

Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

Brand: HALO COMMERCIAL

Report Number: P775873

Luminaire Tested: HCDJBL510CSD-HCD8TRH-1000lm-4000K

Issue Date: 2/7/2024

Test Information

Test Method: LM-79-2019
Report Number: P775873
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (A2310613A001)
Test Lab:
Issue Date: 2/7/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: HALO COMMERCIAL
Catalog Number: HCDJBL510CSD-HCD8TRH-1000lm-4000K
Description: 8 INCH ROUND MEDIUM HAZE TRIM
Light Source: SELECTABLE LUMENS AND CCT ARRAY 90CRI / 4000K CCT
Ballast/Driver: -

Summary

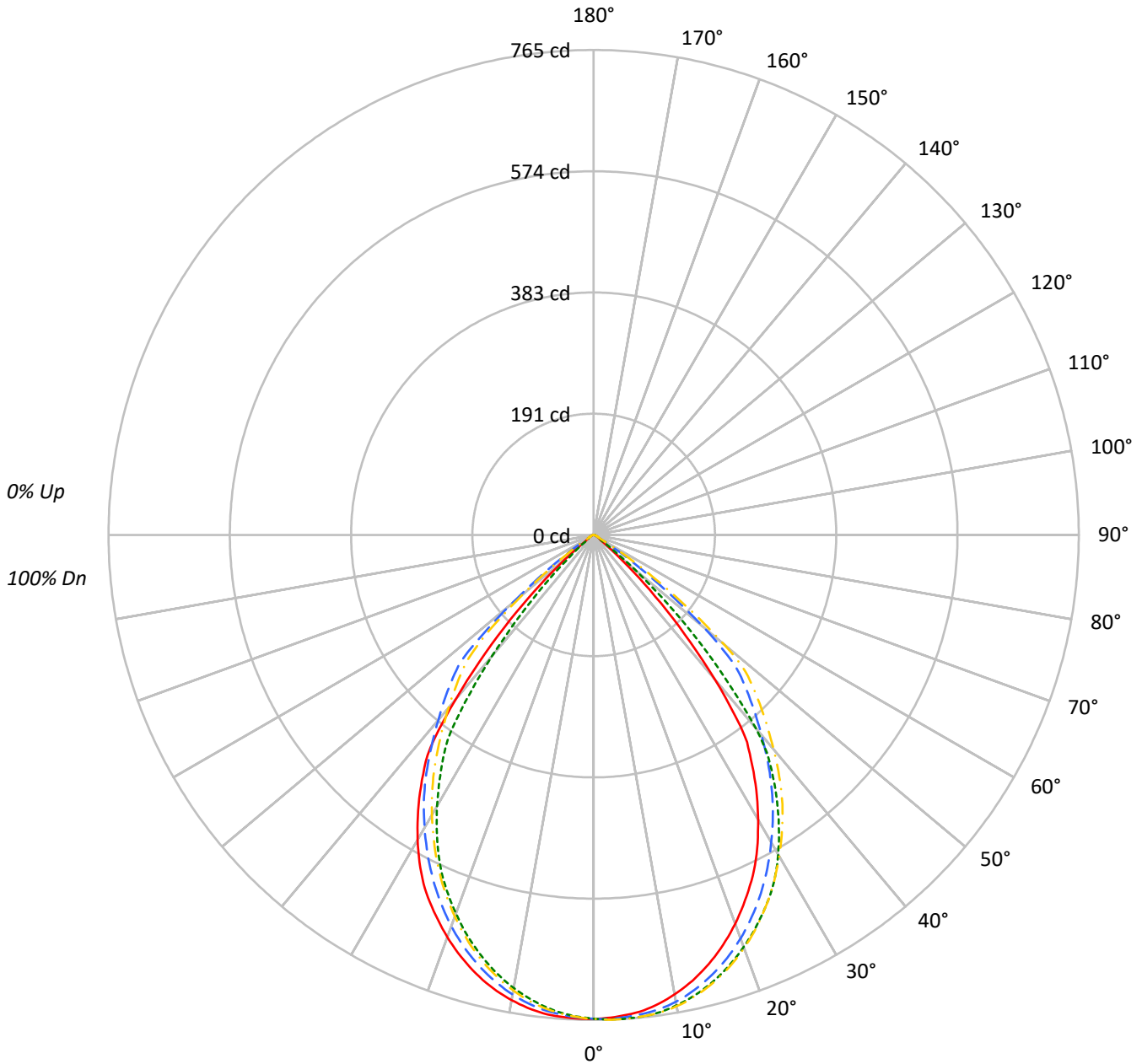
Lumens per Lamp: N/A
Luminaire Lumens: 1058.1 lumens
Efficiency: N/A
Efficacy: 105.8 lumens/watt
Spacing Criteria (0/90/45): 1.08 / 1.08 / 1.15
Luminous Opening: Circular (Dia: 0.67' x H: 0')
CIE Type: Direct

