

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: P332402-840

Luminaire Tested: **S123RDIW-S340D1320U840-4F0-1E-UDD-A**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P332402-840
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-5,
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: S123RDIW-S340D1320U840-4F0-1E-UDD-A
Description: DEFINE 3 DIRECT-INDIRECT WALL MOUNT LED LUMINAIRE
DOWNLIGHT 340 LUMENS PER FOOT, ASYMMETRIC DIFFUSER, REGRESSED HOUSING
UPLIGHT 1320 LUMENS PER FOOT, NO LENS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6703.3 lumens
Efficiency: N/A
Efficacy: 143.8 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-Indirect

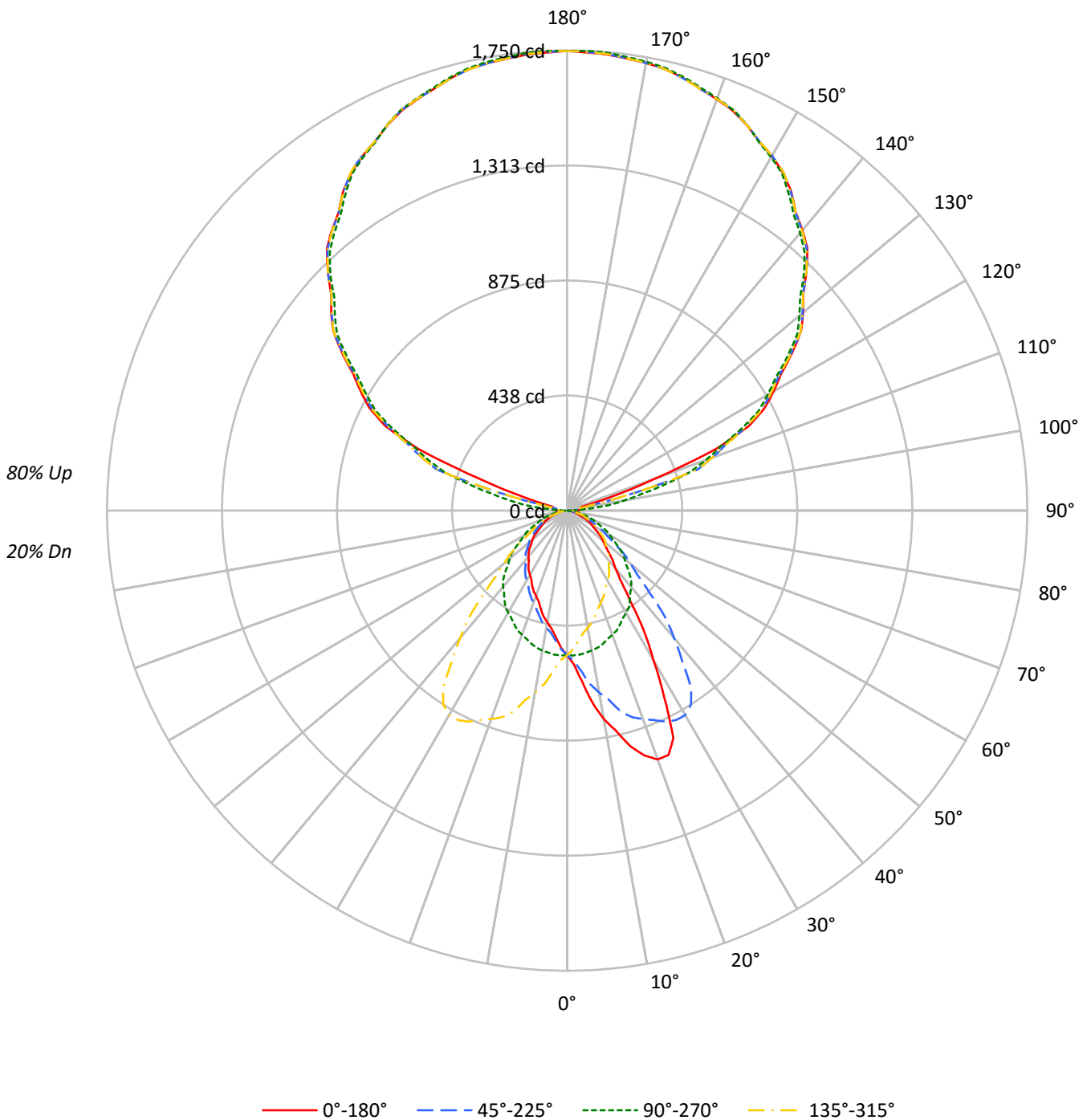
Input Watts (W): 46.6
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	100	100	100	100	89	89	89	89	67	67	67	47	47	47	29	29	29	20
1	91	87	84	80	81	77	74	72	59	57	55	42	41	40	26	25	25	18
2	83	76	71	66	74	68	63	59	52	49	46	37	35	33	23	22	21	15
3	76	67	61	55	67	60	54	50	46	42	39	33	30	28	21	19	18	13
4	70	60	52	47	61	53	47	42	41	36	33	29	27	24	19	17	16	11
5	64	53	45	40	56	47	41	36	36	32	29	26	23	21	17	15	14	10
6	59	47	40	34	52	42	36	31	33	28	25	24	21	19	15	14	12	9
7	54	43	35	30	48	38	32	27	30	25	22	22	19	16	14	12	11	8
8	50	39	31	26	44	35	28	24	27	22	19	20	17	15	13	11	10	7
9	47	35	28	23	41	31	25	21	25	20	17	18	15	13	12	10	9	7
10	43	32	25	21	38	29	23	19	22	18	15	17	14	12	11	9	8	6

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	5916	5916	5916	5916
5°	7052	5942	5232	5942
10°	8805	5908	4726	5908
15°	10336	5846	4310	5846
20°	11535	5756	3956	5756
25°	11351	5662	3739	5662
30°	8158	5574	3515	5574
35°	5447	5460	3369	5460
40°	4013	5323	3219	5323
45°	3367	5083	3073	5083
50°	2971	4767	2869	4767
55°	2607	4406	2586	4406
60°	2321	4060	2370	4060
65°	2038	3691	2203	3691
70°	1599	3361	2014	3361
75°	1406	2936	1838	2936
80°	1227	2492	1810	2492
85°	988	2013	1927	2013



