

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: P332680-940

Luminaire Tested: **SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1**

Issue Date: 10/7/2019

Test Information

Test Method: LM-79-08
Report Number: P332680-940
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-10,
Test Lab: INNOVATION CENTER
Issue Date: 10/7/2019
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1
Description: DEFINE 4 DIRECT-INDIRECT PENDANT LED LUMINAIRE
DOWNLIGHT 1195 LUMENS PER FOOT, ASYMMETRIC DIFFUSER
UPLIGHT 590 LUMENS PER FOOT, FLUSH SATIN WHITE DIFFUSER
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

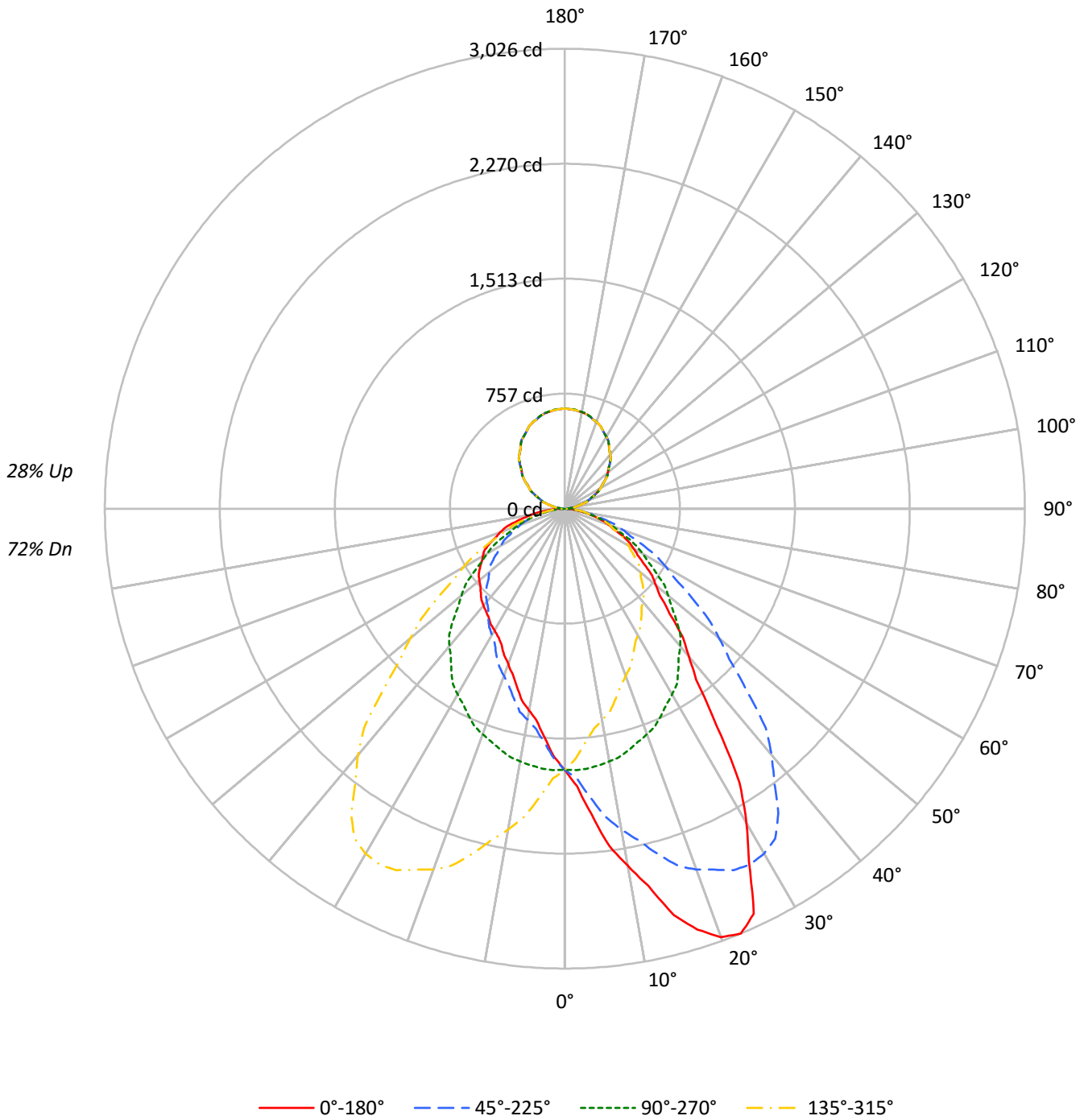
Lumens per Lamp: N/A
Luminaire Lumens: 6568.3 lumens
Efficiency: N/A
Efficacy: 119.2 lumens/watt
Spacing Criteria (0/90/45): 1.31 / 1.23 / 1.41
Luminous Opening: Rectangular (W 4' x L: 0.33' x H: 0')
CIE Type: Semi-Direct

Input Watts (W): 55.1
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	107	107	107	107	96	96	96	86	86	86	77	77	77	72
1	103	99	95	91	98	94	90	87	85	82	79	76	74	72	68	67	65	61
2	94	87	80	75	89	82	77	72	74	70	66	67	64	61	60	58	55	52
3	86	76	69	63	81	73	66	61	66	61	56	60	55	52	54	50	48	44
4	79	68	60	54	75	65	58	52	59	53	48	53	49	45	48	45	41	38
5	73	61	53	46	69	58	51	45	53	47	42	48	43	39	44	40	36	34
6	67	55	47	41	64	52	45	39	48	42	37	44	38	34	40	35	32	30
7	62	50	42	36	59	48	40	35	44	37	33	40	35	31	36	32	29	26
8	58	45	37	32	55	44	36	31	40	34	29	37	31	28	34	29	26	24
9	54	42	34	29	51	40	33	28	37	31	26	34	29	25	31	27	23	21
10	51	38	31	26	48	37	30	25	34	28	24	31	26	23	29	24	21	19

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	13875	13875	13875	13875
5°	16339	13910	12277	13910
10°	19563	13849	11053	13849
15°	23147	13709	10151	13709
20°	25775	13566	9346	13566
25°	26191	13356	8790	13356
30°	22287	13154	8614	13154
35°	17134	12827	8615	12827
40°	13355	12440	8778	12440
45°	11136	11860	8926	11860
50°	9800	11150	9229	11150
55°	8978	10301	9600	10301
60°	8414	9541	10046	9541
65°	7834	8692	10418	8692
70°	7159	7848	10655	7848
75°	6394	6906	10524	6906
80°	5360	5658	10195	5658
85°	3955	4085	9763	4085