Input Watts (W): 10
Input Voltage (V): NR
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: 24 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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100					100			
1	113	110	107	104	110	107	105	103	103	101	99	100	98	97	96	95	94	92					92			
2	106	101	96	92	104	99	95	91	96	92	89	92	90	87	90	87	85	84					84			
3	100	92	87	82	98	91	86	81	88	84	80	86	82	79	83	80	78	76					76			
4	94	85	79	74	92	84	78	73	82	76	72	79	75	72	78	74	71	69					69			
5	88	78	72	67	86	77	71	66	75	70	66	74	69	65	72	68	65	63					63			
6	83	72	66	61	81	72	65	60	70	64	60	68	63	60	67	63	59	57					57			
7	78	67	60	55	76	66	60	55	65	59	55	64	58	55	62	58	54	53					53			
8	73	62	55	51	72	62	55	51	60	55	50	59	54	50	58	54	50	48					48			
9	69	58	51	47	68	57	51	47	56	51	46	56	50	46	55	50	46	45					45			
10	65	54	48	43	64	54	47	43	53	47	43	52	47	43	51	46	43	41					41			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	23307	23307	23307	23307
5°	23191	23423	23307	23040
10°	22814	23363	23099	22498
15°	22150	23042	22643	21705
20°	21203	22476	21927	20641
25°	19990	21691	21007	19309
30°	18289	20517	19573	17412
35°	16123	18721	17588	15147
40°	11809	15814	13475	9868
45°	5950	9628	7439	4352
50°	1814	3994	2446	1249
55°	671	756	671	580
60°	513	562	513	440
65°	405	433	397	340
70°	321	348	312	268
75°	260	283	248	212
80°	211	246	211	158
85°	140	210	140	105

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 135°

Vertical Angle: 45°

Luminance: 15828 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	71.9	6.8
10°-20°	199.5	18.9
20°-30°	279.9	26.5
30°-40°	287.4	27.2
40°-50°	175.7	16.6
50°-60°	34.1	3.2
60°-70°	6.2	0.6
70°-80°	2.8	0.3
80°-90°	0.6	0.1
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	551.2	52.1
0°-40°	838.7	79.3
0°-60°	1048.6	99.1
0°-90°	1058.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1058.1	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	763	763	763	763	763	
5°	757	764	760	752	757	72
15°	701	729	716	687	701	197
25°	593	644	624	573	593	271
35°	433	502	472	406	433	264
45°	138	223	172	101	138	111
55°	13	14	13	11	13	14
65°	6	6	6	5	6	6
75°	2	2	2	2	2	2
85°	0	1	0	0	0	0
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
0°	763.4	763.4	763.4	763.4	763.4	763.4	763.4	763.4	763.4	763.4	763.4
0.5°	763.2	763.1	763.6	764.1	763.7	764.1	764.3	764.3	763.5	763.0	763.0
1°	762.8	763.0	763.6	764.4	764.2	764.5	764.7	764.5	763.5	762.7	762.6
1.5°	762.4	762.8	763.6	764.6	764.5	764.9	765.0	764.6	763.4	762.4	762.1
2°	761.9	762.5	763.6	764.7	764.8	765.1	765.2	764.6	763.2	762.0	761.4
2.5°	761.2	762.1	763.4	764.7	764.9	765.3	765.2	764.6	763.0	761.4	760.8
3°	760.5	761.5	763.1	764.5	764.9	765.3	765.2	764.5	762.6	760.9	760.0
3.5°	759.7	760.9	762.7	764.2	764.9	765.3	765.1	764.2	762.2	760.2	759.1
4°	758.8	760.3	762.2	763.9	764.7	765.1	764.9	764.0	761.8	759.5	758.2
4.5°	757.9	759.5	761.5	763.4	764.5	764.9	764.6	763.6	761.2	758.8	757.0
5°	756.7	758.7	760.9	763.0	764.3	764.6	764.3	763.1	760.5	757.9	756.0
5.5°	755.5	757.7	760.1	762.5	763.9	764.3	763.9	762.5	759.8	756.9	754.7
6°	754.0	756.5	759.3	761.9	763.4	763.9	763.3	761.9	758.7	755.8	753.2
6.5°	752.3	755.0	758.4	761.1	762.8	763.3	762.8	760.9	757.4	754.4	751.7
7°	750.4	753.6	757.3	760.2	762.0	762.6	762.2	759.9	756.1	752.9	750.0
7.5°	748.4	751.8	756.2	759.0	760.9	761.8	761.3	758.5	754.6	751.1	748.1
8°	746.1	749.9	754.9	757.8	759.8	760.7	760.4	757.2	753.0	749.5	746.0
8.5°	743.7	747.7	753.4	756.4	758.4	759.4	759.2	755.8	751.1	747.5	743.8
9°	741.3	745.6	751.7	754.8	756.9	758.2	758.0	754.1	749.3	745.3	741.4
9.5°	738.5	743.2	749.8	753.1	755.3	756.6	756.5	752.3	747.2	743.1	738.9
10°	735.9	740.9	747.7	751.4	753.6	755.0	754.8	750.4	745.1	740.8	736.1
10.5°	733.1	738.2	745.5	749.4	751.6	753.4	753.1	748.5	742.9	738.2	733.3
11°	730.0	735.6	743.1	747.3	749.6	751.4	751.3	746.4	740.4	735.7	730.5
11.5°	726.9	732.8	740.5	745.0	747.5	749.3	749.2	744.2	737.9	732.9	727.3
12°	723.5	729.9	737.8	742.6	745.3	747.2	746.8	741.9	735.3	730.0	724.2
12.5°	720.2	726.9	735.1	740.1	742.9	745.0	744.4	739.5	732.5	727.0	720.8
13°	716.6	723.7	732.1	737.6	740.4	742.6	742.0	736.9	729.6	723.8	717.4
13.5°	712.8	720.5	729.0	734.9	737.7	740.1	739.4	734.2	726.5	720.6	714.0
14°	708.9	717.0	725.8	732.0	735.0	737.5	736.6	731.4	723.3	717.2	710.2
14.5°	704.8	713.2	722.5	729.0	732.0	734.7	733.7	728.4	719.9	713.6	706.5
15°	700.8	709.6	719.0	725.7	729.0	731.7	730.7	725.3	716.4	709.9	702.6
15.5°	696.4	705.7	715.4	722.4	725.8	728.6	727.5	722.1	712.8	706.1	698.6
16°	692.0	701.6	711.8	719.0	722.6	725.4	724.3	718.6	709.0	702.1	694.4
16.5°	687.6	697.5	707.9	715.5	719.1	722.2	721.0	714.9	705.2	698.0	690.1
17°	683.0	693.3	703.9	711.9	715.5	718.7	717.4	711.5	701.3	693.7	685.6
17.5°	678.2	688.9	699.7	707.9	711.9	715.0	713.8	707.6	697.1	689.4	681.1
18°	673.3	684.3	695.5	703.9	708.1	711.3	710.1	703.6	692.9	685.0	676.5
18.5°	668.3	679.5	691.1	699.8	704.1	707.5	706.1	699.6	688.5	680.4	671.5
19°	663.1	674.8	686.6	695.6	700.1	703.4	702.0	695.4	684.0	675.7	666.7
19.5°	658.0	669.9	681.9	691.2	696.0	699.3	697.9	691.1	679.5	670.9	661.7
20°	652.6	664.8	677.2	686.9	691.8	695.0	693.6	686.7	674.9	666.1	656.5
20.5°	647.1	659.5	672.4	682.3	687.5	690.8	689.2	682.1	670.1	660.9	651.3
21°	641.4	654.1	667.5	677.6	683.0	686.3	684.7	677.4	665.4	655.9	645.9