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	54.0	0.8
10°-20°	168.9	2.5
20°-30°	265.3	4.0
30°-40°	276.8	4.1
40°-50°	236.9	3.5
50°-60°	180.5	2.7
60°-70°	115.7	1.7
70°-80°	55.7	0.8
80°-90°	19.6	0.3
90°-100°	63.5	0.9
100°-110°	302.9	4.5
110°-120°	727.5	10.9
120°-130°	926.3	13.8
130°-140°	989.8	14.8
140°-150°	925.5	13.8
150°-160°	746.6	11.1
160°-170°	481.8	7.2
170°-180°	166.1	2.5
0°-30°	488.2	7.3
0°-40°	764.9	11.4
0°-60°	1182.3	17.6
0°-90°	1373.3	20.5
90°-120°	1093.9	16.3
90°-150°	3935.5	58.7
90°-180°	5330.0	79.5
0°-180°	6703.3	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	550	550	550	550	550	
5°	653	550	484	550	653	67
15°	928	525	387	525	928	263
25°	956	477	315	477	956	411
35°	414	416	256	416	414	272
45°	221	334	202	334	221	174
55°	139	235	138	235	139	126
65°	80	145	86	145	80	79
75°	34	71	44	71	34	36
85°	8	16	16	16	8	10
90°	39	1	39	1	39	18
95°	49	79	49	79	49	41
105°	57	387	57	387	57	131
115°	764	726	764	726	764	706
125°	1044	1023	1044	1023	1044	932
135°	1287	1274	1287	1274	1287	992
145°	1484	1470	1484	1470	1484	926
155°	1617	1619	1617	1619	1617	745
165°	1704	1708	1704	1708	1704	481
175°	1741	1748	1741	1748	1741	166
180°	1748	1748	1748	1748	1748	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6
2.5°	585.4	586.1	583.7	583.3	580.5	579.8	579.8	575.7	573.3	570.2	568.3
5°	652.7	656.4	654.5	650.4	643.3	641.6	637.1	630.1	622.1	612.2	607.5
7.5°	736.7	741.8	739.8	733.4	725.9	719.9	707.3	695.6	679.2	664.8	652.5
10°	805.6	800.2	796.0	789.6	782.7	771.7	758.5	740.4	719.5	703.0	684.7
12.5°	857.2	856.3	850.9	844.3	834.8	824.3	808.0	786.0	761.6	737.8	716.8
15°	927.5	928.9	925.3	918.6	904.8	886.3	861.8	852.6	817.8	791.9	766.1
17.5°	976.1	975.8	975.3	965.9	952.0	938.8	916.0	891.9	860.4	823.9	789.1
20°	1007.0	1004.6	1005.1	994.5	984.2	968.9	946.7	911.7	885.9	843.7	807.7
22.5°	1006.2	1005.7	1007.5	1003.9	996.4	984.7	967.2	937.7	904.6	862.1	821.6
25°	955.7	953.8	964.8	968.0	980.0	982.1	976.8	960.7	929.4	885.6	835.5
27.5°	799.8	798.8	819.3	845.1	877.6	902.9	927.4	939.2	929.4	898.0	847.8
30°	656.4	678.5	688.9	726.1	767.5	816.9	860.2	901.3	911.5	897.8	856.7
32.5°	545.0	564.3	573.0	604.8	643.5	701.4	766.3	824.6	865.8	876.2	851.4
35°	414.5	414.8	434.5	448.7	484.4	543.9	607.0	685.1	762.8	821.6	827.7
37.5°	330.8	331.9	344.0	358.0	384.9	416.3	471.8	536.7	626.4	716.7	769.7
40°	285.6	287.7	296.7	310.5	329.8	353.7	396.9	458.1	532.9	633.4	715.5
42.5°	256.6	260.0	264.7	275.4	287.3	309.6	344.6	391.8	459.9	554.9	649.6
45°	221.2	223.1	226.6	231.6	242.4	257.8	281.3	313.2	369.6	446.1	540.9
47.5°	195.1	194.1	197.8	201.8	209.0	219.6	235.4	261.3	301.5	362.9	443.3
50°	177.4	177.1	179.8	182.8	189.7	197.4	210.4	229.8	261.9	312.7	386.4
52.5°	160.9	161.7	163.6	167.3	172.3	178.5	190.2	204.3	231.8	275.6	337.0
55°	138.9	139.6	142.1	144.2	147.7	154.1	161.4	173.2	192.0	222.6	273.2
57.5°	120.2	119.9	122.3	122.9	126.8	132.0	137.6	146.8	160.5	183.2	217.2
60°	107.8	107.0	109.2	110.8	112.9	117.1	121.9	130.8	141.7	158.3	187.5
62.5°	96.4	96.1	97.7	99.4	101.1	104.9	108.9	115.7	124.3	138.4	161.6
65°	80.0	80.7	81.4	82.1	83.0	85.4	89.2	93.9	99.8	109.7	126.3
67.5°	62.9	63.6	63.8	65.2	67.3	68.8	71.1	75.2	79.4	87.7	97.1
70°	50.8	50.6	50.8	51.5	54.1	56.7	59.8	62.8	65.4	71.3	79.3
72.5°	43.6	43.2	43.8	44.0	45.2	45.9	47.9	50.8	54.1	58.1	63.8
75°	33.8	33.8	33.8	33.8	34.8	35.2	36.0	36.7	37.9	39.8	44.0
77.5°	25.0	25.0	25.4	25.7	25.9	26.2	26.6	27.3	27.7	28.7	30.5
80°	19.8	20.0	19.8	20.0	20.0	20.5	20.7	21.4	21.6	22.8	23.5
82.5°	14.8	14.7	14.8	15.1	15.1	15.6	15.7	16.2	16.2	16.8	17.5
85°	8.0	7.6	8.0	7.8	8.3	7.8	8.0	8.5	8.5	8.7	9.7
87.5°	9.7	9.9	9.5	9.5	9.4	9.4	9.2	9.0	9.1	8.7	8.1
90°	39.0	38.4	37.8	37.3	36.7	35.7	34.6	33.4	32.3	31.2	27.4
92.5°	43.1	42.7	42.4	42.1	41.7	40.6	38.8	37.0	35.0	33.2	30.4
95°	49.4	49.4	49.4	49.4	49.4	48.4	46.4	44.3	42.3	40.3	37.1
97.5°	53.5	53.2	52.9	52.6	52.3	51.0	48.8	46.5	44.1	41.8	62.6
100°	54.5	54.2	53.9	53.6	53.4	52.1	49.8	47.5	45.1	42.8	87.9
102.5°	55.5	55.0	54.5	54.0	53.5	56.9	63.9	71.1	78.3	85.4	134.6
105°	57.2	56.6	55.9	55.4	54.8	80.1	131.2	182.2	233.3	284.4	310.3
107.5°	179.5	217.9	256.4	295.0	333.5	371.4	408.9	446.4	483.7	521.2	517.2
110°	357.1	398.4	439.6	480.9	522.1	547.5	557.0	566.5	576.1	585.6	582.5



