

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: P333505-940

Luminaire Tested: **S125RDIP-S375D810U940-4F0-1E-UDD-F**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P333505-940
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-S375D810U940-4F0-1E-UDD-F
Description: DEFINE 5 DIRECT-INDIRECT PENDANT LED LUMINAIRE
DOWNLIGHT 375 LUMENS PER FOOT, FLUSH SATIN WHITE DIFFUSER, REGRESSED
HOUSING
UPLIGHT 810 LUMENS PER FOOT, NO LENS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4179.8 lumens
Efficiency: N/A
Efficacy: 134.0 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

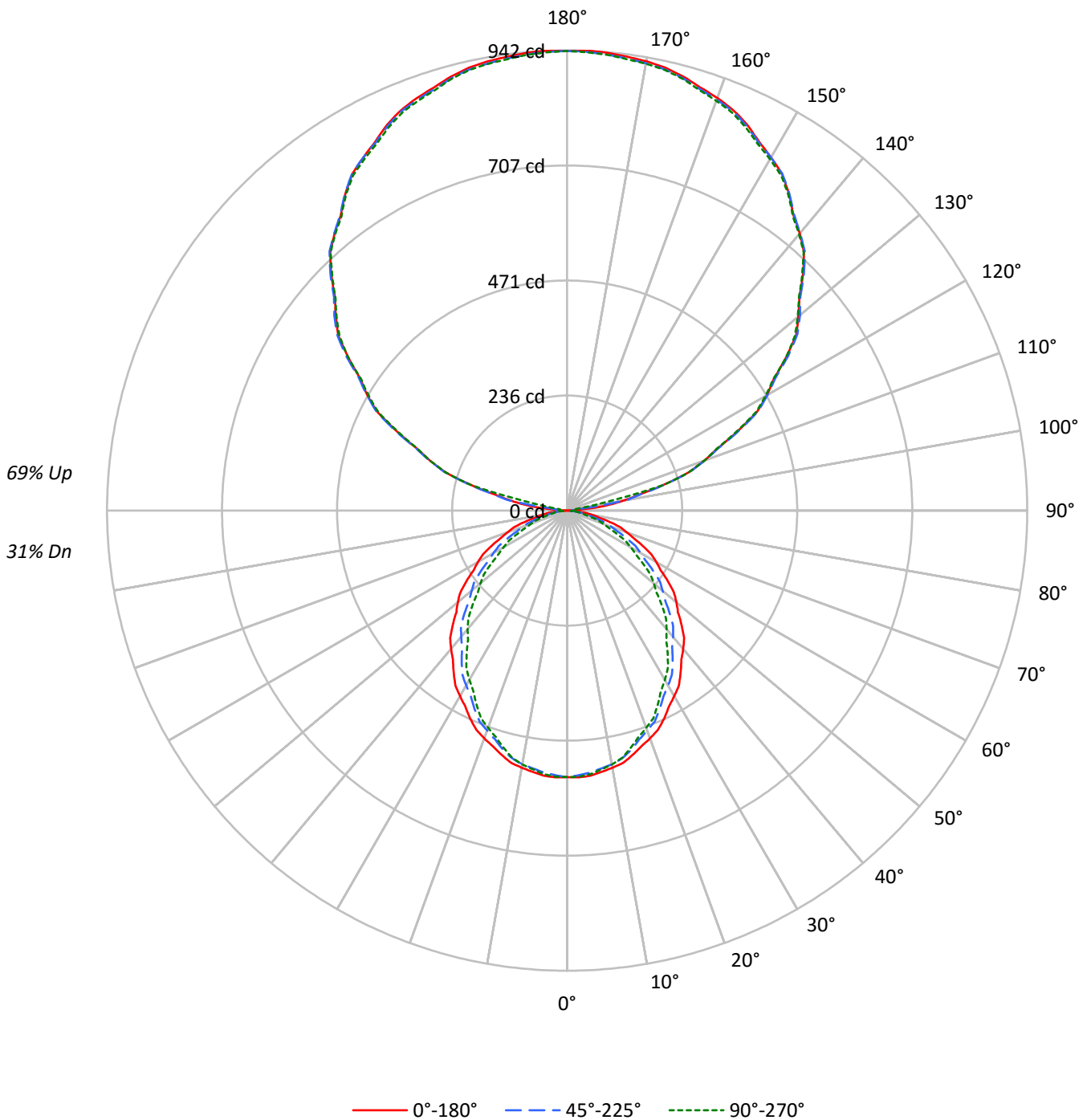
Input Watts (W): 31.2
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									20										
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	50	30	10	50	30	10	0														
RCR																																						
0	103	103	103	103	92	92	92	92	73	73	73	55	55	55	39	39	39	39	39	39	39	39	39	31														
1	94	89	86	82	84	81	77	75	64	62	60	48	47	46	34	33	33	33	33	33	33	33	33	26														
2	85	78	72	67	76	71	66	61	56	53	50	43	40	38	30	29	28	28	28	28	28	28	28	22														
3	78	69	62	56	70	62	56	51	49	45	42	38	35	33	27	25	24	24	24	24	24	24	24	19														
4	71	61	53	48	64	55	49	44	44	39	36	34	31	28	24	22	21	21	21	21	21	21	21	16														
5	65	54	46	41	58	49	42	37	39	34	31	30	27	24	22	20	18	18	18	18	18	18	18	14														
6	60	48	41	35	54	44	37	32	35	30	27	27	24	21	20	18	16	16	16	16	16	16	16	13														
7	55	44	36	31	50	40	33	28	32	27	23	25	21	19	18	16	14	14	14	14	14	14	14	11														
8	51	40	32	27	46	36	29	25	29	24	21	23	19	17	17	14	13	13	13	13	13	13	13	10														
9	48	36	29	24	43	33	26	22	27	22	18	21	17	15	15	13	11	11	11	11	11	11	11	9														
10	45	33	26	21	40	30	24	20	24	20	17	19	16	13	14	12	10	10	10	10	10	10	10	8														

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3524	3524	3524
5°	3532	3492	3513
10°	3505	3459	3459
15°	3463	3389	3361
20°	3410	3291	3252
25°	3348	3195	3125
30°	3270	3082	2984
35°	3191	2967	2827
40°	3117	2845	2672
45°	3027	2711	2503
50°	2936	2563	2327