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
22.5°	624.0	637.4	651.8	663.0	669.2	672.4	670.4	663.0	650.0	640.0	629.1
23°	618.0	631.4	646.5	658.0	664.3	667.5	665.5	658.0	644.9	634.6	623.3
23.5°	612.0	625.7	641.0	652.9	659.3	662.6	660.3	652.8	639.7	628.9	617.5
24°	605.9	619.6	635.2	647.6	654.3	657.5	655.1	647.5	634.5	623.2	611.6
24.5°	599.7	613.6	629.4	642.3	649.2	652.2	649.7	642.3	629.1	617.5	605.5
25°	593.4	607.4	623.6	636.7	643.9	646.9	644.5	636.8	623.6	611.6	599.2
25.5°	586.7	601.2	617.7	631.2	638.8	641.6	638.9	631.3	617.8	605.7	593.0
26°	579.8	595.0	611.7	625.6	633.5	636.2	633.3	625.9	611.7	599.8	586.7
26.5°	572.7	588.7	605.5	620.0	628.0	630.5	627.5	620.3	605.3	593.6	580.3
27°	565.5	582.1	599.3	614.2	622.1	624.8	621.9	614.5	598.7	587.3	573.8
27.5°	558.0	575.1	592.9	608.2	616.0	619.3	616.0	608.5	591.8	580.8	567.1
28°	550.5	568.0	586.5	602.1	609.6	613.5	610.0	602.1	584.9	573.8	560.4
28.5°	542.8	560.9	580.1	596.0	603.0	607.4	603.9	595.6	577.8	566.9	553.8
29°	534.7	553.4	573.4	589.6	596.3	601.1	597.9	589.0	570.5	559.8	547.1
29.5°	526.8	546.2	566.9	583.0	589.2	594.6	591.6	582.2	562.9	552.6	540.3
30°	518.8	538.5	560.1	576.0	582.0	588.0	585.3	574.9	555.2	545.1	533.2
30.5°	510.5	530.8	553.5	569.0	574.5	580.9	578.9	567.7	547.4	537.6	526.4
31°	502.2	522.9	546.6	561.7	567.0	574.1	572.6	560.3	539.5	529.9	519.5
31.5°	493.8	515.2	539.9	554.4	559.2	566.7	566.0	552.9	531.6	522.1	512.5
32°	485.5	507.0	532.8	546.8	551.4	559.4	559.5	545.3	523.4	514.3	505.3
32.5°	477.0	499.2	525.9	538.9	543.5	551.8	552.9	537.6	515.3	506.7	498.2
33°	468.2	491.1	518.9	531.3	535.5	544.4	546.3	529.6	506.9	498.6	490.8
33.5°	459.5	482.9	511.8	523.1	527.2	536.5	539.5	521.6	498.4	490.7	483.3
34°	450.8	474.7	504.2	515.4	519.1	528.7	532.7	513.6	489.8	482.8	475.7
34.5°	441.8	466.6	497.0	507.2	510.7	521.0	525.8	505.5	480.7	474.8	467.7
35°	432.6	458.1	489.5	499.1	502.3	513.1	518.8	497.3	471.9	466.5	460.0
35.5°	424.0	449.7	482.1	490.8	493.4	505.0	511.5	489.0	463.1	458.3	452.0
36°	414.8	441.3	474.3	483.1	484.7	497.1	504.1	480.6	454.4	450.0	444.1
36.5°	406.7	432.6	466.7	474.8	475.9	489.0	496.5	472.1	445.1	441.6	436.2
37°	393.5	424.0	458.8	466.5	466.9	480.5	488.8	463.6	435.1	433.1	428.0
37.5°	380.1	415.4	451.1	458.0	458.0	472.3	481.1	454.8	422.5	424.7	420.0
38°	362.7	406.8	443.1	449.6	448.4	463.8	473.3	446.2	408.2	416.2	412.2
38.5°	346.6	398.3	435.4	440.8	438.7	455.3	465.4	437.7	392.0	407.5	404.5
39°	330.4	389.6	427.3	432.6	426.0	446.9	457.4	428.9	374.6	397.9	396.5
39.5°	313.9	375.9	419.5	423.9	412.7	438.2	449.4	420.4	356.1	386.1	388.8
40°	296.3	360.6	411.6	415.4	396.8	429.7	441.5	408.0	338.1	372.7	381.2
40.5°	279.1	344.5	403.9	406.9	379.2	421.1	433.6	395.2	320.9	357.4	373.9
41°	261.6	328.8	396.1	395.4	361.2	409.1	425.5	380.5	303.6	341.3	366.7
41.5°	244.5	313.1	388.5	384.3	343.2	397.9	417.9	364.4	287.0	324.7	359.7
42°	228.2	297.2	381.1	370.5	325.3	383.4	410.2	347.9	269.6	308.0	352.4
42.5°	213.0	280.5	373.7	355.7	307.9	368.0	402.7	330.4	252.9	292.0	345.5
43°	197.7	263.7	366.5	339.8	291.1	351.4	395.5	314.2	235.4	276.3	338.2
43.5°	182.2	247.1	359.0	323.2	274.1	334.3	388.1	297.9	218.9	260.7	331.2