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	612.7	621.4	630.1	638.7	647.5	651.8	651.6	651.5	651.3	651.1	647.9
115°	763.6	762.3	761.2	760.0	758.9	756.9	754.0	751.1	748.2	745.4	742.8
117.5°	848.2	848.0	847.7	847.5	847.3	846.0	843.6	841.4	839.1	836.8	835.5
120°	906.4	906.4	906.4	906.4	906.4	905.2	902.9	900.6	898.3	896.0	895.1
122.5°	963.5	963.3	963.0	962.8	962.6	961.7	960.1	958.5	956.8	955.2	954.1
125°	1044.0	1043.4	1042.9	1042.3	1041.7	1041.1	1040.6	1040.0	1039.4	1038.8	1037.6
127.5°	1121.4	1122.0	1122.6	1123.2	1123.7	1123.6	1122.6	1121.7	1120.7	1119.8	1118.4
130°	1171.2	1171.8	1172.5	1173.0	1173.6	1173.3	1172.2	1170.9	1169.8	1168.6	1167.5
132.5°	1217.0	1217.8	1218.6	1219.4	1220.2	1220.0	1218.9	1217.7	1216.6	1215.4	1214.5
135°	1286.9	1287.7	1288.6	1289.4	1290.3	1290.3	1289.4	1288.6	1287.7	1286.9	1285.7
137.5°	1352.5	1353.1	1353.7	1354.2	1354.8	1354.4	1353.0	1351.7	1350.3	1348.9	1348.3
140°	1392.0	1392.6	1393.1	1393.7	1394.3	1394.0	1392.9	1391.7	1390.6	1389.4	1388.6
142.5°	1428.4	1429.2	1430.0	1430.8	1431.6	1431.6	1430.6	1429.7	1428.8	1427.8	1426.9
145°	1484.2	1484.2	1484.2	1484.2	1484.2	1483.9	1483.3	1482.8	1482.2	1481.6	1481.1
147.5°	1525.7	1527.1	1528.4	1529.7	1531.1	1531.5	1530.9	1530.2	1529.7	1529.1	1528.5
150°	1556.9	1557.8	1558.6	1559.5	1560.3	1560.5	1559.9	1559.3	1558.8	1558.2	1557.6
152.5°	1581.9	1583.2	1584.5	1585.8	1587.2	1587.3	1586.3	1585.2	1584.2	1583.2	1582.8
155°	1616.7	1618.4	1620.1	1621.8	1623.6	1623.8	1622.2	1620.8	1619.4	1617.9	1617.7
157.5°	1646.0	1648.2	1650.5	1652.7	1655.0	1655.3	1653.6	1651.8	1650.0	1648.3	1648.6
160°	1664.7	1666.7	1668.7	1670.7	1672.7	1672.9	1671.2	1669.4	1667.7	1666.0	1666.3
162.5°	1682.3	1684.2	1686.0	1687.7	1689.5	1689.4	1687.5	1685.5	1683.5	1681.5	1681.8
165°	1703.6	1705.7	1707.7	1709.7	1711.7	1711.6	1709.3	1707.0	1704.7	1702.3	1702.6
167.5°	1719.0	1721.3	1723.6	1725.9	1728.2	1728.2	1725.9	1723.6	1721.3	1719.0	1719.0
170°	1728.3	1730.6	1732.9	1735.3	1737.6	1737.6	1735.3	1732.9	1730.6	1728.3	1728.3
172.5°	1733.5	1736.1	1738.6	1741.1	1743.6	1743.8	1741.5	1739.2	1736.9	1734.5	1734.3
175°	1741.3	1743.6	1746.0	1748.3	1750.5	1750.7	1748.7	1746.7	1744.6	1742.6	1742.3
177.5°	1743.6	1746.0	1748.3	1750.6	1752.9	1753.1	1751.3	1749.4	1747.6	1745.8	1745.5
180°	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6
2.5°	567.4	566.9	564.3	561.3	557.3	554.7	552.6	551.5	548.1	543.9	541.2
5°	602.6	595.5	587.9	578.8	570.3	561.6	556.2	549.9	542.1	533.4	527.3
7.5°	640.1	626.2	611.4	595.9	580.8	567.1	555.0	544.7	532.4	519.9	511.2
10°	668.9	648.6	627.7	606.3	586.8	568.5	554.3	540.5	525.6	511.3	500.4
12.5°	695.1	668.4	644.3	617.9	593.0	571.1	550.8	534.4	516.5	501.3	489.0
15°	728.2	700.8	671.8	631.7	598.5	570.8	546.0	524.6	503.0	484.2	472.2
17.5°	759.1	718.1	678.8	645.5	602.4	567.7	537.6	512.0	488.2	468.3	453.4
20°	771.9	732.2	689.6	647.0	604.7	565.8	530.8	502.5	477.9	455.2	441.6
22.5°	779.6	734.7	689.7	644.0	599.1	558.7	524.0	492.9	466.2	444.7	427.9
25°	788.6	735.0	685.6	640.5	594.5	550.8	509.6	476.7	447.8	425.0	407.1
27.5°	794.6	731.4	673.1	622.9	576.3	532.8	495.0	460.1	430.7	406.6	387.4
30°	795.7	728.6	663.5	609.2	561.9	521.8	481.8	448.5	417.4	391.7	373.9
32.5°	797.2	721.6	650.5	592.8	544.3	504.7	468.5	436.6	404.8	379.5	361.2
35°	791.0	717.8	630.8	564.4	515.9	477.6	444.9	415.5	384.3	359.7	341.1
37.5°	764.3	702.6	610.4	532.5	481.8	446.4	419.7	394.0	365.4	338.9	321.4
40°	737.4	687.5	594.5	513.1	460.2	423.7	399.7	378.8	351.0	326.3	307.5
42.5°	697.3	666.9	579.5	492.8	435.8	400.6	380.3	360.7	336.4	311.2	293.6
45°	623.7	627.7	548.7	460.4	401.8	366.6	347.5	333.9	312.3	291.5	273.4
47.5°	531.5	568.9	512.5	426.0	366.2	333.1	316.4	304.5	289.8	269.5	253.0
50°	471.3	524.6	483.5	402.8	343.8	310.8	294.4	284.7	272.0	256.0	240.2
52.5°	415.8	473.1	448.5	377.0	319.4	289.3	273.3	265.3	255.2	240.1	225.9
55°	339.0	397.2	391.5	338.1	283.1	256.0	243.8	234.8	228.0	216.7	205.4
57.5°	274.3	329.3	332.2	294.8	251.0	224.2	213.7	206.9	202.5	194.0	183.5
60°	233.4	284.0	293.9	265.6	228.0	204.5	194.1	188.6	185.2	178.3	170.4
62.5°	199.5	242.6	253.8	233.5	206.0	183.9	175.8	170.7	168.2	162.4	155.3
65°	152.7	188.4	199.2	188.0	173.6	156.0	149.4	144.9	142.8	139.6	134.3
67.5°	114.8	140.9	152.8	144.8	139.6	128.5	124.3	121.9	120.0	117.8	113.4
70°	92.2	111.5	123.7	121.7	117.4	111.5	108.5	106.8	104.9	103.0	99.3
72.5°	74.1	87.5	98.9	100.0	96.5	95.3	92.6	91.9	90.8	88.6	86.4
75°	49.2	58.4	66.3	69.4	70.8	72.0	70.8	70.6	70.4	68.5	67.3
77.5°	32.2	37.2	42.2	47.5	49.7	51.2	51.6	52.5	51.8	50.9	50.3
80°	24.7	25.9	29.4	33.8	37.4	38.8	39.8	40.2	40.0	39.8	38.8
82.5°	18.0	18.9	20.6	23.7	26.7	29.0	29.6	29.5	30.0	30.2	29.4
85°	9.7	9.9	10.4	10.8	12.4	15.0	15.8	16.3	16.7	16.7	15.2
87.5°	7.8	6.8	6.5	5.8	5.8	5.4	6.0	6.3	7.1	6.9	7.5
90°	23.6	19.9	16.2	12.8	10.0	7.1	4.1	1.3	4.1	7.1	10.0
92.5°	27.6	24.7	21.9	20.9	21.7	22.5	23.3	24.1	23.3	22.5	21.7
95°	33.9	30.7	27.6	31.9	43.7	55.5	67.4	79.2	67.4	55.5	43.7
97.5°	83.4	104.1	124.9	137.9	143.3	148.6	153.9	159.2	153.9	148.6	143.3
100°	132.9	177.9	222.9	242.6	236.7	231.0	225.2	219.4	225.2	231.0	236.7
102.5°	183.8	233.0	282.2	304.7	300.4	296.3	292.2	288.0	292.2	296.3	300.4
105°	336.3	362.2	388.3	399.6	396.5	393.3	390.1	387.0	390.1	393.3	396.5
107.5°	513.0	509.0	504.8	501.5	499.0	496.4	493.9	491.4	493.9	496.4	499.0
110°	579.3	576.1	572.9	570.2	567.8	565.5	563.3	561.0	563.3	565.5	567.8



TEST NUMBER: P332402-840

CATALOG NUMBER: S123RDIW-S340D1320U840-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	644.7	641.6	638.3	635.7	633.7	631.6	629.5	627.4	629.5	631.6	633.7
115°	740.1	737.5	735.0	732.8	731.0	729.3	727.6	725.9	727.6	729.3	731.0
117.5°	834.1	832.7	831.4	829.7	827.6	825.5	823.3	821.2	823.3	825.5	827.6
120°	894.2	893.3	892.5	890.8	888.2	885.6	883.0	880.4	883.0	885.6	888.2
122.5°	953.0	951.9	950.8	949.2	947.1	944.9	942.8	940.7	942.8	944.9	947.1
125°	1036.5	1035.3	1034.2	1032.5	1030.2	1027.8	1025.5	1023.2	1025.5	1027.8	1030.2
127.5°	1117.1	1115.7	1114.3	1112.5	1110.1	1107.8	1105.5	1103.2	1105.5	1107.8	1110.1
130°	1166.4	1165.2	1164.1	1162.4	1160.0	1157.7	1155.4	1153.1	1155.4	1157.7	1160.0
132.5°	1213.6	1212.6	1211.7	1210.1	1207.8	1205.5	1203.2	1200.8	1203.2	1205.5	1207.8
135°	1284.5	1283.3	1282.2	1280.8	1279.0	1277.3	1275.6	1273.8	1275.6	1277.3	1279.0
137.5°	1347.7	1347.0	1346.4	1344.9	1342.7	1340.6	1338.4	1336.2	1338.4	1340.6	1342.7
140°	1387.7	1386.8	1385.9	1384.6	1382.9	1381.2	1379.5	1377.8	1379.5	1381.2	1382.9
142.5°	1426.1	1425.2	1424.4	1423.1	1421.4	1419.7	1417.9	1416.1	1417.9	1419.7	1421.4
145°	1480.5	1479.9	1479.3	1478.0	1476.0	1474.0	1472.0	1470.0	1472.0	1474.0	1476.0
147.5°	1527.9	1527.4	1526.8	1525.9	1524.5	1523.2	1521.9	1520.6	1521.9	1523.2	1524.5
150°	1557.0	1556.5	1555.9	1555.2	1554.3	1553.5	1552.6	1551.8	1552.6	1553.5	1554.3
152.5°	1582.5	1582.2	1581.8	1581.3	1580.9	1580.5	1580.1	1579.7	1580.1	1580.5	1580.9
155°	1617.4	1617.1	1616.8	1616.9	1617.5	1618.1	1618.7	1619.2	1618.7	1618.1	1617.5
157.5°	1648.9	1649.2	1649.5	1649.6	1649.7	1649.8	1649.8	1649.9	1649.8	1649.8	1649.7
160°	1666.6	1666.9	1667.2	1667.4	1667.7	1668.0	1668.3	1668.6	1668.3	1668.0	1667.7
162.5°	1682.1	1682.4	1682.7	1683.2	1683.9	1684.8	1685.5	1686.3	1685.5	1684.8	1683.9
165°	1702.9	1703.2	1703.5	1704.0	1705.0	1705.8	1706.7	1707.6	1706.7	1705.8	1705.0
167.5°	1719.0	1719.0	1719.0	1719.5	1720.7	1721.8	1723.0	1724.1	1723.0	1721.8	1720.7
170°	1728.3	1728.3	1728.3	1728.9	1730.1	1731.2	1732.3	1733.5	1732.3	1731.2	1730.1
172.5°	1734.1	1733.8	1733.6	1734.2	1735.6	1737.0	1738.4	1739.8	1738.4	1737.0	1735.6
175°	1742.0	1741.7	1741.4	1742.0	1743.4	1744.9	1746.4	1747.8	1746.4	1744.9	1743.4
177.5°	1745.2	1745.0	1744.8	1745.2	1746.5	1747.6	1748.7	1749.9	1748.7	1747.6	1746.5
180°	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8



