

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: P332386-840

Luminaire Tested: **S123RDIP-S1165D1195U840-4F0-1E-UDD-A4**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P332386-840  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-17,  
Test Lab: INNOVATION CENTER  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: NEO-RAY  
Catalog Number: S123RDIP-S1165D1195U840-4F0-1E-UDD-A4  
Description: DEFINE 3 DIRECT-INDIRECT PENDANT LED LUMINAIRE  
DOWNLIGHT 1165 LUMENS PER FOOT, ASYMMETRIC DIFFUSER, REGRESSED HOUSING  
UPLIGHT 1195 LUMENS PER FOOT, BATWING OPTIC  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

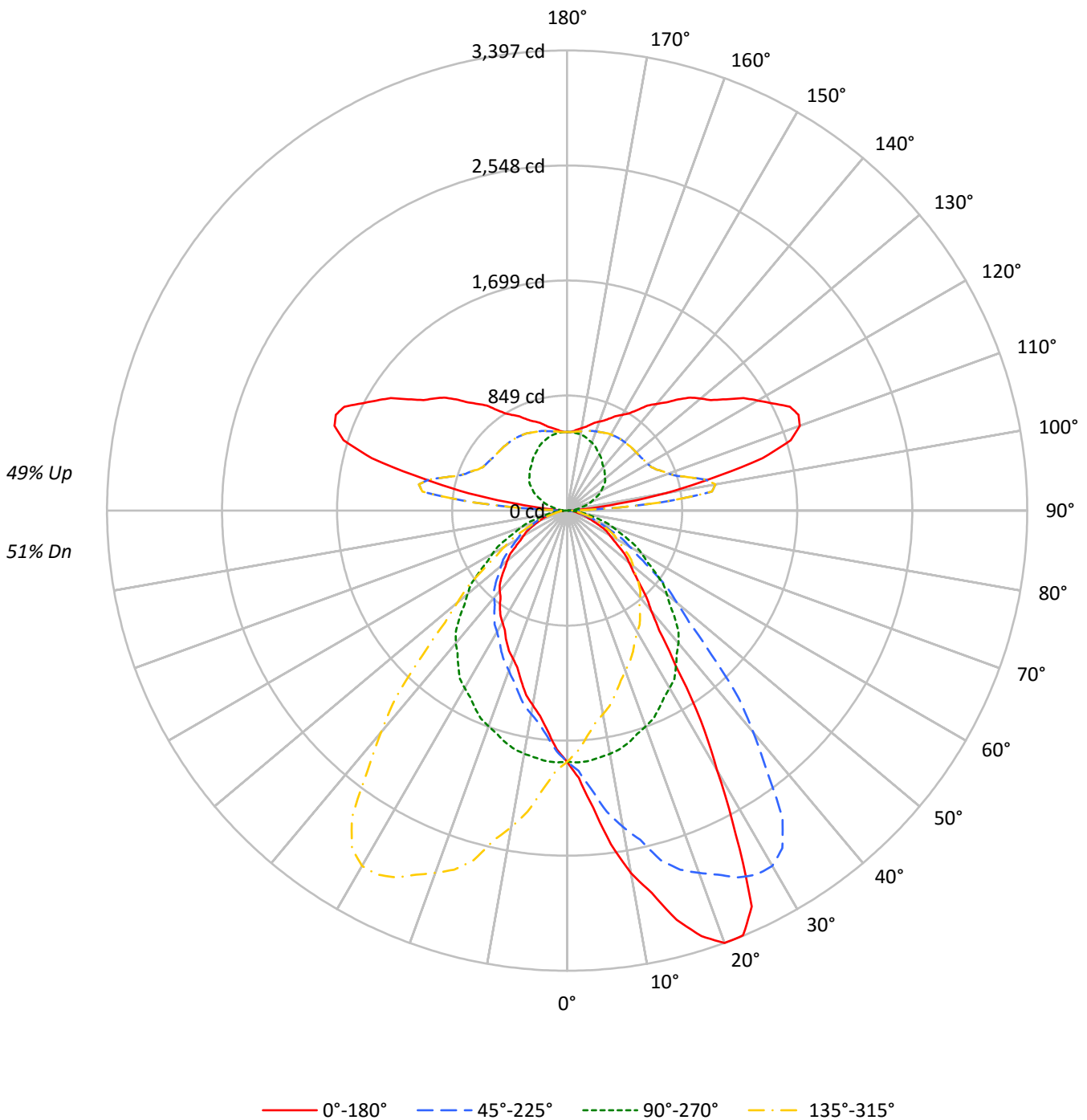
Lumens per Lamp: N/A  
Luminaire Lumens: 8981.7 lumens  
Efficiency: N/A  
Efficacy: 125.3 lumens/watt  
Spacing Criteria (0/90/45): 1.21 / 1.22 / 1.36  
Luminous Opening: Rectangular (W 4' x L: 0.25' x H: 0')  
CIE Type: General Diffuse  
  
