773.2	1823.2
12.5°	1458.3	1469.7	1497.3	1523.0	1556.2	1585.6	1614.3	1649.5	1691.1	1742.7	1802.8
15°	1375.5	1391.4	1418.4	1446.9	1481.9	1512.9	1550.1	1593.0	1633.5	1697.0	1770.0
17.5°	1292.3	1316.5	1344.5	1376.7	1402.7	1445.3	1485.8	1529.8	1579.6	1647.0	1727.2
20°	1239.0	1258.1	1284.2	1331.1	1365.2	1397.8	1435.0	1489.9	1535.8	1612.0	1695.4
22.5°	1194.0	1207.9	1237.3	1275.9	1315.7	1353.3	1391.2	1443.5	1500.3	1572.7	1663.0
25°	1127.1	1149.3	1171.5	1199.3	1242.1	1287.4	1328.7	1373.1	1433.5	1510.5	1608.1
27.5°	1061.9	1082.0	1103.9	1138.0	1170.5	1212.8	1256.0	1307.0	1371.7	1453.2	1552.2
30°	1020.0	1035.0	1055.6	1099.3	1128.6	1165.2	1216.0	1261.2	1321.5	1408.1	1512.9
32.5°	976.7	996.2	1018.9	1052.3	1088.6	1123.3	1169.6	1218.7	1280.3	1365.5	1472.8
35°	915.1	938.2	961.2	985.8	1022.3	1058.0	1096.9	1150.9	1213.6	1296.2	1401.7
37.5°	858.5	877.1	895.8	926.2	960.9	994.8	1031.2	1084.4	1143.5	1232.5	1329.3
40°	822.3	839.0	853.2	885.0	918.4	954.8	990.6	1037.4	1100.9	1184.3	1277.9
42.5°	782.9	798.3	817.7	843.7	879.6	910.4	946.1	990.4	1050.1	1134.7	1216.9
45°	723.9	741.3	758.0	782.6	818.3	848.5	880.2	922.3	983.4	1053.3	1126.3
47.5°	662.5	679.9	698.9	722.8	753.9	784.6	816.3	853.5	909.3	977.9	1027.0
50°	623.1	637.3	656.4	680.2	708.8	741.3	769.9	810.4	863.5	917.6	960.4
52.5°	582.4	595.4	617.0	642.1	668.8	696.9	727.4	762.1	810.2	861.0	895.0
55°	519.1	534.9	553.2	577.8	604.0	627.8	657.2	693.0	731.0	769.1	792.1
57.5°	459.9	473.0	488.5	513.8	536.5	565.0	591.3	619.1	654.4	683.1	698.1
60°	416.7	428.6	448.5	470.7	492.1	516.7	546.8	574.6	601.7	624.7	636.5
62.5°	376.1	389.9	407.2	427.5	450.8	474.1	500.5	523.8	547.6	567.5	575.6
65°	323.1	334.2	346.9	365.9	385.0	408.8	429.4	453.2	470.7	481.8	489.0
67.5°	274.8	282.1	291.8	304.5	323.2	344.0	364.0	382.5	397.2	404.8	411.1
70°	243.7	248.4	255.6	268.3	282.6	300.8	321.4	335.0	347.7	354.0	360.3
72.5°	212.6	218.6	225.1	235.3	247.0	260.1	275.1	291.8	298.7	306.4	310.2
75°	161.2	169.9	178.5	184.9	192.9	203.2	216.7	227.0	231.0	237.3	238.1
77.5°	121.6	123.5	129.9	137.7	144.4	151.9	160.5	169.7	171.6	174.9	177.0
80°	100.0	100.0	100.0	104.7	112.7	118.3	126.2	131.0	134.1	134.9	135.7
82.5°	80.3	80.3	79.7	80.7	83.5	86.5	93.8	99.2	101.8	101.3	99.6
85°	52.4	50.8	50.8	50.0	50.8	49.2	48.4	51.6	56.4	56.4	54.7
87.5°	28.1	27.3	27.2	25.8	24.3	22.9	20.4	20.4	19.8	21.8	20.6
90°	32.6	31.4	27.7	23.8	20.1	16.3	12.9	10.0	7.2	4.2	1.3
92.5°	51.2	50.3	48.2	45.9	43.8	41.7	39.6	37.7	35.6	33.6	31.7
95°	98.1	96.9	94.6	92.3	90.0	87.7	85.4	83.4	81.4	79.3	77.3
