

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: P333511-840

Luminaire Tested: **S125RDIP-S375D1035U840-4F0-1E-UDD-F**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P333511-840
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-7,
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: S125RDIP-S375D1035U840-4F0-1E-UDD-F
Description: DEFINE 5 DIRECT-INDIRECT PENDANT LED LUMINAIRE
DOWNLIGHT 375 LUMENS PER FOOT, FLUSH SATIN WHITE DIFFUSER, REGRESSED
HOUSING
UPLIGHT 1035 LUMENS PER FOOT, NO LENS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5639.7 lumens
Efficiency: N/A
Efficacy: 151.2 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.11 / 1.25
Luminous Opening: Rectangular (W 0.42' x L: 4' x H: 0')
CIE Type: Semi-Indirect

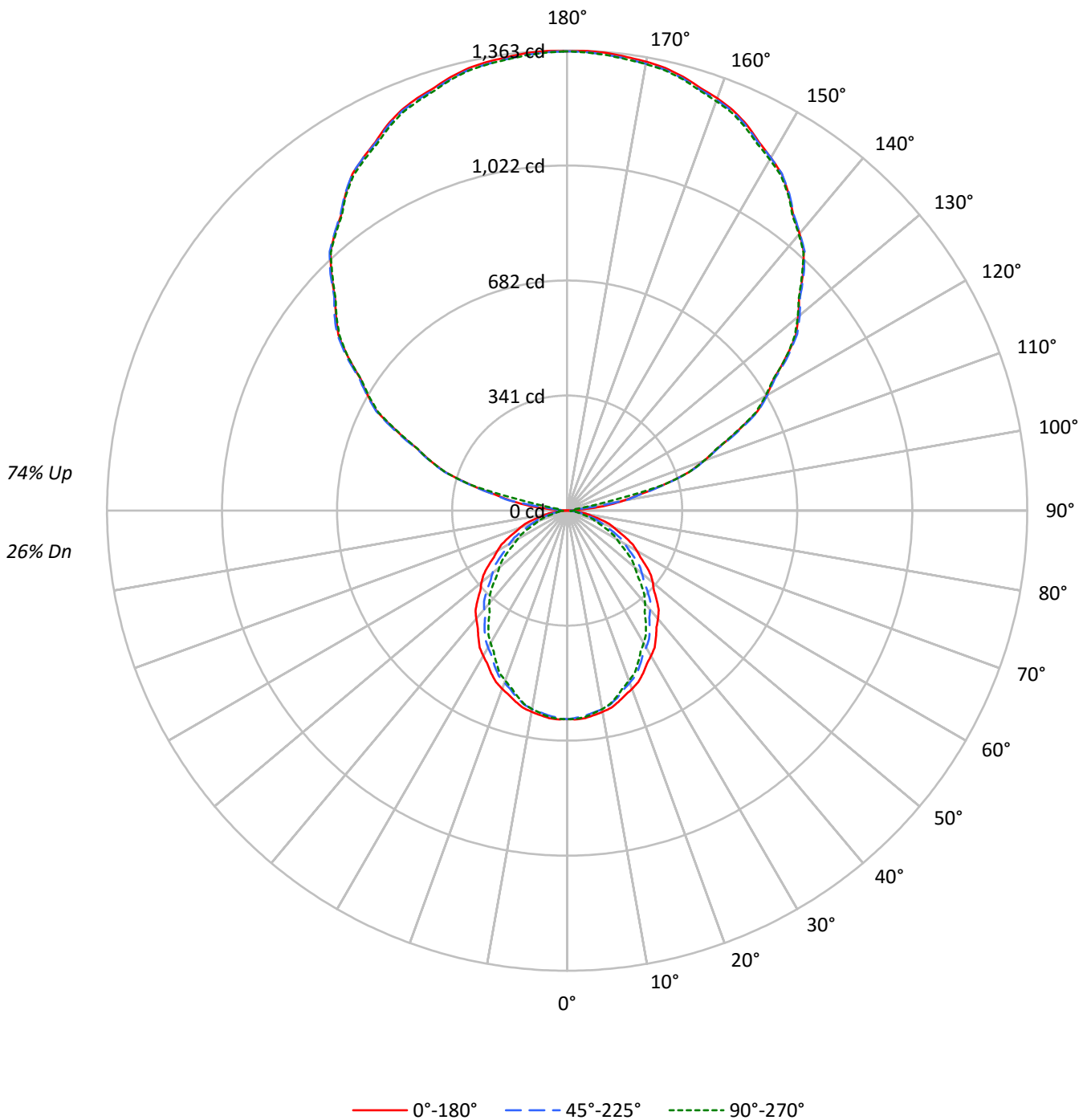
Input Watts (W): 37.3
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	101	101	101	101	90	90	90	90	70	70	70	51	51	51	34	34	34	26
1	93	88	85	81	82	79	76	73	61	59	57	45	44	43	30	30	29	22
2	84	77	71	67	75	69	64	60	54	51	48	40	38	36	27	26	24	19
3	77	68	61	55	68	61	55	50	47	43	40	35	33	30	24	22	21	16
4	70	60	53	47	62	54	47	43	42	38	34	31	28	26	21	19	18	14
5	64	53	46	40	57	48	41	36	38	33	29	28	25	22	19	17	16	12
6	59	48	40	34	53	43	36	31	34	29	25	25	22	20	17	15	14	11
7	55	43	35	30	49	39	32	27	31	26	22	23	20	17	16	14	12	9
8	51	39	31	26	45	35	29	24	28	23	20	21	18	15	15	13	11	8
9	47	35	28	23	42	32	26	21	25	21	18	19	16	14	13	11	10	8
10	44	32	25	21	39	29	23	19	23	19	16	18	15	12	12	10	9	7

