

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: P332643-940

Luminaire Tested: **SA4XXDIP-C1020D810U940-4F0-1E-UDD-A**

Issue Date: 10/7/2019

Test Information

Test Method: LM-79-08
Report Number: P332643-940
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-6,
Test Lab: INNOVATION CENTER
Issue Date: 10/7/2019
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A
Description: DEFINE 4 DIRECT-INDIRECT PENDANT LED LUMINAIRE
DOWNLIGHT 1020 LUMENS PER FOOT, ASYMMETRIC DIFFUSER
UPLIGHT 810 LUMENS PER FOOT, NO LENS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

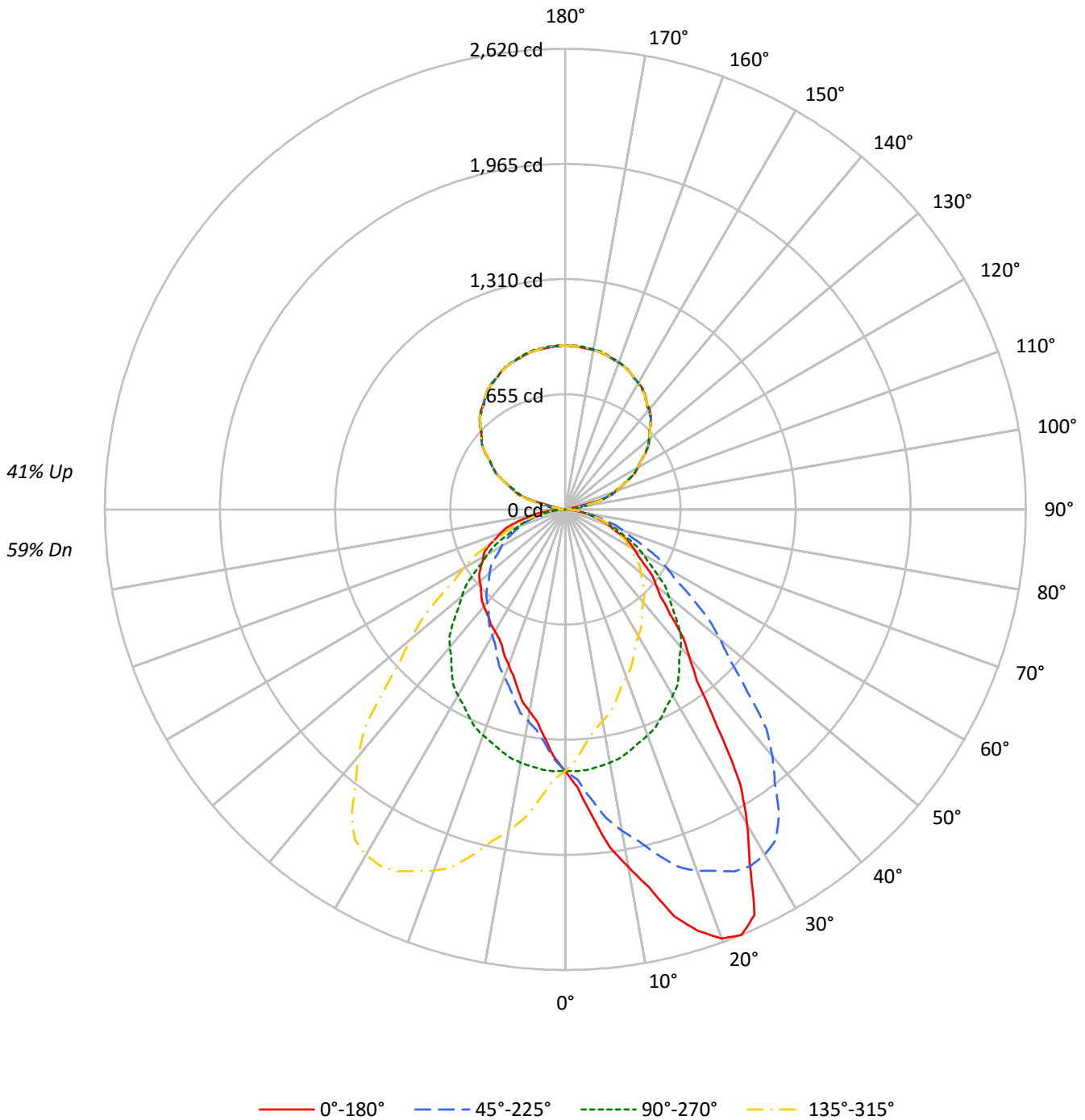
Lumens per Lamp: N/A
Luminaire Lumens: 6991.9 lumens
Efficiency: N/A
Efficacy: 128.5 lumens/watt
Spacing Criteria (0/90/45): 1.31 / 1.23 / 1.41
Luminous Opening: Rectangular (W 4' x L: 0.33' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 54.4
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	109	109	109	109	102	102	102	102	88	88	88	76	76	76	64	64	64	59
1	100	96	92	88	93	89	86	83	78	75	73	67	65	64	57	56	55	50
2	91	84	78	73	85	79	73	69	68	64	61	59	56	54	51	48	46	42
3	83	74	67	61	78	69	63	58	61	56	52	53	49	46	45	42	40	36
4	77	66	58	52	71	62	55	49	54	49	44	47	43	39	40	37	35	31
5	70	59	51	45	65	55	48	42	49	43	38	42	38	34	37	33	30	27
6	65	53	45	39	60	50	42	37	44	38	34	38	34	30	33	30	27	24
7	60	48	40	34	56	45	38	33	40	34	30	35	30	27	30	27	24	21
8	56	43	36	30	52	41	34	29	36	31	27	32	27	24	28	24	21	19
9	52	40	32	27	49	38	31	26	33	28	24	30	25	22	26	22	19	17
10	49	37	29	24	45	35	28	23	31	25	22	27	23	20	24	20	18	16

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	12013	12013	12013	12013
5°	14148	12044	10631	12044
10°	16939	11992	9571	11992
15°	20042	11870	8790	11870
20°	22317	11747	8092	11747
25°	22678	11564	7611	11564
30°	19296	11389	7458	11389
35°	14836	11106	7460	11106
40°	11564	10771	7600	10771
45°	9642	10268	7728	10268
50°	8485	9654	7989	9654
55°	7773	8919	8313	8919
60°	7285	8262	8699	8262
65°	6783	7524	9020	7524
70°	6198	6793	9224	6793
75°	5536	5979	9114	5979
80°	4644	4900	8824	4900
85°	3427	3548	8448	3548