55°	2831	2422	2139
60°	2725	2251	1938
65°	2601	2054	1705
70°	2459	1805	1469
75°	2263	1522	1223
80°	1993	1194	1027
85°	1675	978	919



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	51.3	1.2
10°-20°	143.4	3.4
20°-30°	207.9	5.0
30°-40°	237.0	5.7
40°-50°	231.0	5.5
50°-60°	194.4	4.7
60°-70°	136.3	3.3
70°-80°	70.1	1.7
80°-90°	19.7	0.5
90°-100°	34.2	0.8
100°-110°	210.7	5.0
110°-120°	382.1	9.1
120°-130°	490.4	11.7
130°-140°	527.5	12.6
140°-150°	495.1	11.8
150°-160°	400.5	9.6
160°-170°	259.0	6.2
170°-180°	89.3	2.1
0°-30°	402.6	9.6
0°-40°	639.6	15.3
0°-60°	1065.0	25.5
0°-90°	1291.0	30.9
90°-120°	627.0	15.0
90°-150°	2140.0	51.2
90°-180°	2889.0	69.1
0°-180°	4179.8	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	546	546	546	546	546	
5°	545	543	539	542	542	52
15°	518	515	507	506	503	146
25°	470	463	448	443	438	216
35°	405	394	376	365	359	253
45°	331	319	297	281	274	256
55°	251	238	215	197	190	225
65°	170	156	134	118	112	169
75°	91	78	61	52	49	96
85°	23	16	13	13	12	25
90°	1	6	11	15	17	3
95°	40	36	11	14	15	51
105°	205	208	208	208	207	217
115°	385	388	389	386	382	381
125°	547	552	552	550	547	489
135°	683	687	686	684	680	526
145°	792	793	793	793	789	495
155°	872	868	869	871	865	401
165°	920	916	916	920	915	260
175°	941	937	937	942	937	90
180°	941	941	941	941	941	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	545.6	545.6	545.6	545.6	545.6	545.6	545.6	545.6	545.6	545.6	545.6
2.5°	546.6	546.4	546.2	546.0	545.7	545.3	544.6	543.8	543.1	542.3	543.1
5°	544.8	544.5	544.1	543.7	543.3	542.7	541.6	540.6	539.7	538.6	539.6
7.5°	539.5	539.1	538.8	538.4	538.1	537.3	536.1	534.8	533.7	532.4	533.1
10°	534.5	534.2	534.0	533.7	533.4	532.6	531.4	530.0	528.8	527.5	527.8
12.5°	528.9	528.5	528.2	527.9	527.5	526.5	524.8	523.1	521.3	519.6	519.8
15°	518.0	517.5	516.9	516.4	515.9	514.6	512.6	510.8	508.8	506.9	506.8
17.5°	505.8	504.9	504.1	503.2	502.4	500.8	498.3	495.9	493.5	491.1	490.6
20°	496.1	495.3	494.4	493.5	492.5	490.6	487.7	484.7	481.8	478.8	478.4
22.5°	485.6	484.7	483.8	482.9	482.0	480.0	476.9	473.9	470.7	467.7	466.8
25°	469.8	468.4	467.1	465.7	464.3	461.9	458.5	455.1	451.7	448.4	447.2