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	167.4	2.5
10°-20°	516.1	7.9
20°-30°	818.4	12.5
30°-40°	910.7	13.9
40°-50°	829.0	12.6
50°-60°	677.5	10.3
60°-70°	483.6	7.4
70°-80°	266.3	4.1
80°-90°	74.7	1.1
90°-100°	43.4	0.7
100°-110°	128.5	2.0
110°-120°	218.1	3.3
120°-130°	287.6	4.4
130°-140°	322.9	4.9
140°-150°	317.3	4.8
150°-160°	266.9	4.1
160°-170°	177.6	2.7
170°-180°	62.2	0.9
0°-30°	1501.9	22.9
0°-40°	2412.6	36.7
0°-60°	3919.1	59.7
0°-90°	4743.8	72.2
90°-120°	389.9	5.9
90°-150°	1317.8	20.1
90°-180°	1824.0	27.8
0°-180°	6568.3	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	1719	1719	1719	1719	1719	
5°	2016	1716	1515	1716	2016	205
15°	2770	1640	1215	1640	2770	782
25°	2940	1499	987	1499	2940	1296
35°	1739	1302	874	1302	1739	1104
45°	975	1039	782	1039	975	768
55°	638	732	682	732	638	576
65°	410	455	545	455	410	406
75°	205	221	337	221	205	218
85°	43	44	105	44	43	52
90°	15	2	15	2	15	9
95°	40	30	40	30	40	42
105°	124	118	124	118	124	131
115°	220	222	220	222	220	217
125°	320	323	320	323	320	286
135°	417	416	417	416	417	322
145°	507	506	507	506	507	317
155°	579	580	579	580	579	267
165°	630	631	630	631	630	177
175°	654	657	654	657	654	62
180°	658	658	658	658	658	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7
2.5°	1829.2	1828.5	1822.9	1821.8	1817.8	1812.7	1811.5	1802.4	1784.1	1775.6	1773.3
5°	2016.2	2030.5	2012.0	2008.4	2006.3	1982.8	1970.7	1956.4	1923.7	1904.5	1889.5
7.5°	2239.5	2241.2	2233.1	2226.6	2208.5	2188.0	2157.2	2124.5	2085.4	2044.9	2014.3
10°	2386.5	2392.2	2382.9	2381.5	2345.2	2322.4	2276.8	2238.4	2194.2	2145.1	2100.2
12.5°	2541.4	2533.4	2528.7	2498.2	2491.5	2450.0	2397.0	2357.4	2289.4	2232.8	2173.2
15°	2769.5	2753.9	2743.9	2701.9	2681.2	2623.5	2567.3	2523.9	2434.9	2350.2	2286.1
17.5°	2903.3	2919.0	2895.9	2878.7	2825.3	2784.9	2727.4	2636.3	2566.6	2461.4	2380.5
20°	3000.2	3001.6	2988.7	2971.0	2929.0	2877.7	2815.0	2715.3	2632.1	2527.5	2416.4
22.5°	3026.4	3026.6	3021.2	3004.6	2972.8	2931.2	2868.0	2784.9	2684.0	2570.2	2459.1
25°	2940.3	2937.5	2943.9	2962.4	2950.3	2937.5	2901.2	2839.3	2745.3	2624.9	2505.4
27.5°	2620.8	2640.4	2676.6	2722.2	2766.1	2799.5	2809.0	2796.2	2738.0	2639.1	2513.7
30°	2390.8	2414.9	2442.0	2487.5	2575.9	2626.4	2681.9	2723.9	2700.5	2621.5	2504.6
32.5°	2137.9	2143.9	2184.0	2235.8	2316.7	2414.0	2502.0	2587.2	2615.6	2574.1	2476.7
35°	1738.6	1748.6	1792.0	1843.3	1942.2	2061.1	2193.5	2311.7	2409.2	2448.4	2398.5
37.5°	1418.8	1447.4	1478.0	1533.1	1620.2	1727.3	1864.9	2017.9	2163.2	2260.6	2277.1
40°	1267.3	1285.0	1307.2	1349.2	1423.2	1528.6	1646.7	1821.9	1976.4	2115.9	2161.5
42.5°	1147.6	1158.1	1171.6	1209.6	1266.0	1370.8	1478.7	1632.8	1787.9	1954.7	2031.0
45°	975.4	986.1	1008.8	1030.9	1073.6	1146.2	1246.6	1373.3	1529.3	1690.1	1831.1
47.5°	851.0	857.7	871.3	894.9	931.2	979.1	1060.8	1166.6	1311.2	1467.3	1617.6
50°	780.3	786.0	796.7	818.1	845.8	888.5	955.5	1054.4	1167.6	1324.9	1472.3
52.5°	724.5	726.7	734.6	749.1	771.2	807.1	862.0	943.9	1049.1	1189.4	1336.2
55°	637.9	640.8	647.9	658.5	677.8	700.5	742.5	803.8	895.6	1017.4	1144.8
57.5°	566.7	568.7	574.7	578.8	594.6	613.1	645.4	689.2	758.8	862.0	975.8
60°	521.1	519.7	526.8	530.4	541.1	556.8	581.7	623.7	684.2	767.5	872.2
62.5°	476.7	474.7	480.7	485.4	491.5	504.9	525.3	558.2	607.3	682.6	773.0
65°	410.1	407.2	410.8	416.5	422.2	429.3	444.3	473.4	512.6	566.7	635.8
67.5°	343.1	346.2	346.7	349.6	352.8	362.6	372.7	393.4	421.1	464.3	522.9
70°	303.3	304.0	306.8	306.8	309.0	317.5	326.1	338.1	365.2	405.1	452.8
72.5°	263.4	266.4	265.3	267.5	269.1	274.8	281.1	292.6	315.7	345.3	385.6
75°	205.0	207.1	207.1	207.9	210.0	212.1	217.1	225.7	242.1	264.1	291.9
77.5°	149.5	149.8	150.8	153.4	153.4	156.8	160.5	167.3	175.4	190.6	207.5
80°	115.3	116.7	116.0	117.4	117.4	120.3	121.7	130.3	133.8	143.8	157.3
82.5°	84.6	86.0	85.9	87.8	89.0	89.5	91.6	95.0	98.5	107.4	112.9
85°	42.7	44.1	42.7	44.1	46.3	47.0	49.1	49.8	52.7	54.8	59.8
87.5°	15.6	17.2	17.2	17.7	18.8	19.3	19.7	19.0	21.1	21.6	23.7
90°	15.2	15.1	14.8	14.6	14.4	13.9	13.2	12.6	11.9	11.1	10.3
92.5°	22.6	22.5	22.3	22.2	22.0	21.8	21.4	21.0	20.5	20.2	19.5
95°	40.2	40.2	40.2	40.2	40.2	40.0	39.7	39.3	39.0	38.6	37.9
97.5°	63.0	63.0	63.0	63.0	63.0	62.8	62.3	62.0	61.5	61.2	60.2
100°	78.8	78.8	78.8	78.8	78.8	78.7	78.5	78.3	78.0	77.8	76.8
102.5°	96.8	96.7	96.6	96.5	96.4	96.1	95.9	95.5	95.2	94.9	94.0
105°	124.1	123.8	123.4	123.1	122.7	122.4	122.1	121.7	121.4	121.0	120.6
107.5°	150.8	150.8	150.8	150.8	150.9	150.7	150.3	150.1	149.7	149.5	149.4
110°	169.9	169.5	169.2	168.9	168.5	168.4	168.7	168.9	169.2	169.3	169.5