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
45°	137.8	200.8	337.6	274.8	223.0	284.6	366.6	249.8	172.3	213.7	310.0
45.5°	124.3	185.8	330.5	259.6	206.9	268.5	359.3	233.5	157.4	198.5	302.9
46°	111.5	171.1	323.2	244.3	191.3	252.6	351.9	217.7	143.0	183.6	296.0
46.5°	98.7	156.6	316.2	228.7	176.0	236.3	344.9	202.1	129.0	169.6	284.7
47°	86.8	142.1	307.7	213.1	161.0	219.8	337.5	186.9	115.4	155.3	271.2
47.5°	75.9	128.7	296.9	197.8	146.2	204.2	329.9	172.3	103.9	141.8	255.5
48°	65.9	115.8	284.2	183.1	132.2	189.1	322.4	158.1	92.4	128.3	238.1
48.5°	57.3	103.4	270.3	169.0	118.7	174.3	312.0	144.1	81.0	115.7	220.7
49°	49.9	91.6	257.1	155.3	107.1	159.7	298.7	130.2	69.5	104.3	203.0
49.5°	43.6	80.3	241.5	141.7	95.7	145.5	284.8	117.1	60.0	92.8	185.8
50°	38.2	69.7	226.4	128.2	84.1	131.5	268.4	105.9	51.5	81.3	168.9
50.5°	34.0	60.1	209.6	115.2	72.7	118.5	250.9	94.6	43.7	69.9	153.1
51°	29.7	51.9	192.1	102.8	61.3	106.9	232.7	83.5	36.9	60.6	137.6
51.5°	25.5	44.8	175.1	91.0	52.6	95.4	214.4	72.2	30.9	52.0	123.3
52°	21.3	39.0	158.6	80.2	44.3	83.8	196.7	61.1	25.2	44.0	111.3
52.5°	17.1	34.5	142.5	69.8	36.9	72.2	179.7	52.2	20.2	36.8	99.4
53°	14.9	30.2	128.0	60.2	30.5	60.8	163.5	44.1	16.2	30.5	87.6
53.5°	14.2	25.8	113.8	51.1	24.8	51.7	147.6	37.1	14.4	24.9	75.6
54°	13.7	21.5	100.6	43.2	19.4	43.3	132.7	30.8	13.8	19.8	63.7
54.5°	13.1	17.2	88.0	35.6	15.5	36.1	118.2	25.2	13.2	15.3	54.5
55°	12.6	14.1	76.9	30.1	14.2	29.5	105.6	20.1	12.6	12.3	46.5
55.5°	12.1	12.7	66.2	24.8	13.7	23.6	93.3	15.4	12.1	11.8	39.4
56°	11.6	12.2	56.6	19.3	13.0	18.4	80.8	12.5	11.7	11.3	33.2
56.5°	11.1	11.7	48.1	14.0	12.4	14.1	68.3	12.0	11.1	10.9	27.7
57°	10.7	11.2	40.5	12.0	11.9	12.1	58.4	11.4	10.7	10.5	23.2
57.5°	10.3	10.8	34.4	11.6	11.4	11.6	49.4	11.0	10.3	10.1	19.5
58°	9.9	10.4	30.0	11.1	10.9	11.1	41.2	10.6	9.9	9.8	16.6
58.5°	9.5	10.1	25.6	10.7	10.5	10.7	34.0	10.3	9.5	9.3	14.3
59°	9.0	9.7	21.2	10.3	10.1	10.3	27.7	9.9	9.0	9.0	12.4
59.5°	8.7	9.3	16.8	10.0	9.7	9.9	22.5	9.6	8.7	8.7	11.0
60°	8.4	9.0	14.6	9.6	9.2	9.6	18.5	9.2	8.4	8.4	10.0
60.5°	8.1	8.7	12.7	9.2	8.8	9.2	15.4	8.8	8.0	8.2	9.0
61°	7.8	8.4	11.2	8.9	8.5	8.8	13.1	8.6	7.7	7.9	8.5
61.5°	7.5	8.1	10.0	8.6	8.2	8.5	11.4	8.3	7.4	7.6	8.2
62°	7.1	7.8	9.1	8.3	7.9	8.3	10.2	8.0	7.0	7.4	7.9
62.5°	6.8	7.6	8.5	8.0	7.6	8.0	9.2	7.7	6.7	7.0	7.6
63°	6.5	7.2	8.2	7.8	7.1	7.7	8.5	7.5	6.4	6.8	7.2
63.5°	6.3	7.0	8.0	7.5	6.8	7.4	8.2	7.1	6.2	6.5	7.0
64°	6.0	6.7	7.7	7.1	6.6	7.1	7.9	6.9	5.9	6.3	6.7
64.5°	5.8	6.5	7.5	6.9	6.3	6.8	7.6	6.6	5.7	6.1	6.5
65°	5.6	6.3	7.1	6.7	6.0	6.6	7.2	6.4	5.5	5.9	6.3
65.5°	5.4	6.1	6.9	6.4	5.8	6.4	6.9	6.2	5.1	5.7	6.1
66°	5.0	5.8	6.6	6.2	5.6	6.1	6.7	5.9	4.9	5.5	5.9



