

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: P332451-930

Luminaire Tested: **S123RDIW-S1000D460U930-4F0-1E-UDD-A1**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P332451-930
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-S1000D460U930-4F0-1E-UDD-A1
Description: DEFINE 3 DIRECT-INDIRECT WALL MOUNT LED LUMINAIRE
DOWNLIGHT 1000 LUMENS PER FOOT, ASYMMETRIC DIFFUSER, REGRESSED HOUSING
UPLIGHT 460 LUMENS PER FOOT, FLUSH SATIN WHITE DIFFUSER
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4531.6 lumens
Efficiency: N/A
Efficacy: 98.1 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: Semi-Direct

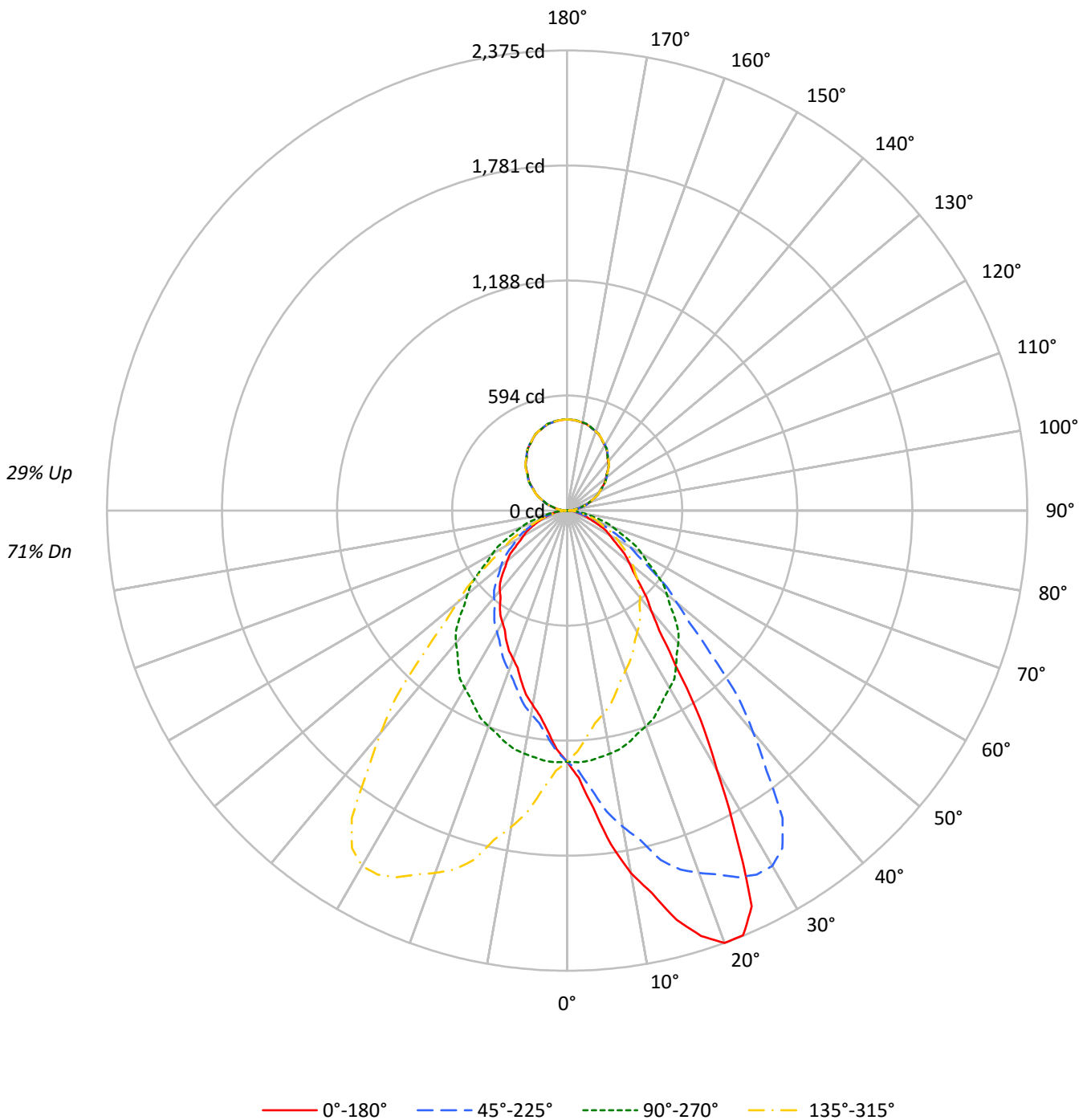
Input Watts (W): 46.2
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	112	112	112	112	106	106	106	106	95	95	95	85	85	85	76	76	76	71
1	103	99	96	92	98	94	91	88	85	82	80	76	74	73	68	67	66	62
2	95	88	82	77	90	83	78	74	75	71	68	68	65	62	61	59	57	53
3	87	78	71	65	82	74	68	63	67	62	58	61	57	53	55	52	49	46
4	80	70	62	56	76	66	59	54	60	55	50	55	50	47	50	46	43	40
5	74	62	54	49	70	60	52	47	54	48	44	50	45	41	45	41	38	35
6	68	56	48	43	65	54	47	41	49	43	39	45	40	36	41	37	34	31
7	64	51	43	38	60	49	42	37	45	39	35	41	36	32	38	34	30	28
8	59	47	39	34	56	45	38	33	41	35	31	38	33	29	35	31	27	25
9	55	43	36	30	53	41	34	30	38	32	28	35	30	26	32	28	25	23
10	52	40	32	28	49	38	31	27	35	30	26	33	28	24	30	26	23	21

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	13951	13951	13951	13951
5°	16630	14011	12337	14011
10°	20764	13930	11146	13930
15°	24373	13788	10165	13788
20°	27202	13575	9330	13575
25°	26766	13351	8817	13351
30°	19240	13144	8289	13144
35°	12846	12875	7947	12875
40°	9465	12552	7593	12552
45°	7939	11985	7247	11985
50°	7005	11241	6764	11241
55°	6142	10393	6101	10393
60°	5470	9580	5591	9580
65°	4806	8706	5201	8706
70°	3770	7928	4749	7928
75°	3323	6924	4338	6924
80°	2889	5883	4265	5883
85°	2322	4730	4520	4730