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	189.4	189.3	189.2	189.2	189.1	189.1	189.1	189.2	189.2	189.3	189.5
115°	219.7	219.8	219.9	220.1	220.2	220.3	220.4	220.5	220.6	220.7	221.0
117.5°	248.6	248.8	249.1	249.2	249.5	249.8	250.2	250.6	250.9	251.4	251.5
120°	270.5	270.4	270.1	269.9	269.7	269.8	270.4	271.0	271.5	272.1	272.4
122.5°	288.9	289.3	289.7	290.1	290.5	290.9	291.3	291.7	292.0	292.5	292.6
125°	320.4	320.7	320.8	321.1	321.3	321.6	321.7	322.0	322.2	322.4	322.5
127.5°	349.6	349.8	350.0	350.2	350.4	350.5	350.8	351.0	351.2	351.4	351.6
130°	368.7	369.2	369.6	370.1	370.5	370.9	371.1	371.3	371.6	371.8	371.8
132.5°	389.1	389.2	389.4	389.6	389.8	390.0	390.2	390.5	390.7	390.9	391.0
135°	417.1	417.4	417.7	418.0	418.4	418.7	418.9	419.1	419.4	419.5	419.5
137.5°	446.5	446.4	446.3	446.2	446.1	446.3	446.6	446.8	447.2	447.5	447.3
140°	464.3	464.5	464.6	464.7	464.8	464.9	465.0	465.1	465.2	465.4	465.4
142.5°	482.2	482.2	482.3	482.3	482.3	482.3	482.4	482.4	482.4	482.4	482.5
145°	506.6	506.8	507.2	507.6	507.9	508.1	508.3	508.4	508.5	508.5	508.5
147.5°	531.2	531.3	531.4	531.5	531.6	531.7	531.8	531.9	532.0	532.1	532.2
150°	546.3	546.4	546.4	546.5	546.7	546.7	546.7	546.7	546.7	546.7	546.7
152.5°	560.1	560.4	560.6	561.0	561.2	561.2	561.0	560.7	560.4	560.2	560.1
155°	579.3	579.7	580.1	580.6	581.1	581.1	580.6	580.1	579.7	579.3	579.4
157.5°	596.5	596.8	597.3	597.6	598.0	598.1	597.7	597.4	597.0	596.6	596.7
160°	606.3	606.8	607.3	608.0	608.5	608.6	608.2	608.0	607.6	607.3	607.3
162.5°	616.4	617.0	617.5	618.1	618.7	618.7	618.0	617.4	616.8	616.2	616.4
165°	629.6	630.1	630.5	631.0	631.4	631.3	630.6	630.0	629.3	628.7	628.8
167.5°	639.1	639.8	640.5	641.2	641.9	641.9	641.2	640.5	639.9	639.2	639.2
170°	644.4	645.2	646.0	646.8	647.6	647.6	646.9	646.2	645.6	644.9	644.8
172.5°	648.9	649.6	650.4	651.2	652.0	652.0	651.3	650.5	649.7	649.0	648.9
175°	653.5	654.3	655.1	655.9	656.7	656.7	655.9	655.1	654.3	653.5	653.6
177.5°	655.9	656.7	657.5	658.2	658.9	658.9	658.3	657.6	657.0	656.4	656.4
180°	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7
2.5°	1773.9	1765.9	1760.2	1755.7	1743.1	1735.7	1730.0	1722.1	1713.0	1703.3	1691.3
5°	1874.6	1850.4	1832.6	1805.5	1779.9	1758.5	1736.4	1716.5	1692.3	1666.0	1646.7
7.5°	1980.4	1944.4	1898.2	1858.2	1813.2	1774.1	1739.0	1703.2	1665.8	1629.7	1596.5
10°	2047.5	2001.3	1950.0	1889.5	1832.6	1782.0	1735.0	1689.4	1645.3	1601.2	1563.4
12.5°	2120.0	2062.3	1986.5	1915.8	1851.9	1784.3	1727.6	1671.8	1618.5	1572.2	1528.1
15°	2217.1	2133.7	2046.1	1951.4	1867.4	1788.4	1710.8	1640.3	1580.6	1519.3	1476.6
17.5°	2276.7	2173.6	2073.5	1974.5	1872.9	1773.2	1689.4	1608.2	1533.3	1472.5	1418.6
20°	2316.0	2213.5	2088.8	1989.9	1868.8	1766.4	1669.6	1579.1	1500.8	1436.0	1380.5
22.5°	2350.2	2231.7	2107.1	1976.8	1856.4	1747.6	1641.6	1550.6	1470.6	1402.4	1349.2
25°	2368.7	2232.7	2097.4	1967.8	1831.1	1702.3	1606.1	1499.4	1413.9	1342.0	1285.0
27.5°	2370.7	2225.3	2072.2	1928.2	1787.2	1667.1	1545.8	1450.4	1361.6	1285.7	1231.0
30°	2364.4	2212.8	2048.3	1892.4	1750.7	1620.4	1515.0	1411.1	1320.7	1245.2	1188.2
32.5°	2344.5	2186.6	2017.5	1852.5	1705.7	1578.2	1469.5	1370.6	1282.5	1208.2	1148.3
35°	2286.8	2130.8	1950.7	1779.1	1629.0	1500.1	1401.9	1301.5	1213.2	1142.7	1085.0
37.5°	2196.6	2055.7	1872.6	1695.1	1547.5	1418.1	1320.7	1229.9	1150.4	1078.8	1019.7
40°	2118.1	1994.2	1810.5	1637.4	1478.0	1354.9	1263.7	1180.4	1101.4	1033.8	977.5
42.5°	2027.5	1919.6	1750.2	1566.8	1413.1	1289.3	1200.5	1125.7	1051.2	988.7	932.6
45°	1866.0	1794.8	1635.4	1465.9	1305.7	1188.9	1104.2	1038.8	976.1	914.9	867.9
47.5°	1680.3	1645.0	1510.7	1349.9	1197.7	1082.7	1009.2	948.8	893.8	842.0	800.5
50°	1555.6	1538.6	1422.5	1267.3	1122.0	1013.8	939.8	887.8	840.8	795.2	756.1
52.5°	1432.6	1432.0	1327.4	1185.3	1050.9	946.6	873.2	824.6	783.9	746.8	711.7
55°	1244.5	1264.4	1182.6	1055.8	935.5	841.5	775.3	731.9	703.4	672.8	646.5
57.5°	1071.7	1104.8	1037.3	925.7	825.3	738.7	681.1	648.5	618.1	599.6	580.4
60°	959.0	990.3	937.6	843.6	748.9	674.9	620.1	590.9	564.5	551.8	538.2
62.5°	858.7	886.6	847.7	760.5	678.3	607.2	560.9	532.8	515.1	501.1	492.1
65°	715.5	739.0	705.5	642.2	571.7	514.8	477.0	455.0	437.8	432.1	422.2
67.5°	578.4	599.8	581.7	527.8	471.3	428.2	398.7	377.5	367.4	362.4	355.3
70°	497.0	518.3	499.1	452.1	408.7	372.4	344.6	332.5	321.8	319.7	309.7
72.5°	428.0	442.6	423.3	386.6	349.5	318.8	297.3	284.6	279.1	275.3	269.8
75°	321.1	333.9	321.1	292.6	266.3	245.0	226.4	221.4	215.0	212.9	209.3
77.5°	227.3	238.4	228.5	210.7	191.1	174.6	164.6	158.2	156.8	153.1	154.8
80°	173.7	180.8	171.6	159.4	143.8	132.4	125.3	121.7	117.4	116.0	118.9
82.5°	124.8	127.9	123.1	115.0	103.3	95.9	91.1	87.0	86.1	86.4	86.4
85°	64.8	64.1	63.4	56.3	52.7	47.7	44.9	44.1	43.4	44.9	46.3
87.5°	23.5	23.9	23.2	20.7	18.7	16.8	16.0	15.1	16.0	16.8	17.6
90°	9.4	8.5	7.6	6.5	5.3	4.0	2.8	1.5	2.8	4.0	5.3
92.5°	18.9	18.3	17.6	16.6	15.2	13.7	12.3	10.9	12.3	13.7	15.2
95°	37.1	36.3	35.5	34.6	33.5	32.5	31.6	30.5	31.6	32.5	33.5
97.5°	59.3	58.3	57.4	56.5	55.7	54.9	54.1	53.3	54.1	54.9	55.7
100°	75.8	74.7	73.7	73.0	72.6	72.1	71.7	71.2	71.7	72.1	72.6
102.5°	93.0	92.1	91.2	90.6	90.4	90.2	90.1	89.9	90.1	90.2	90.4
105°	120.1	119.7	119.2	119.0	118.9	118.7	118.6	118.5	118.6	118.7	118.9
107.5°	149.3	149.2	149.2	149.1	148.9	148.7	148.6	148.5	148.6	148.7	148.9
110°	169.6	169.7	169.8	169.8	169.5	169.3	169.1	168.9	169.1	169.3	169.5



TEST NUMBER: P332680-940

CATALOG NUMBER: SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	189.7	189.9	190.1	190.2	190.1	190.1	190.0	190.0	190.0	190.1	190.1
115°	221.1	221.4	221.6	221.8	221.8	221.8	221.8	221.8	221.8	221.8	221.8
117.5°	251.6	251.8	252.0	252.0	251.9	251.8	251.7	251.6	251.7	251.8	251.9
120°	272.8	273.1	273.5	273.4	273.0	272.5	272.1	271.6	272.1	272.5	273.0
122.5°	292.7	292.9	293.1	293.0	292.8	292.7	292.5	292.3	292.5	292.7	292.8
125°	322.7	322.8	322.9	323.0	323.0	323.0	323.0	323.0	323.0	323.0	323.0
127.5°	351.8	352.0	352.1	352.0	351.8	351.4	351.1	350.7	351.1	351.4	351.8
130°	371.8	371.8	371.8	371.6	371.3	371.0	370.6	370.2	370.6	371.0	371.3
132.5°	391.1	391.2	391.3	391.2	390.9	390.7	390.5	390.2	390.5	390.7	390.9
135°	419.5	419.5	419.5	419.3	418.6	417.9	417.2	416.5	417.2	417.9	418.6
137.5°	447.1	446.9	446.7	446.5	446.1	445.9	445.5	445.2	445.5	445.9	446.1
140°	465.4	465.4	465.4	465.2	465.0	464.8	464.6	464.3	464.6	464.8	465.0
142.5°	482.6	482.7	482.8	482.8	482.5	482.3	482.1	481.8	482.1	482.3	482.5
145°	508.4	508.3	508.1	507.8	507.4	506.9	506.5	506.0	506.5	506.9	507.4
147.5°	532.3	532.4	532.4	532.3	531.6	531.1	530.6	530.0	530.6	531.1	531.6
150°	546.7	546.7	546.7	546.5	546.1	545.6	545.2	544.7	545.2	545.6	546.1
152.5°	560.0	559.9	559.8	559.6	559.4	559.1	558.8	558.6	558.8	559.1	559.4
155°	579.5	579.6	579.7	579.8	579.8	579.8	579.8	579.8	579.8	579.8	579.8
157.5°	596.7	596.7	596.7	596.9	597.1	597.3	597.4	597.7	597.4	597.3	597.1
160°	607.5	607.6	607.7	607.8	608.0	608.1	608.1	608.2	608.1	608.1	608.0
162.5°	616.4	616.5	616.6	616.9	617.2	617.4	617.8	618.0	617.8	617.4	617.2
165°	629.1	629.3	629.5	629.8	630.2	630.4	630.8	631.2	630.8	630.4	630.2
167.5°	639.2	639.1	639.1	639.4	639.8	640.2	640.8	641.2	640.8	640.2	639.8
170°	644.6	644.5	644.4	644.6	645.2	645.8	646.4	646.9	646.4	645.8	645.2
172.5°	648.9	648.9	648.9	649.1	649.6	650.1	650.5	650.9	650.5	650.1	649.6
175°	653.8	653.9	654.0	654.3	654.9	655.5	656.0	656.6	656.0	655.5	654.9
177.5°	656.4	656.4	656.4	656.6	657.1	657.5	658.0	658.4	658.0	657.5	657.1
180°	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6