TEST NUMBER: P775873

CATALOG NUMBER: HCDJBL510CSD-HCD8TRH-1000lm-4000K

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
67.5°	4.5	5.1	6.0	5.6	4.8	5.5	6.1	5.3	4.3	4.8	5.3
68°	4.3	4.9	5.8	5.4	4.6	5.3	5.8	5.0	4.2	4.6	5.0
68.5°	4.1	4.8	5.6	5.1	4.4	5.0	5.6	4.8	4.0	4.4	4.8
69°	3.9	4.6	5.4	4.9	4.2	4.8	5.4	4.7	3.8	4.3	4.6
69.5°	3.8	4.4	5.1	4.7	4.1	4.7	5.1	4.5	3.7	4.1	4.4
70°	3.6	4.2	4.9	4.5	3.9	4.5	4.9	4.3	3.5	3.9	4.2
70.5°	3.5	4.1	4.7	4.4	3.7	4.3	4.8	4.1	3.4	3.8	4.1
71°	3.3	3.9	4.5	4.2	3.6	4.2	4.6	4.0	3.2	3.6	3.9
71.5°	3.2	3.8	4.3	4.0	3.4	4.0	4.4	3.8	3.0	3.5	3.7
72°	2.9	3.6	4.2	3.9	3.3	3.8	4.2	3.7	2.8	3.3	3.6
72.5°	2.8	3.5	4.0	3.7	3.0	3.7	4.0	3.5	2.7	3.2	3.4
73°	2.7	3.3	3.8	3.6	2.9	3.5	3.9	3.4	2.6	3.0	3.3
73.5°	2.5	3.2	3.7	3.4	2.8	3.4	3.7	3.2	2.5	2.8	3.0
74°	2.4	2.9	3.5	3.3	2.7	3.3	3.6	3.0	2.3	2.7	2.9
74.5°	2.3	2.8	3.3	3.0	2.5	3.0	3.4	2.9	2.2	2.6	2.7
75°	2.2	2.7	3.2	2.9	2.4	2.9	3.3	2.7	2.1	2.4	2.6
75.5°	2.1	2.5	2.9	2.8	2.3	2.8	3.0	2.6	2.0	2.3	2.5
76°	2.0	2.4	2.8	2.7	2.2	2.7	2.9	2.5	1.9	2.2	2.3
76.5°	1.9	2.3	2.7	2.5	2.1	2.5	2.7	2.3	1.8	2.1	2.2
77°	1.8	2.2	2.5	2.4	2.0	2.4	2.6	2.2	1.7	2.0	2.1
77.5°	1.7	2.1	2.4	2.3	1.9	2.3	2.5	2.1	1.6	1.9	2.0
78°	1.6	2.0	2.3	2.2	1.8	2.2	2.3	2.0	1.5	1.8	1.8
78.5°	1.5	1.8	2.1	2.1	1.7	2.1	2.2	1.9	1.4	1.6	1.7
79°	1.4	1.7	2.0	1.9	1.6	2.0	2.1	1.8	1.4	1.5	1.6
79.5°	1.3	1.6	1.9	1.8	1.5	1.9	2.0	1.7	1.3	1.4	1.5
80°	1.2	1.5	1.8	1.7	1.4	1.7	1.8	1.6	1.2	1.3	1.4
80.5°	1.1	1.4	1.7	1.6	1.4	1.6	1.7	1.4	1.1	1.2	1.3
81°	0.9	1.3	1.6	1.5	1.3	1.5	1.6	1.3	0.9	1.1	1.2
81.5°	0.9	1.2	1.4	1.4	1.2	1.5	1.5	1.3	0.9	1.1	1.1
82°	0.8	1.1	1.3	1.3	1.1	1.4	1.4	1.2	0.8	0.9	0.9
82.5°	0.7	0.9	1.2	1.2	0.9	1.3	1.3	1.1	0.7	0.8	0.8
83°	0.6	0.8	1.1	1.1	0.9	1.2	1.2	0.9	0.6	0.7	0.7
83.5°	0.6	0.7	0.9	0.9	0.8	1.1	1.1	0.8	0.6	0.6	0.6
84°	0.5	0.7	0.8	0.9	0.7	0.9	0.9	0.7	0.5	0.5	0.5
84.5°	0.4	0.6	0.7	0.8	0.7	0.8	0.8	0.6	0.4	0.4	0.5
85°	0.4	0.5	0.6	0.7	0.6	0.7	0.7	0.5	0.4	0.4	0.4
85.5°	0.3	0.4	0.6	0.6	0.6	0.7	0.6	0.4	0.3	0.3	0.3
86°	0.2	0.3	0.5	0.5	0.5	0.6	0.5	0.4	0.3	0.2	0.2
86.5°	0.2	0.2	0.4	0.5	0.4	0.5	0.5	0.3	0.2	0.2	0.2
87°	0.1	0.2	0.3	0.4	0.4	0.4	0.4	0.2	0.2	0.1	0.1
87.5°	0.1	0.1	0.3	0.3	0.3	0.4	0.3	0.2	0.1	0.1	0.1
88°	0.1	0.1	0.2	0.3	0.3	0.3	0.3	0.1	0.1	0.0	0.0
88.5°	0.0	0.1	0.1	0.2	0.2	0.2	0.2	0.1	0.1	0.0	0.0