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	145.0	2.1
10°-20°	446.9	6.4
20°-30°	708.6	10.1
30°-40°	788.6	11.3
40°-50°	717.8	10.3
50°-60°	586.6	8.4
60°-70°	418.8	6.0
70°-80°	230.6	3.3
80°-90°	65.7	0.9
90°-100°	31.9	0.5
100°-110°	203.3	2.9
110°-120°	388.9	5.6
120°-130°	493.7	7.1
130°-140°	528.2	7.6
140°-150°	493.9	7.1
150°-160°	398.3	5.7
160°-170°	256.9	3.7
170°-180°	88.5	1.3
0°-30°	1300.4	18.6
0°-40°	2089.0	29.9
0°-60°	3393.4	48.5
0°-90°	4108.4	58.8
90°-120°	624.1	8.9
90°-150°	2139.8	30.6
90°-180°	2884.0	41.2
0°-180°	6991.9	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	1488	1488	1488	1488	1488	
5°	1746	1486	1312	1486	1746	178
15°	2398	1420	1052	1420	2398	678
25°	2546	1298	854	1298	2546	1122
35°	1505	1127	757	1127	1505	956
45°	844	899	677	899	844	665
55°	552	634	591	634	552	499
65°	355	394	472	394	355	352
75°	178	192	292	192	178	189
85°	37	38	91	38	37	46
90°	21	2	21	2	21	10
95°	20	38	20	38	20	16
105°	199	210	199	210	199	173
115°	395	392	395	392	395	391
125°	555	551	555	551	555	494
135°	688	683	688	683	688	530
145°	792	788	792	788	792	495
155°	863	864	863	864	863	398
165°	907	911	907	911	907	256
175°	927	932	927	932	927	88
180°	932	932	932	932	932	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1
2.5°	1583.8	1583.3	1578.3	1577.3	1573.9	1569.5	1568.5	1560.6	1544.8	1537.4	1535.4
5°	1745.8	1758.1	1742.0	1739.0	1737.1	1716.8	1706.3	1694.0	1665.6	1649.0	1636.0
7.5°	1939.1	1940.5	1933.6	1927.9	1912.2	1894.4	1867.9	1839.5	1805.7	1770.6	1744.0
10°	2066.4	2071.3	2063.2	2062.0	2030.6	2010.8	1971.4	1938.1	1899.9	1857.3	1818.6
12.5°	2200.5	2193.5	2189.5	2163.1	2157.3	2121.3	2075.5	2041.2	1982.3	1933.3	1881.6
15°	2398.0	2384.4	2375.8	2339.4	2321.6	2271.6	2222.9	2185.3	2108.3	2034.9	1979.4
17.5°	2513.8	2527.5	2507.5	2492.5	2446.3	2411.3	2361.5	2282.6	2222.3	2131.2	2061.2
20°	2597.7	2598.9	2587.8	2572.4	2536.0	2491.7	2437.4	2351.1	2279.0	2188.3	2092.2
22.5°	2620.4	2620.6	2615.9	2601.5	2574.0	2538.0	2483.3	2411.3	2323.9	2225.4	2129.2
25°	2545.9	2543.4	2549.0	2565.0	2554.6	2543.4	2512.0	2458.4	2377.0	2272.8	2169.3
27.5°	2269.2	2286.3	2317.6	2357.1	2395.0	2424.0	2432.1	2421.2	2370.7	2285.0	2176.6
30°	2070.0	2091.0	2114.4	2153.8	2230.3	2274.0	2322.2	2358.5	2338.2	2269.8	2168.6
32.5°	1851.1	1856.3	1891.1	1935.9	2005.9	2090.1	2166.3	2240.2	2264.7	2228.8	2144.5
35°	1505.4	1513.9	1551.6	1596.0	1681.7	1784.6	1899.3	2001.6	2086.1	2120.0	2076.8
37.5°	1228.4	1253.2	1279.8	1327.5	1402.9	1495.6	1614.7	1747.1	1873.0	1957.3	1971.7
40°	1097.3	1112.7	1131.8	1168.1	1232.3	1323.5	1425.8	1577.5	1711.3	1832.1	1871.5
42.5°	993.7	1002.7	1014.4	1047.3	1096.2	1186.9	1280.3	1413.7	1548.0	1692.5	1758.6
45°	844.5	853.8	873.5	892.6	929.6	992.5	1079.4	1189.1	1324.1	1463.5	1585.5
47.5°	736.7	742.7	754.4	774.9	806.3	847.7	918.5	1010.1	1135.2	1270.5	1400.5
50°	675.6	680.6	689.8	708.3	732.4	769.3	827.2	912.9	1010.9	1147.2	1274.8
52.5°	627.3	629.3	636.1	648.6	667.7	698.8	746.4	817.3	908.4	1029.8	1156.9
55°	552.3	554.8	561.0	570.2	586.8	606.5	642.9	696.0	775.5	880.9	991.2
57.5°	490.7	492.4	497.6	501.1	514.9	530.9	558.8	596.7	657.0	746.4	844.9
60°	451.2	450.0	456.2	459.2	468.5	482.1	503.6	540.0	592.4	664.5	755.1
62.5°	412.8	411.1	416.3	420.3	425.6	437.2	454.8	483.3	525.8	591.0	669.3
65°	355.1	352.6	355.7	360.6	365.5	371.8	384.7	409.9	443.8	490.7	550.5
67.5°	297.1	299.7	300.2	302.6	305.5	313.9	322.8	340.6	364.5	402.1	452.7
70°	262.6	263.2	265.7	265.7	267.5	274.9	282.3	292.8	316.2	350.8	392.1
72.5°	228.1	230.7	229.7	231.7	233.0	237.9	243.3	253.3	273.3	299.0	333.9
75°	177.5	179.4	179.4	180.0	181.8	183.7	188.0	195.4	209.6	228.7	252.7
77.5°	129.5	129.7	130.5	132.8	132.8	135.7	138.9	144.9	151.9	165.0	179.6
80°	99.9	101.1	100.5	101.7	101.7	104.2	105.4	112.8	115.9	124.5	136.3
82.5°	73.2	74.5	74.4	76.1	77.0	77.6	79.3	82.2	85.3	92.9	97.7
85°	37.0	38.3	37.0	38.3	40.0	40.7	42.5	43.2	45.7	47.4	51.8
87.5°	15.1	16.4	16.4	16.9	17.7	18.1	18.5	17.7	19.5	19.8	21.6
90°	21.0	20.6	20.3	20.0	19.7	19.1	18.1	17.2	16.2	15.3	14.1
92.5°	19.3	19.2	19.1	19.1	19.0	18.5	17.6	16.7	15.7	14.8	13.6
95°	20.2	20.1	19.9	19.8	19.6	19.1	18.1	17.2	16.2	15.3	15.2
97.5°	19.5	19.4	19.2	19.1	18.9	18.8	18.7	18.6	18.5	18.4	35.7
100°	19.5	19.4	19.2	19.1	18.9	20.2	22.7	25.4	28.0	30.7	52.1
102.5°	20.1	20.1	20.0	20.0	20.0	34.2	62.6	91.0	119.4	147.8	150.6
105°	198.7	204.3	209.8	215.4	221.1	223.1	221.7	220.3	218.9	217.5	216.8
107.5°	277.0	276.3	275.7	275.2	274.6	273.9	273.2	272.6	271.9	271.3	270.2
110°	310.9	310.5	310.0	309.6	309.1	308.7	308.4	308.1	307.8	307.5	306.6