TEST NUMBER: P332680-940

CATALOG NUMBER: SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7
2.5°	1685.6	1680.5	1673.1	1662.9	1654.3	1645.2	1642.9	1639.5	1646.3	1640.7	1638.9
5°	1630.4	1615.4	1596.2	1574.1	1561.3	1542.8	1539.3	1532.1	1525.0	1524.3	1517.2
7.5°	1571.8	1549.9	1524.7	1502.2	1481.4	1461.2	1448.0	1445.1	1434.6	1428.4	1421.3
10°	1534.3	1507.2	1478.0	1456.7	1432.4	1411.1	1396.2	1387.6	1380.5	1372.6	1365.6
12.5°	1489.9	1461.1	1437.0	1413.9	1385.2	1369.0	1344.3	1329.5	1328.1	1328.2	1309.7
15°	1438.2	1409.7	1372.6	1339.9	1324.2	1292.9	1279.3	1262.3	1251.6	1240.9	1232.4
17.5°	1379.0	1343.6	1314.6	1277.1	1247.2	1222.3	1204.5	1194.3	1178.1	1163.1	1152.1
20°	1342.0	1304.3	1273.7	1233.8	1201.0	1170.5	1155.5	1141.3	1129.2	1116.3	1104.2
22.5°	1304.4	1265.0	1227.5	1188.8	1158.3	1126.1	1111.6	1092.3	1080.8	1073.6	1061.5
25°	1245.2	1202.5	1159.8	1122.8	1091.5	1062.9	1043.7	1028.8	1015.9	1010.2	1002.5
27.5°	1180.8	1138.4	1097.2	1055.1	1019.5	998.9	983.5	972.2	964.8	957.3	953.8
30°	1139.9	1095.7	1051.6	1012.4	979.6	959.0	944.8	936.9	931.2	927.6	924.1
32.5°	1098.2	1054.7	1008.3	972.5	943.2	924.8	914.0	906.2	903.3	902.1	900.8
35°	1031.6	987.5	944.8	912.8	884.9	877.8	868.6	864.3	862.9	867.9	870.0
37.5°	967.1	926.1	886.8	855.8	837.6	827.2	824.0	824.1	829.3	833.7	838.8
40°	925.5	885.6	848.6	821.6	804.5	798.1	796.7	800.2	805.9	810.9	816.6
42.5°	885.1	845.8	812.2	786.8	774.9	769.0	769.9	773.5	781.4	787.6	796.1
45°	822.3	789.5	756.8	736.2	726.2	727.6	727.6	734.1	741.8	751.1	760.4
47.5°	763.2	730.2	703.3	685.9	680.7	679.5	683.5	691.9	703.1	714.5	727.5
50°	723.4	692.1	668.5	652.8	647.2	649.3	655.0	662.8	676.4	690.6	704.1
52.5°	682.9	654.4	632.7	618.1	614.1	618.0	623.7	636.1	647.9	663.3	679.7
55°	620.1	595.9	578.8	568.1	566.7	568.8	575.2	588.8	605.8	625.1	640.8
57.5°	557.6	537.3	521.7	514.3	515.1	517.0	527.5	543.7	561.9	582.4	602.6
60°	515.4	497.0	484.1	478.4	479.1	483.4	496.2	511.2	534.0	553.9	575.2
62.5°	475.5	459.3	447.1	442.0	441.0	450.4	462.6	478.1	501.0	523.2	546.2
65°	411.5	398.7	388.7	385.8	388.0	395.1	410.8	431.4	450.7	474.1	498.4
67.5°	348.8	338.3	331.4	332.8	335.4	345.9	359.0	376.7	398.6	422.9	446.8
70°	309.0	299.0	293.3	294.0	298.3	311.1	322.5	340.3	363.8	388.7	408.7
72.5°	268.0	261.4	256.3	259.3	263.6	272.4	286.6	304.4	325.1	348.3	369.3
75°	205.7	205.7	202.9	205.0	211.4	220.0	230.7	249.1	269.8	288.4	305.4
77.5°	152.7	151.1	152.9	155.5	159.2	169.3	181.6	194.7	210.4	228.8	242.9
80°	116.7	117.4	121.0	125.3	126.7	134.6	147.4	159.4	171.6	187.3	200.8
82.5°	87.7	88.5	90.2	95.7	97.1	105.5	113.8	125.9	136.9	147.4	158.6
85°	47.7	47.7	51.3	53.4	57.0	62.7	67.6	74.7	84.7	91.8	102.5
87.5°	19.5	19.7	22.2	23.5	25.4	28.4	29.7	36.1	38.5	41.6	46.7
90°	6.5	7.6	8.5	9.4	10.3	11.1	11.9	12.6	13.2	13.9	14.4
92.5°	16.6	17.6	18.3	18.9	19.5	20.2	20.5	21.0	21.4	21.8	22.0
95°	34.6	35.5	36.3	37.1	37.9	38.6	39.0	39.3	39.7	40.0	40.2
97.5°	56.5	57.4	58.3	59.3	60.2	61.2	61.5	62.0	62.3	62.8	63.0
100°	73.0	73.7	74.7	75.8	76.8	77.8	78.0	78.3	78.5	78.7	78.8
102.5°	90.6	91.2	92.1	93.0	94.0	94.9	95.2	95.5	95.9	96.1	96.4
105°	119.0	119.2	119.7	120.1	120.6	121.0	121.4	121.7	122.1	122.4	122.7
107.5°	149.1	149.2	149.2	149.3	149.4	149.5	149.7	150.1	150.3	150.7	150.9
110°	169.8	169.8	169.7	169.6	169.5	169.3	169.2	168.9	168.7	168.4	168.5



TEST NUMBER: P332680-940

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CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	190.2	190.1	189.9	189.7	189.5	189.3	189.2	189.2	189.1	189.1	189.1
115°	221.8	221.6	221.4	221.1	221.0	220.7	220.6	220.5	220.4	220.3	220.2
117.5°	252.0	252.0	251.8	251.6	251.5	251.4	250.9	250.6	250.2	249.8	249.5
120°	273.4	273.5	273.1	272.8	272.4	272.1	271.5	271.0	270.4	269.8	269.7
122.5°	293.0	293.1	292.9	292.7	292.6	292.5	292.0	291.7	291.3	290.9	290.5
125°	323.0	322.9	322.8	322.7	322.5	322.4	322.2	322.0	321.7	321.6	321.3
127.5°	352.0	352.1	352.0	351.8	351.6	351.4	351.2	351.0	350.8	350.5	350.4
130°	371.6	371.8	371.8	371.8	371.8	371.8	371.6	371.3	371.1	370.9	370.5
132.5°	391.2	391.3	391.2	391.1	391.0	390.9	390.7	390.5	390.2	390.0	389.8
135°	419.3	419.5	419.5	419.5	419.5	419.5	419.4	419.1	418.9	418.7	418.4
137.5°	446.5	446.7	446.9	447.1	447.3	447.5	447.2	446.8	446.6	446.3	446.1
140°	465.2	465.4	465.4	465.4	465.4	465.4	465.2	465.1	465.0	464.9	464.8
142.5°	482.8	482.8	482.7	482.6	482.5	482.4	482.4	482.4	482.4	482.3	482.3
145°	507.8	508.1	508.3	508.4	508.5	508.5	508.5	508.4	508.3	508.1	507.9
147.5°	532.3	532.4	532.4	532.3	532.2	532.1	532.0	531.9	531.8	531.7	531.6
150°	546.5	546.7	546.7	546.7	546.7	546.7	546.7	546.7	546.7	546.7	546.7
152.5°	559.6	559.8	559.9	560.0	560.1	560.2	560.4	560.7	561.0	561.2	561.2
155°	579.8	579.7	579.6	579.5	579.4	579.3	579.7	580.1	580.6	581.1	581.1
157.5°	596.9	596.7	596.7	596.7	596.7	596.6	597.0	597.4	597.7	598.1	598.0
160°	607.8	607.7	607.6	607.5	607.3	607.3	607.6	608.0	608.2	608.6	608.5
162.5°	616.9	616.6	616.5	616.4	616.4	616.2	616.8	617.4	618.0	618.7	618.7
165°	629.8	629.5	629.3	629.1	628.8	628.7	629.3	630.0	630.6	631.3	631.4
167.5°	639.4	639.1	639.1	639.2	639.2	639.2	639.9	640.5	641.2	641.9	641.9
170°	644.6	644.4	644.5	644.6	644.8	644.9	645.6	646.2	646.9	647.6	647.6
172.5°	649.1	648.9	648.9	648.9	648.9	649.0	649.7	650.5	651.3	652.0	652.0
175°	654.3	654.0	653.9	653.8	653.6	653.5	654.3	655.1	655.9	656.7	656.7
177.5°	656.6	656.4	656.4	656.4	656.4	656.4	657.0	657.6	658.3	658.9	658.9
180°	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6