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	127.5	2.8
10°-20°	398.2	8.8
20°-30°	625.6	13.8
30°-40°	652.7	14.4
40°-50°	558.6	12.3
50°-60°	425.7	9.4
60°-70°	272.9	6.0
70°-80°	131.3	2.9
80°-90°	36.1	0.8
90°-100°	30.6	0.7
100°-110°	91.7	2.0
110°-120°	156.0	3.4
120°-130°	205.2	4.5
130°-140°	230.6	5.1
140°-150°	226.7	5.0
150°-160°	190.8	4.2
160°-170°	127.0	2.8
170°-180°	44.5	1.0
0°-30°	1151.2	25.4
0°-40°	1803.9	39.8
0°-60°	2788.2	61.5
0°-90°	3228.5	71.2
90°-120°	278.3	6.1
90°-150°	940.8	20.8
90°-180°	1303.0	28.8
0°-180°	4531.6	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	1296	1296	1296	1296	1296	
5°	1539	1297	1142	1297	1539	159
15°	2187	1237	912	1237	2187	620
25°	2254	1124	742	1124	2254	969
35°	978	980	605	980	978	641
45°	522	787	476	787	522	410
55°	327	554	325	554	327	296
65°	189	342	204	342	189	186
75°	80	166	104	166	80	86
85°	19	38	37	38	19	22
90°	11	0	11	0	11	6
95°	29	22	29	22	29	30
105°	88	83	88	83	88	93
115°	157	157	157	157	157	156
125°	227	230	227	230	227	203
135°	298	298	298	298	298	229
145°	362	362	362	362	362	226
155°	413	414	413	414	413	190
165°	450	451	450	451	450	127
175°	467	469	467	469	467	44
180°	470	470	470	470	470	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1
2.5°	1380.5	1382.2	1376.5	1375.6	1368.9	1367.1	1367.1	1357.8	1352.0	1344.5	1340.0
5°	1539.1	1548.0	1543.5	1533.6	1516.9	1513.0	1502.5	1485.9	1467.0	1443.7	1432.6
7.5°	1737.3	1749.4	1744.7	1729.3	1711.9	1697.8	1668.1	1640.5	1601.7	1567.7	1538.7
10°	1899.7	1887.0	1877.0	1862.1	1845.9	1819.8	1788.8	1746.0	1696.7	1657.8	1614.6
12.5°	2021.4	2019.3	2006.6	1991.2	1968.5	1943.7	1905.5	1853.5	1796.1	1740.0	1690.4
15°	2187.2	2190.5	2182.1	2166.1	2133.9	2090.1	2032.4	2010.8	1928.6	1867.6	1806.5
17.5°	2301.9	2301.3	2300.1	2277.9	2245.0	2213.8	2160.3	2103.4	2029.0	1943.0	1860.8
20°	2374.7	2369.2	2370.2	2345.3	2320.9	2284.8	2232.7	2150.0	2089.0	1989.7	1904.8
22.5°	2372.9	2371.8	2376.0	2367.5	2349.8	2322.1	2281.0	2211.3	2133.3	2033.1	1937.6
25°	2253.7	2249.3	2275.4	2282.6	2310.9	2315.9	2303.7	2265.4	2191.6	2088.4	1970.3
27.5°	1886.2	1883.7	1932.2	1992.8	2069.6	2129.2	2187.0	2214.8	2191.6	2117.7	1999.3
30°	1548.0	1600.2	1624.6	1712.2	1809.9	1926.4	2028.5	2125.6	2149.5	2117.3	2020.1
32.5°	1285.2	1330.7	1351.1	1426.4	1517.4	1653.8	1807.0	1944.5	2041.6	2066.2	2007.8
35°	977.6	978.2	1024.7	1058.1	1142.4	1282.8	1431.5	1615.7	1798.8	1937.5	1951.9
37.5°	780.1	782.9	811.1	844.2	907.5	981.7	1112.6	1265.8	1477.3	1690.3	1815.1
40°	673.6	678.6	699.7	732.4	777.9	833.9	936.0	1080.3	1256.7	1493.6	1687.3
42.5°	605.2	613.3	624.2	649.4	677.6	730.0	812.6	924.1	1084.5	1308.6	1531.9
45°	521.5	525.9	534.3	545.9	571.4	608.1	663.6	738.5	871.6	1052.0	1275.5
47.5°	460.1	457.7	466.5	476.0	492.9	517.9	555.1	616.2	711.2	855.9	1045.5
50°	418.3	417.8	423.9	431.1	447.2	465.5	496.0	542.1	617.5	737.4	911.0
52.5°	379.3	381.4	385.7	394.7	406.3	421.1	448.5	481.7	546.5	650.0	794.8
55°	327.3	329.1	335.1	340.1	348.5	363.4	380.6	408.4	452.7	524.9	644.2
57.5°	283.4	282.7	288.5	289.8	299.1	311.4	324.7	346.3	378.4	432.0	512.3
60°	254.1	252.4	257.5	261.3	266.4	276.3	287.4	308.5	334.0	373.4	442.2
62.5°	227.5	226.7	230.4	234.2	238.4	247.4	256.8	273.0	293.2	326.4	381.0
65°	188.7	190.3	192.0	193.6	195.8	201.4	210.3	221.4	235.2	258.5	297.9
67.5°	148.2	149.9	150.5	153.9	158.7	162.2	167.5	177.4	187.1	206.8	229.2
70°	119.8	119.3	119.8	121.5	127.6	133.7	141.0	148.1	154.3	168.1	186.9
72.5°	103.0	102.0	103.5	103.8	106.7	108.4	113.0	119.8	127.6	137.1	150.6
75°	79.9	79.9	79.9	79.9	82.1	83.2	84.9	86.6	89.4	93.8	103.8
77.5°	59.0	59.1	59.9	60.5	60.9	61.6	62.6	64.2	65.2	67.6	71.9
80°	46.6	47.1	46.6	47.1	47.1	48.3	48.8	50.5	51.0	53.8	55.5
82.5°	35.1	34.7	35.1	35.6	35.6	36.8	36.9	38.1	38.2	39.6	41.3
85°	18.8	17.8	18.8	18.3	19.4	18.3	18.8	20.0	20.0	20.5	22.7
87.5°	6.7	7.5	6.6	7.0	6.9	7.3	7.3	7.3	8.1	7.6	7.7
90°	11.1	10.9	10.8	10.6	10.4	10.2	9.9	9.5	9.2	8.9	7.8
92.5°	14.9	15.0	15.1	15.2	15.3	15.2	15.0	14.7	14.4	14.2	13.6
95°	28.8	28.8	28.8	28.8	28.8	28.6	28.3	28.0	27.6	27.3	26.7
97.5°	44.4	44.4	44.4	44.4	44.4	44.3	43.9	43.5	43.1	42.8	42.3
100°	56.2	56.0	55.8	55.7	55.5	55.3	55.0	54.8	54.5	54.3	53.9
102.5°	68.2	68.3	68.3	68.4	68.4	68.3	68.1	67.8	67.6	67.3	66.8
105°	88.0	87.8	87.6	87.5	87.2	87.2	87.2	87.2	87.2	87.2	86.4
107.5°	108.4	108.5	108.6	108.7	108.8	108.7	108.4	108.2	107.9	107.7	107.4
110°	122.3	122.5	122.6	122.8	122.9	122.9	122.5	122.2	121.9	121.6	121.4