Input Watts (W): 71.7  
Input Voltage (V): 120  
Input Current (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	84	84	84	70	70	70	57	57	57	51
1	99	95	91	88	91	88	85	82	75	72	70	63	61	60	52	51	50	45
2	90	83	77	73	83	77	72	68	66	62	59	56	53	51	46	44	43	38
3	83	74	67	61	76	69	62	58	59	54	50	50	46	44	41	39	37	33
4	76	66	58	52	70	61	54	49	53	48	44	45	41	38	37	35	32	29
5	70	59	51	45	65	55	48	43	47	42	38	40	36	33	34	31	29	25
6	65	53	45	39	60	49	42	37	43	37	33	37	33	29	31	28	25	23
7	60	48	40	35	55	45	38	33	39	34	30	34	29	26	28	25	23	20
8	56	44	36	31	52	41	34	29	36	30	26	31	27	23	26	23	21	18
9	52	40	33	28	48	38	31	26	33	28	24	28	24	21	24	21	19	17
10	49	37	30	25	45	35	28	24	30	25	22	26	22	19	23	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	6.3
20°-30°	894.9	10.0
30°-40°	933.7	10.4
40°-50°	799.0	8.9
50°-60°	609.0	6.8
60°-70°	390.4	4.3
70°-80°	187.8	2.1
80°-90°	54.2	0.6
90°-100°	322.6	3.6
100°-110°	913.4	10.2
110°-120°	898.5	10.0
120°-130°	716.7	8.0
130°-140°	565.1	6.3
140°-150°	421.7	4.7
150°-160°	294.0	3.3
160°-170°	172.7	1.9
170°-180°	56.2	0.6
0°-30°	1646.9	18.3
0°-40°	2580.6	28.7
0°-60°	3988.6	44.4
0°-90°	4621.0	51.4
90°-120°	2134.4	23.8
90°-150°	3837.9	42.7
90°-180°	4361.0	48.6
0°-180°	8981.7	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°	34	2	34	2	34	19
95°	136	40	136	40	136	245
105°	1492	136	1492	136	1492	1472
115°	1815	240	1815	240	1815	1764
125°	1432	334	1432	334	1432	1297
135°	1160	392	1160	392	1160	900
145°	907	447	907	447	907	577
155°	752	508	752	508	752	351
165°	656	555	656	555	656	187
175°	590	578	590	578	590	57
180°	580	580	580	580	580	



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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°	13.1	14.6	13.1	13.5	13.8	13.9	13.7	13.5	14.5	14.1	14.0
90°	34.0	35.2	34.0	32.8	34.0	31.7	30.5	29.3	28.2	29.3	25.9
92.5°	56.6	58.7	57.5	61.0	63.1	69.2	78.4	98.8	136.1	180.5	198.5
95°	136.1	140.8	149.1	159.6	181.9	224.1	286.3	422.4	564.3	695.8	619.6
97.5°	370.5	380.6	412.3	465.1	551.7	692.1	843.3	1052.9	1153.6	1078.2	789.4
100°	735.7	734.5	780.2	865.9	984.4	1151.0	1288.3	1383.3	1342.3	1111.2	750.9
102.5°	1079.2	1106.2	1144.5	1212.2	1304.4	1410.1	1490.1	1493.2	1351.6	1050.2	694.6
105°	1492.5	1498.3	1535.9	1580.4	1634.5	1665.0	1642.6	1525.3	1280.1	943.3	625.4
107.5°	1730.4	1741.2	1753.8	1768.9	1768.0	1726.2	1623.4	1432.8	1154.8	849.0	581.3
110°	1828.1	1830.4	1832.7	1823.3	1790.5	1708.4	1560.5	1344.6	1075.9	795.5	564.3



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**CANDELA DISTRIBUTION (continued):**