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3991	3991	3991
5°	4000	3955	3979
10°	3970	3918	3918
15°	3922	3839	3807
20°	3862	3727	3682
25°	3792	3619	3539
30°	3703	3491	3380
35°	3613	3360	3202
40°	3530	3222	3026
45°	3428	3070	2834
50°	3325	2903	2635
55°	3206	2743	2423
60°	3086	2550	2195
65°	2946	2326	1932
70°	2783	2045	1665
75°	2563	1724	1385
80°	2258	1354	1164
85°	1904	1104	1037



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	58.1	1.0
10°-20°	162.4	2.9
20°-30°	235.5	4.2
30°-40°	268.4	4.8
40°-50°	261.6	4.6
50°-60°	220.2	3.9
60°-70°	154.3	2.7
70°-80°	79.3	1.4
80°-90°	22.9	0.4
90°-100°	49.4	0.9
100°-110°	304.6	5.4
110°-120°	552.5	9.8
120°-130°	709.1	12.6
130°-140°	762.7	13.5
140°-150°	715.9	12.7
150°-160°	579.1	10.3
160°-170°	374.5	6.6
170°-180°	129.2	2.3
0°-30°	456.0	8.1
0°-40°	724.3	12.8
0°-60°	1206.1	21.4
0°-90°	1462.7	25.9
90°-120°	906.6	16.1
90°-150°	3094.2	54.9
90°-180°	4177.0	74.1
0°-180°	5639.7	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	618	618	618	618	618	
5°	617	615	610	614	614	58
15°	587	584	574	573	569	165
25°	532	524	508	502	497	245
35°	458	447	426	413	406	287
45°	375	361	336	318	310	289
55°	285	269	244	223	215	255
65°	193	176	152	134	126	191
75°	103	88	69	59	56	109
85°	26	18	15	14	14	29
90°	1	9	16	21	24	4
95°	58	52	16	21	21	73
105°	296	300	300	300	299	314
115°	557	561	563	559	553	552
125°	792	798	799	795	792	707
135°	987	993	991	989	983	761
145°	1144	1146	1146	1147	1142	715
155°	1260	1255	1256	1259	1251	580
165°	1330	1324	1325	1330	1323	376
175°	1360	1355	1355	1362	1354	129
180°	1360	1360	1360	1360	1360	