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	345.0	344.4	343.8	343.2	342.6	342.3	342.4	342.5	342.6	342.6	342.1
115°	394.7	394.7	394.7	394.7	394.7	394.5	394.1	393.9	393.5	393.2	393.4
117.5°	445.1	445.1	445.2	445.3	445.3	445.4	445.5	445.5	445.6	445.7	445.3
120°	476.9	477.2	477.5	477.9	478.1	478.1	477.9	477.5	477.2	476.9	477.1
122.5°	508.1	508.5	508.7	509.1	509.3	509.4	509.3	509.1	508.9	508.7	508.5
125°	555.0	554.8	554.6	554.6	554.4	554.0	553.6	553.1	552.7	552.2	552.5
127.5°	596.1	596.3	596.4	596.5	596.6	596.7	596.8	596.9	597.0	597.1	596.4
130°	624.0	624.0	624.0	624.0	624.0	623.9	623.8	623.7	623.5	623.3	622.9
132.5°	649.7	649.8	649.9	650.1	650.1	650.1	650.0	649.9	649.7	649.5	648.9
135°	688.1	687.9	687.5	687.2	686.9	686.6	686.3	686.0	685.6	685.4	684.7
137.5°	721.0	721.1	721.2	721.3	721.4	721.3	720.9	720.6	720.3	720.0	719.3
140°	744.0	743.8	743.6	743.5	743.3	743.0	742.5	742.1	741.6	741.1	740.8
142.5°	762.9	762.9	762.9	762.8	762.8	762.6	762.2	761.9	761.6	761.3	761.1
145°	792.0	791.8	791.4	791.1	790.8	790.6	790.4	790.2	790.1	790.0	790.0
147.5°	816.2	816.0	815.8	815.7	815.6	815.4	815.3	815.2	815.0	814.9	815.0
150°	831.8	831.6	831.4	831.3	831.2	831.1	831.1	831.1	831.1	831.1	831.3
152.5°	845.2	845.3	845.3	845.4	845.5	845.4	845.3	845.0	844.7	844.5	844.7
155°	863.2	863.6	864.1	864.5	865.0	865.0	864.3	863.7	863.1	862.5	862.9
157.5°	878.2	879.0	879.9	880.7	881.5	881.5	880.7	879.9	879.0	878.2	878.8
160°	888.2	889.2	890.1	891.1	892.0	892.0	891.1	890.1	889.2	888.2	888.4
162.5°	896.1	897.2	898.1	899.2	900.3	900.4	899.4	898.5	897.6	896.6	896.8
165°	907.0	908.5	909.9	911.2	912.7	912.8	911.5	910.3	909.0	907.8	907.8
167.5°	915.3	916.9	918.4	920.0	921.5	921.6	920.2	918.9	917.5	916.1	916.2
170°	920.3	921.9	923.5	925.0	926.5	926.7	925.4	924.2	922.9	921.8	921.6
172.5°	923.1	924.8	926.5	928.2	929.8	930.1	928.8	927.6	926.3	925.1	924.9
175°	926.6	928.4	930.3	932.2	934.1	934.2	932.9	931.5	930.1	928.7	928.5
177.5°	928.8	930.3	931.8	933.3	934.8	935.0	934.1	933.1	932.0	931.0	930.9
180°	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1
2.5°	1536.0	1529.0	1524.1	1520.2	1509.3	1502.9	1498.0	1491.0	1483.2	1474.8	1464.5
5°	1623.1	1602.1	1586.7	1563.3	1541.1	1522.6	1503.5	1486.2	1465.3	1442.5	1425.8
7.5°	1714.7	1683.6	1643.6	1608.9	1569.9	1536.1	1505.7	1474.6	1442.3	1411.0	1382.3
10°	1772.9	1732.9	1688.5	1636.0	1586.7	1542.9	1502.3	1462.9	1424.6	1386.3	1353.7
12.5°	1835.5	1785.6	1720.0	1658.8	1603.5	1545.0	1495.8	1447.5	1401.4	1361.2	1323.1
15°	1919.6	1847.4	1771.7	1689.7	1616.9	1548.5	1481.3	1420.3	1368.5	1315.5	1278.5
17.5°	1971.3	1882.0	1795.4	1709.7	1621.6	1535.3	1462.9	1392.4	1327.6	1275.0	1228.3
20°	2005.3	1916.6	1808.7	1723.0	1618.2	1529.4	1445.6	1367.3	1299.5	1243.4	1195.2
22.5°	2034.9	1932.3	1824.4	1711.6	1607.3	1513.1	1421.4	1342.6	1273.4	1214.2	1168.1
25°	2050.9	1933.1	1816.1	1703.9	1585.5	1473.9	1390.7	1298.2	1224.2	1162.0	1112.7
27.5°	2052.6	1926.7	1794.2	1669.6	1547.4	1443.5	1338.5	1255.8	1179.0	1113.2	1065.9
30°	2047.2	1915.9	1773.5	1638.5	1515.8	1403.0	1311.8	1221.8	1143.5	1078.2	1028.9
32.5°	2030.0	1893.2	1746.9	1604.0	1476.9	1366.5	1272.4	1186.8	1110.4	1046.1	994.3
35°	1980.0	1845.0	1689.1	1540.5	1410.4	1298.9	1213.8	1126.9	1050.4	989.4	939.5
37.5°	1902.0	1779.9	1621.4	1467.7	1339.9	1227.8	1143.5	1065.0	996.0	934.1	882.9
40°	1833.9	1726.6	1567.6	1417.8	1279.8	1173.1	1094.2	1022.1	953.7	895.1	846.4
42.5°	1755.5	1662.1	1515.4	1356.6	1223.5	1116.4	1039.5	974.7	910.3	856.1	807.4
45°	1615.7	1554.1	1415.9	1269.3	1130.6	1029.5	956.1	899.4	845.2	792.1	751.4
47.5°	1454.9	1424.3	1308.1	1168.8	1037.1	937.5	873.9	821.4	773.9	729.0	693.1
50°	1346.9	1332.1	1231.6	1097.3	971.5	877.8	813.7	768.7	728.0	688.6	654.7
52.5°	1240.4	1239.9	1149.3	1026.3	909.9	819.7	756.0	714.0	678.7	646.7	616.2
55°	1077.5	1094.8	1024.0	914.2	810.0	728.6	671.3	633.7	609.0	582.6	559.7
57.5°	928.0	956.6	898.1	801.5	714.6	639.6	589.7	561.4	535.2	519.2	502.6
60°	830.4	857.5	811.9	730.5	648.5	584.4	536.9	511.7	488.8	477.8	466.0
62.5°	743.6	767.8	734.0	658.5	587.4	525.7	485.6	461.4	445.9	433.8	426.1
65°	619.6	639.9	610.9	556.1	495.0	445.7	413.0	393.9	379.2	374.2	365.5
67.5°	500.8	519.3	503.6	457.0	408.0	370.8	345.2	326.8	318.1	313.8	307.6
70°	430.3	448.8	432.1	391.5	353.8	322.4	298.4	287.8	278.7	276.8	268.1
72.5°	370.6	383.2	366.6	334.7	302.6	276.1	257.4	246.5	241.7	238.4	233.6
75°	278.0	289.1	278.0	253.3	230.5	212.0	196.0	191.7	186.2	184.3	181.2
77.5°	196.8	206.3	197.9	182.4	165.4	151.1	142.5	137.0	135.7	132.5	134.0
80°	150.4	156.6	148.6	138.1	124.5	114.7	108.5	105.4	101.7	100.5	102.9
82.5°	108.0	110.8	106.6	99.6	89.5	83.1	78.9	75.3	74.5	74.8	74.8
85°	56.1	55.5	54.8	48.7	45.7	41.3	38.9	38.3	37.6	38.9	40.0
87.5°	21.3	21.6	20.8	18.5	16.8	14.9	14.1	13.2	14.1	14.9	15.8
90°	12.8	11.6	10.3	8.9	7.2	5.5	3.8	2.1	3.8	5.5	7.2
92.5°	12.3	11.1	9.8	9.2	9.1	9.0	8.9	8.8	8.9	9.0	9.1
95°	15.1	14.9	14.7	17.3	22.6	27.8	33.1	38.3	33.1	27.8	22.6
97.5°	53.0	70.3	87.6	94.6	91.3	88.0	84.7	81.4	84.7	88.0	91.3
100°	73.5	94.8	116.2	125.5	122.7	119.9	117.2	114.3	117.2	119.9	122.7
102.5°	153.4	156.1	159.0	159.3	157.3	155.2	153.2	151.1	153.2	155.2	157.3
105°	216.0	215.2	214.5	213.6	212.7	211.7	210.8	209.8	210.8	211.7	212.7
107.5°	269.1	268.0	267.0	266.3	265.8	265.3	264.8	264.4	264.8	265.3	265.8
110°	305.6	304.7	303.7	303.1	302.6	302.1	301.7	301.2	301.7	302.1	302.6



TEST NUMBER: P332643-940

CATALOG NUMBER: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	341.7	341.3	340.9	340.3	339.4	338.6	337.7	336.9	337.7	338.6	339.4
115°	393.5	393.7	393.9	393.7	393.2	392.8	392.3	391.8	392.3	392.8	393.2
117.5°	445.0	444.6	444.3	443.8	443.2	442.6	441.9	441.3	441.9	442.6	443.2
120°	477.2	477.3	477.5	477.2	476.7	476.1	475.5	474.8	475.5	476.1	476.7
122.5°	508.3	508.0	507.8	507.6	507.1	506.8	506.4	506.0	506.4	506.8	507.1
125°	552.9	553.1	553.4	553.3	552.7	552.1	551.4	550.8	551.4	552.1	552.7
127.5°	595.7	594.9	594.2	593.8	593.7	593.5	593.3	593.2	593.3	593.5	593.7
130°	622.4	621.9	621.4	621.2	621.0	620.8	620.7	620.5	620.7	620.8	621.0
132.5°	648.4	647.7	647.2	646.8	646.5	646.2	645.9	645.6	645.9	646.2	646.5
135°	684.1	683.5	682.9	682.7	682.8	683.0	683.1	683.3	683.1	683.0	682.8
137.5°	718.6	717.9	717.2	716.8	716.8	716.8	716.7	716.6	716.7	716.8	716.8
140°	740.6	740.2	739.9	739.6	739.3	739.0	738.7	738.3	738.7	739.0	739.3
142.5°	760.9	760.6	760.5	760.1	759.6	759.0	758.4	757.9	758.4	759.0	759.6
145°	790.0	790.0	790.0	789.7	789.3	788.8	788.4	787.8	788.4	788.8	789.3
147.5°	815.2	815.4	815.6	815.2	814.3	813.4	812.6	811.7	812.6	813.4	814.3
150°	831.4	831.5	831.7	831.4	830.9	830.3	829.6	829.0	829.6	830.3	830.9
152.5°	845.1	845.3	845.6	845.5	845.0	844.5	844.0	843.5	844.0	844.5	845.0
155°	863.4	863.9	864.3	864.5	864.3	864.2	864.0	863.9	864.0	864.2	864.3
157.5°	879.3	879.8	880.3	880.7	880.7	880.8	880.9	881.0	880.9	880.8	880.7
160°	888.6	888.8	888.9	889.2	889.7	890.1	890.6	891.1	890.6	890.1	889.7
162.5°	897.0	897.1	897.2	897.6	898.2	898.8	899.4	900.0	899.4	898.8	898.2
165°	907.8	907.8	907.8	908.2	908.9	909.7	910.5	911.2	910.5	909.7	908.9
167.5°	916.3	916.4	916.5	916.9	917.7	918.6	919.4	920.2	919.4	918.6	917.7
170°	921.4	921.2	921.1	921.5	922.4	923.4	924.3	925.2	924.3	923.4	922.4
172.5°	924.8	924.6	924.4	924.9	925.8	926.7	927.6	928.5	927.6	926.7	925.8
175°	928.4	928.3	928.1	928.4	929.4	930.3	931.2	932.2	931.2	930.3	929.4
177.5°	930.6	930.3	930.1	930.4	931.2	932.1	933.0	933.9	933.0	932.1	931.2
180°	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2