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	137.1	137.1	137.1	137.1	137.2	137.1	136.6	136.2	135.8	135.4	135.4
115°	157.4	157.5	157.6	157.7	157.8	157.8	157.7	157.6	157.5	157.4	157.6
117.5°	178.0	178.2	178.5	178.7	179.0	179.0	179.0	179.1	179.1	179.1	179.4
120°	192.5	192.7	192.8	193.0	193.1	193.3	193.4	193.5	193.6	193.6	194.0
122.5°	206.4	206.6	206.8	207.1	207.3	207.5	207.7	208.0	208.1	208.4	208.6
125°	227.2	227.6	227.9	228.2	228.5	228.9	229.2	229.5	229.8	230.2	230.3
127.5°	248.0	248.3	248.7	249.2	249.5	249.9	250.4	250.9	251.3	251.8	251.9
130°	261.5	262.2	262.8	263.3	263.9	264.3	264.6	265.0	265.3	265.6	265.9
132.5°	275.7	276.2	276.6	277.1	277.5	277.9	278.3	278.8	279.2	279.6	279.7
135°	297.8	298.0	298.2	298.3	298.5	298.7	299.1	299.4	299.7	300.0	300.1
137.5°	317.2	317.6	317.9	318.1	318.5	318.8	319.2	319.5	319.8	320.2	320.0
140°	330.0	330.5	331.1	331.7	332.2	332.6	332.6	332.7	332.8	332.9	332.8
142.5°	342.9	343.4	343.8	344.3	344.7	345.0	345.0	345.1	345.2	345.3	345.2
145°	361.7	362.1	362.4	362.7	363.1	363.2	363.3	363.4	363.5	363.5	363.3
147.5°	378.4	378.9	379.4	379.9	380.4	380.7	380.7	380.7	380.7	380.7	380.4
150°	389.1	389.6	390.0	390.5	391.0	391.3	391.3	391.3	391.3	391.3	391.1
152.5°	399.4	399.8	400.2	400.7	401.1	401.3	401.1	401.0	400.9	400.7	400.6
155°	413.4	414.0	414.6	415.2	415.7	415.9	415.6	415.2	414.9	414.6	414.5
157.5°	426.2	426.6	427.1	427.6	428.0	428.1	427.8	427.5	427.1	426.7	426.6
160°	434.5	434.8	435.1	435.5	435.8	435.8	435.4	435.0	434.6	434.1	434.1
162.5°	440.7	441.2	441.7	442.3	442.8	442.9	442.5	442.1	441.6	441.2	441.2
165°	449.6	450.2	450.8	451.3	451.9	452.0	451.5	451.0	450.5	450.0	450.0
167.5°	457.2	457.8	458.3	458.8	459.3	459.3	458.8	458.3	457.8	457.2	457.2
170°	461.1	461.7	462.3	462.8	463.4	463.4	462.8	462.3	461.7	461.1	461.1
172.5°	464.1	464.6	465.2	465.8	466.4	466.4	465.9	465.4	464.9	464.3	464.3
175°	467.4	468.0	468.6	469.1	469.7	469.7	469.2	468.7	468.2	467.7	467.7
177.5°	469.1	469.6	470.1	470.5	471.0	471.0	470.7	470.3	469.9	469.4	469.4
180°	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1
2.5°	1338.2	1336.9	1330.7	1323.6	1314.3	1308.1	1303.2	1300.6	1292.6	1282.8	1276.1
5°	1420.9	1404.3	1386.6	1364.9	1344.9	1324.4	1311.7	1296.7	1278.3	1257.8	1243.4
7.5°	1509.5	1476.8	1441.7	1405.4	1369.5	1337.4	1309.0	1284.7	1255.5	1226.0	1205.4
10°	1577.4	1529.7	1480.3	1429.8	1383.7	1340.5	1307.2	1274.5	1239.5	1205.7	1180.1
12.5°	1639.1	1576.3	1519.4	1457.3	1398.4	1346.7	1298.8	1260.3	1218.2	1182.1	1153.1
15°	1717.2	1652.9	1584.0	1489.7	1411.5	1346.1	1287.8	1237.3	1186.3	1141.8	1113.5
17.5°	1790.2	1693.4	1600.9	1522.2	1420.6	1338.8	1267.7	1207.3	1151.3	1104.2	1069.4
20°	1820.4	1726.6	1626.2	1525.8	1426.0	1334.4	1251.7	1185.1	1126.9	1073.6	1041.5
22.5°	1838.6	1732.4	1626.7	1518.7	1412.6	1317.5	1235.7	1162.5	1099.3	1048.7	1009.0
25°	1859.8	1733.3	1616.8	1510.3	1402.1	1298.9	1201.8	1124.1	1055.9	1002.0	959.9
27.5°	1873.8	1725.0	1587.3	1468.8	1359.1	1256.4	1167.3	1085.0	1015.8	958.9	913.6
30°	1876.5	1718.3	1564.6	1436.5	1324.9	1230.6	1136.3	1057.5	984.3	923.8	881.7
32.5°	1880.0	1701.9	1534.0	1397.8	1283.7	1190.3	1104.8	1029.6	954.6	895.0	851.9
35°	1865.4	1692.8	1487.5	1331.1	1216.8	1126.3	1049.2	979.8	906.0	848.3	804.5
37.5°	1802.3	1656.8	1439.3	1255.8	1136.3	1052.6	989.7	929.3	861.5	799.3	758.0
40°	1738.9	1621.2	1402.1	1210.1	1085.2	999.2	942.6	893.3	827.9	769.6	725.2
42.5°	1644.3	1572.9	1366.6	1162.1	1027.5	944.7	896.9	850.7	793.2	734.0	692.4
45°	1470.9	1480.3	1293.9	1085.8	947.6	864.5	819.5	787.3	736.3	687.5	644.7
47.5°	1253.4	1341.6	1208.5	1004.4	863.4	785.3	746.0	718.0	683.5	635.6	596.6
50°	1111.3	1237.3	1140.2	949.9	810.7	733.0	694.1	671.3	641.4	603.6	566.5
52.5°	980.4	1115.7	1057.6	889.1	753.3	682.3	644.4	625.7	601.9	566.4	532.7
55°	799.5	936.5	923.2	797.3	667.5	603.6	574.8	553.8	537.6	511.0	484.4
57.5°	646.7	776.7	783.5	695.2	591.8	528.7	503.9	488.0	477.5	457.4	432.8
60°	550.4	669.7	693.0	626.4	537.6	482.2	457.7	445.0	436.7	420.5	401.7
62.5°	470.5	572.0	598.4	550.5	485.7	433.7	414.7	402.4	396.7	382.9	366.2
65°	360.1	444.4	469.9	443.3	409.4	367.9	352.3	341.8	336.8	329.1	316.8
67.5°	270.8	332.2	360.2	341.4	329.2	303.0	293.1	287.4	283.0	277.6	267.4
70°	217.5	263.0	291.9	286.8	276.9	263.0	255.8	251.9	247.4	243.0	234.2
72.5°	174.9	206.2	233.3	235.8	227.6	224.9	218.5	216.9	214.2	208.9	204.0
75°	115.9	137.6	156.5	163.7	167.0	169.7	167.0	166.5	165.9	161.4	158.7
77.5°	76.0	87.6	99.5	111.9	117.1	120.8	121.7	123.8	122.3	119.9	118.6
80°	58.3	61.1	69.4	79.9	88.2	91.6	93.8	94.9	94.3	93.8	91.6
82.5°	42.3	44.6	48.5	55.9	62.9	68.5	69.8	69.5	70.8	71.1	69.4
85°	22.7	23.3	24.4	25.5	29.4	35.5	37.2	38.3	39.4	39.4	36.0
87.5°	8.5	7.8	8.5	8.3	9.5	9.7	12.2	14.3	14.9	13.3	13.5
90°	6.8	5.6	4.6	3.7	2.9	2.0	1.2	0.4	1.2	2.0	2.9
92.5°	13.0	12.4	11.7	11.2	10.6	10.0	9.5	9.0	9.5	10.0	10.6
95°	26.0	25.4	24.7	24.1	23.6	22.9	22.3	21.8	22.3	22.9	23.6
97.5°	41.8	41.3	40.8	40.4	40.0	39.5	39.1	38.7	39.1	39.5	40.0
100°	53.5	53.1	52.7	52.2	51.7	51.2	50.7	50.2	50.7	51.2	51.7
102.5°	66.2	65.7	65.1	64.7	64.4	64.2	63.8	63.5	63.8	64.2	64.4
105°	85.7	85.0	84.2	83.8	83.6	83.5	83.3	83.2	83.3	83.5	83.6
107.5°	107.0	106.8	106.5	106.3	106.2	106.1	106.0	105.9	106.0	106.1	106.2
110°	121.2	121.1	120.9	120.7	120.6	120.4	120.3	120.1	120.3	120.4	120.6



TEST NUMBER: P332451-930

CATALOG NUMBER: S123RDIW-S1000D460U930-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	135.4	135.3	135.3	135.3	135.2	135.1	134.9	134.9	134.9	135.1	135.2
115°	157.8	157.9	158.1	158.0	157.8	157.5	157.3	157.0	157.3	157.5	157.8
117.5°	179.5	179.8	179.9	180.0	179.9	179.7	179.5	179.4	179.5	179.7	179.9
120°	194.4	194.9	195.3	195.2	194.7	194.2	193.7	193.2	193.7	194.2	194.7
122.5°	208.8	209.0	209.2	209.1	208.8	208.5	208.1	207.7	208.1	208.5	208.8
125°	230.5	230.6	230.8	230.8	230.6	230.3	230.1	229.8	230.1	230.3	230.6
127.5°	252.1	252.3	252.5	252.3	251.8	251.3	250.7	250.2	250.7	251.3	251.8
130°	266.1	266.4	266.6	266.4	265.8	265.1	264.5	263.8	264.5	265.1	265.8
132.5°	279.9	280.1	280.3	280.1	279.4	278.8	278.0	277.4	278.0	278.8	279.4
135°	300.2	300.3	300.4	300.1	299.6	299.1	298.6	298.2	298.6	299.1	299.6
137.5°	319.8	319.5	319.4	319.0	318.6	318.2	317.8	317.4	317.8	318.2	318.6
140°	332.7	332.6	332.6	332.3	331.9	331.5	331.1	330.7	331.1	331.5	331.9
142.5°	345.0	344.9	344.7	344.5	344.1	343.6	343.2	342.8	343.2	343.6	344.1
145°	363.1	362.8	362.6	362.4	362.2	362.1	361.9	361.7	361.9	362.1	362.2
147.5°	380.2	379.9	379.7	379.4	379.1	378.9	378.5	378.3	378.5	378.9	379.1
150°	390.9	390.8	390.6	390.4	390.3	390.1	390.0	389.8	390.0	390.1	390.3
152.5°	400.6	400.4	400.3	400.1	399.9	399.7	399.5	399.3	399.5	399.7	399.9
155°	414.4	414.3	414.3	414.2	414.2	414.2	414.2	414.2	414.2	414.2	414.2
157.5°	426.6	426.6	426.5	426.5	426.6	426.7	426.8	426.9	426.8	426.7	426.6
160°	434.1	434.1	434.1	434.2	434.4	434.6	434.7	434.9	434.7	434.6	434.4
162.5°	441.1	441.0	441.0	441.1	441.2	441.5	441.7	442.0	441.7	441.5	441.2
165°	450.0	450.0	450.0	450.1	450.4	450.6	450.9	451.1	450.9	450.6	450.4
167.5°	457.1	457.1	457.0	457.1	457.5	457.8	458.1	458.4	458.1	457.8	457.5
170°	461.1	461.1	461.1	461.3	461.6	461.9	462.3	462.6	462.3	461.9	461.6
172.5°	464.3	464.3	464.3	464.5	464.9	465.2	465.5	465.9	465.5	465.2	464.9
175°	467.7	467.7	467.7	467.9	468.2	468.6	468.9	469.2	468.9	468.6	468.2
177.5°	469.4	469.4	469.4	469.6	469.9	470.1	470.3	470.7	470.3	470.1	469.9
180°	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3