27.5°	451.7	450.0	448.4	446.7	445.0	442.4	438.7	435.1	431.5	427.8	426.1
30°	438.5	436.8	435.0	433.3	431.5	428.7	424.9	421.1	417.2	413.3	411.3
32.5°	425.6	423.6	421.6	419.5	417.5	414.6	410.6	406.7	402.8	398.9	396.5
35°	404.7	402.5	400.3	398.1	395.9	392.7	388.6	384.5	380.4	376.3	373.6
37.5°	384.1	381.5	378.8	376.1	373.4	370.0	365.8	361.5	357.3	353.0	349.8
40°	369.7	366.9	364.2	361.4	358.6	355.1	350.7	346.3	341.9	337.5	334.0
42.5°	354.5	351.7	348.8	346.1	343.2	339.6	335.0	330.5	325.9	321.4	318.1
45°	331.4	328.7	326.0	323.3	320.7	316.8	311.8	306.8	301.8	296.8	293.0
47.5°	307.4	304.5	301.8	298.9	296.1	292.2	287.1	282.0	277.0	271.9	268.1
50°	292.2	289.2	286.1	283.1	280.1	276.0	270.7	265.6	260.3	255.1	251.3
52.5°	275.7	272.6	269.5	266.4	263.3	259.3	254.4	249.4	244.5	239.6	235.5
55°	251.4	248.4	245.5	242.6	239.7	235.7	230.5	225.3	220.3	215.1	211.0
57.5°	226.9	223.7	220.5	217.4	214.3	210.3	205.3	200.4	195.5	190.5	186.5
60°	211.0	207.8	204.6	201.3	198.1	194.1	189.1	184.2	179.2	174.3	170.3
62.5°	194.2	191.1	188.1	185.0	181.9	177.9	172.9	167.9	162.8	157.8	154.1
65°	170.2	167.1	164.0	160.9	157.7	153.7	148.9	144.1	139.2	134.4	130.7
67.5°	146.4	143.3	140.2	137.1	133.9	130.0	125.4	120.7	116.1	111.5	108.1
70°	130.2	127.2	124.0	120.9	117.8	114.0	109.3	104.8	100.2	95.6	92.7
72.5°	114.4	111.4	108.3	105.3	102.3	98.5	94.3	90.0	85.7	81.4	78.8
75°	90.7	87.9	85.2	82.4	79.7	76.4	72.5	68.7	64.8	61.0	58.9
77.5°	67.1	64.9	62.7	60.5	58.3	55.6	52.6	49.5	46.5	43.3	41.9
80°	53.6	51.4	49.2	47.0	44.8	42.4	39.9	37.3	34.7	32.1	31.3
82.5°	40.4	38.4	36.5	34.4	32.5	30.6	28.9	27.1	25.3	23.5	23.2
85°	22.6	21.0	19.4	17.7	16.1	15.0	14.5	14.1	13.6	13.2	13.1
87.5°	7.8	7.5	7.2	7.0	6.7	6.6	6.8	6.9	7.0	7.1	7.3
90°	0.7	2.0	3.2	4.5	5.6	6.8	7.9	9.0	10.1	11.1	11.9
92.5°	10.7	9.9	9.0	8.1	7.3	7.3	8.3	9.3	10.2	11.1	11.9
95°	39.8	39.3	38.8	38.3	37.9	34.7	28.8	22.9	17.0	11.1	11.9
97.5°	83.0	83.8	84.6	85.5	86.3	81.0	69.3	57.6	45.9	34.3	30.0
100°	116.5	116.9	117.3	117.9	118.3	118.9	119.5	120.1	120.7	121.4	98.3
102.5°	150.5	151.1	151.7	152.2	152.8	153.3	153.7	154.1	154.4	154.8	150.4