TEST NUMBER: P333511-840

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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	617.9	617.9	617.9	617.9	617.9	617.9	617.9	617.9	617.9	617.9	617.9
2.5°	619.0	618.8	618.5	618.3	618.0	617.5	616.7	615.8	615.0	614.2	615.0
5°	617.0	616.6	616.2	615.7	615.3	614.6	613.4	612.3	611.2	610.0	611.1
7.5°	611.0	610.6	610.2	609.8	609.4	608.4	607.1	605.7	604.4	603.0	603.7
10°	605.3	605.0	604.7	604.4	604.1	603.2	601.8	600.3	598.8	597.4	597.7
12.5°	599.0	598.5	598.2	597.8	597.4	596.2	594.3	592.4	590.4	588.4	588.7
15°	586.6	586.0	585.4	584.8	584.2	582.8	580.6	578.5	576.2	574.1	574.0
17.5°	572.8	571.8	570.9	569.9	569.0	567.1	564.3	561.6	558.9	556.1	555.6
20°	561.9	560.9	559.9	558.9	557.7	555.6	552.3	549.0	545.6	542.3	541.8
22.5°	550.0	549.0	548.0	546.8	545.8	543.6	540.1	536.6	533.1	529.7	528.7
25°	532.1	530.5	529.0	527.4	525.8	523.1	519.3	515.4	511.6	507.8	506.4
27.5°	511.5	509.7	507.8	505.8	503.9	501.0	496.9	492.7	488.7	484.5	482.6
30°	496.6	494.6	492.6	490.7	488.7	485.5	481.2	476.9	472.5	468.1	465.7
32.5°	482.0	479.7	477.5	475.1	472.8	469.5	465.0	460.6	456.2	451.7	449.1
35°	458.3	455.9	453.3	450.8	448.4	444.7	440.1	435.5	430.8	426.2	423.1
37.5°	435.0	432.0	429.0	426.0	422.9	419.0	414.2	409.4	404.7	399.8	396.2
40°	418.7	415.6	412.4	409.3	406.2	402.1	397.2	392.2	387.2	382.2	378.3
42.5°	401.4	398.3	395.1	391.9	388.7	384.6	379.4	374.3	369.1	364.0	360.2
45°	375.3	372.2	369.2	366.2	363.2	358.8	353.1	347.5	341.7	336.1	331.8
47.5°	348.1	344.9	341.7	338.5	335.4	330.9	325.2	319.4	313.7	307.9	303.7
50°	330.9	327.5	324.1	320.6	317.2	312.6	306.6	300.7	294.8	288.9	284.6
52.5°	312.3	308.7	305.2	301.7	298.2	293.7	288.1	282.5	276.9	271.4	266.7
55°	284.7	281.3	278.0	274.8	271.5	266.9	261.1	255.2	249.4	243.6	238.9
57.5°	256.9	253.4	249.7	246.2	242.7	238.1	232.5	226.9	221.4	215.7	211.2
60°	238.9	235.3	231.7	228.0	224.4	219.8	214.2	208.6	203.0	197.4	192.9
62.5°	219.9	216.4	213.0	209.5	206.0	201.5	195.8	190.2	184.4	178.7	174.5
65°	192.8	189.2	185.7	182.2	178.6	174.1	168.6	163.2	157.6	152.2	148.0
67.5°	165.8	162.3	158.8	155.2	151.7	147.2	142.0	136.7	131.5	126.2	122.4
70°	147.4	144.0	140.5	136.9	133.4	129.1	123.8	118.7	113.5	108.3	105.0
72.5°	129.6	126.1	122.7	119.3	115.8	111.6	106.7	101.9	97.0	92.2	89.3
75°	102.7	99.6	96.4	93.3	90.3	86.5	82.1	77.8	73.4	69.1	66.8
77.5°	75.9	73.5	71.0	68.5	66.0	63.0	59.6	56.0	52.6	49.1	47.5
80°	60.7	58.2	55.7	53.2	50.7	48.1	45.1	42.2	39.3	36.4	35.4
82.5°	45.7	43.5	41.3	39.0	36.8	34.6	32.7	30.7	28.7	26.7	26.3
85°	25.7	23.8	21.9	20.1	18.2	17.0	16.5	16.0	15.5	14.9	14.8
87.5°	8.8	8.6	8.4	8.1	7.9	7.9	8.2	8.4	8.6	8.8	9.1
90°	1.0	2.8	4.5	6.4	8.2	9.9	11.4	13.0	14.5	16.2	17.3
92.5°	15.6	14.2	13.0	11.7	10.5	10.6	11.9	13.3	14.7	16.2	17.3
95°	57.5	56.8	56.1	55.4	54.8	50.2	41.7	33.1	24.6	16.2	17.3
97.5°	120.0	121.2	122.4	123.6	124.8	117.0	100.2	83.3	66.4	49.6	43.3
100°	168.3	169.1	169.8	170.4	171.1	171.9	172.8	173.7	174.5	175.4	142.1
102.5°	217.6	218.4	219.3	220.2	221.0	221.7	222.3	222.8	223.3	223.9	217.5
105°	296.4	297.3	298.2	299.1	300.0	300.4	300.4	300.4	300.4	300.4	300.4
107.5°	378.3	378.3	378.3	378.3	378.3	378.5	379.0	379.4	379.9	380.3	380.4
110°	431.5	431.5	431.5	431.5	431.5	431.8	432.2	432.7	433.1	433.5	432.9