TEST NUMBER: P332451-930

CATALOG NUMBER: S123RDIW-S1000D460U930-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1
2.5°	1273.9	1268.1	1264.1	1255.2	1249.5	1243.2	1237.1	1241.0	1240.6	1240.2	1240.2
5°	1231.2	1218.4	1206.8	1191.8	1182.3	1170.7	1161.8	1160.7	1162.9	1155.2	1150.7
7.5°	1188.8	1171.3	1154.9	1138.3	1120.8	1106.8	1098.0	1093.9	1088.3	1083.5	1078.5
10°	1159.0	1138.6	1122.4	1101.9	1083.0	1066.4	1055.9	1048.6	1044.7	1040.9	1033.6
12.5°	1128.5	1108.3	1087.9	1064.6	1046.7	1027.4	1019.5	1011.4	1004.0	999.6	989.7
15°	1083.6	1057.5	1035.9	1011.5	991.5	972.7	961.6	945.4	943.2	937.7	927.7
17.5°	1038.7	1010.3	980.5	962.5	939.9	920.2	903.4	898.0	882.1	876.1	867.4
20°	1003.1	977.1	954.3	930.5	897.7	879.4	866.1	858.9	846.1	838.4	832.8
22.5°	972.5	946.0	919.7	891.9	864.9	844.3	834.6	823.4	816.4	805.5	799.5
25°	928.8	899.9	868.3	838.4	819.0	803.4	787.9	777.9	767.9	762.9	751.8
27.5°	878.0	847.8	818.2	795.5	771.7	756.4	742.2	733.4	721.4	713.0	706.9
30°	850.0	814.5	789.0	768.4	737.9	723.5	713.0	701.9	693.0	684.1	678.0
32.5°	817.6	785.2	761.0	735.6	712.2	696.4	682.8	673.0	665.4	657.0	650.9
35°	766.8	739.6	714.6	689.1	671.9	655.8	639.8	631.4	624.2	616.4	610.9
37.5°	720.8	695.5	671.7	647.5	626.1	613.1	600.1	593.8	584.0	578.8	573.2
40°	692.4	667.5	642.0	618.6	596.5	586.4	574.8	565.4	556.5	552.6	546.5
42.5°	661.4	636.4	614.9	589.8	571.6	558.1	547.3	537.0	530.4	524.6	521.2
45°	615.3	593.1	572.0	547.1	529.9	518.2	506.0	496.6	490.5	486.6	480.5
47.5°	570.6	548.4	527.0	505.2	488.6	475.2	463.1	456.5	448.4	443.7	439.5
50°	538.2	518.2	495.5	475.5	458.9	445.6	435.5	427.2	420.0	413.9	411.2
52.5°	508.4	487.1	467.5	448.9	431.3	416.2	407.2	398.4	393.0	386.0	382.7
55°	459.4	438.9	422.2	403.9	386.7	374.0	362.9	355.1	349.5	341.8	337.4
57.5°	413.4	394.9	375.0	359.2	341.4	330.7	321.5	311.0	304.2	298.1	293.8
60°	382.3	361.2	344.0	329.1	313.5	299.6	291.3	283.0	275.7	269.6	265.8
62.5°	349.8	331.5	315.1	298.8	284.6	272.6	262.9	255.9	249.6	245.6	241.8
65°	300.2	285.8	269.1	255.8	242.5	233.6	225.8	219.7	215.2	212.5	209.2
67.5°	254.5	240.4	225.9	212.9	204.0	197.2	192.1	186.9	184.7	181.1	178.9
70°	224.7	210.3	197.5	187.5	178.6	173.7	170.3	166.5	164.2	159.8	157.6
72.5°	192.3	181.9	172.7	164.4	157.4	152.8	148.5	143.8	140.2	135.3	133.1
75°	151.5	142.0	134.9	129.3	124.8	118.7	112.6	107.6	106.0	104.3	103.8
77.5°	112.2	106.2	101.0	96.3	90.7	86.3	85.0	83.9	83.6	82.7	82.7
80°	88.2	82.7	78.8	73.2	69.9	69.9	69.9	68.8	69.4	69.4	69.4
82.5°	65.6	60.5	58.4	56.3	55.7	56.2	56.2	56.3	56.0	56.9	56.5
85°	33.8	34.4	35.5	35.0	35.5	35.5	36.6	36.0	36.6	35.5	36.6
87.5°	13.1	14.7	15.3	16.0	16.6	16.4	17.0	17.0	17.5	17.6	17.6
90°	3.7	4.6	5.6	6.8	7.8	8.9	9.2	9.5	9.9	10.2	10.4
92.5°	11.2	11.7	12.4	13.0	13.6	14.2	14.4	14.7	15.0	15.2	15.3
95°	24.1	24.7	25.4	26.0	26.7	27.3	27.6	28.0	28.3	28.6	28.8
97.5°	40.4	40.8	41.3	41.8	42.3	42.8	43.1	43.5	43.9	44.3	44.4
100°	52.2	52.7	53.1	53.5	53.9	54.3	54.5	54.8	55.0	55.3	55.5
102.5°	64.7	65.1	65.7	66.2	66.8	67.3	67.6	67.8	68.1	68.3	68.4
105°	83.8	84.2	85.0	85.7	86.4	87.2	87.2	87.2	87.2	87.2	87.2
107.5°	106.3	106.5	106.8	107.0	107.4	107.7	107.9	108.2	108.4	108.7	108.8
110°	120.7	120.9	121.1	121.2	121.4	121.6	121.9	122.2	122.5	122.9	122.9



TEST NUMBER: P332451-930

CATALOG NUMBER: S123RDIW-S1000D460U930-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	135.3	135.3	135.3	135.4	135.4	135.4	135.8	136.2	136.6	137.1	137.2
115°	158.0	158.1	157.9	157.8	157.6	157.4	157.5	157.6	157.7	157.8	157.8
117.5°	180.0	179.9	179.8	179.5	179.4	179.1	179.1	179.1	179.0	179.0	179.0
120°	195.2	195.3	194.9	194.4	194.0	193.6	193.6	193.5	193.4	193.3	193.1
122.5°	209.1	209.2	209.0	208.8	208.6	208.4	208.1	208.0	207.7	207.5	207.3
125°	230.8	230.8	230.6	230.5	230.3	230.2	229.8	229.5	229.2	228.9	228.5
127.5°	252.3	252.5	252.3	252.1	251.9	251.8	251.3	250.9	250.4	249.9	249.5
130°	266.4	266.6	266.4	266.1	265.9	265.6	265.3	265.0	264.6	264.3	263.9
132.5°	280.1	280.3	280.1	279.9	279.7	279.6	279.2	278.8	278.3	277.9	277.5
135°	300.1	300.4	300.3	300.2	300.1	300.0	299.7	299.4	299.1	298.7	298.5
137.5°	319.0	319.4	319.5	319.8	320.0	320.2	319.8	319.5	319.2	318.8	318.5
140°	332.3	332.6	332.6	332.7	332.8	332.9	332.8	332.7	332.6	332.6	332.2
142.5°	344.5	344.7	344.9	345.0	345.2	345.3	345.2	345.1	345.0	345.0	344.7
145°	362.4	362.6	362.8	363.1	363.3	363.5	363.5	363.4	363.3	363.2	363.1
147.5°	379.4	379.7	379.9	380.2	380.4	380.7	380.7	380.7	380.7	380.7	380.4
150°	390.4	390.6	390.8	390.9	391.1	391.3	391.3	391.3	391.3	391.3	391.0
152.5°	400.1	400.3	400.4	400.6	400.6	400.7	400.9	401.0	401.1	401.3	401.1
155°	414.2	414.3	414.3	414.4	414.5	414.6	414.9	415.2	415.6	415.9	415.7
157.5°	426.5	426.5	426.6	426.6	426.6	426.7	427.1	427.5	427.8	428.1	428.0
160°	434.2	434.1	434.1	434.1	434.1	434.1	434.6	435.0	435.4	435.8	435.8
162.5°	441.1	441.0	441.0	441.1	441.2	441.2	441.6	442.1	442.5	442.9	442.8
165°	450.1	450.0	450.0	450.0	450.0	450.0	450.5	451.0	451.5	452.0	451.9
167.5°	457.1	457.0	457.1	457.1	457.2	457.2	457.8	458.3	458.8	459.3	459.3
170°	461.3	461.1	461.1	461.1	461.1	461.1	461.7	462.3	462.8	463.4	463.4
172.5°	464.5	464.3	464.3	464.3	464.3	464.3	464.9	465.4	465.9	466.4	466.4
175°	467.9	467.7	467.7	467.7	467.7	467.7	468.2	468.7	469.2	469.7	469.7
177.5°	469.6	469.4	469.4	469.4	469.4	469.4	469.9	470.3	470.7	471.0	471.0
180°	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3