105°	205.0	205.6	206.3	206.9	207.5	207.8	207.8	207.8	207.8	207.8	207.8
107.5°	261.6	261.6	261.6	261.6	261.6	261.8	262.1	262.4	262.7	263.1	263.1
110°	298.5	298.5	298.5	298.5	298.5	298.6	298.9	299.3	299.5	299.9	299.4



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	333.1	333.4	333.8	334.2	334.6	334.8	335.0	335.2	335.4	335.6	335.0
115°	385.0	385.8	386.5	387.3	388.1	388.5	388.7	388.8	389.0	389.1	388.5
117.5°	438.6	438.6	438.5	438.5	438.5	438.8	439.3	440.0	440.6	441.1	440.3
120°	472.1	472.0	471.8	471.6	471.4	471.6	472.1	472.6	473.1	473.5	473.2
122.5°	501.7	502.3	502.8	503.5	504.0	504.4	504.6	504.9	505.1	505.3	505.0
125°	547.4	548.5	549.6	550.7	551.8	552.3	552.3	552.3	552.3	552.3	551.7
127.5°	591.1	591.8	592.6	593.4	594.1	594.5	594.4	594.3	594.2	594.1	593.8
130°	617.9	618.7	619.4	620.2	621.0	621.4	621.6	621.7	621.9	622.1	621.6
132.5°	644.6	645.5	646.4	647.3	648.3	648.5	648.2	647.8	647.5	647.1	647.0
135°	682.7	683.7	684.6	685.5	686.4	686.7	686.4	686.1	685.8	685.5	685.2
137.5°	717.7	718.5	719.3	720.1	720.9	721.2	720.9	720.7	720.4	720.1	720.1
140°	740.6	740.9	741.2	741.5	741.8	741.9	741.7	741.6	741.5	741.3	741.6
142.5°	761.3	761.4	761.6	761.8	762.0	762.1	762.4	762.6	762.9	763.0	763.1
145°	791.5	791.8	792.1	792.5	792.7	792.9	792.9	792.9	792.9	792.9	793.1
147.5°	818.0	818.0	817.9	817.8	817.8	817.8	818.0	818.1	818.4	818.6	818.8
150°	834.7	834.5	834.1	833.8	833.5	833.5	833.8	834.1	834.5	834.7	835.1
152.5°	851.0	850.2	849.5	848.9	848.2	848.0	848.3	848.6	848.9	849.3	849.5
155°	871.7	870.8	869.9	868.9	868.0	867.6	868.0	868.3	868.6	868.9	869.3
157.5°	887.7	887.2	886.6	886.1	885.5	885.2	885.3	885.3	885.3	885.4	885.8
160°	898.9	898.0	897.1	896.1	895.2	894.8	894.9	895.1	895.3	895.4	896.0
162.5°	907.9	906.9	906.0	905.0	904.1	903.7	903.8	904.0	904.2	904.4	905.2
165°	919.8	918.9	917.9	917.0	916.1	915.7	915.9	916.1	916.1	916.3	917.3
167.5°	928.7	927.8	926.8	925.9	924.9	924.5	924.6	924.8	925.0	925.1	926.2
170°	933.8	932.6	931.6	930.5	929.4	929.0	929.1	929.3	929.4	929.6	930.9
172.5°	937.1	936.0	935.0	933.9	932.7	932.4	932.6	932.9	933.2	933.4	934.6
175°	940.8	939.8	938.9	938.0	937.0	936.7	936.7	936.9	937.1	937.3	938.5