TEST NUMBER: P332402-840

CATALOG NUMBER: S123RDIW-S340D1320U840-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6
2.5°	540.2	537.8	536.0	532.3	529.9	527.3	524.6	526.2	526.0	525.9	525.9
5°	522.1	516.6	511.7	505.3	501.4	496.4	492.7	492.2	493.1	489.9	488.0
7.5°	504.1	496.8	489.7	482.7	475.2	469.3	465.6	463.8	461.5	459.5	457.4
10°	491.5	482.8	475.9	467.3	459.3	452.2	447.8	444.6	443.0	441.4	438.3
12.5°	478.5	470.0	461.3	451.4	443.8	435.7	432.3	428.9	425.8	423.8	419.7
15°	459.5	448.5	439.3	428.9	420.4	412.4	407.8	400.9	400.0	397.6	393.3
17.5°	440.4	428.5	415.8	408.1	398.6	390.2	383.0	380.8	374.1	371.5	367.8
20°	425.4	414.3	404.7	394.6	380.7	372.9	367.3	364.3	358.8	355.5	353.1
22.5°	412.4	401.1	390.0	378.2	366.8	358.0	353.9	349.1	346.2	341.5	339.0
25°	393.8	381.6	368.2	355.5	347.3	340.7	334.1	329.8	325.6	323.5	318.8
27.5°	372.3	359.5	347.0	337.3	327.2	320.7	314.8	311.0	305.9	302.4	299.7
30°	360.4	345.4	334.6	325.9	313.0	306.8	302.4	297.6	293.9	290.1	287.5
32.5°	346.7	333.0	322.8	311.9	302.1	295.3	289.5	285.4	282.2	278.6	276.0
35°	325.2	313.7	303.1	292.3	284.9	278.1	271.2	267.7	264.7	261.4	259.0
37.5°	305.7	294.9	284.8	274.6	265.5	259.9	254.5	251.8	247.6	245.4	243.1
40°	293.7	283.1	272.3	262.4	253.0	248.7	243.8	239.7	236.0	234.3	231.8
42.5°	280.4	269.8	260.7	250.1	242.4	236.6	232.1	227.7	224.9	222.5	221.1
45°	260.9	251.6	242.6	232.0	224.7	219.7	214.6	210.6	208.0	206.3	203.8
47.5°	242.0	232.6	223.5	214.3	207.2	201.6	196.3	193.6	190.2	188.1	186.4
50°	228.2	219.7	210.2	201.7	194.6	188.9	184.7	181.2	178.1	175.5	174.3
52.5°	215.6	206.6	198.2	190.4	182.9	176.5	172.7	169.0	166.6	163.7	162.3
55°	194.8	186.1	179.0	171.3	164.0	158.5	153.9	150.6	148.2	144.9	143.1
57.5°	175.3	167.4	159.1	152.3	144.8	140.3	136.3	131.9	129.0	126.4	124.5
60°	162.1	153.2	145.8	139.6	132.9	127.0	123.5	120.0	116.9	114.3	112.7
62.5°	148.3	140.6	133.6	126.7	120.7	115.5	111.5	108.6	105.8	104.2	102.5
65°	127.2	121.2	114.1	108.5	102.8	99.1	95.7	93.2	91.3	90.1	88.7
67.5°	107.9	102.0	95.8	90.3	86.4	83.6	81.5	79.3	78.3	76.7	75.8
70°	95.3	89.2	83.7	79.5	75.7	73.6	72.2	70.6	69.7	67.8	66.9
72.5°	81.6	77.2	73.2	69.8	66.8	64.8	63.0	61.0	59.5	57.4	56.5
75°	64.2	60.2	57.2	54.8	52.9	50.4	47.8	45.6	44.9	44.2	44.0
77.5°	47.6	45.0	42.8	40.8	38.5	36.7	36.1	35.5	35.4	35.0	35.0
80°	37.4	35.0	33.4	31.1	29.7	29.7	29.7	29.2	29.4	29.4	29.4
82.5°	27.8	25.7	24.7	23.9	23.6	23.8	23.8	23.9	23.7	24.1	23.9
85°	14.3	14.5	15.0	14.8	15.0	15.0	15.6	15.2	15.6	15.0	15.6
87.5°	7.9	9.1	10.0	10.9	11.9	12.4	12.8	13.1	13.5	13.7	13.9
90°	12.8	16.2	19.9	23.6	27.4	31.2	32.3	33.4	34.6	35.7	36.7
92.5°	20.9	21.9	24.7	27.6	30.4	33.2	35.0	37.0	38.8	40.6	41.7
95°	31.9	27.6	30.7	33.9	37.1	40.3	42.3	44.3	46.4	48.4	49.4
97.5°	137.9	124.9	104.1	83.4	62.6	41.8	44.1	46.5	48.8	51.0	52.3
100°	242.6	222.9	177.9	132.9	87.9	42.8	45.1	47.5	49.8	52.1	53.4
102.5°	304.7	282.2	233.0	183.8	134.6	85.4	78.3	71.1	63.9	56.9	53.5
105°	399.6	388.3	362.2	336.3	310.3	284.4	233.3	182.2	131.2	80.1	54.8
107.5°	501.5	504.8	509.0	513.0	517.2	521.2	483.7	446.4	408.9	371.4	333.5
110°	570.2	572.9	576.1	579.3	582.5	585.6	576.1	566.5	557.0	547.5	522.1



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CATALOG NUMBER: S123RDIW-S340D1320U840-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	635.7	638.3	641.6	644.7	647.9	651.1	651.3	651.5	651.6	651.8	647.5
115°	732.8	735.0	737.5	740.1	742.8	745.4	748.2	751.1	754.0	756.9	758.9
117.5°	829.7	831.4	832.7	834.1	835.5	836.8	839.1	841.4	843.6	846.0	847.3
120°	890.8	892.5	893.3	894.2	895.1	896.0	898.3	900.6	902.9	905.2	906.4
122.5°	949.2	950.8	951.9	953.0	954.1	955.2	956.8	958.5	960.1	961.7	962.6
125°	1032.5	1034.2	1035.3	1036.5	1037.6	1038.8	1039.4	1040.0	1040.6	1041.1	1041.7
127.5°	1112.5	1114.3	1115.7	1117.1	1118.4	1119.8	1120.7	1121.7	1122.6	1123.6	1123.7
130°	1162.4	1164.1	1165.2	1166.4	1167.5	1168.6	1169.8	1170.9	1172.2	1173.3	1173.6
132.5°	1210.1	1211.7	1212.6	1213.6	1214.5	1215.4	1216.6	1217.7	1218.9	1220.0	1220.2
135°	1280.8	1282.2	1283.3	1284.5	1285.7	1286.9	1287.7	1288.6	1289.4	1290.3	1290.3
137.5°	1344.9	1346.4	1347.0	1347.7	1348.3	1348.9	1350.3	1351.7	1353.0	1354.4	1354.8
140°	1384.6	1385.9	1386.8	1387.7	1388.6	1389.4	1390.6	1391.7	1392.9	1394.0	1394.3
142.5°	1423.1	1424.4	1425.2	1426.1	1426.9	1427.8	1428.8	1429.7	1430.6	1431.6	1431.6
145°	1478.0	1479.3	1479.9	1480.5	1481.1	1481.6	1482.2	1482.8	1483.3	1483.9	1484.2
147.5°	1525.9	1526.8	1527.4	1527.9	1528.5	1529.1	1529.7	1530.2	1530.9	1531.5	1531.1
150°	1555.2	1555.9	1556.5	1557.0	1557.6	1558.2	1558.8	1559.3	1559.9	1560.5	1560.3
152.5°	1581.3	1581.8	1582.2	1582.5	1582.8	1583.2	1584.2	1585.2	1586.3	1587.3	1587.2
155°	1616.9	1616.8	1617.1	1617.4	1617.7	1617.9	1619.4	1620.8	1622.2	1623.8	1623.6
157.5°	1649.6	1649.5	1649.2	1648.9	1648.6	1648.3	1650.0	1651.8	1653.6	1655.3	1655.0
160°	1667.4	1667.2	1666.9	1666.6	1666.3	1666.0	1667.7	1669.4	1671.2	1672.9	1672.7
162.5°	1683.2	1682.7	1682.4	1682.1	1681.8	1681.5	1683.5	1685.5	1687.5	1689.4	1689.5
165°	1704.0	1703.5	1703.2	1702.9	1702.6	1702.3	1704.7	1707.0	1709.3	1711.6	1711.7
167.5°	1719.5	1719.0	1719.0	1719.0	1719.0	1719.0	1721.3	1723.6	1725.9	1728.2	1728.2
170°	1728.9	1728.3	1728.3	1728.3	1728.3	1728.3	1730.6	1732.9	1735.3	1737.6	1737.6
172.5°	1734.2	1733.6	1733.8	1734.1	1734.3	1734.5	1736.9	1739.2	1741.5	1743.8	1743.6
175°	1742.0	1741.4	1741.7	1742.0	1742.3	1742.6	1744.6	1746.7	1748.7	1750.7	1750.5
177.5°	1745.2	1744.8	1745.0	1745.2	1745.5	1745.8	1747.6	1749.4	1751.3	1753.1	1752.9
180°	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8