TEST NUMBER: P775873

CATALOG NUMBER: HCDJBL510CSD-HCD8TRH-1000lm-4000K

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
90°	0.0	0.0	0.0	0.0	0.1	0.0	0.1	0.0	0.0	0.0	0.0



TEST NUMBER: P775873

CATALOG NUMBER: HCDJBL510CSD-HCD8TRH-1000lm-4000K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
0°	763.4	763.4	763.4	763.4	763.4	763.4
0.5°	763.2	762.5	762.8	763.2	763.4	763.2
1°	762.6	761.8	762.1	762.5	762.9	762.8
1.5°	761.9	760.9	761.2	761.8	762.2	762.4
2°	761.1	760.1	760.3	760.9	761.4	761.9
2.5°	760.3	759.1	759.3	760.0	760.6	761.2
3°	759.4	758.0	758.3	758.8	759.8	760.5
3.5°	758.3	756.7	756.9	757.8	758.7	759.7
4°	757.1	755.2	755.6	756.5	757.8	758.8
4.5°	755.8	753.6	753.9	755.0	756.6	757.9
5°	754.2	751.8	752.1	753.6	755.2	756.7
5.5°	752.5	749.7	750.1	752.0	753.9	755.5
6°	750.6	747.7	748.1	750.2	752.3	754.0
6.5°	748.6	745.3	745.8	748.2	750.6	752.3
7°	746.5	742.9	743.4	746.1	748.6	750.4
7.5°	744.1	740.2	740.8	743.8	746.5	748.4
8°	741.7	737.6	738.1	741.4	744.2	746.1
8.5°	739.2	734.8	735.4	738.8	741.6	743.7
9°	736.6	731.8	732.6	735.9	739.0	741.3
9.5°	733.8	728.8	729.5	733.0	736.1	738.5
10°	731.1	725.7	726.5	729.8	733.3	735.9
10.5°	728.0	722.4	723.2	726.6	730.3	733.1
11°	725.0	718.9	719.9	723.1	727.1	730.0
11.5°	721.8	715.4	716.4	719.6	723.7	726.9
12°	718.5	711.7	712.7	716.0	720.3	723.5
12.5°	714.9	707.8	708.9	712.1	716.6	720.2
13°	711.3	703.8	705.0	708.2	712.9	716.6
13.5°	707.5	699.6	701.0	704.3	709.0	712.8
14°	703.6	695.4	696.6	700.1	705.0	708.9
14.5°	699.6	691.2	692.3	695.8	700.7	704.8
15°	695.4	686.7	687.8	691.5	696.5	700.8
15.5°	691.2	681.9	683.3	686.9	692.0	696.4
16°	686.8	677.3	678.6	682.3	687.4	692.0
16.5°	682.3	672.6	673.9	677.5	682.8	687.6
17°	677.5	667.7	668.8	672.5	678.1	683.0
17.5°	672.8	662.6	663.8	667.5	673.0	678.2
18°	667.9	657.3	658.5	662.2	668.1	673.3
18.5°	662.8	652.0	653.3	657.0	662.8	668.3
19°	657.8	646.6	647.8	651.6	657.6	663.1
19.5°	652.4	641.0	642.1	646.1	652.2	658.0
20°	647.2	635.3	636.6	640.5	646.8	652.6
20.5°	641.6	629.6	630.7	634.8	641.2	647.1
21°	636.0	623.9	624.8	629.0	635.3	641.4