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	1847.8	1847.2	1838.4	1809.3	1749.2	1643.6	1477.9	1257.3	1007.4	759.8	555.0
115°	1815.1	1809.3	1785.7	1734.1	1646.2	1518.2	1345.7	1141.7	924.5	721.5	551.5
117.5°	1711.4	1703.4	1669.6	1610.5	1518.7	1389.0	1234.1	1057.8	874.5	699.0	553.6
120°	1625.1	1618.0	1589.8	1524.1	1431.5	1312.9	1172.2	1013.7	848.3	688.7	557.3
122.5°	1544.3	1535.4	1504.4	1445.3	1362.9	1252.8	1122.4	979.0	826.7	682.2	563.9
125°	1431.5	1423.2	1393.9	1342.3	1267.2	1173.3	1060.7	932.8	799.0	673.5	573.7
127.5°	1338.5	1331.0	1304.4	1260.4	1193.5	1108.0	1006.4	892.4	774.7	669.2	585.0
130°	1286.0	1276.6	1251.9	1209.7	1147.5	1067.7	972.7	867.1	761.4	666.4	592.5
132.5°	1234.4	1227.8	1205.9	1163.7	1105.3	1029.3	940.8	843.6	749.3	665.5	598.1
135°	1160.4	1152.2	1131.0	1095.9	1038.3	971.5	895.2	811.9	733.4	664.1	606.6
137.5°	1082.3	1076.8	1059.0	1023.4	975.0	917.1	851.3	783.0	719.4	661.5	612.3
140°	1027.8	1029.0	1010.3	977.3	932.8	882.3	826.0	766.2	711.0	660.6	616.0
142.5°	977.1	978.3	961.4	932.3	894.3	850.4	801.6	750.2	703.5	658.7	618.8
145°	907.0	904.6	895.2	870.6	841.2	807.3	769.7	730.9	693.5	655.9	620.7
147.5°	849.2	848.3	839.4	822.7	800.4	776.3	746.0	715.3	683.6	651.5	620.7
150°	815.5	815.5	808.4	795.5	777.9	755.6	730.9	704.0	677.0	647.6	620.7
152.5°	787.3	787.3	783.0	771.1	757.3	738.7	716.9	693.7	669.5	643.0	617.8
155°	752.0	750.9	748.6	739.2	728.6	714.6	696.9	678.1	658.2	634.8	614.8
157.5°	719.9	720.1	718.3	711.2	702.1	691.1	677.5	661.8	645.5	627.5	610.9
160°	699.3	700.4	700.4	693.5	685.2	677.0	665.3	652.4	637.1	621.9	608.9
162.5°	680.5	681.7	681.7	675.6	670.1	662.9	652.2	641.1	628.6	616.2	605.2
165°	655.9	655.9	657.0	652.4	647.6	641.8	633.6	626.5	617.1	607.7	599.6
167.5°	632.4	632.4	633.6	630.3	628.2	624.0	619.2	613.9	606.1	599.4	593.9
170°	618.3	618.3	619.6	617.1	616.0	613.6	608.9	605.4	599.6	593.7	590.2
172.5°	605.2	606.1	608.2	605.9	605.6	604.3	600.5	597.9	593.0	589.0	587.3
175°	590.2	591.4	592.5	591.4	591.4	591.4	589.0	587.8	585.5	583.1	583.1
177.5°	581.5	581.5	583.4	582.4	583.4	583.4	582.4	581.5	580.6	579.7	580.6
180°	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7



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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°	14.6	13.2	13.8	13.3	14.8	14.7	18.1	20.8	21.9	19.8	20.5
90°	22.3	18.8	15.2	12.9	10.6	7.1	4.6	2.3	4.6	7.1	10.6
92.5°	149.1	98.6	67.9	50.5	40.6	31.4	21.6	14.5	21.6	31.4	40.6
95°	427.1	252.3	152.5	106.7	76.2	56.4	43.4	39.9	43.4	56.4	76.2
97.5°	468.6	271.6	176.2	126.7	96.6	79.3	69.2	68.1	69.2	79.3	96.6
100°	442.3	268.7	186.5	140.8	112.6	96.2	88.0	86.8	88.0	96.2	112.6
102.5°	419.8	272.5	198.7	156.7	131.4	115.9	108.7	106.5	108.7	115.9	131.4
105°	403.6	282.8	219.4	183.0	160.8	146.6	139.7	136.1	139.7	146.6	160.8
107.5°	402.4	302.1	246.4	212.6	191.7	177.8	171.1	167.5	171.1	177.8	191.7
110°	407.2	318.0	265.2	232.3	212.4	199.4	193.6	190.1	193.6	199.4	212.4





TEST NUMBER: P332386-840

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**CANDELA DISTRIBUTION (continued):**