97.5°	153.0	151.7	150.0	148.2	146.6	144.9	143.3	141.8	140.3	138.8	137.2
100°	193.4	192.6	191.1	189.7	188.1	186.7	185.1	183.4	181.6	179.9	178.1
102.5°	239.5	238.6	236.7	234.8	232.9	231.0	229.4	228.4	227.4	226.3	225.3
105°	309.1	309.1	306.5	303.9	301.2	298.6	297.0	296.4	295.9	295.3	294.7
107.5°	382.6	381.6	380.6	379.6	378.5	377.5	376.8	376.5	376.1	375.8	375.4
110°	432.1	430.9	430.3	429.8	429.2	428.6	428.0	427.4	426.9	426.3	425.7



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CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	481.6	480.2	480.1	479.9	479.8	479.7	479.5	479.1	478.8	478.4	478.1
115°	558.3	558.0	558.6	559.2	559.7	560.3	560.2	559.3	558.4	557.5	556.6
117.5°	634.9	635.0	635.7	636.5	637.2	638.0	638.1	637.5	636.9	636.3	635.8
120°	686.0	686.3	687.8	689.2	690.6	692.2	692.0	690.2	688.5	686.7	685.0
122.5°	737.9	738.7	739.4	740.2	740.9	741.7	741.4	740.2	738.9	737.6	736.4
125°	814.9	816.0	816.6	817.2	817.7	818.3	818.2	817.3	816.4	815.6	814.7
127.5°	890.8	892.5	893.1	893.7	894.4	895.0	894.4	892.5	890.7	888.9	887.0
130°	940.6	941.7	942.6	943.5	944.3	945.2	944.5	942.2	939.9	937.5	935.1
132.5°	989.6	991.0	991.6	992.3	992.9	993.5	992.7	990.4	988.1	985.7	983.4
135°	1062.4	1063.5	1063.8	1064.1	1064.4	1064.7	1064.0	1062.2	1060.5	1058.7	1057.0
137.5°	1133.8	1135.1	1134.3	1133.6	1132.8	1132.1	1130.9	1129.4	1128.0	1126.5	1125.1
140°	1179.8	1180.1	1179.8	1179.5	1179.2	1178.9	1178.1	1176.6	1175.2	1173.7	1172.3
142.5°	1223.9	1224.2	1223.6	1223.0	1222.5	1222.0	1221.0	1219.6	1218.1	1216.7	1215.2
145°	1288.5	1288.8	1288.0	1287.1	1286.2	1285.4	1284.5	1284.0	1283.4	1282.8	1282.2
147.5°	1349.3	1349.3	1348.5	1347.7	1346.9	1346.0	1345.1	1344.1	1343.0	1342.0	1340.9
150°	1387.0	1387.0	1386.4	1385.8	1385.3	1384.7	1384.1	1383.5	1383.0	1382.4	1381.8
152.5°	1421.1	1420.6	1420.3	1419.9	1419.6	1419.2	1418.6	1417.7	1416.9	1416.1	1415.3
155°	1470.8	1469.6	1469.3	1468.9	1468.6	1468.4	1468.2	1468.2	1468.2	1468.2	1468.2
157.5°	1514.0	1512.8	1512.6	1512.3	1512.1	1511.9	1511.9	1512.3	1512.6	1513.0	1513.3
160°	1540.4	1538.9	1538.9	1538.9	1538.9	1538.9	1539.2	1539.8	1540.4	1541.1	1541.6
162.5°	1565.6	1564.1	1563.9	1563.7	1563.5	1563.2	1563.5	1564.3	1565.1	1565.9	1566.7
165°	1597.0	1595.3	1595.3	1595.3	1595.3	1595.3	1595.8	1596.6	1597.5	1598.3	1599.2
167.5°	1622.8	1620.9	1620.7	1620.5	1620.2	1620.0	1620.5	1621.6	1622.9	1624.0	1625.2
170°	1636.6	1634.6	1634.6	1634.6	1634.6	1634.6	1635.2	1636.4	1637.5	1638.7	1639.8