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	481.6	482.1	482.6	483.2	483.7	484.1	484.4	484.6	484.9	485.2	484.3
115°	556.6	557.7	558.9	560.0	561.1	561.8	562.0	562.2	562.4	562.6	561.8
117.5°	634.2	634.2	634.1	634.1	634.1	634.5	635.3	636.1	637.0	637.8	636.7
120°	682.7	682.4	682.2	682.0	681.8	682.0	682.7	683.3	684.0	684.7	684.2
122.5°	725.4	726.2	727.1	727.9	728.8	729.3	729.7	730.0	730.3	730.6	730.1
125°	791.5	793.0	794.7	796.3	797.8	798.6	798.6	798.6	798.6	798.6	797.7
127.5°	854.6	855.8	856.9	858.0	859.1	859.6	859.5	859.4	859.2	859.1	858.6
130°	893.3	894.5	895.6	896.8	897.9	898.5	898.8	899.0	899.2	899.4	898.8
132.5°	932.1	933.4	934.7	935.9	937.3	937.7	937.2	936.8	936.2	935.7	935.5
135°	987.1	988.5	989.9	991.2	992.5	993.0	992.5	992.1	991.6	991.2	990.7
137.5°	1037.7	1038.9	1040.1	1041.3	1042.4	1042.8	1042.4	1042.0	1041.6	1041.2	1041.3
140°	1070.9	1071.3	1071.8	1072.2	1072.6	1072.8	1072.5	1072.3	1072.1	1071.9	1072.3
142.5°	1100.7	1101.0	1101.3	1101.5	1101.8	1102.1	1102.4	1102.7	1103.0	1103.3	1103.4
145°	1144.5	1144.9	1145.3	1145.8	1146.2	1146.5	1146.5	1146.5	1146.5	1146.5	1146.7
147.5°	1182.8	1182.7	1182.6	1182.5	1182.3	1182.5	1182.8	1183.1	1183.3	1183.6	1183.9
150°	1207.0	1206.5	1206.1	1205.6	1205.2	1205.2	1205.6	1206.1	1206.5	1207.0	1207.4
152.5°	1230.3	1229.4	1228.4	1227.4	1226.4	1226.2	1226.6	1227.0	1227.5	1227.9	1228.4
155°	1260.4	1259.1	1257.7	1256.4	1255.1	1254.6	1255.1	1255.5	1255.9	1256.4	1257.1
157.5°	1283.5	1282.7	1282.0	1281.2	1280.4	1280.0	1280.0	1280.1	1280.1	1280.2	1280.9
160°	1299.7	1298.4	1297.1	1295.7	1294.3	1293.7	1294.0	1294.2	1294.4	1294.6	1295.6
162.5°	1312.6	1311.3	1309.9	1308.6	1307.3	1306.7	1306.9	1307.2	1307.4	1307.6	1308.9
165°	1330.0	1328.6	1327.3	1326.0	1324.6	1324.0	1324.2	1324.4	1324.7	1324.9	1326.3
167.5°	1342.9	1341.5	1340.1	1338.7	1337.4	1336.8	1337.0	1337.2	1337.4	1337.7	1339.3
170°	1350.1	1348.6	1347.0	1345.4	1343.8	1343.2	1343.4	1343.6	1343.8	1344.1	1345.8
172.5°	1354.9	1353.4	1351.8	1350.3	1348.7	1348.2	1348.5	1348.9	1349.3	1349.7	1351.3
175°	1360.2	1358.9	1357.6	1356.1	1354.8	1354.3	1354.5	1354.7	1354.9	1355.1	1357.0
177.5°	1362.6	1361.6	1360.5	1359.4	1358.4	1357.9	1358.1	1358.3	1358.5	1358.6	1359.9
180°	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