TEST NUMBER: P332402-840

CATALOG NUMBER: S123RDIW-S340D1320U840-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
0°	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6
2.5°	523.6	523.4	523.6	522.9	523.6	523.4	523.6	525.9	525.9	526.0	526.2
5°	487.3	487.1	486.4	484.2	486.4	487.1	487.3	488.0	489.9	493.1	492.2
7.5°	455.4	455.1	453.1	453.1	453.1	455.1	455.4	457.4	459.5	461.5	463.8
10°	436.7	436.9	434.0	432.4	434.0	436.9	436.7	438.3	441.4	443.0	444.6
12.5°	418.4	417.4	415.1	413.2	415.1	417.4	418.4	419.7	423.8	425.8	428.9
15°	394.4	391.9	386.4	386.8	386.4	391.9	394.4	393.3	397.6	400.0	400.9
17.5°	366.0	364.3	364.2	360.8	364.2	364.3	366.0	367.8	371.5	374.1	380.8
20°	349.4	348.2	348.7	345.4	348.7	348.2	349.4	353.1	355.5	358.8	364.3
22.5°	336.4	335.2	333.3	332.2	333.3	335.2	336.4	339.0	341.5	346.2	349.1
25°	317.4	315.5	313.7	314.8	313.7	315.5	317.4	318.8	323.5	325.6	329.8
27.5°	298.4	297.0	295.1	294.9	295.1	297.0	298.4	299.7	302.4	305.9	311.0
30°	286.3	284.9	284.0	282.8	284.0	284.9	286.3	287.5	290.1	293.9	297.6
32.5°	274.1	273.8	272.2	271.9	272.2	273.8	274.1	276.0	278.6	282.2	285.4
35°	258.1	256.7	256.2	256.4	256.2	256.7	258.1	259.0	261.4	264.7	267.7
37.5°	242.9	241.1	240.1	239.3	240.1	241.1	242.9	243.1	245.4	247.6	251.8
40°	232.0	230.1	229.6	229.1	229.6	230.1	232.0	231.8	234.3	236.0	239.7
42.5°	219.7	219.0	218.7	217.8	218.7	219.0	219.7	221.1	222.5	224.9	227.7
45°	203.1	202.8	201.4	201.9	201.4	202.8	203.1	203.8	206.3	208.0	210.6
47.5°	185.4	184.4	183.4	184.1	183.4	184.4	185.4	186.4	188.1	190.2	193.6
50°	173.4	172.9	170.8	171.3	170.8	172.9	173.4	174.3	175.5	178.1	181.2
52.5°	161.4	159.6	158.8	158.4	158.8	159.6	161.4	162.3	163.7	166.6	169.0
55°	141.4	139.3	138.4	137.8	138.4	139.3	141.4	143.1	144.9	148.2	150.6
57.5°	121.8	121.3	120.5	121.0	120.5	121.3	121.8	124.5	126.4	129.0	131.9
60°	110.4	110.4	110.4	110.1	110.4	110.4	110.4	112.7	114.3	116.9	120.0
62.5°	101.5	100.9	100.8	101.1	100.8	100.9	101.5	102.5	104.2	105.8	108.6
65°	88.0	87.8	86.8	86.5	86.8	87.8	88.0	88.7	90.1	91.3	93.2
67.5°	75.2	74.4	74.1	73.8	74.1	74.4	75.2	75.8	76.7	78.3	79.3
70°	65.6	65.1	63.7	64.0	63.7	65.1	65.6	66.9	67.8	69.7	70.6
72.5°	55.3	54.8	54.5	54.2	54.5	54.8	55.3	56.5	57.4	59.5	61.0
75°	43.7	43.5	43.3	44.2	43.3	43.5	43.7	44.0	44.2	44.9	45.6
77.5°	35.0	35.0	35.2	34.8	35.2	35.0	35.0	35.0	35.0	35.4	35.5
80°	29.4	29.4	29.2	29.2	29.2	29.4	29.4	29.4	29.4	29.4	29.2
82.5°	23.5	23.7	23.9	23.5	23.9	23.7	23.5	23.9	24.1	23.7	23.9
85°	15.6	15.2	15.8	15.6	15.8	15.2	15.6	15.6	15.0	15.6	15.2
87.5°	14.4	14.1	14.2	14.5	14.2	14.1	14.4	13.9	13.7	13.5	13.1
90°	37.3	37.8	38.4	39.0	38.4	37.8	37.3	36.7	35.7	34.6	33.4
92.5°	42.1	42.4	42.7	43.1	42.7	42.4	42.1	41.7	40.6	38.8	37.0
95°	49.4	49.4	49.4	49.4	49.4	49.4	49.4	49.4	48.4	46.4	44.3
97.5°	52.6	52.9	53.2	53.5	53.2	52.9	52.6	52.3	51.0	48.8	46.5
100°	53.6	53.9	54.2	54.5	54.2	53.9	53.6	53.4	52.1	49.8	47.5
102.5°	54.0	54.5	55.0	55.5	55.0	54.5	54.0	53.5	56.9	63.9	71.1
105°	55.4	55.9	56.6	57.2	56.6	55.9	55.4	54.8	80.1	131.2	182.2
107.5°	295.0	256.4	217.9	179.5	217.9	256.4	295.0	333.5	371.4	408.9	446.4
110°	480.9	439.6	398.4	357.1	398.4	439.6	480.9	522.1	547.5	557.0	566.5



TEST NUMBER: P332402-840

CATALOG NUMBER: S123RDIW-S340D1320U840-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	638.7	630.1	621.4	612.7	621.4	630.1	638.7	647.5	651.8	651.6	651.5
115°	760.0	761.2	762.3	763.6	762.3	761.2	760.0	758.9	756.9	754.0	751.1
117.5°	847.5	847.7	848.0	848.2	848.0	847.7	847.5	847.3	846.0	843.6	841.4
120°	906.4	906.4	906.4	906.4	906.4	906.4	906.4	906.4	905.2	902.9	900.6
122.5°	962.8	963.0	963.3	963.5	963.3	963.0	962.8	962.6	961.7	960.1	958.5
125°	1042.3	1042.9	1043.4	1044.0	1043.4	1042.9	1042.3	1041.7	1041.1	1040.6	1040.0
127.5°	1123.2	1122.6	1122.0	1121.4	1122.0	1122.6	1123.2	1123.7	1123.6	1122.6	1121.7
130°	1173.0	1172.5	1171.8	1171.2	1171.8	1172.5	1173.0	1173.6	1173.3	1172.2	1170.9
132.5°	1219.4	1218.6	1217.8	1217.0	1217.8	1218.6	1219.4	1220.2	1220.0	1218.9	1217.7
135°	1289.4	1288.6	1287.7	1286.9	1287.7	1288.6	1289.4	1290.3	1290.3	1289.4	1288.6
137.5°	1354.2	1353.7	1353.1	1352.5	1353.1	1353.7	1354.2	1354.8	1354.4	1353.0	1351.7
140°	1393.7	1393.1	1392.6	1392.0	1392.6	1393.1	1393.7	1394.3	1394.0	1392.9	1391.7
142.5°	1430.8	1430.0	1429.2	1428.4	1429.2	1430.0	1430.8	1431.6	1431.6	1430.6	1429.7
145°	1484.2	1484.2	1484.2	1484.2	1484.2	1484.2	1484.2	1484.2	1483.9	1483.3	1482.8
147.5°	1529.7	1528.4	1527.1	1525.7	1527.1	1528.4	1529.7	1531.1	1531.5	1530.9	1530.2
150°	1559.5	1558.6	1557.8	1556.9	1557.8	1558.6	1559.5	1560.3	1560.5	1559.9	1559.3
152.5°	1585.8	1584.5	1583.2	1581.9	1583.2	1584.5	1585.8	1587.2	1587.3	1586.3	1585.2
155°	1621.8	1620.1	1618.4	1616.7	1618.4	1620.1	1621.8	1623.6	1623.8	1622.2	1620.8
157.5°	1652.7	1650.5	1648.2	1646.0	1648.2	1650.5	1652.7	1655.0	1655.3	1653.6	1651.8
160°	1670.7	1668.7	1666.7	1664.7	1666.7	1668.7	1670.7	1672.7	1672.9	1671.2	1669.4
162.5°	1687.7	1686.0	1684.2	1682.3	1684.2	1686.0	1687.7	1689.5	1689.4	1687.5	1685.5
165°	1709.7	1707.7	1705.7	1703.6	1705.7	1707.7	1709.7	1711.7	1711.6	1709.3	1707.0
167.5°	1725.9	1723.6	1721.3	1719.0	1721.3	1723.6	1725.9	1728.2	1728.2	1725.9	1723.6
170°	1735.3	1732.9	1730.6	1728.3	1730.6	1732.9	1735.3	1737.6	1737.6	1735.3	1732.9
172.5°	1741.1	1738.6	1736.1	1733.5	1736.1	1738.6	1741.1	1743.6	1743.8	1741.5	1739.2
175°	1748.3	1746.0	1743.6	1741.3	1743.6	1746.0	1748.3	1750.5	1750.7	1748.7	1746.7
177.5°	1750.6	1748.3	1746.0	1743.6	1746.0	1748.3	1750.6	1752.9	1753.1	1751.3	1749.4
180°	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8