172.5°	1647.9	1646.1	1646.1	1646.1	1646.1	1646.1	1646.7	1647.9	1649.0	1650.2	1651.3
175°	1659.9	1658.2	1658.2	1658.2	1658.2	1658.2	1658.7	1659.9	1661.1	1662.2	1663.4
177.5°	1665.6	1664.2	1664.2	1664.2	1664.2	1664.2	1664.7	1665.6	1666.5	1667.5	1668.4
180°	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4



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CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
0°	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1
2.5°	1864.3	1871.3	1880.2	1893.5	1903.7	1912.6	1914.5	1917.0	1923.4	1934.1	1942.4
5°	1876.3	1894.6	1924.0	1952.6	1983.5	2008.9	2032.8	2049.4	2065.3	2098.6	2125.6
7.5°	1872.6	1913.2	1959.2	2010.5	2062.4	2112.7	2159.4	2201.1	2242.7	2291.3	2346.7
10°	1870.0	1917.6	1979.5	2045.4	2117.7	2188.3	2256.5	2309.8	2371.7	2427.2	2497.8
12.5°	1857.9	1926.5	2000.5	2084.8	2173.5	2254.9	2344.8	2418.3	2489.1	2569.4	2651.5
15°	1842.2	1925.6	2019.2	2131.1	2266.0	2364.5	2456.6	2584.3	2671.7	2759.0	2876.5
17.5°	1813.5	1915.2	2032.3	2177.7	2290.2	2422.5	2561.0	2662.0	2779.7	2902.7	3009.0
20°	1790.6	1908.9	2039.8	2182.7	2326.4	2470.0	2604.2	2724.8	2846.3	2988.4	3075.6
22.5°	1767.8	1884.8	2020.8	2172.6	2327.0	2478.3	2630.2	2771.9	2908.5	3051.9	3163.3
25°	1719.2	1858.2	2005.7	2160.5	2312.9	2479.6	2660.6	2818.5	2987.6	3135.2	3240.8
27.5°	1670.0	1797.3	1944.3	2101.3	2270.7	2467.7	2680.6	2860.1	3029.5	3135.2	3168.4
30°	1625.6	1760.5	1895.4	2055.0	2238.3	2458.1	2684.3	2889.9	3028.9	3074.8	3040.7
32.5°	1580.4	1702.7	1836.3	1999.7	2194.4	2434.7	2689.5	2872.2	2955.8	2920.6	2781.7
35°	1501.0	1611.2	1740.6	1904.1	2128.0	2421.7	2668.5	2792.3	2771.7	2573.2	2311.3
37.5°	1415.8	1505.7	1625.6	1796.5	2059.1	2370.1	2578.3	2596.6	2418.0	2113.3	1810.8
40°	1348.6	1429.5	1552.6	1731.1	2005.7	2319.3	2487.5	2413.7	2136.7	1797.8	1545.4
42.5°	1283.1	1351.4	1470.0	1662.5	1954.9	2250.1	2352.3	2191.5	1871.9	1551.5	1321.9
45°	1172.4	1236.6	1355.6	1553.3	1851.0	2117.7	2104.2	1824.7	1504.9	1247.0	1056.4
47.5°	1067.2	1123.5	1235.2	1436.9	1728.9	1919.2	1793.0	1495.7	1224.4	1017.4	881.5
50°	992.9	1048.5	1159.6	1358.9	1631.1	1770.0	1589.8	1303.3	1054.9	883.4	775.5
52.5°	921.8	976.1	1077.7	1271.8	1513.0	1596.0	1402.5	1136.9	929.8	781.8	689.1
55°	822.3	863.5	954.8	1140.5	1320.8	1339.8	1143.8	921.5	750.8	647.7	584.2
57.5°	720.8	756.4	846.6	994.5	1120.8	1111.1	925.1	733.0	618.0	541.3	495.2
60°	654.8	689.7	769.1	896.2	991.4	958.1	787.4	632.6	534.2	477.9	441.3
62.5°	593.2	620.6	694.8	787.5	856.1	818.3	673.1	544.9	466.9	419.4	390.5