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	416.6	334.0	284.9	253.0	233.0	220.2	214.3	210.8	214.3	220.2	233.0
115°	431.8	360.2	315.6	284.0	264.0	252.3	245.2	240.5	245.2	252.3	264.0
117.5°	451.9	388.1	344.1	314.7	292.4	281.6	275.7	270.3	275.7	281.6	292.4
120°	467.0	406.0	363.8	334.4	312.1	300.3	294.5	290.9	294.5	300.3	312.1
122.5°	481.1	424.7	383.4	352.2	330.8	318.2	312.4	308.8	312.4	318.2	330.8
125°	503.3	451.7	410.6	379.0	356.7	343.8	336.8	334.4	336.8	343.8	356.7
127.5°	521.7	475.1	435.6	403.8	379.2	366.1	357.4	353.9	357.4	366.1	379.2
130°	533.8	489.3	450.5	418.9	394.3	380.1	369.6	366.1	369.6	380.1	394.3
132.5°	545.1	501.5	463.7	432.9	408.3	391.4	379.9	375.5	379.9	391.4	408.3
135°	559.7	519.8	483.4	451.7	427.1	409.5	396.6	391.9	396.6	409.5	427.1
137.5°	570.5	532.4	497.5	468.2	443.7	425.0	412.3	407.4	412.3	425.0	443.7
140°	576.1	540.9	506.9	477.6	454.0	435.3	423.5	417.7	423.5	435.3	454.0
142.5°	581.7	547.4	514.4	487.0	463.4	446.6	433.9	429.0	433.9	446.6	463.4
145°	587.8	556.1	525.6	498.7	478.7	461.1	450.5	447.1	450.5	461.1	478.7
147.5°	591.6	563.2	535.2	512.3	493.0	477.8	467.5	465.3	467.5	477.8	493.0
150°	592.5	567.8	540.9	519.8	503.3	488.1	478.7	477.6	478.7	488.1	503.3
152.5°	594.4	570.7	547.4	527.3	512.7	499.4	490.0	489.8	490.0	499.4	512.7
155°	594.9	576.1	556.1	539.7	526.8	515.1	508.1	508.1	508.1	515.1	526.8
157.5°	596.0	579.2	563.2	550.5	539.5	529.2	523.5	522.6	523.5	529.2	539.5
160°	596.0	582.0	567.8	556.1	548.0	538.6	533.8	533.8	533.8	538.6	548.0
162.5°	595.1	582.9	570.7	560.9	553.6	546.0	542.3	542.3	542.3	546.0	553.6
165°	592.5	584.3	574.9	566.7	562.0	556.1	553.8	555.0	553.8	556.1	562.0
167.5°	590.7	584.1	577.2	572.1	568.9	564.3	563.2	564.6	563.2	564.3	568.9
170°	587.8	583.1	577.2	574.9	572.6	569.1	567.8	570.3	567.8	569.1	572.6
172.5°	586.9	583.1	578.2	576.8	575.4	572.8	572.6	574.0	572.6	572.8	575.4
175°	584.3	582.0	579.7	578.5	578.5	576.1	577.2	578.5	577.2	576.1	578.5
177.5°	582.4	580.6	579.7	579.7	579.7	578.7	579.7	580.6	579.7	578.7	579.7
180°	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7



TEST NUMBER: P332386-840

CATALOG NUMBER: S123RDIP-S1165D1195U840-4F0-1E-UDD-A4

**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	22.7	24.0	25.4	26.8	26.9	27.3	27.5	28.3	28.6	29.0
90°	12.9	15.2	18.8	22.3	25.9	29.3	28.2	29.3	30.5	31.7	34.0
92.5°	50.5	67.9	98.6	149.1	198.5	180.5	136.1	98.8	78.4	69.2	63.1
95°	106.7	152.5	252.3	427.1	619.6	695.8	564.3	422.4	286.3	224.1	181.9
97.5°	126.7	176.2	271.6	468.6	789.4	1078.2	1153.6	1052.9	843.3	692.1	551.7
100°	140.8	186.5	268.7	442.3	750.9	1111.2	1342.3	1383.3	1288.3	1151.0	984.4
102.5°	156.7	198.7	272.5	419.8	694.6	1050.2	1351.6	1493.2	1490.1	1410.1	1304.4
105°	183.0	219.4	282.8	403.6	625.4	943.3	1280.1	1525.3	1642.6	1665.0	1634.5
107.5°	212.6	246.4	302.1	402.4	581.3	849.0	1154.8	1432.8	1623.4	1726.2	1768.0
110°	232.3	265.2	318.0	407.2	564.3	795.5	1075.9	1344.6	1560.5	1708.4	1790.5