0°	617.9	617.9	617.9	617.9	617.9	617.9	617.9	617.9
2.5°	615.8	616.7	617.5	617.9	617.8	617.7	617.6	617.5
5°	612.1	613.1	614.1	614.6	614.4	614.1	613.9	613.7
7.5°	604.4	605.2	605.9	606.1	605.9	605.7	605.5	605.2
10°	598.0	598.3	598.6	598.6	598.3	598.0	597.7	597.4
12.5°	588.9	589.2	589.4	589.3	588.8	588.2	587.8	587.3
15°	573.8	573.7	573.6	573.1	572.2	571.3	570.4	569.4
17.5°	555.1	554.6	554.1	553.4	552.7	551.9	551.1	550.4
20°	541.3	540.8	540.3	539.6	538.6	537.7	536.7	535.8
22.5°	527.6	526.5	525.5	524.6	523.9	523.1	522.4	521.6
25°	505.1	503.7	502.4	501.2	500.0	498.9	497.8	496.6
27.5°	480.8	478.9	477.0	475.5	474.4	473.3	472.2	471.1
30°	463.3	461.0	458.6	457.0	456.0	455.0	454.1	453.2
32.5°	446.5	443.8	441.1	439.3	438.1	436.9	435.7	434.5
35°	420.1	417.1	414.0	411.8	410.4	409.0	407.5	406.1
37.5°	392.5	389.0	385.4	382.8	381.4	380.0	378.6	377.2
40°	374.4	370.4	366.5	363.9	362.6	361.4	360.1	358.9
42.5°	356.4	352.6	348.8	346.1	344.3	342.3	340.5	338.7
45°	327.7	323.6	319.4	316.6	315.1	313.5	311.9	310.3
47.5°	299.4	295.1	290.8	287.8	286.1	284.4	282.7	280.9
50°	280.1	275.8	271.5	268.5	267.0	265.4	263.9	262.3
52.5°	262.0	257.3	252.6	249.4	247.9	246.4	244.8	243.3
55°	234.3	229.6	225.0	221.8	220.2	218.4	216.8	215.2
57.5°	206.6	202.1	197.4	194.4	193.0	191.5	190.1	188.5
60°	188.3	183.7	179.2	176.1	174.5	173.0	171.5	169.9
62.5°	170.3	166.0	161.8	159.0	157.3	155.8	154.3	152.7
65°	143.8	139.7	135.5	132.7	131.2	129.6	128.1	126.4
67.5°	118.6	114.8	111.0	108.5	107.2	106.0	104.7	103.5
70°	101.9	98.7	95.4	93.2	91.9	90.7	89.5	88.2
72.5°	86.2	83.3	80.4	78.5	77.7	76.9	75.9	75.1
75°	64.5	62.2	60.0	58.5	57.8	57.0	56.2	55.5
77.5°	45.9	44.3	42.7	41.6	41.1	40.6	40.0	39.5
80°	34.5	33.6	32.7	32.1	31.9	31.7	31.5	31.3
82.5°	25.9	25.3	24.9	24.6	24.5	24.4	24.3	24.1
85°	14.7	14.6	14.5	14.4	14.3	14.2	14.1	14.0
87.5°	9.3	9.5	9.7	9.9	9.9	10.0	10.0	10.1
90°	18.4	19.5	20.6	21.5	22.2	22.8	23.5	24.2
92.5°	18.4	19.5	20.6	21.3	21.6	21.9	22.3	22.6
95°	18.4	19.5	20.6	21.2	21.2	21.2	21.2	21.2
97.5°	37.0	30.7	24.3	21.2	21.2	21.2	21.2	21.2
100°	108.7	75.3	41.9	24.7	23.8	22.9	22.1	21.2
102.5°	211.2	204.9	198.5	187.8	172.6	157.3	142.1	126.8
105°	300.4	300.4	300.4	300.3	300.1	299.9	299.7	299.4
107.5°	380.4	380.5	380.5	380.2	379.5	378.9	378.2	377.5
110°	432.2	431.5	430.9	430.7	430.9	431.1	431.3	431.5