65°	504.0	526.2	585.7	634.2	672.3	635.8	515.1	426.3	369.9	336.6	316.7
67.5°	419.2	433.3	471.0	488.5	515.3	475.2	387.4	327.8	295.8	267.6	253.9
70°	365.9	376.2	396.1	410.3	417.5	376.2	311.1	267.5	240.4	220.7	212.0
72.5°	312.6	321.6	325.6	337.3	333.7	295.0	250.1	215.4	196.0	182.6	171.3
75°	238.9	242.9	238.9	234.2	223.8	196.8	165.9	148.5	134.1	127.7	123.8
77.5°	174.1	172.9	167.4	160.1	142.4	125.4	108.8	102.9	96.6	93.3	91.9
80°	134.1	131.0	126.2	114.3	99.2	87.4	83.3	79.4	77.0	73.0	72.2
82.5°	99.9	98.0	90.0	80.0	69.4	63.8	60.5	59.1	56.7	54.6	54.4
85°	53.2	50.8	42.1	36.6	34.9	33.3	32.5	32.5	29.4	28.6	28.6
87.5°	18.0	14.7	14.7	13.4	14.0	13.5	14.9	14.4	14.5	15.5	14.3
90°	4.2	7.2	10.0	12.9	16.3	20.1	23.8	27.7	31.4	32.6	33.7
92.5°	33.6	35.6	37.7	39.6	41.7	43.8	45.9	48.2	50.3	51.2	52.1
95°	79.3	81.4	83.4	85.4	87.7	90.0	92.3	94.6	96.9	98.1	99.3
97.5°	138.8	140.3	141.8	143.3	144.9	146.6	148.2	150.0	151.7	153.0	154.3
100°	179.9	181.6	183.4	185.1	186.7	188.1	189.7	191.1	192.6	193.4	194.3
102.5°	226.3	227.4	228.4	229.4	231.0	232.9	234.8	236.7	238.6	239.5	240.3
105°	295.3	295.9	296.4	297.0	298.6	301.2	303.9	306.5	309.1	309.1	309.1
107.5°	375.8	376.1	376.5	376.8	377.5	378.5	379.6	380.6	381.6	382.6	383.5
110°	426.3	426.9	427.4	428.0	428.6	429.2	429.8	430.3	430.9	432.1	433.2



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CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	478.4	478.8	479.1	479.5	479.7	479.8	479.9	480.1	480.2	481.6	482.9
115°	557.5	558.4	559.3	560.2	560.3	559.7	559.2	558.6	558.0	558.3	558.6
117.5°	636.3	636.9	637.5	638.1	638.0	637.2	636.5	635.7	635.0	634.9	634.9
120°	686.7	688.5	690.2	692.0	692.2	690.6	689.2	687.8	686.3	686.0	685.7
122.5°	737.6	738.9	740.2	741.4	741.7	740.9	740.2	739.4	738.7	737.9	737.2
125°	815.6	816.4	817.3	818.2	818.3	817.7	817.2	816.6	816.0	814.9	813.6
127.5°	888.9	890.7	892.5	894.4	895.0	894.4	893.7	893.1	892.5	890.8	889.2
130°	937.5	939.9	942.2	944.5	945.2	944.3	943.5	942.6	941.7	940.6	939.4
132.5°	985.7	988.1	990.4	992.7	993.5	992.9	992.3	991.6	991.0	989.6	988.2
135°	1058.7	1060.5	1062.2	1064.0	1064.7	1064.4	1064.1	1063.8	1063.5	1062.4	1061.2
137.5°	1126.5	1128.0	1129.4	1130.9	1132.1	1132.8	1133.6	1134.3	1135.1	1133.8	1132.6
140°	1173.7	1175.2	1176.6	1178.1	1178.9	1179.2	1179.5	1179.8	1180.1	1179.8	1179.5
142.5°	1216.7	1218.1	1219.6	1221.0	1222.0	1222.5	1223.0	1223.6	1224.2	1223.9	1223.6
145°	1282.8	1283.4	1284.0	1284.5	1285.4	1286.2	1287.1	1288.0	1288.8	1288.5	1288.2