TEST NUMBER: P332402-840

CATALOG NUMBER: S123RDIW-S340D1320U840-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
0°	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6
2.5°	524.6	527.3	529.9	532.3	536.0	537.8	540.2	541.2	543.9	548.1	551.5
5°	492.7	496.4	501.4	505.3	511.7	516.6	522.1	527.3	533.4	542.1	549.9
7.5°	465.6	469.3	475.2	482.7	489.7	496.8	504.1	511.2	519.9	532.4	544.7
10°	447.8	452.2	459.3	467.3	475.9	482.8	491.5	500.4	511.3	525.6	540.5
12.5°	432.3	435.7	443.8	451.4	461.3	470.0	478.5	489.0	501.3	516.5	534.4
15°	407.8	412.4	420.4	428.9	439.3	448.5	459.5	472.2	484.2	503.0	524.6
17.5°	383.0	390.2	398.6	408.1	415.8	428.5	440.4	453.4	468.3	488.2	512.0
20°	367.3	372.9	380.7	394.6	404.7	414.3	425.4	441.6	455.2	477.9	502.5
22.5°	353.9	358.0	366.8	378.2	390.0	401.1	412.4	427.9	444.7	466.2	492.9
25°	334.1	340.7	347.3	355.5	368.2	381.6	393.8	407.1	425.0	447.8	476.7
27.5°	314.8	320.7	327.2	337.3	347.0	359.5	372.3	387.4	406.6	430.7	460.1
30°	302.4	306.8	313.0	325.9	334.6	345.4	360.4	373.9	391.7	417.4	448.5
32.5°	289.5	295.3	302.1	311.9	322.8	333.0	346.7	361.2	379.5	404.8	436.6
35°	271.2	278.1	284.9	292.3	303.1	313.7	325.2	341.1	359.7	384.3	415.5
37.5°	254.5	259.9	265.5	274.6	284.8	294.9	305.7	321.4	338.9	365.4	394.0
40°	243.8	248.7	253.0	262.4	272.3	283.1	293.7	307.5	326.3	351.0	378.8
42.5°	232.1	236.6	242.4	250.1	260.7	269.8	280.4	293.6	311.2	336.4	360.7
45°	214.6	219.7	224.7	232.0	242.6	251.6	260.9	273.4	291.5	312.3	333.9
47.5°	196.3	201.6	207.2	214.3	223.5	232.6	242.0	253.0	269.5	289.8	304.5
50°	184.7	188.9	194.6	201.7	210.2	219.7	228.2	240.2	256.0	272.0	284.7
52.5°	172.7	176.5	182.9	190.4	198.2	206.6	215.6	225.9	240.1	255.2	265.3
55°	153.9	158.5	164.0	171.3	179.0	186.1	194.8	205.4	216.7	228.0	234.8
57.5°	136.3	140.3	144.8	152.3	159.1	167.4	175.3	183.5	194.0	202.5	206.9
60°	123.5	127.0	132.9	139.6	145.8	153.2	162.1	170.4	178.3	185.2	188.6
62.5°	111.5	115.5	120.7	126.7	133.6	140.6	148.3	155.3	162.4	168.2	170.7
65°	95.7	99.1	102.8	108.5	114.1	121.2	127.2	134.3	139.6	142.8	144.9
67.5°	81.5	83.6	86.4	90.3	95.8	102.0	107.9	113.4	117.8	120.0	121.9
70°	72.2	73.6	75.7	79.5	83.7	89.2	95.3	99.3	103.0	104.9	106.8
72.5°	63.0	64.8	66.8	69.8	73.2	77.2	81.6	86.4	88.6	90.8	91.9
75°	47.8	50.4	52.9	54.8	57.2	60.2	64.2	67.3	68.5	70.4	70.6
77.5°	36.1	36.7	38.5	40.8	42.8	45.0	47.6	50.3	50.9	51.8	52.5
80°	29.7	29.7	29.7	31.1	33.4	35.0	37.4	38.8	39.8	40.0	40.2
82.5°	23.8	23.8	23.6	23.9	24.7	25.7	27.8	29.4	30.2	30.0	29.5
85°	15.6	15.0	15.0	14.8	15.0	14.5	14.3	15.2	16.7	16.7	16.3
87.5°	12.8	12.4	11.9	10.9	10.0	9.1	7.9	7.5	6.9	7.1	6.3
90°	32.3	31.2	27.4	23.6	19.9	16.2	12.8	10.0	7.1	4.1	1.3
92.5°	35.0	33.2	30.4	27.6	24.7	21.9	20.9	21.7	22.5	23.3	24.1
95°	42.3	40.3	37.1	33.9	30.7	27.6	31.9	43.7	55.5	67.4	79.2
97.5°	44.1	41.8	62.6	83.4	104.1	124.9	137.9	143.3	148.6	153.9	159.2
100°	45.1	42.8	87.9	132.9	177.9	222.9	242.6	236.7	231.0	225.2	219.4
102.5°	78.3	85.4	134.6	183.8	233.0	282.2	304.7	300.4	296.3	292.2	288.0
105°	233.3	284.4	310.3	336.3	362.2	388.3	399.6	396.5	393.3	390.1	387.0
107.5°	483.7	521.2	517.2	513.0	509.0	504.8	501.5	499.0	496.4	493.9	491.4
110°	576.1	585.6	582.5	579.3	576.1	572.9	570.2	567.8	565.5	563.3	561.0