177.5°	942.4	941.6	940.9	940.2	939.4	939.1	939.2	939.3	939.5	939.6	940.5
180°	940.8	940.8	940.8	940.8	940.8	940.8	940.8	940.8	940.8	940.8	940.8



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
0°	545.6	545.6	545.6	545.6	545.6	545.6	545.6	545.6
2.5°	543.8	544.6	545.3	545.6	545.5	545.5	545.4	545.3
5°	540.5	541.4	542.2	542.7	542.5	542.2	542.1	541.9
7.5°	533.7	534.4	535.0	535.2	535.0	534.8	534.7	534.4
10°	528.1	528.3	528.6	528.6	528.3	528.1	527.8	527.5
12.5°	520.0	520.2	520.4	520.3	519.9	519.4	519.1	518.6
15°	506.7	506.6	506.5	506.0	505.2	504.4	503.6	502.7
17.5°	490.2	489.7	489.3	488.7	488.0	487.3	486.6	486.0
20°	478.0	477.5	477.1	476.4	475.5	474.7	473.9	473.1
22.5°	465.8	464.9	464.0	463.2	462.6	461.9	461.3	460.6
25°	446.0	444.8	443.6	442.6	441.5	440.5	439.5	438.5
27.5°	424.5	422.8	421.2	419.9	418.9	417.9	417.0	416.0
30°	409.1	407.1	404.9	403.5	402.6	401.8	401.0	400.2
32.5°	394.2	391.9	389.5	387.9	386.8	385.8	384.7	383.7
35°	371.0	368.3	365.6	363.6	362.4	361.1	359.8	358.6
37.5°	346.6	343.5	340.3	338.0	336.8	335.6	334.3	333.1
40°	330.6	327.1	323.6	321.3	320.2	319.1	318.0	316.9
42.5°	314.7	311.4	308.0	305.6	304.0	302.3	300.7	299.1
45°	289.4	285.7	282.0	279.6	278.2	276.8	275.4	274.0
47.5°	264.4	260.6	256.8	254.1	252.6	251.1	249.6	248.1
50°	247.4	243.5	239.7	237.1	235.8	234.3	233.0	231.6
52.5°	231.3	227.2	223.0	220.3	218.9	217.6	216.2	214.8
55°	206.9	202.8	198.7	195.8	194.4	192.9	191.5	190.0
57.5°	182.4	178.4	174.3	171.7	170.4	169.1	167.8	166.5
60°	166.3	162.2	158.2	155.5	154.1	152.8	151.4	150.0
62.5°	150.3	146.6	142.9	140.4	138.9	137.6	136.3	134.8
65°	127.0	123.3	119.7	117.2	115.8	114.4	113.1	111.6
67.5°	104.7	101.4	98.0	95.8	94.7	93.6	92.5	91.4
70°	90.0	87.1	84.3	82.3	81.1	80.1	79.0	77.8
72.5°	76.2	73.6	71.0	69.3	68.6	67.9	67.1	66.3
75°	57.0	54.9	53.0	51.6	51.0	50.3	49.7	49.0
77.5°	40.6	39.1	37.7	36.7	36.3	35.8	35.3	34.9
80°	30.5	29.7	28.9	28.4	28.2	28.0	27.8	27.6
82.5°	22.8	22.4	22.0	21.8	21.7	21.6	21.5	21.3
85°	13.0	12.9	12.8	12.8	12.7	12.6	12.5	12.4
87.5°	7.5	7.7	7.8	7.8	7.9	7.9	7.9	7.9
90°	12.8	13.5	14.3	14.9	15.3	15.8	16.2	16.8