147.5°	1342.0	1343.0	1344.1	1345.1	1346.0	1346.9	1347.7	1348.5	1349.3	1349.3	1349.3
150°	1382.4	1383.0	1383.5	1384.1	1384.7	1385.3	1385.8	1386.4	1387.0	1387.0	1387.0
152.5°	1416.1	1416.9	1417.7	1418.6	1419.2	1419.6	1419.9	1420.3	1420.6	1421.1	1421.5
155°	1468.2	1468.2	1468.2	1468.2	1468.4	1468.6	1468.9	1469.3	1469.6	1470.8	1471.9
157.5°	1513.0	1512.6	1512.3	1511.9	1511.9	1512.1	1512.3	1512.6	1512.8	1514.0	1515.2
160°	1541.1	1540.4	1539.8	1539.2	1538.9	1538.9	1538.9	1538.9	1538.9	1540.4	1541.9
162.5°	1565.9	1565.1	1564.3	1563.5	1563.2	1563.5	1563.7	1563.9	1564.1	1565.6	1567.0
165°	1598.3	1597.5	1596.6	1595.8	1595.3	1595.3	1595.3	1595.3	1595.3	1597.0	1598.8
167.5°	1624.0	1622.9	1621.6	1620.5	1620.0	1620.2	1620.5	1620.7	1620.9	1622.8	1624.6
170°	1638.7	1637.5	1636.4	1635.2	1634.6	1634.6	1634.6	1634.6	1634.6	1636.6	1638.7
172.5°	1650.2	1649.0	1647.9	1646.7	1646.1	1646.1	1646.1	1646.1	1646.1	1647.9	1649.7
175°	1662.2	1661.1	1659.9	1658.7	1658.2	1658.2	1658.2	1658.2	1658.2	1659.9	1661.6
177.5°	1667.5	1666.5	1665.6	1664.7	1664.2	1664.2	1664.2	1664.2	1664.2	1665.6	1667.0
180°	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
0°	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1	1854.1
2.5°	1955.7	1955.7	1958.2	1967.8	1969.0	1977.3	1974.8
5°	2149.4	2164.4	2170.0	2193.8	2208.2	2214.5	2201.8
7.5°	2386.2	2428.8	2448.9	2473.9	2496.0	2502.6	2485.3
10°	2559.0	2603.4	2640.7	2663.7	2685.1	2699.5	2717.7
12.5°	2725.9	2780.6	2816.0	2848.5	2870.5	2888.7	2891.6
15°	2907.4	2989.9	3052.6	3098.7	3121.7	3133.6	3128.9
17.5°	3090.4	3166.9	3211.6	3258.5	3290.4	3292.1	3293.0
20°	3193.9	3268.5	3320.1	3355.1	3390.8	3389.2	3397.1
22.5°	3263.2	3321.8	3361.4	3386.8	3399.0	3393.0	3394.6
25°	3295.5	3313.0	3305.9	3265.4	3255.1	3217.7	3224.1
27.5°	3128.6	3046.0	2960.6	2850.7	2764.1	2694.8	2698.4
30°	2901.8	2755.8	2589.1	2449.4	2324.0	2289.1	2214.5
32.5°	2585.0	2365.9	2170.7	2040.5	1932.9	1903.7	1838.6
35°	2047.8	1835.1	1634.3	1513.6	1466.0	1399.4	1398.6
37.5°	1591.7	1404.4	1298.2	1207.7	1160.2	1119.9	1116.0
40°	1339.0	1193.0	1112.8	1047.7	1000.9	970.7	963.6
42.5°	1162.5	1044.4	969.3	929.0	892.9	877.4	865.8
45°	949.3	869.9	817.5	781.0	764.4	752.5	746.1
47.5°	794.1	740.8	705.2	680.9	667.3	654.8	658.1
50°	709.6	665.9	639.7	616.7	606.4	597.6	598.4
52.5°	641.7	602.5	581.3	564.6	551.8	545.6	542.6
55°	544.5	519.9	498.5	486.6	479.4	470.7	468.3
57.5°	464.4	445.5	428.0	414.4	412.7	404.3	405.5
60°	411.1	395.3	381.0	373.9	368.3	361.1	363.6