TEST NUMBER: P332680-940

CATALOG NUMBER: SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
0°	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7
2.5°	1637.8	1636.6	1632.6	1632.1	1632.6	1636.6	1637.8	1638.9	1640.7	1646.3	1639.5
5°	1512.9	1509.3	1507.2	1515.0	1507.2	1509.3	1512.9	1517.2	1524.3	1525.0	1532.1
7.5°	1418.8	1415.9	1409.7	1407.7	1409.7	1415.9	1418.8	1421.3	1428.4	1434.6	1445.1
10°	1358.4	1355.6	1349.9	1348.4	1349.9	1355.6	1358.4	1365.6	1372.6	1380.5	1387.6
12.5°	1300.3	1294.6	1293.5	1294.9	1293.5	1294.6	1300.3	1309.7	1328.2	1328.1	1329.5
15°	1223.2	1220.3	1212.5	1214.6	1212.5	1220.3	1223.2	1232.4	1240.9	1251.6	1262.3
17.5°	1147.1	1143.7	1134.2	1142.5	1134.2	1143.7	1147.1	1152.1	1163.1	1178.1	1194.3
20°	1099.2	1093.6	1088.6	1087.9	1088.6	1093.6	1099.2	1104.2	1116.3	1129.2	1141.3
22.5°	1053.6	1048.6	1048.1	1043.5	1048.1	1048.6	1053.6	1061.5	1073.6	1080.8	1092.3
25°	996.8	991.8	990.3	986.8	990.3	991.8	996.8	1002.5	1010.2	1015.9	1028.8
27.5°	953.1	950.6	948.1	949.1	948.1	950.6	953.1	953.8	957.3	964.8	972.2
30°	926.2	925.5	924.1	924.1	924.1	925.5	926.2	924.1	927.6	931.2	936.9
32.5°	904.0	903.9	904.7	904.7	904.7	903.9	904.0	900.8	902.1	903.3	906.2
35°	872.9	874.9	876.4	874.2	876.4	874.9	872.9	870.0	867.9	862.9	864.3
37.5°	844.6	846.8	848.8	851.2	848.8	846.8	844.6	838.8	833.7	829.3	824.1
40°	823.0	828.0	829.4	832.9	829.4	828.0	823.0	816.6	810.9	805.9	800.2
42.5°	802.5	808.1	811.7	812.4	811.7	808.1	802.5	796.1	787.6	781.4	773.5
45°	771.1	776.8	781.8	781.8	781.8	776.8	771.1	760.4	751.1	741.8	734.1
47.5°	738.4	746.7	751.7	753.0	751.7	746.7	738.4	727.5	714.5	703.1	691.9
50°	716.2	726.2	731.2	734.8	731.2	726.2	716.2	704.1	690.6	676.4	662.8
52.5°	694.6	704.5	711.2	713.1	711.2	704.5	694.6	679.7	663.3	647.9	636.1
55°	657.1	671.4	679.2	682.1	679.2	671.4	657.1	640.8	625.1	605.8	588.8
57.5°	621.8	634.9	644.0	646.1	644.0	634.9	621.8	602.6	582.4	561.9	543.7
60°	594.5	608.7	620.1	622.2	620.1	608.7	594.5	575.2	553.9	534.0	511.2
62.5°	566.6	581.4	591.7	597.2	591.7	581.4	566.6	546.2	523.2	501.0	478.1
65°	518.3	533.2	543.2	545.4	543.2	533.2	518.3	498.4	474.1	450.7	431.4
67.5°	465.7	480.5	487.1	491.2	487.1	480.5	465.7	446.8	422.9	398.6	376.7
70°	428.6	440.7	447.8	451.4	447.8	440.7	428.6	408.7	388.7	363.8	340.3
72.5°	386.5	399.1	407.4	408.0	407.4	399.1	386.5	369.3	348.3	325.1	304.4
75°	321.8	333.2	337.4	337.4	337.4	333.2	321.8	305.4	288.4	269.8	249.1
77.5°	254.8	260.6	266.0	267.2	266.0	260.6	254.8	242.9	228.8	210.4	194.7
80°	211.4	215.0	219.3	219.3	219.3	215.0	211.4	200.8	187.3	171.6	159.4
82.5°	167.0	170.0	174.3	173.7	174.3	170.0	167.0	158.6	147.4	136.9	125.9
85°	101.1	107.5	106.8	105.4	106.8	107.5	101.1	102.5	91.8	84.7	74.7
87.5°	48.5	49.1	50.8	52.1	50.8	49.1	48.5	46.7	41.6	38.5	36.1
90°	14.6	14.8	15.1	15.2	15.1	14.8	14.6	14.4	13.9	13.2	12.6
92.5°	22.2	22.3	22.5	22.6	22.5	22.3	22.2	22.0	21.8	21.4	21.0
95°	40.2	40.2	40.2	40.2	40.2	40.2	40.2	40.2	40.0	39.7	39.3
97.5°	63.0	63.0	63.0	63.0	63.0	63.0	63.0	63.0	62.8	62.3	62.0
100°	78.8	78.8	78.8	78.8	78.8	78.8	78.8	78.8	78.7	78.5	78.3
102.5°	96.5	96.6	96.7	96.8	96.7	96.6	96.5	96.4	96.1	95.9	95.5
105°	123.1	123.4	123.8	124.1	123.8	123.4	123.1	122.7	122.4	122.1	121.7
107.5°	150.8	150.8	150.8	150.8	150.8	150.8	150.8	150.9	150.7	150.3	150.1
110°	168.9	169.2	169.5	169.9	169.5	169.2	168.9	168.5	168.4	168.7	168.9



TEST NUMBER: P332680-940

CATALOG NUMBER: SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	189.2	189.2	189.3	189.4	189.3	189.2	189.2	189.1	189.1	189.1	189.2
115°	220.1	219.9	219.8	219.7	219.8	219.9	220.1	220.2	220.3	220.4	220.5
117.5°	249.2	249.1	248.8	248.6	248.8	249.1	249.2	249.5	249.8	250.2	250.6
120°	269.9	270.1	270.4	270.5	270.4	270.1	269.9	269.7	269.8	270.4	271.0
122.5°	290.1	289.7	289.3	288.9	289.3	289.7	290.1	290.5	290.9	291.3	291.7
125°	321.1	320.8	320.7	320.4	320.7	320.8	321.1	321.3	321.6	321.7	322.0
127.5°	350.2	350.0	349.8	349.6	349.8	350.0	350.2	350.4	350.5	350.8	351.0
130°	370.1	369.6	369.2	368.7	369.2	369.6	370.1	370.5	370.9	371.1	371.3
132.5°	389.6	389.4	389.2	389.1	389.2	389.4	389.6	389.8	390.0	390.2	390.5
135°	418.0	417.7	417.4	417.1	417.4	417.7	418.0	418.4	418.7	418.9	419.1
137.5°	446.2	446.3	446.4	446.5	446.4	446.3	446.2	446.1	446.3	446.6	446.8
140°	464.7	464.6	464.5	464.3	464.5	464.6	464.7	464.8	464.9	465.0	465.1
142.5°	482.3	482.3	482.2	482.2	482.2	482.3	482.3	482.3	482.3	482.4	482.4
145°	507.6	507.2	506.8	506.6	506.8	507.2	507.6	507.9	508.1	508.3	508.4
147.5°	531.5	531.4	531.3	531.2	531.3	531.4	531.5	531.6	531.7	531.8	531.9
150°	546.5	546.4	546.4	546.3	546.4	546.4	546.5	546.7	546.7	546.7	546.7
152.5°	561.0	560.6	560.4	560.1	560.4	560.6	561.0	561.2	561.2	561.0	560.7
155°	580.6	580.1	579.7	579.3	579.7	580.1	580.6	581.1	581.1	580.6	580.1
157.5°	597.6	597.3	596.8	596.5	596.8	597.3	597.6	598.0	598.1	597.7	597.4
160°	608.0	607.3	606.8	606.3	606.8	607.3	608.0	608.5	608.6	608.2	608.0
162.5°	618.1	617.5	617.0	616.4	617.0	617.5	618.1	618.7	618.7	618.0	617.4
165°	631.0	630.5	630.1	629.6	630.1	630.5	631.0	631.4	631.3	630.6	630.0
167.5°	641.2	640.5	639.8	639.1	639.8	640.5	641.2	641.9	641.9	641.2	640.5
170°	646.8	646.0	645.2	644.4	645.2	646.0	646.8	647.6	647.6	646.9	646.2
172.5°	651.2	650.4	649.6	648.9	649.6	650.4	651.2	652.0	652.0	651.3	650.5
175°	655.9	655.1	654.3	653.5	654.3	655.1	655.9	656.7	656.7	655.9	655.1
177.5°	658.2	657.5	656.7	655.9	656.7	657.5	658.2	658.9	658.9	658.3	657.6
180°	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6