TEST NUMBER: P332386-840

CATALOG NUMBER: S123RDIP-S1165D1195U840-4F0-1E-UDD-A4

**CANDELA DISTRIBUTION (continued):**

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	253.0	284.9	334.0	416.6	555.0	759.8	1007.4	1257.3	1477.9	1643.6	1749.2
115°	284.0	315.6	360.2	431.8	551.5	721.5	924.5	1141.7	1345.7	1518.2	1646.2
117.5°	314.7	344.1	388.1	451.9	553.6	699.0	874.5	1057.8	1234.1	1389.0	1518.7
120°	334.4	363.8	406.0	467.0	557.3	688.7	848.3	1013.7	1172.2	1312.9	1431.5
122.5°	352.2	383.4	424.7	481.1	563.9	682.2	826.7	979.0	1122.4	1252.8	1362.9
125°	379.0	410.6	451.7	503.3	573.7	673.5	799.0	932.8	1060.7	1173.3	1267.2
127.5°	403.8	435.6	475.1	521.7	585.0	669.2	774.7	892.4	1006.4	1108.0	1193.5
130°	418.9	450.5	489.3	533.8	592.5	666.4	761.4	867.1	972.7	1067.7	1147.5
132.5°	432.9	463.7	501.5	545.1	598.1	665.5	749.3	843.6	940.8	1029.3	1105.3
135°	451.7	483.4	519.8	559.7	606.6	664.1	733.4	811.9	895.2	971.5	1038.3
137.5°	468.2	497.5	532.4	570.5	612.3	661.5	719.4	783.0	851.3	917.1	975.0
140°	477.6	506.9	540.9	576.1	616.0	660.6	711.0	766.2	826.0	882.3	932.8
142.5°	487.0	514.4	547.4	581.7	618.8	658.7	703.5	750.2	801.6	850.4	894.3
145°	498.7	525.6	556.1	587.8	620.7	655.9	693.5	730.9	769.7	807.3	841.2
147.5°	512.3	535.2	563.2	591.6	620.7	651.5	683.6	715.3	746.0	776.3	800.4
150°	519.8	540.9	567.8	592.5	620.7	647.6	677.0	704.0	730.9	755.6	777.9
152.5°	527.3	547.4	570.7	594.4	617.8	643.0	669.5	693.7	716.9	738.7	757.3
155°	539.7	556.1	576.1	594.9	614.8	634.8	658.2	678.1	696.9	714.6	728.6
157.5°	550.5	563.2	579.2	596.0	610.9	627.5	645.5	661.8	677.5	691.1	702.1
160°	556.1	567.8	582.0	596.0	608.9	621.9	637.1	652.4	665.3	677.0	685.2
162.5°	560.9	570.7	582.9	595.1	605.2	616.2	628.6	641.1	652.2	662.9	670.1
165°	566.7	574.9	584.3	592.5	599.6	607.7	617.1	626.5	633.6	641.8	647.6
167.5°	572.1	577.2	584.1	590.7	593.9	599.4	606.1	613.9	619.2	624.0	628.2
170°	574.9	577.2	583.1	587.8	590.2	593.7	599.6	605.4	608.9	613.6	616.0
172.5°	576.8	578.2	583.1	586.9	587.3	589.0	593.0	597.9	600.5	604.3	605.6
175°	578.5	579.7	582.0	584.3	583.1	583.1	585.5	587.8	589.0	591.4	591.4
177.5°	579.7	579.7	580.6	582.4	580.6	579.7	580.6	581.5	582.4	583.4	583.4
180°	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7



TEST NUMBER: P332386-840

CATALOG NUMBER: S123RDIP-S1165D1195U840-4F0-1E-UDD-A4

**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°	30.1	29.0	29.3	29.7	29.3	29.0	30.1	29.0	28.6	28.3	27.5
90°	32.8	34.0	35.2	34.0	35.2	34.0	32.8	34.0	31.7	30.5	29.3
92.5°	61.0	57.5	58.7	56.6	58.7	57.5	61.0	63.1	69.2	78.4	98.8
95°	159.6	149.1	140.8	136.1	140.8	149.1	159.6	181.9	224.1	286.3	422.4
97.5°	465.1	412.3	380.6	370.5	380.6	412.3	465.1	551.7	692.1	843.3	1052.9
100°	865.9	780.2	734.5	735.7	734.5	780.2	865.9	984.4	1151.0	1288.3	1383.3
102.5°	1212.2	1144.5	1106.2	1079.2	1106.2	1144.5	1212.2	1304.4	1410.1	1490.1	1493.2
105°	1580.4	1535.9	1498.3	1492.5	1498.3	1535.9	1580.4	1634.5	1665.0	1642.6	1525.3
107.5°	1768.9	1753.8	1741.2	1730.4	1741.2	1753.8	1768.9	1768.0	1726.2	1623.4	1432.8
110°	1823.3	1832.7	1830.4	1828.1	1830.4	1832.7	1823.3	1790.5	1708.4	1560.5	1344.6



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**CANDELA DISTRIBUTION (continued):**