TEST NUMBER: P332643-940

CATALOG NUMBER: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1
2.5°	1459.5	1455.1	1448.7	1439.8	1432.4	1424.5	1422.5	1419.5	1425.5	1420.5	1419.1
5°	1411.7	1398.7	1382.1	1363.0	1351.8	1335.9	1332.8	1326.6	1320.4	1319.8	1313.7
7.5°	1361.0	1342.0	1320.2	1300.7	1282.7	1265.2	1253.7	1251.2	1242.2	1236.8	1230.7
10°	1328.5	1305.0	1279.8	1261.2	1240.3	1221.8	1208.9	1201.5	1195.2	1188.5	1182.3
12.5°	1289.9	1265.1	1244.2	1224.2	1199.4	1185.3	1164.0	1151.1	1150.0	1150.0	1134.0
15°	1245.2	1220.6	1188.5	1160.1	1146.6	1119.5	1107.8	1093.0	1083.7	1074.4	1067.1
17.5°	1194.1	1163.3	1138.4	1105.8	1079.9	1058.3	1042.9	1034.0	1020.1	1007.0	997.6
20°	1162.0	1129.4	1102.8	1068.3	1039.9	1013.4	1000.5	988.2	977.7	966.6	956.1
22.5°	1129.4	1095.3	1062.8	1029.3	1003.0	975.0	962.5	945.7	935.8	929.6	919.1
25°	1078.2	1041.2	1004.2	972.1	945.0	920.3	903.7	890.7	879.7	874.8	868.0
27.5°	1022.4	985.7	949.9	913.6	882.8	864.9	851.6	841.8	835.4	828.8	825.8
30°	986.9	948.7	910.5	876.6	848.2	830.4	818.1	811.3	806.3	803.3	800.1
32.5°	950.9	913.2	873.0	842.0	816.6	800.8	791.4	784.6	782.1	781.0	779.9
35°	893.2	855.0	818.1	790.3	766.2	760.1	752.1	748.3	747.2	751.4	753.3
37.5°	837.4	801.9	767.9	740.9	725.2	716.2	713.5	713.6	718.0	721.8	726.3
40°	801.4	766.9	734.8	711.4	696.6	691.1	689.8	692.9	697.9	702.1	707.0
42.5°	766.3	732.4	703.2	681.3	670.9	665.8	666.6	669.7	676.6	681.9	689.3
45°	712.0	683.7	655.3	637.4	628.7	630.0	630.0	635.5	642.3	650.3	658.4
47.5°	660.8	632.2	608.9	593.9	589.4	588.4	591.8	599.1	608.8	618.7	629.9
50°	626.3	599.1	578.8	565.3	560.4	562.2	567.1	573.9	585.6	598.0	609.7
52.5°	591.3	566.6	547.8	535.2	531.7	535.1	540.0	550.7	561.0	574.3	588.4
55°	536.9	515.9	501.1	492.0	490.7	492.6	498.1	509.8	524.6	541.3	554.8
57.5°	482.8	465.3	451.7	445.3	445.9	447.6	456.8	470.7	486.5	504.3	521.7
60°	446.3	430.3	419.2	414.3	414.8	418.6	429.6	442.6	462.4	479.6	498.1
62.5°	411.8	397.7	387.1	382.7	381.8	389.9	400.6	414.0	433.7	453.0	473.0
65°	356.3	345.2	336.6	334.1	336.0	342.1	355.7	373.5	390.2	410.5	431.5
67.5°	302.0	292.9	287.0	288.1	290.3	299.4	310.9	326.2	345.1	366.1	386.9
70°	267.5	258.9	254.0	254.6	258.3	269.4	279.3	294.6	315.0	336.6	353.8
72.5°	232.0	226.3	221.9	224.5	228.2	235.9	248.2	263.6	281.5	301.6	319.8
75°	178.2	178.2	175.7	177.5	183.1	190.5	199.7	215.8	233.6	249.7	264.5
77.5°	132.2	130.8	132.4	134.6	137.9	146.6	157.2	168.6	182.1	198.1	210.4
80°	101.1	101.7	104.8	108.5	109.8	116.5	127.6	138.1	148.6	162.1	173.8
82.5°	76.0	76.6	78.2	82.8	84.1	91.4	98.5	109.0	118.5	127.6	137.3
85°	41.3	41.3	44.4	46.2	49.3	54.2	58.6	64.7	73.4	79.5	88.7
87.5°	17.6	17.8	20.1	21.3	23.0	25.8	26.9	32.5	34.7	37.4	41.9
90°	8.9	10.3	11.6	12.8	14.1	15.3	16.2	17.2	18.1	19.1	19.7
92.5°	9.2	9.8	11.1	12.3	13.6	14.8	15.7	16.7	17.6	18.5	19.0
95°	17.3	14.7	14.9	15.1	15.2	15.3	16.2	17.2	18.1	19.1	19.6
97.5°	94.6	87.6	70.3	53.0	35.7	18.4	18.5	18.6	18.7	18.8	18.9
100°	125.5	116.2	94.8	73.5	52.1	30.7	28.0	25.4	22.7	20.2	18.9
102.5°	159.3	159.0	156.1	153.4	150.6	147.8	119.4	91.0	62.6	34.2	20.0
105°	213.6	214.5	215.2	216.0	216.8	217.5	218.9	220.3	221.7	223.1	221.1
107.5°	266.3	267.0	268.0	269.1	270.2	271.3	271.9	272.6	273.2	273.9	274.6
110°	303.1	303.7	304.7	305.6	306.6	307.5	307.8	308.1	308.4	308.7	309.1



TEST NUMBER: P332643-940

CATALOG NUMBER: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	340.3	340.9	341.3	341.7	342.1	342.6	342.6	342.5	342.4	342.3	342.6
115°	393.7	393.9	393.7	393.5	393.4	393.2	393.5	393.9	394.1	394.5	394.7
117.5°	443.8	444.3	444.6	445.0	445.3	445.7	445.6	445.5	445.5	445.4	445.3
120°	477.2	477.5	477.3	477.2	477.1	476.9	477.2	477.5	477.9	478.1	478.1
122.5°	507.6	507.8	508.0	508.3	508.5	508.7	508.9	509.1	509.3	509.4	509.3
125°	553.3	553.4	553.1	552.9	552.5	552.2	552.7	553.1	553.6	554.0	554.4
127.5°	593.8	594.2	594.9	595.7	596.4	597.1	597.0	596.9	596.8	596.7	596.6
130°	621.2	621.4	621.9	622.4	622.9	623.3	623.5	623.7	623.8	623.9	624.0
132.5°	646.8	647.2	647.7	648.4	648.9	649.5	649.7	649.9	650.0	650.1	650.1
135°	682.7	682.9	683.5	684.1	684.7	685.4	685.6	686.0	686.3	686.6	686.9
137.5°	716.8	717.2	717.9	718.6	719.3	720.0	720.3	720.6	720.9	721.3	721.4
140°	739.6	739.9	740.2	740.6	740.8	741.1	741.6	742.1	742.5	743.0	743.3
142.5°	760.1	760.5	760.6	760.9	761.1	761.3	761.6	761.9	762.2	762.6	762.8
145°	789.7	790.0	790.0	790.0	790.0	790.0	790.1	790.2	790.4	790.6	790.8
147.5°	815.2	815.6	815.4	815.2	815.0	814.9	815.0	815.2	815.3	815.4	815.6
150°	831.4	831.7	831.5	831.4	831.3	831.1	831.1	831.1	831.1	831.1	831.2
152.5°	845.5	845.6	845.3	845.1	844.7	844.5	844.7	845.0	845.3	845.4	845.5
155°	864.5	864.3	863.9	863.4	862.9	862.5	863.1	863.7	864.3	865.0	865.0
157.5°	880.7	880.3	879.8	879.3	878.8	878.2	879.0	879.9	880.7	881.5	881.5
160°	889.2	888.9	888.8	888.6	888.4	888.2	889.2	890.1	891.1	892.0	892.0
162.5°	897.6	897.2	897.1	897.0	896.8	896.6	897.6	898.5	899.4	900.4	900.3
165°	908.2	907.8	907.8	907.8	907.8	907.8	909.0	910.3	911.5	912.8	912.7
167.5°	916.9	916.5	916.4	916.3	916.2	916.1	917.5	918.9	920.2	921.6	921.5
170°	921.5	921.1	921.2	921.4	921.6	921.8	922.9	924.2	925.4	926.7	926.5
172.5°	924.9	924.4	924.6	924.8	924.9	925.1	926.3	927.6	928.8	930.1	929.8
175°	928.4	928.1	928.3	928.4	928.5	928.7	930.1	931.5	932.9	934.2	934.1
177.5°	930.4	930.1	930.3	930.6	930.9	931.0	932.0	933.1	934.1	935.0	934.8
180°	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2