TEST NUMBER: P332680-940

CATALOG NUMBER: SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
0°	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7
2.5°	1642.9	1645.2	1654.3	1662.9	1673.1	1680.5	1685.6	1691.3	1703.3	1713.0	1722.1
5°	1539.3	1542.8	1561.3	1574.1	1596.2	1615.4	1630.4	1646.7	1666.0	1692.3	1716.5
7.5°	1448.0	1461.2	1481.4	1502.2	1524.7	1549.9	1571.8	1596.5	1629.7	1665.8	1703.2
10°	1396.2	1411.1	1432.4	1456.7	1478.0	1507.2	1534.3	1563.4	1601.2	1645.3	1689.4
12.5°	1344.3	1369.0	1385.2	1413.9	1437.0	1461.1	1489.9	1528.1	1572.2	1618.5	1671.8
15°	1279.3	1292.9	1324.2	1339.9	1372.6	1409.7	1438.2	1476.6	1519.3	1580.6	1640.3
17.5°	1204.5	1222.3	1247.2	1277.1	1314.6	1343.6	1379.0	1418.6	1472.5	1533.3	1608.2
20°	1155.5	1170.5	1201.0	1233.8	1273.7	1304.3	1342.0	1380.5	1436.0	1500.8	1579.1
22.5°	1111.6	1126.1	1158.3	1188.8	1227.5	1265.0	1304.4	1349.2	1402.4	1470.6	1550.6
25°	1043.7	1062.9	1091.5	1122.8	1159.8	1202.5	1245.2	1285.0	1342.0	1413.9	1499.4
27.5°	983.5	998.9	1019.5	1055.1	1097.2	1138.4	1180.8	1231.0	1285.7	1361.6	1450.4
30°	944.8	959.0	979.6	1012.4	1051.6	1095.7	1139.9	1188.2	1245.2	1320.7	1411.1
32.5°	914.0	924.8	943.2	972.5	1008.3	1054.7	1098.2	1148.3	1208.2	1282.5	1370.6
35°	868.6	877.8	884.9	912.8	944.8	987.5	1031.6	1085.0	1142.7	1213.2	1301.5
37.5°	824.0	827.2	837.6	855.8	886.8	926.1	967.1	1019.7	1078.8	1150.4	1229.9
40°	796.7	798.1	804.5	821.6	848.6	885.6	925.5	977.5	1033.8	1101.4	1180.4
42.5°	769.9	769.0	774.9	786.8	812.2	845.8	885.1	932.6	988.7	1051.2	1125.7
45°	727.6	727.6	726.2	736.2	756.8	789.5	822.3	867.9	914.9	976.1	1038.8
47.5°	683.5	679.5	680.7	685.9	703.3	730.2	763.2	800.5	842.0	893.8	948.8
50°	655.0	649.3	647.2	652.8	668.5	692.1	723.4	756.1	795.2	840.8	887.8
52.5°	623.7	618.0	614.1	618.1	632.7	654.4	682.9	711.7	746.8	783.9	824.6
55°	575.2	568.8	566.7	568.1	578.8	595.9	620.1	646.5	672.8	703.4	731.9
57.5°	527.5	517.0	515.1	514.3	521.7	537.3	557.6	580.4	599.6	618.1	648.5
60°	496.2	483.4	479.1	478.4	484.1	497.0	515.4	538.2	551.8	564.5	590.9
62.5°	462.6	450.4	441.0	442.0	447.1	459.3	475.5	492.1	501.1	515.1	532.8
65°	410.8	395.1	388.0	385.8	388.7	398.7	411.5	422.2	432.1	437.8	455.0
67.5°	359.0	345.9	335.4	332.8	331.4	338.3	348.8	355.3	362.4	367.4	377.5
70°	322.5	311.1	298.3	294.0	293.3	299.0	309.0	309.7	319.7	321.8	332.5
72.5°	286.6	272.4	263.6	259.3	256.3	261.4	268.0	269.8	275.3	279.1	284.6
75°	230.7	220.0	211.4	205.0	202.9	205.7	205.7	209.3	212.9	215.0	221.4
77.5°	181.6	169.3	159.2	155.5	152.9	151.1	152.7	154.8	153.1	156.8	158.2
80°	147.4	134.6	126.7	125.3	121.0	117.4	116.7	118.9	116.0	117.4	121.7
82.5°	113.8	105.5	97.1	95.7	90.2	88.5	87.7	86.4	86.4	86.1	87.0
85°	67.6	62.7	57.0	53.4	51.3	47.7	47.7	46.3	44.9	43.4	44.1
87.5°	29.7	28.4	25.4	23.5	22.2	19.7	19.5	17.6	16.8	16.0	15.1
90°	11.9	11.1	10.3	9.4	8.5	7.6	6.5	5.3	4.0	2.8	1.5
92.5°	20.5	20.2	19.5	18.9	18.3	17.6	16.6	15.2	13.7	12.3	10.9
95°	39.0	38.6	37.9	37.1	36.3	35.5	34.6	33.5	32.5	31.6	30.5
97.5°	61.5	61.2	60.2	59.3	58.3	57.4	56.5	55.7	54.9	54.1	53.3
100°	78.0	77.8	76.8	75.8	74.7	73.7	73.0	72.6	72.1	71.7	71.2
102.5°	95.2	94.9	94.0	93.0	92.1	91.2	90.6	90.4	90.2	90.1	89.9
105°	121.4	121.0	120.6	120.1	119.7	119.2	119.0	118.9	118.7	118.6	118.5
107.5°	149.7	149.5	149.4	149.3	149.2	149.2	149.1	148.9	148.7	148.6	148.5
110°	169.2	169.3	169.5	169.6	169.7	169.8	169.8	169.5	169.3	169.1	168.9