TEST NUMBER: P332451-930

CATALOG NUMBER: S123RDIW-S1000D460U930-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
0°	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1
2.5°	1234.9	1234.4	1234.9	1233.1	1234.9	1234.4	1234.9	1240.2	1240.2	1240.6	1241.0
5°	1149.1	1148.5	1146.9	1141.8	1146.9	1148.5	1149.1	1150.7	1155.2	1162.9	1160.7
7.5°	1074.2	1073.4	1068.5	1068.6	1068.5	1073.4	1074.2	1078.5	1083.5	1088.3	1093.9
10°	1029.8	1030.3	1023.7	1019.8	1023.7	1030.3	1029.8	1033.6	1040.9	1044.7	1048.6
12.5°	986.8	984.1	978.8	974.5	978.8	984.1	986.8	989.7	999.6	1004.0	1011.4
15°	929.9	924.4	911.0	912.2	911.0	924.4	929.9	927.7	937.7	943.2	945.4
17.5°	863.0	858.9	858.7	850.9	858.7	858.9	863.0	867.4	876.1	882.1	898.0
20°	823.9	821.2	822.2	814.5	822.2	821.2	823.9	832.8	838.4	846.1	858.9
22.5°	793.3	790.5	785.9	783.4	785.9	790.5	793.3	799.5	805.5	816.4	823.4
25°	748.4	744.0	739.6	742.4	739.6	744.0	748.4	751.8	762.9	767.9	777.9
27.5°	703.7	700.3	695.9	695.3	695.9	700.3	703.7	706.9	713.0	721.4	733.4
30°	675.2	671.9	669.7	666.9	669.7	671.9	675.2	678.0	684.1	693.0	701.9
32.5°	646.4	645.7	641.7	641.2	641.7	645.7	646.4	650.9	657.0	665.4	673.0
35°	608.6	605.4	604.2	604.8	604.2	605.4	608.6	610.9	616.4	624.2	631.4
37.5°	572.8	568.3	566.4	564.4	566.4	568.3	572.8	573.2	578.8	584.0	593.8
40°	547.1	542.7	541.5	540.4	541.5	542.7	547.1	546.5	552.6	556.5	565.4
42.5°	518.2	516.4	515.8	513.8	515.8	516.4	518.2	521.2	524.6	530.4	537.0
45°	478.8	478.3	474.9	476.1	474.9	478.3	478.8	480.5	486.6	490.5	496.6
47.5°	437.3	434.9	432.5	434.1	432.5	434.9	437.3	439.5	443.7	448.4	456.5
50°	409.0	407.8	402.8	403.9	402.8	407.8	409.0	411.2	413.9	420.0	427.2
52.5°	380.5	376.3	374.4	373.7	374.4	376.3	380.5	382.7	386.0	393.0	398.4
55°	333.5	328.5	326.3	325.1	326.3	328.5	333.5	337.4	341.8	349.5	355.1
57.5°	287.3	285.9	284.2	285.4	284.2	285.9	287.3	293.8	298.1	304.2	311.0
60°	260.2	260.2	260.2	259.7	260.2	260.2	260.2	265.8	269.6	275.7	283.0
62.5°	239.4	238.0	237.6	238.4	237.6	238.0	239.4	241.8	245.6	249.6	255.9
65°	207.5	206.9	204.7	204.2	204.7	206.9	207.5	209.2	212.5	215.2	219.7
67.5°	177.4	175.5	174.8	174.0	174.8	175.5	177.4	178.9	181.1	184.7	186.9
70°	154.8	153.7	150.3	150.9	150.3	153.7	154.8	157.6	159.8	164.2	166.5
72.5°	130.4	129.3	128.6	127.8	128.6	129.3	130.4	133.1	135.3	140.2	143.8
75°	103.2	102.6	102.1	104.3	102.1	102.6	103.2	103.8	104.3	106.0	107.6
77.5°	82.7	82.7	83.0	82.1	83.0	82.7	82.7	82.7	82.7	83.6	83.9
80°	69.4	69.4	68.8	68.8	68.8	69.4	69.4	69.4	69.4	69.4	68.8
82.5°	55.6	56.0	56.3	55.5	56.3	56.0	55.6	56.5	56.9	56.0	56.3
85°	36.6	36.0	37.2	36.6	37.2	36.0	36.6	36.6	35.5	36.6	36.0
87.5°	18.5	17.7	17.7	18.2	17.7	17.7	18.5	17.6	17.6	17.5	17.0
90°	10.6	10.8	10.9	11.1	10.9	10.8	10.6	10.4	10.2	9.9	9.5
92.5°	15.2	15.1	15.0	14.9	15.0	15.1	15.2	15.3	15.2	15.0	14.7
95°	28.8	28.8	28.8	28.8	28.8	28.8	28.8	28.8	28.6	28.3	28.0
97.5°	44.4	44.4	44.4	44.4	44.4	44.4	44.4	44.4	44.3	43.9	43.5
100°	55.7	55.8	56.0	56.2	56.0	55.8	55.7	55.5	55.3	55.0	54.8
102.5°	68.4	68.3	68.3	68.2	68.3	68.3	68.4	68.4	68.3	68.1	67.8
105°	87.5	87.6	87.8	88.0	87.8	87.6	87.5	87.2	87.2	87.2	87.2
107.5°	108.7	108.6	108.5	108.4	108.5	108.6	108.7	108.8	108.7	108.4	108.2
110°	122.8	122.6	122.5	122.3	122.5	122.6	122.8	122.9	122.9	122.5	122.2



TEST NUMBER: P332451-930

CATALOG NUMBER: S123RDIW-S1000D460U930-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	137.1	137.1	137.1	137.1	137.1	137.1	137.1	137.2	137.1	136.6	136.2
115°	157.7	157.6	157.5	157.4	157.5	157.6	157.7	157.8	157.8	157.7	157.6
117.5°	178.7	178.5	178.2	178.0	178.2	178.5	178.7	179.0	179.0	179.0	179.1
120°	193.0	192.8	192.7	192.5	192.7	192.8	193.0	193.1	193.3	193.4	193.5
122.5°	207.1	206.8	206.6	206.4	206.6	206.8	207.1	207.3	207.5	207.7	208.0
125°	228.2	227.9	227.6	227.2	227.6	227.9	228.2	228.5	228.9	229.2	229.5
127.5°	249.2	248.7	248.3	248.0	248.3	248.7	249.2	249.5	249.9	250.4	250.9
130°	263.3	262.8	262.2	261.5	262.2	262.8	263.3	263.9	264.3	264.6	265.0
132.5°	277.1	276.6	276.2	275.7	276.2	276.6	277.1	277.5	277.9	278.3	278.8
135°	298.3	298.2	298.0	297.8	298.0	298.2	298.3	298.5	298.7	299.1	299.4
137.5°	318.1	317.9	317.6	317.2	317.6	317.9	318.1	318.5	318.8	319.2	319.5
140°	331.7	331.1	330.5	330.0	330.5	331.1	331.7	332.2	332.6	332.6	332.7
142.5°	344.3	343.8	343.4	342.9	343.4	343.8	344.3	344.7	345.0	345.0	345.1
145°	362.7	362.4	362.1	361.7	362.1	362.4	362.7	363.1	363.2	363.3	363.4
147.5°	379.9	379.4	378.9	378.4	378.9	379.4	379.9	380.4	380.7	380.7	380.7
150°	390.5	390.0	389.6	389.1	389.6	390.0	390.5	391.0	391.3	391.3	391.3
152.5°	400.7	400.2	399.8	399.4	399.8	400.2	400.7	401.1	401.3	401.1	401.0
155°	415.2	414.6	414.0	413.4	414.0	414.6	415.2	415.7	415.9	415.6	415.2
157.5°	427.6	427.1	426.6	426.2	426.6	427.1	427.6	428.0	428.1	427.8	427.5
160°	435.5	435.1	434.8	434.5	434.8	435.1	435.5	435.8	435.8	435.4	435.0
162.5°	442.3	441.7	441.2	440.7	441.2	441.7	442.3	442.8	442.9	442.5	442.1
165°	451.3	450.8	450.2	449.6	450.2	450.8	451.3	451.9	452.0	451.5	451.0
167.5°	458.8	458.3	457.8	457.2	457.8	458.3	458.8	459.3	459.3	458.8	458.3
170°	462.8	462.3	461.7	461.1	461.7	462.3	462.8	463.4	463.4	462.8	462.3
172.5°	465.8	465.2	464.6	464.1	464.6	465.2	465.8	466.4	466.4	465.9	465.4
175°	469.1	468.6	468.0	467.4	468.0	468.6	469.1	469.7	469.7	469.2	468.7
177.5°	470.5	470.1	469.6	469.1	469.6	470.1	470.5	471.0	471.0	470.7	470.3
180°	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3