TEST NUMBER: P332643-940

CATALOG NUMBER: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
0°	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1
2.5°	1418.1	1417.1	1413.6	1413.2	1413.6	1417.1	1418.1	1419.1	1420.5	1425.5	1419.5
5°	1309.9	1306.9	1305.0	1311.8	1305.0	1306.9	1309.9	1313.7	1319.8	1320.4	1326.6
7.5°	1228.4	1226.0	1220.6	1218.9	1220.6	1226.0	1228.4	1230.7	1236.8	1242.2	1251.2
10°	1176.2	1173.7	1168.8	1167.5	1168.8	1173.7	1176.2	1182.3	1188.5	1195.2	1201.5
12.5°	1125.9	1121.0	1120.0	1121.1	1120.0	1121.0	1125.9	1134.0	1150.0	1150.0	1151.1
15°	1059.1	1056.6	1049.8	1051.7	1049.8	1056.6	1059.1	1067.1	1074.4	1083.7	1093.0
17.5°	993.2	990.2	982.0	989.3	982.0	990.2	993.2	997.6	1007.0	1020.1	1034.0
20°	951.8	946.8	942.5	941.9	942.5	946.8	951.8	956.1	966.6	977.7	988.2
22.5°	912.3	907.9	907.5	903.5	907.5	907.9	912.3	919.1	929.6	935.8	945.7
25°	863.0	858.7	857.5	854.4	857.5	858.7	863.0	868.0	874.8	879.7	890.7
27.5°	825.2	823.0	820.8	821.8	820.8	823.0	825.2	825.8	828.8	835.4	841.8
30°	802.0	801.4	800.1	800.1	800.1	801.4	802.0	800.1	803.3	806.3	811.3
32.5°	782.7	782.7	783.4	783.4	783.4	782.7	782.7	779.9	781.0	782.1	784.6
35°	755.7	757.6	758.8	757.0	758.8	757.6	755.7	753.3	751.4	747.2	748.3
37.5°	731.4	733.2	734.9	737.0	734.9	733.2	731.4	726.3	721.8	718.0	713.6
40°	712.6	716.9	718.2	721.2	718.2	716.9	712.6	707.0	702.1	697.9	692.9
42.5°	694.8	699.6	702.8	703.5	702.8	699.6	694.8	689.3	681.9	676.6	669.7
45°	667.6	672.5	676.9	676.9	676.9	672.5	667.6	658.4	650.3	642.3	635.5
47.5°	639.4	646.5	650.9	651.9	650.9	646.5	639.4	629.9	618.7	608.8	599.1
50°	620.2	628.7	633.1	636.1	633.1	628.7	620.2	609.7	598.0	585.6	573.9
52.5°	601.4	610.0	615.8	617.4	615.8	610.0	601.4	588.4	574.3	561.0	550.7
55°	569.0	581.3	588.1	590.6	588.1	581.3	569.0	554.8	541.3	524.6	509.8
57.5°	538.4	549.7	557.7	559.5	557.7	549.7	538.4	521.7	504.3	486.5	470.7
60°	514.7	527.1	536.9	538.8	536.9	527.1	514.7	498.1	479.6	462.4	442.6
62.5°	490.5	503.4	512.3	517.1	512.3	503.4	490.5	473.0	453.0	433.7	414.0
65°	448.8	461.7	470.4	472.2	470.4	461.7	448.8	431.5	410.5	390.2	373.5
67.5°	403.1	416.1	421.8	425.3	421.8	416.1	403.1	386.9	366.1	345.1	326.2
70°	371.1	381.6	387.7	390.8	387.7	381.6	371.1	353.8	336.6	315.0	294.6
72.5°	334.6	345.5	352.8	353.4	352.8	345.5	334.6	319.8	301.6	281.5	263.6
75°	278.7	288.5	292.2	292.2	292.2	288.5	278.7	264.5	249.7	233.6	215.8
77.5°	220.5	225.6	230.3	231.3	230.3	225.6	220.5	210.4	198.1	182.1	168.6
80°	183.1	186.2	189.8	189.8	189.8	186.2	183.1	173.8	162.1	148.6	138.1
82.5°	144.6	147.2	150.9	150.4	150.9	147.2	144.6	137.3	127.6	118.5	109.0
85°	87.6	93.1	92.5	91.2	92.5	93.1	87.6	88.7	79.5	73.4	64.7
87.5°	43.4	44.0	45.6	46.6	45.6	44.0	43.4	41.9	37.4	34.7	32.5
90°	20.0	20.3	20.6	21.0	20.6	20.3	20.0	19.7	19.1	18.1	17.2
92.5°	19.1	19.1	19.2	19.3	19.2	19.1	19.1	19.0	18.5	17.6	16.7
95°	19.8	19.9	20.1	20.2	20.1	19.9	19.8	19.6	19.1	18.1	17.2
97.5°	19.1	19.2	19.4	19.5	19.4	19.2	19.1	18.9	18.8	18.7	18.6
100°	19.1	19.2	19.4	19.5	19.4	19.2	19.1	18.9	20.2	22.7	25.4
102.5°	20.0	20.0	20.1	20.1	20.1	20.0	20.0	20.0	34.2	62.6	91.0
105°	215.4	209.8	204.3	198.7	204.3	209.8	215.4	221.1	223.1	221.7	220.3
107.5°	275.2	275.7	276.3	277.0	276.3	275.7	275.2	274.6	273.9	273.2	272.6
110°	309.6	310.0	310.5	310.9	310.5	310.0	309.6	309.1	308.7	308.4	308.1



TEST NUMBER: P332643-940

CATALOG NUMBER: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	343.2	343.8	344.4	345.0	344.4	343.8	343.2	342.6	342.3	342.4	342.5
115°	394.7	394.7	394.7	394.7	394.7	394.7	394.7	394.7	394.5	394.1	393.9
117.5°	445.3	445.2	445.1	445.1	445.1	445.2	445.3	445.3	445.4	445.5	445.5
120°	477.9	477.5	477.2	476.9	477.2	477.5	477.9	478.1	478.1	477.9	477.5
122.5°	509.1	508.7	508.5	508.1	508.5	508.7	509.1	509.3	509.4	509.3	509.1
125°	554.6	554.6	554.8	555.0	554.8	554.6	554.6	554.4	554.0	553.6	553.1
127.5°	596.5	596.4	596.3	596.1	596.3	596.4	596.5	596.6	596.7	596.8	596.9
130°	624.0	624.0	624.0	624.0	624.0	624.0	624.0	624.0	623.9	623.8	623.7
132.5°	650.1	649.9	649.8	649.7	649.8	649.9	650.1	650.1	650.1	650.0	649.9
135°	687.2	687.5	687.9	688.1	687.9	687.5	687.2	686.9	686.6	686.3	686.0
137.5°	721.3	721.2	721.1	721.0	721.1	721.2	721.3	721.4	721.3	720.9	720.6
140°	743.5	743.6	743.8	744.0	743.8	743.6	743.5	743.3	743.0	742.5	742.1
142.5°	762.8	762.9	762.9	762.9	762.9	762.9	762.8	762.8	762.6	762.2	761.9
145°	791.1	791.4	791.8	792.0	791.8	791.4	791.1	790.8	790.6	790.4	790.2
147.5°	815.7	815.8	816.0	816.2	816.0	815.8	815.7	815.6	815.4	815.3	815.2
150°	831.3	831.4	831.6	831.8	831.6	831.4	831.3	831.2	831.1	831.1	831.1
152.5°	845.4	845.3	845.3	845.2	845.3	845.3	845.4	845.5	845.4	845.3	845.0
155°	864.5	864.1	863.6	863.2	863.6	864.1	864.5	865.0	865.0	864.3	863.7
157.5°	880.7	879.9	879.0	878.2	879.0	879.9	880.7	881.5	881.5	880.7	879.9
160°	891.1	890.1	889.2	888.2	889.2	890.1	891.1	892.0	892.0	891.1	890.1
162.5°	899.2	898.1	897.2	896.1	897.2	898.1	899.2	900.3	900.4	899.4	898.5
165°	911.2	909.9	908.5	907.0	908.5	909.9	911.2	912.7	912.8	911.5	910.3
167.5°	920.0	918.4	916.9	915.3	916.9	918.4	920.0	921.5	921.6	920.2	918.9
170°	925.0	923.5	921.9	920.3	921.9	923.5	925.0	926.5	926.7	925.4	924.2
172.5°	928.2	926.5	924.8	923.1	924.8	926.5	928.2	929.8	930.1	928.8	927.6
175°	932.2	930.3	928.4	926.6	928.4	930.3	932.2	934.1	934.2	932.9	931.5
177.5°	933.3	931.8	930.3	928.8	930.3	931.8	933.3	934.8	935.0	934.1	933.1
180°	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2