TEST NUMBER: P775873

CATALOG NUMBER: HCDJBL510CSD-HCD8TRH-1000lm-4000K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
22.5°	618.6	606.1	606.7	611.0	617.6	624.0
23°	612.7	599.9	600.4	604.9	611.3	618.0
23.5°	606.8	593.7	594.4	598.7	605.1	612.0
24°	600.8	587.1	587.9	592.3	598.9	605.9
24.5°	594.5	580.4	581.6	585.8	592.5	599.7
25°	588.3	573.2	574.9	579.1	586.1	593.4
25.5°	581.9	565.9	568.2	572.6	579.5	586.7
26°	575.4	558.5	561.1	566.0	572.9	579.8
26.5°	568.2	550.9	554.0	559.3	566.3	572.7
27°	561.1	543.0	546.6	552.3	559.5	565.5
27.5°	553.8	535.1	539.0	545.3	552.5	558.0
28°	546.3	526.9	531.1	538.4	545.1	550.5
28.5°	538.6	518.8	523.5	531.1	537.7	542.8
29°	530.8	510.4	515.6	524.3	530.2	534.7
29.5°	523.2	502.3	507.6	517.3	522.6	526.8
30°	515.1	493.9	499.4	510.0	514.6	518.8
30.5°	507.0	485.3	491.3	502.7	506.8	510.5
31°	498.8	476.5	483.1	495.7	498.8	502.2
31.5°	490.5	468.1	474.8	488.2	490.8	493.8
32°	482.3	459.4	466.4	480.7	482.5	485.5
32.5°	474.2	450.6	458.2	473.0	474.7	477.0
33°	465.8	441.8	449.8	465.6	466.6	468.2
33.5°	457.3	432.6	441.4	458.0	458.3	459.5
34°	448.8	423.9	432.8	450.2	450.1	450.8
34.5°	440.3	414.9	424.0	442.2	441.9	441.8
35°	431.8	406.4	415.5	434.2	433.6	432.6
35.5°	423.4	396.2	406.9	426.3	425.5	424.0
36°	414.7	382.7	398.2	418.4	417.0	414.8
36.5°	406.2	366.5	389.7	410.4	408.6	406.7
37°	397.7	349.8	381.5	402.3	400.2	393.5
37.5°	389.2	333.5	372.5	394.3	391.8	380.1
38°	381.4	316.4	359.5	386.4	383.4	362.7
38.5°	368.3	299.5	344.2	378.7	374.7	346.6
39°	353.9	282.0	328.7	371.1	367.2	330.4
39.5°	338.2	264.4	313.4	363.3	354.1	313.9
40°	322.6	247.6	297.9	355.8	340.7	296.3
40.5°	307.1	231.0	282.2	348.4	325.1	279.1
41°	290.9	215.3	265.7	341.2	309.9	261.6
41.5°	274.6	199.9	249.3	333.9	295.3	244.5
42°	257.8	184.6	233.4	326.7	280.6	228.2
42.5°	241.7	169.2	218.4	319.8	265.3	213.0
43°	226.0	154.4	203.7	312.7	249.4	197.7
43.5°	211.0	140.2	189.1	305.8	233.5	182.2



TEST NUMBER: P775873

CATALOG NUMBER: HCDJBL510CSD-HCD8TRH-1000lm-4000K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
45°	167.0	100.8	146.6	284.8	189.8	137.8
45.5°	152.7	88.9	133.0	274.3	175.6	124.3
46°	138.5	77.5	120.6	263.1	161.6	111.5
46.5°	125.4	67.5	108.0	249.9	147.9	98.7
47°	112.9	58.5	96.0	238.0	134.4	86.8
47.5°	101.4	50.7	84.3	223.4	121.6	75.9
48°	90.1	44.2	73.7	208.6	109.2	65.9
48.5°	78.7	38.9	64.1	191.4	97.3	57.3
49°	67.3	34.7	55.3	175.6	86.0	49.9
49.5°	58.0	30.5	47.7	159.8	75.2	43.6
50°	50.0	26.3	41.5	145.3	65.2	38.2
50.5°	42.9	22.1	35.9	131.3	56.1	34.0
51°	37.3	17.9	31.8	118.5	48.3	29.7
51.5°	32.4	15.0	27.7	105.7	41.8	25.5
52°	28.2	14.1	23.6	94.3	36.0	21.3
52.5°	24.3	13.4	19.5	83.1	31.8	17.1
53°	20.3	12.9	15.9	72.9	27.5	14.9
53.5°	16.5	12.4	13.0	63.3	23.3	14.2
54°	13.5	11.9	12.1	55.0	19.0	13.7
54.5°	12.1	11.3	11.7	47.3	15.3	13.1
55°	11.7	10.9	11.2	40.5	12.7	12.6
55.5°	11.2	10.5	10.8	35.8	12.0	12.1
56°	10.8	10.1	10.4	31.2	11.6	11.6
56.5°	10.4	9.7	10.0	26.6	11.1	11.1
57°	10.1	9.2	9.7	21.8	10.7	10.7
57.5°	9.7	8.8	9.2	17.3	10.3	10.3
58°	9.3	8.5	8.9	14.9	10.0	9.9
58.5°	9.0	8.2	8.6	12.9	9.7	9.5
59°	8.7	7.9	8.3	11.3	9.3	9.0
59.5°	8.4	7.6	8.0	10.1	9.0	8.7
60°	8.1	7.2	7.8	9.1	8.7	8.4
60.5°	7.9	6.9	7.5	8.6	8.4	8.1
61°	7.6	6.6	7.2	8.3	8.1	7.8
61.5°	7.2	6.4	6.9	8.0	7.8	7.5
62°	7.0	6.1	6.7	7.7	7.6	7.1
62.5°	6.7	5.9	6.4	7.5	7.2	6.8
63°	6.5	5.6	6.2	7.1	7.0	6.5
63.5°	6.3	5.4	6.0	6.9	6.7	6.3
64°	6.0	5.1	5.8	6.7	6.5	6.0
64.5°	5.8	4.9	5.6	6.4	6.3	5.8
65°	5.6	4.7	5.4	6.2	6.1	5.6
65.5°	5.4	4.5	5.1	6.0	5.8	5.4
66°	5.1	4.3	4.9	5.8	5.6	5.0