TEST NUMBER: P332402-840

CATALOG NUMBER: S123RDIW-S340D1320U840-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	651.3	651.1	647.9	644.7	641.6	638.3	635.7	633.7	631.6	629.5	627.4
115°	748.2	745.4	742.8	740.1	737.5	735.0	732.8	731.0	729.3	727.6	725.9
117.5°	839.1	836.8	835.5	834.1	832.7	831.4	829.7	827.6	825.5	823.3	821.2
120°	898.3	896.0	895.1	894.2	893.3	892.5	890.8	888.2	885.6	883.0	880.4
122.5°	956.8	955.2	954.1	953.0	951.9	950.8	949.2	947.1	944.9	942.8	940.7
125°	1039.4	1038.8	1037.6	1036.5	1035.3	1034.2	1032.5	1030.2	1027.8	1025.5	1023.2
127.5°	1120.7	1119.8	1118.4	1117.1	1115.7	1114.3	1112.5	1110.1	1107.8	1105.5	1103.2
130°	1169.8	1168.6	1167.5	1166.4	1165.2	1164.1	1162.4	1160.0	1157.7	1155.4	1153.1
132.5°	1216.6	1215.4	1214.5	1213.6	1212.6	1211.7	1210.1	1207.8	1205.5	1203.2	1200.8
135°	1287.7	1286.9	1285.7	1284.5	1283.3	1282.2	1280.8	1279.0	1277.3	1275.6	1273.8
137.5°	1350.3	1348.9	1348.3	1347.7	1347.0	1346.4	1344.9	1342.7	1340.6	1338.4	1336.2
140°	1390.6	1389.4	1388.6	1387.7	1386.8	1385.9	1384.6	1382.9	1381.2	1379.5	1377.8
142.5°	1428.8	1427.8	1426.9	1426.1	1425.2	1424.4	1423.1	1421.4	1419.7	1417.9	1416.1
145°	1482.2	1481.6	1481.1	1480.5	1479.9	1479.3	1478.0	1476.0	1474.0	1472.0	1470.0
147.5°	1529.7	1529.1	1528.5	1527.9	1527.4	1526.8	1525.9	1524.5	1523.2	1521.9	1520.6
150°	1558.8	1558.2	1557.6	1557.0	1556.5	1555.9	1555.2	1554.3	1553.5	1552.6	1551.8
152.5°	1584.2	1583.2	1582.8	1582.5	1582.2	1581.8	1581.3	1580.9	1580.5	1580.1	1579.7
155°	1619.4	1617.9	1617.7	1617.4	1617.1	1616.8	1616.9	1617.5	1618.1	1618.7	1619.2
157.5°	1650.0	1648.3	1648.6	1648.9	1649.2	1649.5	1649.6	1649.7	1649.8	1649.8	1649.9
160°	1667.7	1666.0	1666.3	1666.6	1666.9	1667.2	1667.4	1667.7	1668.0	1668.3	1668.6
162.5°	1683.5	1681.5	1681.8	1682.1	1682.4	1682.7	1683.2	1683.9	1684.8	1685.5	1686.3
165°	1704.7	1702.3	1702.6	1702.9	1703.2	1703.5	1704.0	1705.0	1705.8	1706.7	1707.6
167.5°	1721.3	1719.0	1719.0	1719.0	1719.0	1719.0	1719.5	1720.7	1721.8	1723.0	1724.1
170°	1730.6	1728.3	1728.3	1728.3	1728.3	1728.3	1728.9	1730.1	1731.2	1732.3	1733.5
172.5°	1736.9	1734.5	1734.3	1734.1	1733.8	1733.6	1734.2	1735.6	1737.0	1738.4	1739.8
175°	1744.6	1742.6	1742.3	1742.0	1741.7	1741.4	1742.0	1743.4	1744.9	1746.4	1747.8
177.5°	1747.6	1745.8	1745.5	1745.2	1745.0	1744.8	1745.2	1746.5	1747.6	1748.7	1749.9
180°	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8



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CATALOG NUMBER: S123RDIW-S340D1320U840-4F0-1E-UDD-A

CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
0°	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6	549.6
2.5°	552.6	554.7	557.3	561.3	564.3	566.9	567.4	568.3	570.2	573.3	575.7
5°	556.2	561.6	570.3	578.8	587.9	595.5	602.6	607.5	612.2	622.1	630.1
7.5°	555.0	567.1	580.8	595.9	611.4	626.2	640.1	652.5	664.8	679.2	695.6
10°	554.3	568.5	586.8	606.3	627.7	648.6	668.9	684.7	703.0	719.5	740.4
12.5°	550.8	571.1	593.0	617.9	644.3	668.4	695.1	716.8	737.8	761.6	786.0
15°	546.0	570.8	598.5	631.7	671.8	700.8	728.2	766.1	791.9	817.8	852.6
17.5°	537.6	567.7	602.4	645.5	678.8	718.1	759.1	789.1	823.9	860.4	891.9
20°	530.8	565.8	604.7	647.0	689.6	732.2	771.9	807.7	843.7	885.9	911.7
22.5°	524.0	558.7	599.1	644.0	689.7	734.7	779.6	821.6	862.1	904.6	937.7
25°	509.6	550.8	594.5	640.5	685.6	735.0	788.6	835.5	885.6	929.4	960.7
27.5°	495.0	532.8	576.3	622.9	673.1	731.4	794.6	847.8	898.0	929.4	939.2
30°	481.8	521.8	561.9	609.2	663.5	728.6	795.7	856.7	897.8	911.5	901.3
32.5°	468.5	504.7	544.3	592.8	650.5	721.6	797.2	851.4	876.2	865.8	824.6
35°	444.9	477.6	515.9	564.4	630.8	717.8	791.0	827.7	821.6	762.8	685.1
37.5°	419.7	446.4	481.8	532.5	610.4	702.6	764.3	769.7	716.7	626.4	536.7
40°	399.7	423.7	460.2	513.1	594.5	687.5	737.4	715.5	633.4	532.9	458.1
42.5°	380.3	400.6	435.8	492.8	579.5	666.9	697.3	649.6	554.9	459.9	391.8
45°	347.5	366.6	401.8	460.4	548.7	627.7	623.7	540.9	446.1	369.6	313.2
47.5°	316.4	333.1	366.2	426.0	512.5	568.9	531.5	443.3	362.9	301.5	261.3
50°	294.4	310.8	343.8	402.8	483.5	524.6	471.3	386.4	312.7	261.9	229.8
52.5°	273.3	289.3	319.4	377.0	448.5	473.1	415.8	337.0	275.6	231.8	204.3
55°	243.8	256.0	283.1	338.1	391.5	397.2	339.0	273.2	222.6	192.0	173.2
57.5°	213.7	224.2	251.0	294.8	332.2	329.3	274.3	217.2	183.2	160.5	146.8
60°	194.1	204.5	228.0	265.6	293.9	284.0	233.4	187.5	158.3	141.7	130.8
62.5°	175.8	183.9	206.0	233.5	253.8	242.6	199.5	161.6	138.4	124.3	115.7
65°	149.4	156.0	173.6	188.0	199.2	188.4	152.7	126.3	109.7	99.8	93.9
67.5°	124.3	128.5	139.6	144.8	152.8	140.9	114.8	97.1	87.7	79.4	75.2
70°	108.5	111.5	117.4	121.7	123.7	111.5	92.2	79.3	71.3	65.4	62.8
72.5°	92.6	95.3	96.5	100.0	98.9	87.5	74.1	63.8	58.1	54.1	50.8
75°	70.8	72.0	70.8	69.4	66.3	58.4	49.2	44.0	39.8	37.9	36.7
77.5°	51.6	51.2	49.7	47.5	42.2	37.2	32.2	30.5	28.7	27.7	27.3
80°	39.8	38.8	37.4	33.8	29.4	25.9	24.7	23.5	22.8	21.6	21.4
82.5°	29.6	29.0	26.7	23.7	20.6	18.9	18.0	17.5	16.8	16.2	16.2
85°	15.8	15.0	12.4	10.8	10.4	9.9	9.7	9.7	8.7	8.5	8.5
87.5°	6.0	5.4	5.8	5.8	6.5	6.8	7.8	8.1	8.7	9.1	9.0
90°	4.1	7.1	10.0	12.8	16.2	19.9	23.6	27.4	31.2	32.3	33.4
92.5°	23.3	22.5	21.7	20.9	21.9	24.7	27.6	30.4	33.2	35.0	37.0
95°	67.4	55.5	43.7	31.9	27.6	30.7	33.9	37.1	40.3	42.3	44.3
97.5°	153.9	148.6	143.3	137.9	124.9	104.1	83.4	62.6	41.8	44.1	46.5
100°	225.2	231.0	236.7	242.6	222.9	177.9	132.9	87.9	42.8	45.1	47.5
102.5°	292.2	296.3	300.4	304.7	282.2	233.0	183.8	134.6	85.4	78.3	71.1
105°	390.1	393.3	396.5	399.6	388.3	362.2	336.3	310.3	284.4	233.3	182.2
107.5°	493.9	496.4	499.0	501.5	504.8	509.0	513.0	517.2	521.2	483.7	446.4
110°	563.3	565.5	567.8	570.2	572.9	576.1	579.3	582.5	585.6	576.1	566.5