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	1809.3	1838.4	1847.2	1847.8	1847.2	1838.4	1809.3	1749.2	1643.6	1477.9	1257.3
115°	1734.1	1785.7	1809.3	1815.1	1809.3	1785.7	1734.1	1646.2	1518.2	1345.7	1141.7
117.5°	1610.5	1669.6	1703.4	1711.4	1703.4	1669.6	1610.5	1518.7	1389.0	1234.1	1057.8
120°	1524.1	1589.8	1618.0	1625.1	1618.0	1589.8	1524.1	1431.5	1312.9	1172.2	1013.7
122.5°	1445.3	1504.4	1535.4	1544.3	1535.4	1504.4	1445.3	1362.9	1252.8	1122.4	979.0
125°	1342.3	1393.9	1423.2	1431.5	1423.2	1393.9	1342.3	1267.2	1173.3	1060.7	932.8
127.5°	1260.4	1304.4	1331.0	1338.5	1331.0	1304.4	1260.4	1193.5	1108.0	1006.4	892.4
130°	1209.7	1251.9	1276.6	1286.0	1276.6	1251.9	1209.7	1147.5	1067.7	972.7	867.1
132.5°	1163.7	1205.9	1227.8	1234.4	1227.8	1205.9	1163.7	1105.3	1029.3	940.8	843.6
135°	1095.9	1131.0	1152.2	1160.4	1152.2	1131.0	1095.9	1038.3	971.5	895.2	811.9
137.5°	1023.4	1059.0	1076.8	1082.3	1076.8	1059.0	1023.4	975.0	917.1	851.3	783.0
140°	977.3	1010.3	1029.0	1027.8	1029.0	1010.3	977.3	932.8	882.3	826.0	766.2
142.5°	932.3	961.4	978.3	977.1	978.3	961.4	932.3	894.3	850.4	801.6	750.2
145°	870.6	895.2	904.6	907.0	904.6	895.2	870.6	841.2	807.3	769.7	730.9
147.5°	822.7	839.4	848.3	849.2	848.3	839.4	822.7	800.4	776.3	746.0	715.3
150°	795.5	808.4	815.5	815.5	815.5	808.4	795.5	777.9	755.6	730.9	704.0
152.5°	771.1	783.0	787.3	787.3	787.3	783.0	771.1	757.3	738.7	716.9	693.7
155°	739.2	748.6	750.9	752.0	750.9	748.6	739.2	728.6	714.6	696.9	678.1
157.5°	711.2	718.3	720.1	719.9	720.1	718.3	711.2	702.1	691.1	677.5	661.8
160°	693.5	700.4	700.4	699.3	700.4	700.4	693.5	685.2	677.0	665.3	652.4
162.5°	675.6	681.7	681.7	680.5	681.7	681.7	675.6	670.1	662.9	652.2	641.1
165°	652.4	657.0	655.9	655.9	655.9	657.0	652.4	647.6	641.8	633.6	626.5
167.5°	630.3	633.6	632.4	632.4	632.4	633.6	630.3	628.2	624.0	619.2	613.9
170°	617.1	619.6	618.3	618.3	618.3	619.6	617.1	616.0	613.6	608.9	605.4
172.5°	605.9	608.2	606.1	605.2	606.1	608.2	605.9	605.6	604.3	600.5	597.9
175°	591.4	592.5	591.4	590.2	591.4	592.5	591.4	591.4	591.4	589.0	587.8
177.5°	582.4	583.4	581.5	581.5	581.5	583.4	582.4	583.4	583.4	582.4	581.5
180°	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7



TEST NUMBER: P332386-840

CATALOG NUMBER: S123RDIP-S1165D1195U840-4F0-1E-UDD-A4

**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°	27.3	26.9	26.8	25.4	24.0	22.7	20.4	20.5	19.8	21.9	20.8
90°	28.2	29.3	25.9	22.3	18.8	15.2	12.9	10.6	7.1	4.6	2.3
92.5°	136.1	180.5	198.5	149.1	98.6	67.9	50.5	40.6	31.4	21.6	14.5
95°	564.3	695.8	619.6	427.1	252.3	152.5	106.7	76.2	56.4	43.4	39.9
97.5°	1153.6	1078.2	789.4	468.6	271.6	176.2	126.7	96.6	79.3	69.2	68.1
100°	1342.3	1111.2	750.9	442.3	268.7	186.5	140.8	112.6	96.2	88.0	86.8
102.5°	1351.6	1050.2	694.6	419.8	272.5	198.7	156.7	131.4	115.9	108.7	106.5
105°	1280.1	943.3	625.4	403.6	282.8	219.4	183.0	160.8	146.6	139.7	136.1
107.5°	1154.8	849.0	581.3	402.4	302.1	246.4	212.6	191.7	177.8	171.1	167.5
110°	1075.9	795.5	564.3	407.2	318.0	265.2	232.3	212.4	199.4	193.6	190.1