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CATALOG NUMBER: S125RDIP-S375D1035U840-4F0-1E-UDD-F

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
112.5°	483.5	482.6	481.8	481.2	480.9	480.6	480.3	480.0
115°	560.9	560.0	559.1	558.0	556.6	555.2	553.9	552.6
117.5°	635.5	634.4	633.2	632.3	631.8	631.2	630.6	630.0
120°	683.8	683.3	682.9	682.1	681.0	679.8	678.7	677.6
122.5°	729.7	729.3	728.8	727.9	726.7	725.4	724.1	722.8
125°	796.8	795.9	795.0	794.3	793.6	792.8	792.2	791.5
127.5°	858.1	857.6	857.1	856.1	854.3	852.7	851.1	849.4
130°	898.1	897.4	896.8	895.9	894.7	893.6	892.5	891.3
132.5°	935.4	935.3	935.1	934.5	933.4	932.3	931.2	930.1
135°	990.3	989.9	989.4	988.5	987.1	985.8	984.4	983.1
137.5°	1041.4	1041.5	1041.6	1041.0	1039.9	1038.6	1037.5	1036.3
140°	1072.8	1073.2	1073.6	1073.2	1071.9	1070.5	1069.1	1067.8
142.5°	1103.5	1103.6	1103.7	1103.1	1101.7	1100.3	1099.0	1097.6
145°	1146.9	1147.1	1147.3	1146.8	1145.5	1144.1	1142.8	1141.5
147.5°	1184.1	1184.4	1184.7	1184.0	1182.3	1180.7	1179.1	1177.5
150°	1207.9	1208.3	1208.7	1208.1	1206.3	1204.5	1202.6	1200.9
152.5°	1228.8	1229.3	1229.7	1229.1	1227.5	1225.9	1224.3	1222.6
155°	1257.7	1258.4	1259.1	1258.5	1256.7	1254.9	1253.1	1251.3
157.5°	1281.6	1282.3	1283.0	1282.5	1280.7	1278.9	1277.1	1275.4
160°	1296.5	1297.4	1298.3	1297.8	1296.1	1294.2	1292.4	1290.6
162.5°	1310.1	1311.3	1312.6	1312.2	1310.3	1308.3	1306.4	1304.3
165°	1327.6	1329.0	1330.3	1330.1	1328.3	1326.5	1324.7	1322.9
167.5°	1340.9	1342.5	1344.1	1343.9	1341.9	1339.9	1337.9	1335.8
170°	1347.7	1349.5	1351.3	1351.1	1349.1	1347.2	1345.1	1343.1
172.5°	1352.9	1354.5	1356.1	1355.9	1353.9	1351.9	1349.9	1348.0
175°	1358.8	1360.6	1362.3	1362.2	1360.2	1358.2	1356.1	1354.1
177.5°	1361.1	1362.4	1363.6	1363.5	1362.1	1360.7	1359.3	1357.8
180°	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2	1360.2

(END OF REPORT)