62.5°	367.3	354.0	341.0	335.1	329.5	324.3	325.4
65°	300.8	288.1	280.1	277.0	274.6	272.3	269.8
67.5°	239.7	232.0	227.0	220.2	215.3	214.5	212.1
70°	201.6	191.3	182.6	173.8	171.5	170.7	171.5
72.5°	161.6	155.1	152.7	148.5	147.9	145.9	147.3
75°	121.5	119.1	117.4	114.3	114.3	114.3	114.3
77.5°	89.6	88.1	87.2	86.5	85.7	84.6	84.4
80°	69.9	69.1	67.5	67.5	66.7	67.5	66.7
82.5°	52.7	52.5	51.0	51.0	50.2	49.7	50.2
85°	27.0	26.2	27.8	26.2	27.0	25.4	27.0
87.5°	14.6	14.8	14.3	14.5	13.9	15.3	14.2
90°	34.9	36.1	37.0	37.6	38.2	38.7	39.3
92.5°	53.1	54.0	54.3	53.9	53.6	53.2	52.9
95°	100.4	101.6	102.2	102.2	102.2	102.2	102.2
97.5°	155.7	157.0	157.6	157.5	157.4	157.3	157.1
100°	195.1	196.0	196.7	197.3	197.9	198.5	199.0
102.5°	241.3	242.2	242.5	242.4	242.3	242.2	242.1
105°	309.1	309.1	309.4	310.0	310.5	311.1	311.7
107.5°	384.5	385.4	385.7	385.4	385.0	384.7	384.3
110°	434.4	435.6	435.9	435.3	434.7	434.1	433.5



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
112.5°	484.3	485.7	486.4	486.3	486.1	486.0	485.9
115°	558.9	559.2	559.2	558.9	558.6	558.3	558.0
117.5°	634.8	634.7	634.3	633.5	632.7	631.9	631.1
120°	685.5	685.2	684.7	684.2	683.6	683.0	682.4
122.5°	736.4	735.7	734.9	734.1	733.3	732.5	731.6
125°	812.5	811.3	810.2	809.0	807.8	806.7	805.5
127.5°	887.6	886.0	884.4	883.1	881.8	880.5	879.1
130°	938.3	937.1	935.4	933.4	931.4	929.4	927.4
132.5°	986.7	985.4	983.9	982.3	980.8	979.2	977.7
135°	1060.1	1058.8	1058.0	1057.4	1056.8	1056.2	1055.7
137.5°	1131.4	1130.1	1129.0	1127.9	1126.8	1125.7	1124.6
140°	1179.2	1178.9	1177.8	1175.8	1173.7	1171.6	1169.6
142.5°	1223.2	1222.9	1222.0	1220.4	1218.9	1217.3	1215.8
145°	1288.0	1287.7	1287.0	1285.8	1284.5	1283.4	1282.2
147.5°	1349.3	1349.3	1348.5	1346.8	1344.9	1343.2	1341.5
150°	1387.0	1387.0	1386.1	1384.4	1382.7	1380.9	1379.2
152.5°	1422.0	1422.4	1421.9	1420.4	1418.9	1417.3	1415.8
155°	1473.1	1474.2	1473.8	1471.8	1469.8	1467.6	1465.6
157.5°	1516.4	1517.7	1517.4	1515.8	1514.2	1512.6	1511.0
160°	1543.4	1544.8	1545.0	1543.8	1542.7	1541.5	1540.2
162.5°	1568.5	1569.9	1569.7	1567.9	1566.0	1564.2	1562.3
165°	1600.5	1602.3	1602.2	1600.1	1598.1	1596.0	1594.0
167.5°	1626.4	1628.2	1628.2	1626.4	1624.6	1622.8	1620.9
170°	1640.7	1642.7	1642.7	1640.7	1638.7	1636.6	1634.6
172.5°	1651.5	1653.4	1653.3	1651.2	1649.1	1647.1	1645.1
175°	1663.4	1665.2	1665.0	1662.9	1660.9	1658.9	1656.9
177.5°	1668.4	1669.8	1669.7	1668.0	1666.4	1664.8	1663.1
180°	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4	1667.4

(END OF REPORT)