TEST NUMBER: P332451-930

CATALOG NUMBER: S123RDIW-S1000D460U930-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
0°	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1
2.5°	1237.1	1243.2	1249.5	1255.2	1264.1	1268.1	1273.9	1276.1	1282.8	1292.6	1300.6
5°	1161.8	1170.7	1182.3	1191.8	1206.8	1218.4	1231.2	1243.4	1257.8	1278.3	1296.7
7.5°	1098.0	1106.8	1120.8	1138.3	1154.9	1171.3	1188.8	1205.4	1226.0	1255.5	1284.7
10°	1055.9	1066.4	1083.0	1101.9	1122.4	1138.6	1159.0	1180.1	1205.7	1239.5	1274.5
12.5°	1019.5	1027.4	1046.7	1064.6	1087.9	1108.3	1128.5	1153.1	1182.1	1218.2	1260.3
15°	961.6	972.7	991.5	1011.5	1035.9	1057.5	1083.6	1113.5	1141.8	1186.3	1237.3
17.5°	903.4	920.2	939.9	962.5	980.5	1010.3	1038.7	1069.4	1104.2	1151.3	1207.3
20°	866.1	879.4	897.7	930.5	954.3	977.1	1003.1	1041.5	1073.6	1126.9	1185.1
22.5°	834.6	844.3	864.9	891.9	919.7	946.0	972.5	1009.0	1048.7	1099.3	1162.5
25°	787.9	803.4	819.0	838.4	868.3	899.9	928.8	959.9	1002.0	1055.9	1124.1
27.5°	742.2	756.4	771.7	795.5	818.2	847.8	878.0	913.6	958.9	1015.8	1085.0
30°	713.0	723.5	737.9	768.4	789.0	814.5	850.0	881.7	923.8	984.3	1057.5
32.5°	682.8	696.4	712.2	735.6	761.0	785.2	817.6	851.9	895.0	954.6	1029.6
35°	639.8	655.8	671.9	689.1	714.6	739.6	766.8	804.5	848.3	906.0	979.8
37.5°	600.1	613.1	626.1	647.5	671.7	695.5	720.8	758.0	799.3	861.5	929.3
40°	574.8	586.4	596.5	618.6	642.0	667.5	692.4	725.2	769.6	827.9	893.3
42.5°	547.3	558.1	571.6	589.8	614.9	636.4	661.4	692.4	734.0	793.2	850.7
45°	506.0	518.2	529.9	547.1	572.0	593.1	615.3	644.7	687.5	736.3	787.3
47.5°	463.1	475.2	488.6	505.2	527.0	548.4	570.6	596.6	635.6	683.5	718.0
50°	435.5	445.6	458.9	475.5	495.5	518.2	538.2	566.5	603.6	641.4	671.3
52.5°	407.2	416.2	431.3	448.9	467.5	487.1	508.4	532.7	566.4	601.9	625.7
55°	362.9	374.0	386.7	403.9	422.2	438.9	459.4	484.4	511.0	537.6	553.8
57.5°	321.5	330.7	341.4	359.2	375.0	394.9	413.4	432.8	457.4	477.5	488.0
60°	291.3	299.6	313.5	329.1	344.0	361.2	382.3	401.7	420.5	436.7	445.0
62.5°	262.9	272.6	284.6	298.8	315.1	331.5	349.8	366.2	382.9	396.7	402.4
65°	225.8	233.6	242.5	255.8	269.1	285.8	300.2	316.8	329.1	336.8	341.8
67.5°	192.1	197.2	204.0	212.9	225.9	240.4	254.5	267.4	277.6	283.0	287.4
70°	170.3	173.7	178.6	187.5	197.5	210.3	224.7	234.2	243.0	247.4	251.9
72.5°	148.5	152.8	157.4	164.4	172.7	181.9	192.3	204.0	208.9	214.2	216.9
75°	112.6	118.7	124.8	129.3	134.9	142.0	151.5	158.7	161.4	165.9	166.5
77.5°	85.0	86.3	90.7	96.3	101.0	106.2	112.2	118.6	119.9	122.3	123.8
80°	69.9	69.9	69.9	73.2	78.8	82.7	88.2	91.6	93.8	94.3	94.9
82.5°	56.2	56.2	55.7	56.3	58.4	60.5	65.6	69.4	71.1	70.8	69.5
85°	36.6	35.5	35.5	35.0	35.5	34.4	33.8	36.0	39.4	39.4	38.3
87.5°	17.0	16.4	16.6	16.0	15.3	14.7	13.1	13.5	13.3	14.9	14.3
90°	9.2	8.9	7.8	6.8	5.6	4.6	3.7	2.9	2.0	1.2	0.4
92.5°	14.4	14.2	13.6	13.0	12.4	11.7	11.2	10.6	10.0	9.5	9.0
95°	27.6	27.3	26.7	26.0	25.4	24.7	24.1	23.6	22.9	22.3	21.8
97.5°	43.1	42.8	42.3	41.8	41.3	40.8	40.4	40.0	39.5	39.1	38.7
100°	54.5	54.3	53.9	53.5	53.1	52.7	52.2	51.7	51.2	50.7	50.2
102.5°	67.6	67.3	66.8	66.2	65.7	65.1	64.7	64.4	64.2	63.8	63.5
105°	87.2	87.2	86.4	85.7	85.0	84.2	83.8	83.6	83.5	83.3	83.2
107.5°	107.9	107.7	107.4	107.0	106.8	106.5	106.3	106.2	106.1	106.0	105.9
110°	121.9	121.6	121.4	121.2	121.1	120.9	120.7	120.6	120.4	120.3	120.1