TEST NUMBER: P332643-940

CATALOG NUMBER: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
0°	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1
2.5°	1422.5	1424.5	1432.4	1439.8	1448.7	1455.1	1459.5	1464.5	1474.8	1483.2	1491.0
5°	1332.8	1335.9	1351.8	1363.0	1382.1	1398.7	1411.7	1425.8	1442.5	1465.3	1486.2
7.5°	1253.7	1265.2	1282.7	1300.7	1320.2	1342.0	1361.0	1382.3	1411.0	1442.3	1474.6
10°	1208.9	1221.8	1240.3	1261.2	1279.8	1305.0	1328.5	1353.7	1386.3	1424.6	1462.9
12.5°	1164.0	1185.3	1199.4	1224.2	1244.2	1265.1	1289.9	1323.1	1361.2	1401.4	1447.5
15°	1107.8	1119.5	1146.6	1160.1	1188.5	1220.6	1245.2	1278.5	1315.5	1368.5	1420.3
17.5°	1042.9	1058.3	1079.9	1105.8	1138.4	1163.3	1194.1	1228.3	1275.0	1327.6	1392.4
20°	1000.5	1013.4	1039.9	1068.3	1102.8	1129.4	1162.0	1195.2	1243.4	1299.5	1367.3
22.5°	962.5	975.0	1003.0	1029.3	1062.8	1095.3	1129.4	1168.1	1214.2	1273.4	1342.6
25°	903.7	920.3	945.0	972.1	1004.2	1041.2	1078.2	1112.7	1162.0	1224.2	1298.2
27.5°	851.6	864.9	882.8	913.6	949.9	985.7	1022.4	1065.9	1113.2	1179.0	1255.8
30°	818.1	830.4	848.2	876.6	910.5	948.7	986.9	1028.9	1078.2	1143.5	1221.8
32.5°	791.4	800.8	816.6	842.0	873.0	913.2	950.9	994.3	1046.1	1110.4	1186.8
35°	752.1	760.1	766.2	790.3	818.1	855.0	893.2	939.5	989.4	1050.4	1126.9
37.5°	713.5	716.2	725.2	740.9	767.9	801.9	837.4	882.9	934.1	996.0	1065.0
40°	689.8	691.1	696.6	711.4	734.8	766.9	801.4	846.4	895.1	953.7	1022.1
42.5°	666.6	665.8	670.9	681.3	703.2	732.4	766.3	807.4	856.1	910.3	974.7
45°	630.0	630.0	628.7	637.4	655.3	683.7	712.0	751.4	792.1	845.2	899.4
47.5°	591.8	588.4	589.4	593.9	608.9	632.2	660.8	693.1	729.0	773.9	821.4
50°	567.1	562.2	560.4	565.3	578.8	599.1	626.3	654.7	688.6	728.0	768.7
52.5°	540.0	535.1	531.7	535.2	547.8	566.6	591.3	616.2	646.7	678.7	714.0
55°	498.1	492.6	490.7	492.0	501.1	515.9	536.9	559.7	582.6	609.0	633.7
57.5°	456.8	447.6	445.9	445.3	451.7	465.3	482.8	502.6	519.2	535.2	561.4
60°	429.6	418.6	414.8	414.3	419.2	430.3	446.3	466.0	477.8	488.8	511.7
62.5°	400.6	389.9	381.8	382.7	387.1	397.7	411.8	426.1	433.8	445.9	461.4
65°	355.7	342.1	336.0	334.1	336.6	345.2	356.3	365.5	374.2	379.2	393.9
67.5°	310.9	299.4	290.3	288.1	287.0	292.9	302.0	307.6	313.8	318.1	326.8
70°	279.3	269.4	258.3	254.6	254.0	258.9	267.5	268.1	276.8	278.7	287.8
72.5°	248.2	235.9	228.2	224.5	221.9	226.3	232.0	233.6	238.4	241.7	246.5
75°	199.7	190.5	183.1	177.5	175.7	178.2	178.2	181.2	184.3	186.2	191.7
77.5°	157.2	146.6	137.9	134.6	132.4	130.8	132.2	134.0	132.5	135.7	137.0
80°	127.6	116.5	109.8	108.5	104.8	101.7	101.1	102.9	100.5	101.7	105.4
82.5°	98.5	91.4	84.1	82.8	78.2	76.6	76.0	74.8	74.8	74.5	75.3
85°	58.6	54.2	49.3	46.2	44.4	41.3	41.3	40.0	38.9	37.6	38.3
87.5°	26.9	25.8	23.0	21.3	20.1	17.8	17.6	15.8	14.9	14.1	13.2
90°	16.2	15.3	14.1	12.8	11.6	10.3	8.9	7.2	5.5	3.8	2.1
92.5°	15.7	14.8	13.6	12.3	11.1	9.8	9.2	9.1	9.0	8.9	8.8
95°	16.2	15.3	15.2	15.1	14.9	14.7	17.3	22.6	27.8	33.1	38.3
97.5°	18.5	18.4	35.7	53.0	70.3	87.6	94.6	91.3	88.0	84.7	81.4
100°	28.0	30.7	52.1	73.5	94.8	116.2	125.5	122.7	119.9	117.2	114.3
102.5°	119.4	147.8	150.6	153.4	156.1	159.0	159.3	157.3	155.2	153.2	151.1
105°	218.9	217.5	216.8	216.0	215.2	214.5	213.6	212.7	211.7	210.8	209.8
107.5°	271.9	271.3	270.2	269.1	268.0	267.0	266.3	265.8	265.3	264.8	264.4
110°	307.8	307.5	306.6	305.6	304.7	303.7	303.1	302.6	302.1	301.7	301.2