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CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	629.5	631.6	633.7	635.7	638.3	641.6	644.7	647.9	651.1	651.3	651.5
115°	727.6	729.3	731.0	732.8	735.0	737.5	740.1	742.8	745.4	748.2	751.1
117.5°	823.3	825.5	827.6	829.7	831.4	832.7	834.1	835.5	836.8	839.1	841.4
120°	883.0	885.6	888.2	890.8	892.5	893.3	894.2	895.1	896.0	898.3	900.6
122.5°	942.8	944.9	947.1	949.2	950.8	951.9	953.0	954.1	955.2	956.8	958.5
125°	1025.5	1027.8	1030.2	1032.5	1034.2	1035.3	1036.5	1037.6	1038.8	1039.4	1040.0
127.5°	1105.5	1107.8	1110.1	1112.5	1114.3	1115.7	1117.1	1118.4	1119.8	1120.7	1121.7
130°	1155.4	1157.7	1160.0	1162.4	1164.1	1165.2	1166.4	1167.5	1168.6	1169.8	1170.9
132.5°	1203.2	1205.5	1207.8	1210.1	1211.7	1212.6	1213.6	1214.5	1215.4	1216.6	1217.7
135°	1275.6	1277.3	1279.0	1280.8	1282.2	1283.3	1284.5	1285.7	1286.9	1287.7	1288.6
137.5°	1338.4	1340.6	1342.7	1344.9	1346.4	1347.0	1347.7	1348.3	1348.9	1350.3	1351.7
140°	1379.5	1381.2	1382.9	1384.6	1385.9	1386.8	1387.7	1388.6	1389.4	1390.6	1391.7
142.5°	1417.9	1419.7	1421.4	1423.1	1424.4	1425.2	1426.1	1426.9	1427.8	1428.8	1429.7
145°	1472.0	1474.0	1476.0	1478.0	1479.3	1479.9	1480.5	1481.1	1481.6	1482.2	1482.8
147.5°	1521.9	1523.2	1524.5	1525.9	1526.8	1527.4	1527.9	1528.5	1529.1	1529.7	1530.2
150°	1552.6	1553.5	1554.3	1555.2	1555.9	1556.5	1557.0	1557.6	1558.2	1558.8	1559.3
152.5°	1580.1	1580.5	1580.9	1581.3	1581.8	1582.2	1582.5	1582.8	1583.2	1584.2	1585.2
155°	1618.7	1618.1	1617.5	1616.9	1616.8	1617.1	1617.4	1617.7	1617.9	1619.4	1620.8
157.5°	1649.8	1649.8	1649.7	1649.6	1649.5	1649.2	1648.9	1648.6	1648.3	1650.0	1651.8
160°	1668.3	1668.0	1667.7	1667.4	1667.2	1666.9	1666.6	1666.3	1666.0	1667.7	1669.4
162.5°	1685.5	1684.8	1683.9	1683.2	1682.7	1682.4	1682.1	1681.8	1681.5	1683.5	1685.5
165°	1706.7	1705.8	1705.0	1704.0	1703.5	1703.2	1702.9	1702.6	1702.3	1704.7	1707.0
167.5°	1723.0	1721.8	1720.7	1719.5	1719.0	1719.0	1719.0	1719.0	1719.0	1721.3	1723.6
170°	1732.3	1731.2	1730.1	1728.9	1728.3	1728.3	1728.3	1728.3	1728.3	1730.6	1732.9
172.5°	1738.4	1737.0	1735.6	1734.2	1733.6	1733.8	1734.1	1734.3	1734.5	1736.9	1739.2
175°	1746.4	1744.9	1743.4	1742.0	1741.4	1741.7	1742.0	1742.3	1742.6	1744.6	1746.7
177.5°	1748.7	1747.6	1746.5	1745.2	1744.8	1745.0	1745.2	1745.5	1745.8	1747.6	1749.4
180°	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
0°	549.6	549.6	549.6	549.6	549.6	549.6	549.6
2.5°	579.8	579.8	580.5	583.3	583.7	586.1	585.4
5°	637.1	641.6	643.3	650.4	654.5	656.4	652.7
7.5°	707.3	719.9	725.9	733.4	739.8	741.8	736.7
10°	758.5	771.7	782.7	789.6	796.0	800.2	805.6
12.5°	808.0	824.3	834.8	844.3	850.9	856.3	857.2
15°	861.8	886.3	904.8	918.6	925.3	928.9	927.5
17.5°	916.0	938.8	952.0	965.9	975.3	975.8	976.1
20°	946.7	968.9	984.2	994.5	1005.1	1004.6	1007.0
22.5°	967.2	984.7	996.4	1003.9	1007.5	1005.7	1006.2
25°	976.8	982.1	980.0	968.0	964.8	953.8	955.7
27.5°	927.4	902.9	877.6	845.1	819.3	798.8	799.8
30°	860.2	816.9	767.5	726.1	688.9	678.5	656.4
32.5°	766.3	701.4	643.5	604.8	573.0	564.3	545.0
35°	607.0	543.9	484.4	448.7	434.5	414.8	414.5
37.5°	471.8	416.3	384.9	358.0	344.0	331.9	330.8
40°	396.9	353.7	329.8	310.5	296.7	287.7	285.6
42.5°	344.6	309.6	287.3	275.4	264.7	260.0	256.6
45°	281.3	257.8	242.4	231.6	226.6	223.1	221.2
47.5°	235.4	219.6	209.0	201.8	197.8	194.1	195.1
50°	210.4	197.4	189.7	182.8	179.8	177.1	177.4
52.5°	190.2	178.5	172.3	167.3	163.6	161.7	160.9
55°	161.4	154.1	147.7	144.2	142.1	139.6	138.9
57.5°	137.6	132.0	126.8	122.9	122.3	119.9	120.2
60°	121.9	117.1	112.9	110.8	109.2	107.0	107.8
62.5°	108.9	104.9	101.1	99.4	97.7	96.1	96.4
65°	89.2	85.4	83.0	82.1	81.4	80.7	80.0
67.5°	71.1	68.8	67.3	65.2	63.8	63.6	62.9
70°	59.8	56.7	54.1	51.5	50.8	50.6	50.8
72.5°	47.9	45.9	45.2	44.0	43.8	43.2	43.6
75°	36.0	35.2	34.8	33.8	33.8	33.8	33.8
77.5°	26.6	26.2	25.9	25.7	25.4	25.0	25.0
80°	20.7	20.5	20.0	20.0	19.8	20.0	19.8
82.5°	15.7	15.6	15.1	15.1	14.8	14.7	14.8
85°	8.0	7.8	8.3	7.8	8.0	7.6	8.0
87.5°	9.2	9.4	9.4	9.5	9.5	9.9	9.7
90°	34.6	35.7	36.7	37.3	37.8	38.4	39.0
92.5°	38.8	40.6	41.7	42.1	42.4	42.7	43.1
95°	46.4	48.4	49.4	49.4	49.4	49.4	49.4
97.5°	48.8	51.0	52.3	52.6	52.9	53.2	53.5
100°	49.8	52.1	53.4	53.6	53.9	54.2	54.5
102.5°	63.9	56.9	53.5	54.0	54.5	55.0	55.5
105°	131.2	80.1	54.8	55.4	55.9	56.6	57.2
107.5°	408.9	371.4	333.5	295.0	256.4	217.9	179.5
110°	557.0	547.5	522.1	480.9	439.6	398.4	357.1



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CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
112.5°	651.6	651.8	647.5	638.7	630.1	621.4	612.7
115°	754.0	756.9	758.9	760.0	761.2	762.3	763.6
117.5°	843.6	846.0	847.3	847.5	847.7	848.0	848.2
120°	902.9	905.2	906.4	906.4	906.4	906.4	906.4
122.5°	960.1	961.7	962.6	962.8	963.0	963.3	963.5
125°	1040.6	1041.1	1041.7	1042.3	1042.9	1043.4	1044.0
127.5°	1122.6	1123.6	1123.7	1123.2	1122.6	1122.0	1121.4
130°	1172.2	1173.3	1173.6	1173.0	1172.5	1171.8	1171.2
132.5°	1218.9	1220.0	1220.2	1219.4	1218.6	1217.8	1217.0
135°	1289.4	1290.3	1290.3	1289.4	1288.6	1287.7	1286.9
137.5°	1353.0	1354.4	1354.8	1354.2	1353.7	1353.1	1352.5
140°	1392.9	1394.0	1394.3	1393.7	1393.1	1392.6	1392.0
142.5°	1430.6	1431.6	1431.6	1430.8	1430.0	1429.2	1428.4
145°	1483.3	1483.9	1484.2	1484.2	1484.2	1484.2	1484.2
147.5°	1530.9	1531.5	1531.1	1529.7	1528.4	1527.1	1525.7
150°	1559.9	1560.5	1560.3	1559.5	1558.6	1557.8	1556.9
152.5°	1586.3	1587.3	1587.2	1585.8	1584.5	1583.2	1581.9
155°	1622.2	1623.8	1623.6	1621.8	1620.1	1618.4	1616.7
157.5°	1653.6	1655.3	1655.0	1652.7	1650.5	1648.2	1646.0
160°	1671.2	1672.9	1672.7	1670.7	1668.7	1666.7	1664.7
162.5°	1687.5	1689.4	1689.5	1687.7	1686.0	1684.2	1682.3
165°	1709.3	1711.6	1711.7	1709.7	1707.7	1705.7	1703.6
167.5°	1725.9	1728.2	1728.2	1725.9	1723.6	1721.3	1719.0
170°	1735.3	1737.6	1737.6	1735.3	1732.9	1730.6	1728.3
172.5°	1741.5	1743.8	1743.6	1741.1	1738.6	1736.1	1733.5
175°	1748.7	1750.7	1750.5	1748.3	1746.0	1743.6	1741.3
177.5°	1751.3	1753.1	1752.9	1750.6	1748.3	1746.0	1743.6
180°	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8	1747.8

(END OF REPORT)