TEST NUMBER: P332451-930

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CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	135.8	135.4	135.4	135.4	135.3	135.3	135.3	135.2	135.1	134.9	134.9
115°	157.5	157.4	157.6	157.8	157.9	158.1	158.0	157.8	157.5	157.3	157.0
117.5°	179.1	179.1	179.4	179.5	179.8	179.9	180.0	179.9	179.7	179.5	179.4
120°	193.6	193.6	194.0	194.4	194.9	195.3	195.2	194.7	194.2	193.7	193.2
122.5°	208.1	208.4	208.6	208.8	209.0	209.2	209.1	208.8	208.5	208.1	207.7
125°	229.8	230.2	230.3	230.5	230.6	230.8	230.8	230.6	230.3	230.1	229.8
127.5°	251.3	251.8	251.9	252.1	252.3	252.5	252.3	251.8	251.3	250.7	250.2
130°	265.3	265.6	265.9	266.1	266.4	266.6	266.4	265.8	265.1	264.5	263.8
132.5°	279.2	279.6	279.7	279.9	280.1	280.3	280.1	279.4	278.8	278.0	277.4
135°	299.7	300.0	300.1	300.2	300.3	300.4	300.1	299.6	299.1	298.6	298.2
137.5°	319.8	320.2	320.0	319.8	319.5	319.4	319.0	318.6	318.2	317.8	317.4
140°	332.8	332.9	332.8	332.7	332.6	332.6	332.3	331.9	331.5	331.1	330.7
142.5°	345.2	345.3	345.2	345.0	344.9	344.7	344.5	344.1	343.6	343.2	342.8
145°	363.5	363.5	363.3	363.1	362.8	362.6	362.4	362.2	362.1	361.9	361.7
147.5°	380.7	380.7	380.4	380.2	379.9	379.7	379.4	379.1	378.9	378.5	378.3
150°	391.3	391.3	391.1	390.9	390.8	390.6	390.4	390.3	390.1	390.0	389.8
152.5°	400.9	400.7	400.6	400.6	400.4	400.3	400.1	399.9	399.7	399.5	399.3
155°	414.9	414.6	414.5	414.4	414.3	414.3	414.2	414.2	414.2	414.2	414.2
157.5°	427.1	426.7	426.6	426.6	426.6	426.5	426.5	426.6	426.7	426.8	426.9
160°	434.6	434.1	434.1	434.1	434.1	434.1	434.2	434.4	434.6	434.7	434.9
162.5°	441.6	441.2	441.2	441.1	441.0	441.0	441.1	441.2	441.5	441.7	442.0
165°	450.5	450.0	450.0	450.0	450.0	450.0	450.1	450.4	450.6	450.9	451.1
167.5°	457.8	457.2	457.2	457.1	457.1	457.0	457.1	457.5	457.8	458.1	458.4
170°	461.7	461.1	461.1	461.1	461.1	461.1	461.3	461.6	461.9	462.3	462.6
172.5°	464.9	464.3	464.3	464.3	464.3	464.3	464.5	464.9	465.2	465.5	465.9
175°	468.2	467.7	467.7	467.7	467.7	467.7	467.9	468.2	468.6	468.9	469.2
177.5°	469.9	469.4	469.4	469.4	469.4	469.4	469.6	469.9	470.1	470.3	470.7
180°	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3



TEST NUMBER: P332451-930

CATALOG NUMBER: S123RDIW-S1000D460U930-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
0°	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1
2.5°	1303.2	1308.1	1314.3	1323.6	1330.7	1336.9	1338.2	1340.0	1344.5	1352.0	1357.8
5°	1311.7	1324.4	1344.9	1364.9	1386.6	1404.3	1420.9	1432.6	1443.7	1467.0	1485.9
7.5°	1309.0	1337.4	1369.5	1405.4	1441.7	1476.8	1509.5	1538.7	1567.7	1601.7	1640.5
10°	1307.2	1340.5	1383.7	1429.8	1480.3	1529.7	1577.4	1614.6	1657.8	1696.7	1746.0
12.5°	1298.8	1346.7	1398.4	1457.3	1519.4	1576.3	1639.1	1690.4	1740.0	1796.1	1853.5
15°	1287.8	1346.1	1411.5	1489.7	1584.0	1652.9	1717.2	1806.5	1867.6	1928.6	2010.8
17.5°	1267.7	1338.8	1420.6	1522.2	1600.9	1693.4	1790.2	1860.8	1943.0	2029.0	2103.4
20°	1251.7	1334.4	1426.0	1525.8	1626.2	1726.6	1820.4	1904.8	1989.7	2089.0	2150.0
22.5°	1235.7	1317.5	1412.6	1518.7	1626.7	1732.4	1838.6	1937.6	2033.1	2133.3	2211.3
25°	1201.8	1298.9	1402.1	1510.3	1616.8	1733.3	1859.8	1970.3	2088.4	2191.6	2265.4
27.5°	1167.3	1256.4	1359.1	1468.8	1587.3	1725.0	1873.8	1999.3	2117.7	2191.6	2214.8
30°	1136.3	1230.6	1324.9	1436.5	1564.6	1718.3	1876.5	2020.1	2117.3	2149.5	2125.6
32.5°	1104.8	1190.3	1283.7	1397.8	1534.0	1701.9	1880.0	2007.8	2066.2	2041.6	1944.5
35°	1049.2	1126.3	1216.8	1331.1	1487.5	1692.8	1865.4	1951.9	1937.5	1798.8	1615.7
37.5°	989.7	1052.6	1136.3	1255.8	1439.3	1656.8	1802.3	1815.1	1690.3	1477.3	1265.8
40°	942.6	999.2	1085.2	1210.1	1402.1	1621.2	1738.9	1687.3	1493.6	1256.7	1080.3
42.5°	896.9	944.7	1027.5	1162.1	1366.6	1572.9	1644.3	1531.9	1308.6	1084.5	924.1
45°	819.5	864.5	947.6	1085.8	1293.9	1480.3	1470.9	1275.5	1052.0	871.6	738.5
47.5°	746.0	785.3	863.4	1004.4	1208.5	1341.6	1253.4	1045.5	855.9	711.2	616.2
50°	694.1	733.0	810.7	949.9	1140.2	1237.3	1111.3	911.0	737.4	617.5	542.1
52.5°	644.4	682.3	753.3	889.1	1057.6	1115.7	980.4	794.8	650.0	546.5	481.7
55°	574.8	603.6	667.5	797.3	923.2	936.5	799.5	644.2	524.9	452.7	408.4
57.5°	503.9	528.7	591.8	695.2	783.5	776.7	646.7	512.3	432.0	378.4	346.3
60°	457.7	482.2	537.6	626.4	693.0	669.7	550.4	442.2	373.4	334.0	308.5
62.5°	414.7	433.7	485.7	550.5	598.4	572.0	470.5	381.0	326.4	293.2	273.0
65°	352.3	367.9	409.4	443.3	469.9	444.4	360.1	297.9	258.5	235.2	221.4
67.5°	293.1	303.0	329.2	341.4	360.2	332.2	270.8	229.2	206.8	187.1	177.4
70°	255.8	263.0	276.9	286.8	291.9	263.0	217.5	186.9	168.1	154.3	148.1
72.5°	218.5	224.9	227.6	235.8	233.3	206.2	174.9	150.6	137.1	127.6	119.8
75°	167.0	169.7	167.0	163.7	156.5	137.6	115.9	103.8	93.8	89.4	86.6
77.5°	121.7	120.8	117.1	111.9	99.5	87.6	76.0	71.9	67.6	65.2	64.2
80°	93.8	91.6	88.2	79.9	69.4	61.1	58.3	55.5	53.8	51.0	50.5
82.5°	69.8	68.5	62.9	55.9	48.5	44.6	42.3	41.3	39.6	38.2	38.1
85°	37.2	35.5	29.4	25.5	24.4	23.3	22.7	22.7	20.5	20.0	20.0
87.5°	12.2	9.7	9.5	8.3	8.5	7.8	8.5	7.7	7.6	8.1	7.3
90°	1.2	2.0	2.9	3.7	4.6	5.6	6.8	7.8	8.9	9.2	9.5
92.5°	9.5	10.0	10.6	11.2	11.7	12.4	13.0	13.6	14.2	14.4	14.7
95°	22.3	22.9	23.6	24.1	24.7	25.4	26.0	26.7	27.3	27.6	28.0
97.5°	39.1	39.5	40.0	40.4	40.8	41.3	41.8	42.3	42.8	43.1	43.5
100°	50.7	51.2	51.7	52.2	52.7	53.1	53.5	53.9	54.3	54.5	54.8
102.5°	63.8	64.2	64.4	64.7	65.1	65.7	66.2	66.8	67.3	67.6	67.8
105°	83.3	83.5	83.6	83.8	84.2	85.0	85.7	86.4	87.2	87.2	87.2
107.5°	106.0	106.1	106.2	106.3	106.5	106.8	107.0	107.4	107.7	107.9	108.2
110°	120.3	120.4	120.6	120.7	120.9	121.1	121.2	121.4	121.6	121.9	122.2