TEST NUMBER: P775873

CATALOG NUMBER: HCDJBL510CSD-HCD8TRH-1000lm-4000K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
67.5°	4.6	3.8	4.4	5.1	4.9	4.5
68°	4.4	3.6	4.2	4.9	4.7	4.3
68.5°	4.2	3.5	4.1	4.7	4.6	4.1
69°	4.1	3.3	3.9	4.5	4.4	3.9
69.5°	3.9	3.2	3.8	4.4	4.2	3.8
70°	3.8	3.0	3.6	4.2	4.0	3.6
70.5°	3.6	2.8	3.5	4.0	3.9	3.5
71°	3.5	2.7	3.3	3.9	3.7	3.3
71.5°	3.3	2.6	3.2	3.7	3.6	3.2
72°	3.2	2.5	3.0	3.5	3.4	2.9
72.5°	3.0	2.3	2.8	3.4	3.3	2.8
73°	2.8	2.2	2.7	3.2	3.0	2.7
73.5°	2.7	2.1	2.6	3.0	2.9	2.5
74°	2.6	2.0	2.5	2.8	2.7	2.4
74.5°	2.4	1.9	2.3	2.7	2.6	2.3
75°	2.3	1.8	2.2	2.6	2.5	2.2
75.5°	2.2	1.7	2.1	2.4	2.4	2.1
76°	2.1	1.6	2.0	2.3	2.2	2.0
76.5°	2.0	1.6	1.9	2.2	2.1	1.9
77°	1.9	1.5	1.8	2.0	2.0	1.8
77.5°	1.8	1.4	1.7	1.9	1.9	1.7
78°	1.7	1.3	1.6	1.8	1.8	1.6
78.5°	1.6	1.2	1.5	1.7	1.6	1.5
79°	1.5	1.1	1.4	1.6	1.5	1.4
79.5°	1.4	1.1	1.3	1.5	1.4	1.3
80°	1.3	0.9	1.2	1.3	1.3	1.2
80.5°	1.2	0.8	1.1	1.2	1.2	1.1
81°	1.1	0.8	0.9	1.1	1.1	0.9
81.5°	0.9	0.7	0.8	0.9	0.9	0.9
82°	0.8	0.6	0.8	0.8	0.8	0.8
82.5°	0.7	0.6	0.7	0.8	0.7	0.7
83°	0.6	0.5	0.6	0.7	0.6	0.6
83.5°	0.6	0.4	0.5	0.6	0.5	0.6
84°	0.5	0.4	0.4	0.5	0.4	0.5
84.5°	0.4	0.3	0.4	0.4	0.4	0.4
85°	0.3	0.3	0.3	0.4	0.3	0.4
85.5°	0.3	0.2	0.2	0.3	0.2	0.3
86°	0.2	0.1	0.2	0.2	0.2	0.2
86.5°	0.1	0.1	0.1	0.2	0.1	0.2
87°	0.1	0.0	0.1	0.1	0.1	0.1
87.5°	0.0	0.0	0.0	0.0	0.1	0.1
88°	0.0	0.0	0.0	0.0	0.0	0.1
88.5°	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P775873

CATALOG NUMBER: HCDJBL510CSD-HCD8TRH-1000lm-4000K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
90°	0.0	0.0	0.0	0.0	0.0	0.0

Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report



Report Generated By 670245859 / DESKTOP-T8S5UU9

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— 0°-180° - - 45°-225° - - - - 90°-270° - · - 135°-315°

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21.5°	635.6	648.7	662.3	672.9	678.5	681.7	680.0	672.7	660.3	650.7	640.5
22°	629.9	643.1	657.1	668.1	673.9	677.1	675.3	667.9	655.3	645.5	634.9



44°	166.5	231.0	351.8	306.8	257.2	317.3	380.9	282.0	202.7	245.0	323.9
44.5°	152.0	215.7	344.6	290.7	240.1	300.5	373.7	265.5	187.6	229.3	317.0



66.5°	4.8	5.6	6.4	6.0	5.3	5.9	6.5	5.7	4.7	5.3	5.6
67°	4.6	5.4	6.2	5.8	5.0	5.7	6.3	5.5	4.5	5.0	5.4



89°	0.0	0.0	0.1	0.1	0.2	0.2	0.1	0.1	0.0	0.0	0.0
89.5°	0.0	0.0	0.0	0.1	0.1	0.1	0.1	0.0	0.0	0.0	0.0

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21.5°	630.2	618.0	618.8	623.1	629.4	635.6
22°	624.5	612.0	612.7	617.2	623.5	629.9



44°	195.8	126.3	174.7	298.9	218.1	166.5
44.5°	181.4	113.7	160.6	291.8	203.9	152.0



66.5°	4.9	4.1	4.7	5.6	5.4	4.8
67°	4.8	4.0	4.6	5.4	5.1	4.6

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89°	0.0	0.0	0.0	0.0	0.0	0.0
89.5°	0.0	0.0	0.0	0.0	0.0	0.0

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Scaled Data Report



(END OF REPORT)