92.5°	12.8	13.5	14.3	14.7	15.0	15.2	15.4	15.6
95°	12.8	13.5	14.3	14.6	14.6	14.6	14.6	14.6
97.5°	25.6	21.2	16.9	14.6	14.6	14.6	14.6	14.6
100°	75.2	52.1	29.0	17.1	16.5	15.9	15.2	14.6
102.5°	146.1	141.7	137.3	129.9	119.3	108.8	98.3	87.7
105°	207.8	207.8	207.8	207.8	207.6	207.4	207.2	207.1
107.5°	263.1	263.1	263.1	263.0	262.5	262.0	261.5	261.1
110°	298.9	298.5	298.0	297.8	298.0	298.2	298.3	298.5



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CATALOG NUMBER: S125RDIP-S375D810U940-4F0-1E-UDD-F

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
112.5°	334.4	333.8	333.2	332.8	332.6	332.3	332.2	332.0
115°	387.9	387.3	386.6	385.8	385.0	384.0	383.1	382.2
117.5°	439.5	438.7	437.9	437.3	436.9	436.5	436.1	435.7
120°	472.9	472.6	472.3	471.7	470.9	470.2	469.4	468.6
122.5°	504.7	504.4	504.1	503.5	502.6	501.7	500.8	499.9
125°	551.1	550.5	549.8	549.3	548.8	548.3	547.9	547.4
127.5°	593.4	593.2	592.8	592.0	590.9	589.8	588.6	587.5
130°	621.1	620.6	620.2	619.6	618.8	618.0	617.2	616.4
132.5°	646.9	646.8	646.8	646.3	645.6	644.8	644.0	643.3
135°	684.9	684.6	684.3	683.7	682.7	681.8	680.8	679.9
137.5°	720.2	720.2	720.3	720.0	719.2	718.4	717.6	716.8
140°	741.9	742.3	742.5	742.3	741.3	740.4	739.4	738.5
142.5°	763.2	763.2	763.3	762.9	762.0	761.0	760.1	759.1
145°	793.2	793.4	793.5	793.1	792.2	791.3	790.3	789.4
147.5°	818.9	819.1	819.3	818.9	817.7	816.6	815.5	814.4
150°	835.4	835.7	836.0	835.5	834.3	833.0	831.8	830.5
152.5°	849.9	850.2	850.5	850.1	849.0	847.8	846.8	845.6
155°	869.9	870.3	870.8	870.4	869.2	867.9	866.7	865.4
157.5°	886.4	886.9	887.3	887.0	885.7	884.5	883.2	882.0
160°	896.6	897.2	897.9	897.6	896.3	895.1	893.9	892.6
162.5°	906.1	907.0	907.8	907.6	906.2	904.8	903.5	902.1
165°	918.2	919.1	920.1	919.9	918.6	917.4	916.1	914.9
167.5°	927.4	928.4	929.6	929.4	928.0	926.7	925.2	923.9
170°	932.0	933.3	934.5	934.4	933.1	931.7	930.2	928.9
172.5°	935.7	936.8	938.0	937.8	936.4	935.0	933.6	932.2
175°	939.7	940.9	942.2	942.1	940.8	939.3	938.0	936.6
177.5°	941.4	942.2	943.1	943.1	942.0	941.0	940.0	939.1
180°	940.8	940.8	940.8	940.8	940.8	940.8	940.8	940.8

(END OF REPORT)