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CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	134.9	135.1	135.2	135.3	135.3	135.3	135.4	135.4	135.4	135.8	136.2
115°	157.3	157.5	157.8	158.0	158.1	157.9	157.8	157.6	157.4	157.5	157.6
117.5°	179.5	179.7	179.9	180.0	179.9	179.8	179.5	179.4	179.1	179.1	179.1
120°	193.7	194.2	194.7	195.2	195.3	194.9	194.4	194.0	193.6	193.6	193.5
122.5°	208.1	208.5	208.8	209.1	209.2	209.0	208.8	208.6	208.4	208.1	208.0
125°	230.1	230.3	230.6	230.8	230.8	230.6	230.5	230.3	230.2	229.8	229.5
127.5°	250.7	251.3	251.8	252.3	252.5	252.3	252.1	251.9	251.8	251.3	250.9
130°	264.5	265.1	265.8	266.4	266.6	266.4	266.1	265.9	265.6	265.3	265.0
132.5°	278.0	278.8	279.4	280.1	280.3	280.1	279.9	279.7	279.6	279.2	278.8
135°	298.6	299.1	299.6	300.1	300.4	300.3	300.2	300.1	300.0	299.7	299.4
137.5°	317.8	318.2	318.6	319.0	319.4	319.5	319.8	320.0	320.2	319.8	319.5
140°	331.1	331.5	331.9	332.3	332.6	332.6	332.7	332.8	332.9	332.8	332.7
142.5°	343.2	343.6	344.1	344.5	344.7	344.9	345.0	345.2	345.3	345.2	345.1
145°	361.9	362.1	362.2	362.4	362.6	362.8	363.1	363.3	363.5	363.5	363.4
147.5°	378.5	378.9	379.1	379.4	379.7	379.9	380.2	380.4	380.7	380.7	380.7
150°	390.0	390.1	390.3	390.4	390.6	390.8	390.9	391.1	391.3	391.3	391.3
152.5°	399.5	399.7	399.9	400.1	400.3	400.4	400.6	400.6	400.7	400.9	401.0
155°	414.2	414.2	414.2	414.2	414.3	414.3	414.4	414.5	414.6	414.9	415.2
157.5°	426.8	426.7	426.6	426.5	426.5	426.6	426.6	426.6	426.7	427.1	427.5
160°	434.7	434.6	434.4	434.2	434.1	434.1	434.1	434.1	434.1	434.6	435.0
162.5°	441.7	441.5	441.2	441.1	441.0	441.0	441.1	441.2	441.2	441.6	442.1
165°	450.9	450.6	450.4	450.1	450.0	450.0	450.0	450.0	450.0	450.5	451.0
167.5°	458.1	457.8	457.5	457.1	457.0	457.1	457.1	457.2	457.2	457.8	458.3
170°	462.3	461.9	461.6	461.3	461.1	461.1	461.1	461.1	461.1	461.7	462.3
172.5°	465.5	465.2	464.9	464.5	464.3	464.3	464.3	464.3	464.3	464.9	465.4
175°	468.9	468.6	468.2	467.9	467.7	467.7	467.7	467.7	467.7	468.2	468.7
177.5°	470.3	470.1	469.9	469.6	469.4	469.4	469.4	469.4	469.4	469.9	470.3
180°	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3	470.3



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
0°	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1	1296.1
2.5°	1367.1	1367.1	1368.9	1375.6	1376.5	1382.2	1380.5
5°	1502.5	1513.0	1516.9	1533.6	1543.5	1548.0	1539.1
7.5°	1668.1	1697.8	1711.9	1729.3	1744.7	1749.4	1737.3
10°	1788.8	1819.8	1845.9	1862.1	1877.0	1887.0	1899.7
12.5°	1905.5	1943.7	1968.5	1991.2	2006.6	2019.3	2021.4
15°	2032.4	2090.1	2133.9	2166.1	2182.1	2190.5	2187.2
17.5°	2160.3	2213.8	2245.0	2277.9	2300.1	2301.3	2301.9
20°	2232.7	2284.8	2320.9	2345.3	2370.2	2369.2	2374.7
22.5°	2281.0	2322.1	2349.8	2367.5	2376.0	2371.8	2372.9
25°	2303.7	2315.9	2310.9	2282.6	2275.4	2249.3	2253.7
27.5°	2187.0	2129.2	2069.6	1992.8	1932.2	1883.7	1886.2
30°	2028.5	1926.4	1809.9	1712.2	1624.6	1600.2	1548.0
32.5°	1807.0	1653.8	1517.4	1426.4	1351.1	1330.7	1285.2
35°	1431.5	1282.8	1142.4	1058.1	1024.7	978.2	977.6
37.5°	1112.6	981.7	907.5	844.2	811.1	782.9	780.1
40°	936.0	833.9	777.9	732.4	699.7	678.6	673.6
42.5°	812.6	730.0	677.6	649.4	624.2	613.3	605.2
45°	663.6	608.1	571.4	545.9	534.3	525.9	521.5
47.5°	555.1	517.9	492.9	476.0	466.5	457.7	460.1
50°	496.0	465.5	447.2	431.1	423.9	417.8	418.3
52.5°	448.5	421.1	406.3	394.7	385.7	381.4	379.3
55°	380.6	363.4	348.5	340.1	335.1	329.1	327.3
57.5°	324.7	311.4	299.1	289.8	288.5	282.7	283.4
60°	287.4	276.3	266.4	261.3	257.5	252.4	254.1
62.5°	256.8	247.4	238.4	234.2	230.4	226.7	227.5
65°	210.3	201.4	195.8	193.6	192.0	190.3	188.7
67.5°	167.5	162.2	158.7	153.9	150.5	149.9	148.2
70°	141.0	133.7	127.6	121.5	119.8	119.3	119.8
72.5°	113.0	108.4	106.7	103.8	103.5	102.0	103.0
75°	84.9	83.2	82.1	79.9	79.9	79.9	79.9
77.5°	62.6	61.6	60.9	60.5	59.9	59.1	59.0
80°	48.8	48.3	47.1	47.1	46.6	47.1	46.6
82.5°	36.9	36.8	35.6	35.6	35.1	34.7	35.1
85°	18.8	18.3	19.4	18.3	18.8	17.8	18.8
87.5°	7.3	7.3	6.9	7.0	6.6	7.5	6.7
90°	9.9	10.2	10.4	10.6	10.8	10.9	11.1
92.5°	15.0	15.2	15.3	15.2	15.1	15.0	14.9
95°	28.3	28.6	28.8	28.8	28.8	28.8	28.8
97.5°	43.9	44.3	44.4	44.4	44.4	44.4	44.4
100°	55.0	55.3	55.5	55.7	55.8	56.0	56.2
102.5°	68.1	68.3	68.4	68.4	68.3	68.3	68.2
105°	87.2	87.2	87.2	87.5	87.6	87.8	88.0
107.5°	108.4	108.7	108.8	108.7	108.6	108.5	108.4
110°	122.5	122.9	122.9	122.8	122.6	122.5	122.3



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
112.5°	136.6	137.1	137.2	137.1	137.1	137.1	137.1
115°	157.7	157.8	157.8	157.7	157.6	157.5	157.4
117.5°	179.0	179.0	179.0	178.7	178.5	178.2	178.0
120°	193.4	193.3	193.1	193.0	192.8	192.7	192.5
122.5°	207.7	207.5	207.3	207.1	206.8	206.6	206.4
125°	229.2	228.9	228.5	228.2	227.9	227.6	227.2
127.5°	250.4	249.9	249.5	249.2	248.7	248.3	248.0
130°	264.6	264.3	263.9	263.3	262.8	262.2	261.5
132.5°	278.3	277.9	277.5	277.1	276.6	276.2	275.7
135°	299.1	298.7	298.5	298.3	298.2	298.0	297.8
137.5°	319.2	318.8	318.5	318.1	317.9	317.6	317.2
140°	332.6	332.6	332.2	331.7	331.1	330.5	330.0
142.5°	345.0	345.0	344.7	344.3	343.8	343.4	342.9
145°	363.3	363.2	363.1	362.7	362.4	362.1	361.7
147.5°	380.7	380.7	380.4	379.9	379.4	378.9	378.4
150°	391.3	391.3	391.0	390.5	390.0	389.6	389.1
152.5°	401.1	401.3	401.1	400.7	400.2	399.8	399.4
155°	415.6	415.9	415.7	415.2	414.6	414.0	413.4
157.5°	427.8	428.1	428.0	427.6	427.1	426.6	426.2
160°	435.4	435.8	435.8	435.5	435.1	434.8	434.5
162.5°	442.5	442.9	442.8	442.3	441.7	441.2	440.7
165°	451.5	452.0	451.9	451.3	450.8	450.2	449.6
167.5°	458.8	459.3	459.3	458.8	458.3	457.8	457.2
170°	462.8	463.4	463.4	462.8	462.3	461.7	461.1
172.5°	465.9	466.4	466.4	465.8	465.2	464.6	464.1
175°	469.2	469.7	469.7	469.1	468.6	468.0	467.4
177.5°	470.7	471.0	471.0	470.5	470.1	469.6	469.1
180°	470.3	470.3	470.3	470.3	470.3	470.3	470.3

(END OF REPORT)