TEST NUMBER: P332680-940

CATALOG NUMBER: SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	189.2	189.3	189.5	189.7	189.9	190.1	190.2	190.1	190.1	190.0	190.0
115°	220.6	220.7	221.0	221.1	221.4	221.6	221.8	221.8	221.8	221.8	221.8
117.5°	250.9	251.4	251.5	251.6	251.8	252.0	252.0	251.9	251.8	251.7	251.6
120°	271.5	272.1	272.4	272.8	273.1	273.5	273.4	273.0	272.5	272.1	271.6
122.5°	292.0	292.5	292.6	292.7	292.9	293.1	293.0	292.8	292.7	292.5	292.3
125°	322.2	322.4	322.5	322.7	322.8	322.9	323.0	323.0	323.0	323.0	323.0
127.5°	351.2	351.4	351.6	351.8	352.0	352.1	352.0	351.8	351.4	351.1	350.7
130°	371.6	371.8	371.8	371.8	371.8	371.8	371.6	371.3	371.0	370.6	370.2
132.5°	390.7	390.9	391.0	391.1	391.2	391.3	391.2	390.9	390.7	390.5	390.2
135°	419.4	419.5	419.5	419.5	419.5	419.5	419.3	418.6	417.9	417.2	416.5
137.5°	447.2	447.5	447.3	447.1	446.9	446.7	446.5	446.1	445.9	445.5	445.2
140°	465.2	465.4	465.4	465.4	465.4	465.4	465.2	465.0	464.8	464.6	464.3
142.5°	482.4	482.4	482.5	482.6	482.7	482.8	482.8	482.5	482.3	482.1	481.8
145°	508.5	508.5	508.5	508.4	508.3	508.1	507.8	507.4	506.9	506.5	506.0
147.5°	532.0	532.1	532.2	532.3	532.4	532.4	532.3	531.6	531.1	530.6	530.0
150°	546.7	546.7	546.7	546.7	546.7	546.7	546.5	546.1	545.6	545.2	544.7
152.5°	560.4	560.2	560.1	560.0	559.9	559.8	559.6	559.4	559.1	558.8	558.6
155°	579.7	579.3	579.4	579.5	579.6	579.7	579.8	579.8	579.8	579.8	579.8
157.5°	597.0	596.6	596.7	596.7	596.7	596.7	596.9	597.1	597.3	597.4	597.7
160°	607.6	607.3	607.3	607.5	607.6	607.7	607.8	608.0	608.1	608.1	608.2
162.5°	616.8	616.2	616.4	616.4	616.5	616.6	616.9	617.2	617.4	617.8	618.0
165°	629.3	628.7	628.8	629.1	629.3	629.5	629.8	630.2	630.4	630.8	631.2
167.5°	639.9	639.2	639.2	639.2	639.1	639.1	639.4	639.8	640.2	640.8	641.2
170°	645.6	644.9	644.8	644.6	644.5	644.4	644.6	645.2	645.8	646.4	646.9
172.5°	649.7	649.0	648.9	648.9	648.9	648.9	649.1	649.6	650.1	650.5	650.9
175°	654.3	653.5	653.6	653.8	653.9	654.0	654.3	654.9	655.5	656.0	656.6
177.5°	657.0	656.4	656.4	656.4	656.4	656.4	656.6	657.1	657.5	658.0	658.4
180°	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6



TEST NUMBER: P332680-940

CATALOG NUMBER: SA4XXDIP-C1195D590U940-4F0-1E-UDD-A1

CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
0°	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7
2.5°	1730.0	1735.7	1743.1	1755.7	1760.2	1765.9	1773.9	1773.3	1775.6	1784.1	1802.4
5°	1736.4	1758.5	1779.9	1805.5	1832.6	1850.4	1874.6	1889.5	1904.5	1923.7	1956.4
7.5°	1739.0	1774.1	1813.2	1858.2	1898.2	1944.4	1980.4	2014.3	2044.9	2085.4	2124.5
10°	1735.0	1782.0	1832.6	1889.5	1950.0	2001.3	2047.5	2100.2	2145.1	2194.2	2238.4
12.5°	1727.6	1784.3	1851.9	1915.8	1986.5	2062.3	2120.0	2173.2	2232.8	2289.4	2357.4
15°	1710.8	1788.4	1867.4	1951.4	2046.1	2133.7	2217.1	2286.1	2350.2	2434.9	2523.9
17.5°	1689.4	1773.2	1872.9	1974.5	2073.5	2173.6	2276.7	2380.5	2461.4	2566.6	2636.3
20°	1669.6	1766.4	1868.8	1989.9	2088.8	2213.5	2316.0	2416.4	2527.5	2632.1	2715.3
22.5°	1641.6	1747.6	1856.4	1976.8	2107.1	2231.7	2350.2	2459.1	2570.2	2684.0	2784.9
25°	1606.1	1702.3	1831.1	1967.8	2097.4	2232.7	2368.7	2505.4	2624.9	2745.3	2839.3
27.5°	1545.8	1667.1	1787.2	1928.2	2072.2	2225.3	2370.7	2513.7	2639.1	2738.0	2796.2
30°	1515.0	1620.4	1750.7	1892.4	2048.3	2212.8	2364.4	2504.6	2621.5	2700.5	2723.9
32.5°	1469.5	1578.2	1705.7	1852.5	2017.5	2186.6	2344.5	2476.7	2574.1	2615.6	2587.2
35°	1401.9	1500.1	1629.0	1779.1	1950.7	2130.8	2286.8	2398.5	2448.4	2409.2	2311.7
37.5°	1320.7	1418.1	1547.5	1695.1	1872.6	2055.7	2196.6	2277.1	2260.6	2163.2	2017.9
40°	1263.7	1354.9	1478.0	1637.4	1810.5	1994.2	2118.1	2161.5	2115.9	1976.4	1821.9
42.5°	1200.5	1289.3	1413.1	1566.8	1750.2	1919.6	2027.5	2031.0	1954.7	1787.9	1632.8
45°	1104.2	1188.9	1305.7	1465.9	1635.4	1794.8	1866.0	1831.1	1690.1	1529.3	1373.3
47.5°	1009.2	1082.7	1197.7	1349.9	1510.7	1645.0	1680.3	1617.6	1467.3	1311.2	1166.6
50°	939.8	1013.8	1122.0	1267.3	1422.5	1538.6	1555.6	1472.3	1324.9	1167.6	1054.4
52.5°	873.2	946.6	1050.9	1185.3	1327.4	1432.0	1432.6	1336.2	1189.4	1049.1	943.9
55°	775.3	841.5	935.5	1055.8	1182.6	1264.4	1244.5	1144.8	1017.4	895.6	803.8
57.5°	681.1	738.7	825.3	925.7	1037.3	1104.8	1071.7	975.8	862.0	758.8	689.2
60°	620.1	674.9	748.9	843.6	937.6	990.3	959.0	872.2	767.5	684.2	623.7
62.5°	560.9	607.2	678.3	760.5	847.7	886.6	858.7	773.0	682.6	607.3	558.2
65°	477.0	514.8	571.7	642.2	705.5	739.0	715.5	635.8	566.7	512.6	473.4
67.5°	398.7	428.2	471.3	527.8	581.7	599.8	578.4	522.9	464.3	421.1	393.4
70°	344.6	372.4	408.7	452.1	499.1	518.3	497.0	452.8	405.1	365.2	338.1
72.5°	297.3	318.8	349.5	386.6	423.3	442.6	428.0	385.6	345.3	315.7	292.6
75°	226.4	245.0	266.3	292.6	321.1	333.9	321.1	291.9	264.1	242.1	225.7
77.5°	164.6	174.6	191.1	210.7	228.5	238.4	227.3	207.5	190.6	175.4	167.3
80°	125.3	132.4	143.8	159.4	171.6	180.8	173.7	157.3	143.8	133.8	130.3
82.5°	91.1	95.9	103.3	115.0	123.1	127.9	124.8	112.9	107.4	98.5	95.0
85°	44.9	47.7	52.7	56.3	63.4	64.1	64.8	59.8	54.8	52.7	49.8
87.5°	16.0	16.8	18.7	20.7	23.2	23.9	23.5	23.7	21.6	21.1	19.0
90°	2.8	4.0	5.3	6.5	7.6	8.5	9.4	10.3	11.1	11.9	12.6
92.5°	12.3	13.7	15.2	16.6	17.6	18.3	18.9	19.5	20.2	20.5	21.0
95°	31.6	32.5	33.5	34.6	35.5	36.3	37.1	37.9	38.6	39.0	39.3
97.5°	54.1	54.9	55.7	56.5	57.4	58.3	59.3	60.2	61.2	61.5	62.0
100°	71.7	72.1	72.6	73.0	73.7	74.7	75.8	76.8	77.8	78.0	78.3
102.5°	90.1	90.2	90.4	90.6	91.2	92.1	93.0	94.0	94.9	95.2	95.5
105°	118.6	118.7	118.9	119.0	119.2	119.7	120.1	120.6	121.0	121.4	121.7
107.5°	148.6	148.7	148.9	149.1	149.2	149.2	149.3	149.4	149.5	149.7	150.1
110°	169.1	169.3	169.5	169.8	169.8	169.7	169.6	169.5	169.3	169.2	168.9