TEST NUMBER: P332643-940

CATALOG NUMBER: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	342.6	342.6	342.1	341.7	341.3	340.9	340.3	339.4	338.6	337.7	336.9
115°	393.5	393.2	393.4	393.5	393.7	393.9	393.7	393.2	392.8	392.3	391.8
117.5°	445.6	445.7	445.3	445.0	444.6	444.3	443.8	443.2	442.6	441.9	441.3
120°	477.2	476.9	477.1	477.2	477.3	477.5	477.2	476.7	476.1	475.5	474.8
122.5°	508.9	508.7	508.5	508.3	508.0	507.8	507.6	507.1	506.8	506.4	506.0
125°	552.7	552.2	552.5	552.9	553.1	553.4	553.3	552.7	552.1	551.4	550.8
127.5°	597.0	597.1	596.4	595.7	594.9	594.2	593.8	593.7	593.5	593.3	593.2
130°	623.5	623.3	622.9	622.4	621.9	621.4	621.2	621.0	620.8	620.7	620.5
132.5°	649.7	649.5	648.9	648.4	647.7	647.2	646.8	646.5	646.2	645.9	645.6
135°	685.6	685.4	684.7	684.1	683.5	682.9	682.7	682.8	683.0	683.1	683.3
137.5°	720.3	720.0	719.3	718.6	717.9	717.2	716.8	716.8	716.8	716.7	716.6
140°	741.6	741.1	740.8	740.6	740.2	739.9	739.6	739.3	739.0	738.7	738.3
142.5°	761.6	761.3	761.1	760.9	760.6	760.5	760.1	759.6	759.0	758.4	757.9
145°	790.1	790.0	790.0	790.0	790.0	790.0	789.7	789.3	788.8	788.4	787.8
147.5°	815.0	814.9	815.0	815.2	815.4	815.6	815.2	814.3	813.4	812.6	811.7
150°	831.1	831.1	831.3	831.4	831.5	831.7	831.4	830.9	830.3	829.6	829.0
152.5°	844.7	844.5	844.7	845.1	845.3	845.6	845.5	845.0	844.5	844.0	843.5
155°	863.1	862.5	862.9	863.4	863.9	864.3	864.5	864.3	864.2	864.0	863.9
157.5°	879.0	878.2	878.8	879.3	879.8	880.3	880.7	880.7	880.8	880.9	881.0
160°	889.2	888.2	888.4	888.6	888.8	888.9	889.2	889.7	890.1	890.6	891.1
162.5°	897.6	896.6	896.8	897.0	897.1	897.2	897.6	898.2	898.8	899.4	900.0
165°	909.0	907.8	907.8	907.8	907.8	907.8	908.2	908.9	909.7	910.5	911.2
167.5°	917.5	916.1	916.2	916.3	916.4	916.5	916.9	917.7	918.6	919.4	920.2
170°	922.9	921.8	921.6	921.4	921.2	921.1	921.5	922.4	923.4	924.3	925.2
172.5°	926.3	925.1	924.9	924.8	924.6	924.4	924.9	925.8	926.7	927.6	928.5
175°	930.1	928.7	928.5	928.4	928.3	928.1	928.4	929.4	930.3	931.2	932.2
177.5°	932.0	931.0	930.9	930.6	930.3	930.1	930.4	931.2	932.1	933.0	933.9
180°	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2



TEST NUMBER: P332643-940

CATALOG NUMBER: SA4XXDIP-C1020D810U940-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
0°	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1
2.5°	1498.0	1502.9	1509.3	1520.2	1524.1	1529.0	1536.0	1535.4	1537.4	1544.8	1560.6
5°	1503.5	1522.6	1541.1	1563.3	1586.7	1602.1	1623.1	1636.0	1649.0	1665.6	1694.0
7.5°	1505.7	1536.1	1569.9	1608.9	1643.6	1683.6	1714.7	1744.0	1770.6	1805.7	1839.5
10°	1502.3	1542.9	1586.7	1636.0	1688.5	1732.9	1772.9	1818.6	1857.3	1899.9	1938.1
12.5°	1495.8	1545.0	1603.5	1658.8	1720.0	1785.6	1835.5	1881.6	1933.3	1982.3	2041.2
15°	1481.3	1548.5	1616.9	1689.7	1771.7	1847.4	1919.6	1979.4	2034.9	2108.3	2185.3
17.5°	1462.9	1535.3	1621.6	1709.7	1795.4	1882.0	1971.3	2061.2	2131.2	2222.3	2282.6
20°	1445.6	1529.4	1618.2	1723.0	1808.7	1916.6	2005.3	2092.2	2188.3	2279.0	2351.1
22.5°	1421.4	1513.1	1607.3	1711.6	1824.4	1932.3	2034.9	2129.2	2225.4	2323.9	2411.3
25°	1390.7	1473.9	1585.5	1703.9	1816.1	1933.1	2050.9	2169.3	2272.8	2377.0	2458.4
27.5°	1338.5	1443.5	1547.4	1669.6	1794.2	1926.7	2052.6	2176.6	2285.0	2370.7	2421.2
30°	1311.8	1403.0	1515.8	1638.5	1773.5	1915.9	2047.2	2168.6	2269.8	2338.2	2358.5
32.5°	1272.4	1366.5	1476.9	1604.0	1746.9	1893.2	2030.0	2144.5	2228.8	2264.7	2240.2
35°	1213.8	1298.9	1410.4	1540.5	1689.1	1845.0	1980.0	2076.8	2120.0	2086.1	2001.6
37.5°	1143.5	1227.8	1339.9	1467.7	1621.4	1779.9	1902.0	1971.7	1957.3	1873.0	1747.1
40°	1094.2	1173.1	1279.8	1417.8	1567.6	1726.6	1833.9	1871.5	1832.1	1711.3	1577.5
42.5°	1039.5	1116.4	1223.5	1356.6	1515.4	1662.1	1755.5	1758.6	1692.5	1548.0	1413.7
45°	956.1	1029.5	1130.6	1269.3	1415.9	1554.1	1615.7	1585.5	1463.5	1324.1	1189.1
47.5°	873.9	937.5	1037.1	1168.8	1308.1	1424.3	1454.9	1400.5	1270.5	1135.2	1010.1
50°	813.7	877.8	971.5	1097.3	1231.6	1332.1	1346.9	1274.8	1147.2	1010.9	912.9
52.5°	756.0	819.7	909.9	1026.3	1149.3	1239.9	1240.4	1156.9	1029.8	908.4	817.3
55°	671.3	728.6	810.0	914.2	1024.0	1094.8	1077.5	991.2	880.9	775.5	696.0
57.5°	589.7	639.6	714.6	801.5	898.1	956.6	928.0	844.9	746.4	657.0	596.7
60°	536.9	584.4	648.5	730.5	811.9	857.5	830.4	755.1	664.5	592.4	540.0
62.5°	485.6	525.7	587.4	658.5	734.0	767.8	743.6	669.3	591.0	525.8	483.3
65°	413.0	445.7	495.0	556.1	610.9	639.9	619.6	550.5	490.7	443.8	409.9
67.5°	345.2	370.8	408.0	457.0	503.6	519.3	500.8	452.7	402.1	364.5	340.6
70°	298.4	322.4	353.8	391.5	432.1	448.8	430.3	392.1	350.8	316.2	292.8
72.5°	257.4	276.1	302.6	334.7	366.6	383.2	370.6	333.9	299.0	273.3	253.3
75°	196.0	212.0	230.5	253.3	278.0	289.1	278.0	252.7	228.7	209.6	195.4
77.5°	142.5	151.1	165.4	182.4	197.9	206.3	196.8	179.6	165.0	151.9	144.9
80°	108.5	114.7	124.5	138.1	148.6	156.6	150.4	136.3	124.5	115.9	112.8
82.5°	78.9	83.1	89.5	99.6	106.6	110.8	108.0	97.7	92.9	85.3	82.2
85°	38.9	41.3	45.7	48.7	54.8	55.5	56.1	51.8	47.4	45.7	43.2
87.5°	14.1	14.9	16.8	18.5	20.8	21.6	21.3	21.6	19.8	19.5	17.7
90°	3.8	5.5	7.2	8.9	10.3	11.6	12.8	14.1	15.3	16.2	17.2
92.5°	8.9	9.0	9.1	9.2	9.8	11.1	12.3	13.6	14.8	15.7	16.7
95°	33.1	27.8	22.6	17.3	14.7	14.9	15.1	15.2	15.3	16.2	17.2
97.5°	84.7	88.0	91.3	94.6	87.6	70.3	53.0	35.7	18.4	18.5	18.6
100°	117.2	119.9	122.7	125.5	116.2	94.8	73.5	52.1	30.7	28.0	25.4
102.5°	153.2	155.2	157.3	159.3	159.0	156.1	153.4	150.6	147.8	119.4	91.0
105°	210.8	211.7	212.7	213.6	214.5	215.2	216.0	216.8	217.5	218.9	220.3
107.5°	264.8	265.3	265.8	266.3	267.0	268.0	269.1	270.2	271.3	271.9	272.6
110°	301.7	302.1	302.6	303.1	303.7	304.7	305.6	306.6	307.5	307.8	308.1