TEST NUMBER: P332386-840

CATALOG NUMBER: S123RDIP-S1165D1195U840-4F0-1E-UDD-A4

**CANDELA DISTRIBUTION (continued):**

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	1007.4	759.8	555.0	416.6	334.0	284.9	253.0	233.0	220.2	214.3	210.8
115°	924.5	721.5	551.5	431.8	360.2	315.6	284.0	264.0	252.3	245.2	240.5
117.5°	874.5	699.0	553.6	451.9	388.1	344.1	314.7	292.4	281.6	275.7	270.3
120°	848.3	688.7	557.3	467.0	406.0	363.8	334.4	312.1	300.3	294.5	290.9
122.5°	826.7	682.2	563.9	481.1	424.7	383.4	352.2	330.8	318.2	312.4	308.8
125°	799.0	673.5	573.7	503.3	451.7	410.6	379.0	356.7	343.8	336.8	334.4
127.5°	774.7	669.2	585.0	521.7	475.1	435.6	403.8	379.2	366.1	357.4	353.9
130°	761.4	666.4	592.5	533.8	489.3	450.5	418.9	394.3	380.1	369.6	366.1
132.5°	749.3	665.5	598.1	545.1	501.5	463.7	432.9	408.3	391.4	379.9	375.5
135°	733.4	664.1	606.6	559.7	519.8	483.4	451.7	427.1	409.5	396.6	391.9
137.5°	719.4	661.5	612.3	570.5	532.4	497.5	468.2	443.7	425.0	412.3	407.4
140°	711.0	660.6	616.0	576.1	540.9	506.9	477.6	454.0	435.3	423.5	417.7
142.5°	703.5	658.7	618.8	581.7	547.4	514.4	487.0	463.4	446.6	433.9	429.0
145°	693.5	655.9	620.7	587.8	556.1	525.6	498.7	478.7	461.1	450.5	447.1
147.5°	683.6	651.5	620.7	591.6	563.2	535.2	512.3	493.0	477.8	467.5	465.3
150°	677.0	647.6	620.7	592.5	567.8	540.9	519.8	503.3	488.1	478.7	477.6
152.5°	669.5	643.0	617.8	594.4	570.7	547.4	527.3	512.7	499.4	490.0	489.8
155°	658.2	634.8	614.8	594.9	576.1	556.1	539.7	526.8	515.1	508.1	508.1
157.5°	645.5	627.5	610.9	596.0	579.2	563.2	550.5	539.5	529.2	523.5	522.6
160°	637.1	621.9	608.9	596.0	582.0	567.8	556.1	548.0	538.6	533.8	533.8
162.5°	628.6	616.2	605.2	595.1	582.9	570.7	560.9	553.6	546.0	542.3	542.3
165°	617.1	607.7	599.6	592.5	584.3	574.9	566.7	562.0	556.1	553.8	555.0
167.5°	606.1	599.4	593.9	590.7	584.1	577.2	572.1	568.9	564.3	563.2	564.6
170°	599.6	593.7	590.2	587.8	583.1	577.2	574.9	572.6	569.1	567.8	570.3
172.5°	593.0	589.0	587.3	586.9	583.1	578.2	576.8	575.4	572.8	572.6	574.0
175°	585.5	583.1	583.1	584.3	582.0	579.7	578.5	578.5	576.1	577.2	578.5
177.5°	580.6	579.7	580.6	582.4	580.6	579.7	579.7	579.7	578.7	579.7	580.6
180°	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7



TEST NUMBER: P332386-840

CATALOG NUMBER: S123RDIP-S1165D1195U840-4F0-1E-UDD-A4

**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°	18.1	14.7	14.8	13.3	13.8	13.2	14.6	14.0	14.1	14.5	13.5
90°	4.6	7.1	10.6	12.9	15.2	18.8	22.3	25.9	29.3	28.2	29.3
92.5°	21.6	31.4	40.6	50.5	67.9	98.6	149.1	198.5	180.5	136.1	98.8
95°	43.4	56.4	76.2	106.7	152.5	252.3	427.1	619.6	695.8	564.3	422.4
97.5°	69.2	79.3	96.6	126.7	176.2	271.6	468.6	789.4	1078.2	1153.6	1052.9
100°	88.0	96.2	112.6	140.8	186.5	268.7	442.3	750.9	1111.2	1342.3	1383.3
102.5°	108.7	115.9	131.4	156.7	198.7	272.5	419.8	694.6	1050.2	1351.6	1493.2
105°	139.7	146.6	160.8	183.0	219.4	282.8	403.6	625.4	943.3	1280.1	1525.3
107.5°	171.1	177.8	191.7	212.6	246.4	302.1	402.4	581.3	849.0	1154.8	1432.8
110°	193.6	199.4	212.4	232.3	265.2	318.0	407.2	564.3	795.5	1075.9	1344.6





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**CANDELA DISTRIBUTION (continued):**

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	214.3	220.2	233.0	253.0	284.9	334.0	416.6	555.0	759.8	1007.4	1257.3
115°	245.2	252.3	264.0	284.0	315.6	360.2	431.8	551.5	721.5	924.5	1141.7
117.5°	275.7	281.6	292.4	314.7	344.1	388.1	451.9	553.6	699.0	874.5	1057.8
120°	294.5	300.3	312.1	334.4	363.8	406.0	467.0	557.3	688.7	848.3	1013.7
122.5°	312.4	318.2	330.8	352.2	383.4	424.7	481.1	563.9	682.2	826.7	979.0
125°	336.8	343.8	356.7	379.0	410.6	451.7	503.3	573.7	673.5	799.0	932.8
127.5°	357.4	366.1	379.2	403.8	435.6	475.1	521.7	585.0	669.2	774.7	892.4
130°	369.6	380.1	394.3	418.9	450.5	489.3	533.8	592.5	666.4	761.4	867.1
132.5°	379.9	391.4	408.3	432.9	463.7	501.5	545.1	598.1	665.5	749.3	843.6
135°	396.6	409.5	427.1	451.7	483.4	519.8	559.7	606.6	664.1	733.4	811.9
137.5°	412.3	425.0	443.7	468.2	497.5	532.4	570.5	612.3	661.5	719.4	783.0
140°	423.5	435.3	454.0	477.6	506.9	540.9	576.1	616.0	660.6	711.0	766.2
142.5°	433.9	446.6	463.4	487.0	514.4	547.4	581.7	618.8	658.7	703.5	750.2
145°	450.5	461.1	478.7	498.7	525.6	556.1	587.8	620.7	655.9	693.5	730.9
147.5°	467.5	477.8	493.0	512.3	535.2	563.2	591.6	620.7	651.5	683.6	715.3
150°	478.7	488.1	503.3	519.8	540.9	567.8	592.5	620.7	647.6	677.0	704.0
152.5°	490.0	499.4	512.7	527.3	547.4	570.7	594.4	617.8	643.0	669.5	693.7
155°	508.1	515.1	526.8	539.7	556.1	576.1	594.9	614.8	634.8	658.2	678.1
157.5°	523.5	529.2	539.5	550.5	563.2	579.2	596.0	610.9	627.5	645.5	661.8
160°	533.8	538.6	548.0	556.1	567.8	582.0	596.0	608.9	621.9	637.1	652.4
162.5°	542.3	546.0	553.6	560.9	570.7	582.9	595.1	605.2	616.2	628.6	641.1
165°	553.8	556.1	562.0	566.7	574.9	584.3	592.5	599.6	607.7	617.1	626.5
167.5°	563.2	564.3	568.9	572.1	577.2	584.1	590.7	593.9	599.4	606.1	613.9
170°	567.8	569.1	572.6	574.9	577.2	583.1	587.8	590.2	593.7	599.6	605.4
172.5°	572.6	572.8	575.4	576.8	578.2	583.1	586.9	587.3	589.0	593.0	597.9
175°	577.2	576.1	578.5	578.5	579.7	582.0	584.3	583.1	583.1	585.5	587.8
177.5°	579.7	578.7	579.7	579.7	579.7	580.6	582.4	580.6	579.7	580.6	581.5
180°	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7	579.7