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CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	190.0	190.1	190.1	190.2	190.1	189.9	189.7	189.5	189.3	189.2	189.2
115°	221.8	221.8	221.8	221.8	221.6	221.4	221.1	221.0	220.7	220.6	220.5
117.5°	251.7	251.8	251.9	252.0	252.0	251.8	251.6	251.5	251.4	250.9	250.6
120°	272.1	272.5	273.0	273.4	273.5	273.1	272.8	272.4	272.1	271.5	271.0
122.5°	292.5	292.7	292.8	293.0	293.1	292.9	292.7	292.6	292.5	292.0	291.7
125°	323.0	323.0	323.0	323.0	322.9	322.8	322.7	322.5	322.4	322.2	322.0
127.5°	351.1	351.4	351.8	352.0	352.1	352.0	351.8	351.6	351.4	351.2	351.0
130°	370.6	371.0	371.3	371.6	371.8	371.8	371.8	371.8	371.8	371.6	371.3
132.5°	390.5	390.7	390.9	391.2	391.3	391.2	391.1	391.0	390.9	390.7	390.5
135°	417.2	417.9	418.6	419.3	419.5	419.5	419.5	419.5	419.5	419.4	419.1
137.5°	445.5	445.9	446.1	446.5	446.7	446.9	447.1	447.3	447.5	447.2	446.8
140°	464.6	464.8	465.0	465.2	465.4	465.4	465.4	465.4	465.4	465.2	465.1
142.5°	482.1	482.3	482.5	482.8	482.8	482.7	482.6	482.5	482.4	482.4	482.4
145°	506.5	506.9	507.4	507.8	508.1	508.3	508.4	508.5	508.5	508.5	508.4
147.5°	530.6	531.1	531.6	532.3	532.4	532.4	532.3	532.2	532.1	532.0	531.9
150°	545.2	545.6	546.1	546.5	546.7	546.7	546.7	546.7	546.7	546.7	546.7
152.5°	558.8	559.1	559.4	559.6	559.8	559.9	560.0	560.1	560.2	560.4	560.7
155°	579.8	579.8	579.8	579.8	579.7	579.6	579.5	579.4	579.3	579.7	580.1
157.5°	597.4	597.3	597.1	596.9	596.7	596.7	596.7	596.7	596.6	597.0	597.4
160°	608.1	608.1	608.0	607.8	607.7	607.6	607.5	607.3	607.3	607.6	608.0
162.5°	617.8	617.4	617.2	616.9	616.6	616.5	616.4	616.4	616.2	616.8	617.4
165°	630.8	630.4	630.2	629.8	629.5	629.3	629.1	628.8	628.7	629.3	630.0
167.5°	640.8	640.2	639.8	639.4	639.1	639.1	639.2	639.2	639.2	639.9	640.5
170°	646.4	645.8	645.2	644.6	644.4	644.5	644.6	644.8	644.9	645.6	646.2
172.5°	650.5	650.1	649.6	649.1	648.9	648.9	648.9	648.9	649.0	649.7	650.5
175°	656.0	655.5	654.9	654.3	654.0	653.9	653.8	653.6	653.5	654.3	655.1
177.5°	658.0	657.5	657.1	656.6	656.4	656.4	656.4	656.4	656.4	657.0	657.6
180°	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6	657.6



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
0°	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7	1718.7
2.5°	1811.5	1812.7	1817.8	1821.8	1822.9	1828.5	1829.2
5°	1970.7	1982.8	2006.3	2008.4	2012.0	2030.5	2016.2
7.5°	2157.2	2188.0	2208.5	2226.6	2233.1	2241.2	2239.5
10°	2276.8	2322.4	2345.2	2381.5	2382.9	2392.2	2386.5
12.5°	2397.0	2450.0	2491.5	2498.2	2528.7	2533.4	2541.4
15°	2567.3	2623.5	2681.2	2701.9	2743.9	2753.9	2769.5
17.5°	2727.4	2784.9	2825.3	2878.7	2895.9	2919.0	2903.3
20°	2815.0	2877.7	2929.0	2971.0	2988.7	3001.6	3000.2
22.5°	2868.0	2931.2	2972.8	3004.6	3021.2	3026.6	3026.4
25°	2901.2	2937.5	2950.3	2962.4	2943.9	2937.5	2940.3
27.5°	2809.0	2799.5	2766.1	2722.2	2676.6	2640.4	2620.8
30°	2681.9	2626.4	2575.9	2487.5	2442.0	2414.9	2390.8
32.5°	2502.0	2414.0	2316.7	2235.8	2184.0	2143.9	2137.9
35°	2193.5	2061.1	1942.2	1843.3	1792.0	1748.6	1738.6
37.5°	1864.9	1727.3	1620.2	1533.1	1478.0	1447.4	1418.8
40°	1646.7	1528.6	1423.2	1349.2	1307.2	1285.0	1267.3
42.5°	1478.7	1370.8	1266.0	1209.6	1171.6	1158.1	1147.6
45°	1246.6	1146.2	1073.6	1030.9	1008.8	986.1	975.4
47.5°	1060.8	979.1	931.2	894.9	871.3	857.7	851.0
50°	955.5	888.5	845.8	818.1	796.7	786.0	780.3
52.5°	862.0	807.1	771.2	749.1	734.6	726.7	724.5
55°	742.5	700.5	677.8	658.5	647.9	640.8	637.9
57.5°	645.4	613.1	594.6	578.8	574.7	568.7	566.7
60°	581.7	556.8	541.1	530.4	526.8	519.7	521.1
62.5°	525.3	504.9	491.5	485.4	480.7	474.7	476.7
65°	444.3	429.3	422.2	416.5	410.8	407.2	410.1
67.5°	372.7	362.6	352.8	349.6	346.7	346.2	343.1
70°	326.1	317.5	309.0	306.8	306.8	304.0	303.3
72.5°	281.1	274.8	269.1	267.5	265.3	266.4	263.4
75°	217.1	212.1	210.0	207.9	207.1	207.1	205.0
77.5°	160.5	156.8	153.4	153.4	150.8	149.8	149.5
80°	121.7	120.3	117.4	117.4	116.0	116.7	115.3
82.5°	91.6	89.5	89.0	87.8	85.9	86.0	84.6
85°	49.1	47.0	46.3	44.1	42.7	44.1	42.7
87.5°	19.7	19.3	18.8	17.7	17.2	17.2	15.6
90°	13.2	13.9	14.4	14.6	14.8	15.1	15.2
92.5°	21.4	21.8	22.0	22.2	22.3	22.5	22.6
95°	39.7	40.0	40.2	40.2	40.2	40.2	40.2
97.5°	62.3	62.8	63.0	63.0	63.0	63.0	63.0
100°	78.5	78.7	78.8	78.8	78.8	78.8	78.8
102.5°	95.9	96.1	96.4	96.5	96.6	96.7	96.8
105°	122.1	122.4	122.7	123.1	123.4	123.8	124.1
107.5°	150.3	150.7	150.9	150.8	150.8	150.8	150.8
110°	168.7	168.4	168.5	168.9	169.2	169.5	169.9



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
112.5°	189.1	189.1	189.1	189.2	189.2	189.3	189.4
115°	220.4	220.3	220.2	220.1	219.9	219.8	219.7
117.5°	250.2	249.8	249.5	249.2	249.1	248.8	248.6
120°	270.4	269.8	269.7	269.9	270.1	270.4	270.5
122.5°	291.3	290.9	290.5	290.1	289.7	289.3	288.9
125°	321.7	321.6	321.3	321.1	320.8	320.7	320.4
127.5°	350.8	350.5	350.4	350.2	350.0	349.8	349.6
130°	371.1	370.9	370.5	370.1	369.6	369.2	368.7
132.5°	390.2	390.0	389.8	389.6	389.4	389.2	389.1
135°	418.9	418.7	418.4	418.0	417.7	417.4	417.1
137.5°	446.6	446.3	446.1	446.2	446.3	446.4	446.5
140°	465.0	464.9	464.8	464.7	464.6	464.5	464.3
142.5°	482.4	482.3	482.3	482.3	482.3	482.2	482.2
145°	508.3	508.1	507.9	507.6	507.2	506.8	506.6
147.5°	531.8	531.7	531.6	531.5	531.4	531.3	531.2
150°	546.7	546.7	546.7	546.5	546.4	546.4	546.3
152.5°	561.0	561.2	561.2	561.0	560.6	560.4	560.1
155°	580.6	581.1	581.1	580.6	580.1	579.7	579.3
157.5°	597.7	598.1	598.0	597.6	597.3	596.8	596.5
160°	608.2	608.6	608.5	608.0	607.3	606.8	606.3
162.5°	618.0	618.7	618.7	618.1	617.5	617.0	616.4
165°	630.6	631.3	631.4	631.0	630.5	630.1	629.6
167.5°	641.2	641.9	641.9	641.2	640.5	639.8	639.1
170°	646.9	647.6	647.6	646.8	646.0	645.2	644.4
172.5°	651.3	652.0	652.0	651.2	650.4	649.6	648.9
175°	655.9	656.7	656.7	655.9	655.1	654.3	653.5
177.5°	658.3	658.9	658.9	658.2	657.5	656.7	655.9
180°	657.6	657.6	657.6	657.6	657.6	657.6	657.6

(END OF REPORT)