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CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	337.7	338.6	339.4	340.3	340.9	341.3	341.7	342.1	342.6	342.6	342.5
115°	392.3	392.8	393.2	393.7	393.9	393.7	393.5	393.4	393.2	393.5	393.9
117.5°	441.9	442.6	443.2	443.8	444.3	444.6	445.0	445.3	445.7	445.6	445.5
120°	475.5	476.1	476.7	477.2	477.5	477.3	477.2	477.1	476.9	477.2	477.5
122.5°	506.4	506.8	507.1	507.6	507.8	508.0	508.3	508.5	508.7	508.9	509.1
125°	551.4	552.1	552.7	553.3	553.4	553.1	552.9	552.5	552.2	552.7	553.1
127.5°	593.3	593.5	593.7	593.8	594.2	594.9	595.7	596.4	597.1	597.0	596.9
130°	620.7	620.8	621.0	621.2	621.4	621.9	622.4	622.9	623.3	623.5	623.7
132.5°	645.9	646.2	646.5	646.8	647.2	647.7	648.4	648.9	649.5	649.7	649.9
135°	683.1	683.0	682.8	682.7	682.9	683.5	684.1	684.7	685.4	685.6	686.0
137.5°	716.7	716.8	716.8	716.8	717.2	717.9	718.6	719.3	720.0	720.3	720.6
140°	738.7	739.0	739.3	739.6	739.9	740.2	740.6	740.8	741.1	741.6	742.1
142.5°	758.4	759.0	759.6	760.1	760.5	760.6	760.9	761.1	761.3	761.6	761.9
145°	788.4	788.8	789.3	789.7	790.0	790.0	790.0	790.0	790.0	790.1	790.2
147.5°	812.6	813.4	814.3	815.2	815.6	815.4	815.2	815.0	814.9	815.0	815.2
150°	829.6	830.3	830.9	831.4	831.7	831.5	831.4	831.3	831.1	831.1	831.1
152.5°	844.0	844.5	845.0	845.5	845.6	845.3	845.1	844.7	844.5	844.7	845.0
155°	864.0	864.2	864.3	864.5	864.3	863.9	863.4	862.9	862.5	863.1	863.7
157.5°	880.9	880.8	880.7	880.7	880.3	879.8	879.3	878.8	878.2	879.0	879.9
160°	890.6	890.1	889.7	889.2	888.9	888.8	888.6	888.4	888.2	889.2	890.1
162.5°	899.4	898.8	898.2	897.6	897.2	897.1	897.0	896.8	896.6	897.6	898.5
165°	910.5	909.7	908.9	908.2	907.8	907.8	907.8	907.8	907.8	909.0	910.3
167.5°	919.4	918.6	917.7	916.9	916.5	916.4	916.3	916.2	916.1	917.5	918.9
170°	924.3	923.4	922.4	921.5	921.1	921.2	921.4	921.6	921.8	922.9	924.2
172.5°	927.6	926.7	925.8	924.9	924.4	924.6	924.8	924.9	925.1	926.3	927.6
175°	931.2	930.3	929.4	928.4	928.1	928.3	928.4	928.5	928.7	930.1	931.5
177.5°	933.0	932.1	931.2	930.4	930.1	930.3	930.6	930.9	931.0	932.0	933.1
180°	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2	932.2



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
0°	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1	1488.1
2.5°	1568.5	1569.5	1573.9	1577.3	1578.3	1583.3	1583.8
5°	1706.3	1716.8	1737.1	1739.0	1742.0	1758.1	1745.8
7.5°	1867.9	1894.4	1912.2	1927.9	1933.6	1940.5	1939.1
10°	1971.4	2010.8	2030.6	2062.0	2063.2	2071.3	2066.4
12.5°	2075.5	2121.3	2157.3	2163.1	2189.5	2193.5	2200.5
15°	2222.9	2271.6	2321.6	2339.4	2375.8	2384.4	2398.0
17.5°	2361.5	2411.3	2446.3	2492.5	2507.5	2527.5	2513.8
20°	2437.4	2491.7	2536.0	2572.4	2587.8	2598.9	2597.7
22.5°	2483.3	2538.0	2574.0	2601.5	2615.9	2620.6	2620.4
25°	2512.0	2543.4	2554.6	2565.0	2549.0	2543.4	2545.9
27.5°	2432.1	2424.0	2395.0	2357.1	2317.6	2286.3	2269.2
30°	2322.2	2274.0	2230.3	2153.8	2114.4	2091.0	2070.0
32.5°	2166.3	2090.1	2005.9	1935.9	1891.1	1856.3	1851.1
35°	1899.3	1784.6	1681.7	1596.0	1551.6	1513.9	1505.4
37.5°	1614.7	1495.6	1402.9	1327.5	1279.8	1253.2	1228.4
40°	1425.8	1323.5	1232.3	1168.1	1131.8	1112.7	1097.3
42.5°	1280.3	1186.9	1096.2	1047.3	1014.4	1002.7	993.7
45°	1079.4	992.5	929.6	892.6	873.5	853.8	844.5
47.5°	918.5	847.7	806.3	774.9	754.4	742.7	736.7
50°	827.2	769.3	732.4	708.3	689.8	680.6	675.6
52.5°	746.4	698.8	667.7	648.6	636.1	629.3	627.3
55°	642.9	606.5	586.8	570.2	561.0	554.8	552.3
57.5°	558.8	530.9	514.9	501.1	497.6	492.4	490.7
60°	503.6	482.1	468.5	459.2	456.2	450.0	451.2
62.5°	454.8	437.2	425.6	420.3	416.3	411.1	412.8
65°	384.7	371.8	365.5	360.6	355.7	352.6	355.1
67.5°	322.8	313.9	305.5	302.6	300.2	299.7	297.1
70°	282.3	274.9	267.5	265.7	265.7	263.2	262.6
72.5°	243.3	237.9	233.0	231.7	229.7	230.7	228.1
75°	188.0	183.7	181.8	180.0	179.4	179.4	177.5
77.5°	138.9	135.7	132.8	132.8	130.5	129.7	129.5
80°	105.4	104.2	101.7	101.7	100.5	101.1	99.9
82.5°	79.3	77.6	77.0	76.1	74.4	74.5	73.2
85°	42.5	40.7	40.0	38.3	37.0	38.3	37.0
87.5°	18.5	18.1	17.7	16.9	16.4	16.4	15.1
90°	18.1	19.1	19.7	20.0	20.3	20.6	21.0
92.5°	17.6	18.5	19.0	19.1	19.1	19.2	19.3
95°	18.1	19.1	19.6	19.8	19.9	20.1	20.2
97.5°	18.7	18.8	18.9	19.1	19.2	19.4	19.5
100°	22.7	20.2	18.9	19.1	19.2	19.4	19.5
102.5°	62.6	34.2	20.0	20.0	20.0	20.1	20.1
105°	221.7	223.1	221.1	215.4	209.8	204.3	198.7
107.5°	273.2	273.9	274.6	275.2	275.7	276.3	277.0
110°	308.4	308.7	309.1	309.6	310.0	310.5	310.9



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
112.5°	342.4	342.3	342.6	343.2	343.8	344.4	345.0
115°	394.1	394.5	394.7	394.7	394.7	394.7	394.7
117.5°	445.5	445.4	445.3	445.3	445.2	445.1	445.1
120°	477.9	478.1	478.1	477.9	477.5	477.2	476.9
122.5°	509.3	509.4	509.3	509.1	508.7	508.5	508.1
125°	553.6	554.0	554.4	554.6	554.6	554.8	555.0
127.5°	596.8	596.7	596.6	596.5	596.4	596.3	596.1
130°	623.8	623.9	624.0	624.0	624.0	624.0	624.0
132.5°	650.0	650.1	650.1	650.1	649.9	649.8	649.7
135°	686.3	686.6	686.9	687.2	687.5	687.9	688.1
137.5°	720.9	721.3	721.4	721.3	721.2	721.1	721.0
140°	742.5	743.0	743.3	743.5	743.6	743.8	744.0
142.5°	762.2	762.6	762.8	762.8	762.9	762.9	762.9
145°	790.4	790.6	790.8	791.1	791.4	791.8	792.0
147.5°	815.3	815.4	815.6	815.7	815.8	816.0	816.2
150°	831.1	831.1	831.2	831.3	831.4	831.6	831.8
152.5°	845.3	845.4	845.5	845.4	845.3	845.3	845.2
155°	864.3	865.0	865.0	864.5	864.1	863.6	863.2
157.5°	880.7	881.5	881.5	880.7	879.9	879.0	878.2
160°	891.1	892.0	892.0	891.1	890.1	889.2	888.2
162.5°	899.4	900.4	900.3	899.2	898.1	897.2	896.1
165°	911.5	912.8	912.7	911.2	909.9	908.5	907.0
167.5°	920.2	921.6	921.5	920.0	918.4	916.9	915.3
170°	925.4	926.7	926.5	925.0	923.5	921.9	920.3
172.5°	928.8	930.1	929.8	928.2	926.5	924.8	923.1
175°	932.9	934.2	934.1	932.2	930.3	928.4	926.6
177.5°	934.1	935.0	934.8	933.3	931.8	930.3	928.8
180°	932.2	932.2	932.2	932.2	932.2	932.2	932.2

(END OF REPORT)