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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°	13.7	13.9	13.8	13.5	13.1	14.6	13.1
90°	30.5	31.7	34.0	32.8	34.0	35.2	34.0
92.5°	78.4	69.2	63.1	61.0	57.5	58.7	56.6
95°	286.3	224.1	181.9	159.6	149.1	140.8	136.1
97.5°	843.3	692.1	551.7	465.1	412.3	380.6	370.5
100°	1288.3	1151.0	984.4	865.9	780.2	734.5	735.7
102.5°	1490.1	1410.1	1304.4	1212.2	1144.5	1106.2	1079.2
105°	1642.6	1665.0	1634.5	1580.4	1535.9	1498.3	1492.5
107.5°	1623.4	1726.2	1768.0	1768.9	1753.8	1741.2	1730.4
110°	1560.5	1708.4	1790.5	1823.3	1832.7	1830.4	1828.1



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**CANDELA DISTRIBUTION (continued):**

	330°	335°	340°	345°	350°	355°	360°
112.5°	1477.9	1643.6	1749.2	1809.3	1838.4	1847.2	1847.8
115°	1345.7	1518.2	1646.2	1734.1	1785.7	1809.3	1815.1
117.5°	1234.1	1389.0	1518.7	1610.5	1669.6	1703.4	1711.4
120°	1172.2	1312.9	1431.5	1524.1	1589.8	1618.0	1625.1
122.5°	1122.4	1252.8	1362.9	1445.3	1504.4	1535.4	1544.3
125°	1060.7	1173.3	1267.2	1342.3	1393.9	1423.2	1431.5
127.5°	1006.4	1108.0	1193.5	1260.4	1304.4	1331.0	1338.5
130°	972.7	1067.7	1147.5	1209.7	1251.9	1276.6	1286.0
132.5°	940.8	1029.3	1105.3	1163.7	1205.9	1227.8	1234.4
135°	895.2	971.5	1038.3	1095.9	1131.0	1152.2	1160.4
137.5°	851.3	917.1	975.0	1023.4	1059.0	1076.8	1082.3
140°	826.0	882.3	932.8	977.3	1010.3	1029.0	1027.8
142.5°	801.6	850.4	894.3	932.3	961.4	978.3	977.1
145°	769.7	807.3	841.2	870.6	895.2	904.6	907.0
147.5°	746.0	776.3	800.4	822.7	839.4	848.3	849.2
150°	730.9	755.6	777.9	795.5	808.4	815.5	815.5
152.5°	716.9	738.7	757.3	771.1	783.0	787.3	787.3
155°	696.9	714.6	728.6	739.2	748.6	750.9	752.0
157.5°	677.5	691.1	702.1	711.2	718.3	720.1	719.9
160°	665.3	677.0	685.2	693.5	700.4	700.4	699.3
162.5°	652.2	662.9	670.1	675.6	681.7	681.7	680.5
165°	633.6	641.8	647.6	652.4	657.0	655.9	655.9
167.5°	619.2	624.0	628.2	630.3	633.6	632.4	632.4
170°	608.9	613.6	616.0	617.1	619.6	618.3	618.3
172.5°	600.5	604.3	605.6	605.9	608.2	606.1	605.2
175°	589.0	591.4	591.4	591.4	592.5	591.4	590.2
177.5°	582.4	583.4	583.4	582.4	583.4	581.5	581.5
180°	579.7	579.7	579.7	579.7	579.7	579.7	579.7

(END OF REPORT)