

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: METALUX

Report Number: P1213118

Luminaire Tested: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

Issue Date: 3/29/2018

Test Information

Test Method: LM-79-2019
Report Number: P1213118
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P33520)
Test Lab: INNOVATIONS CENTER-P3
Issue Date: 3/29/2018
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: METALUX
Catalog Number: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U
Description: 4FT LINEAR SNLED LED FIXTURE
WIDE FROSTED LENS
Light Source: -
Ballast/Driver: -

Summary

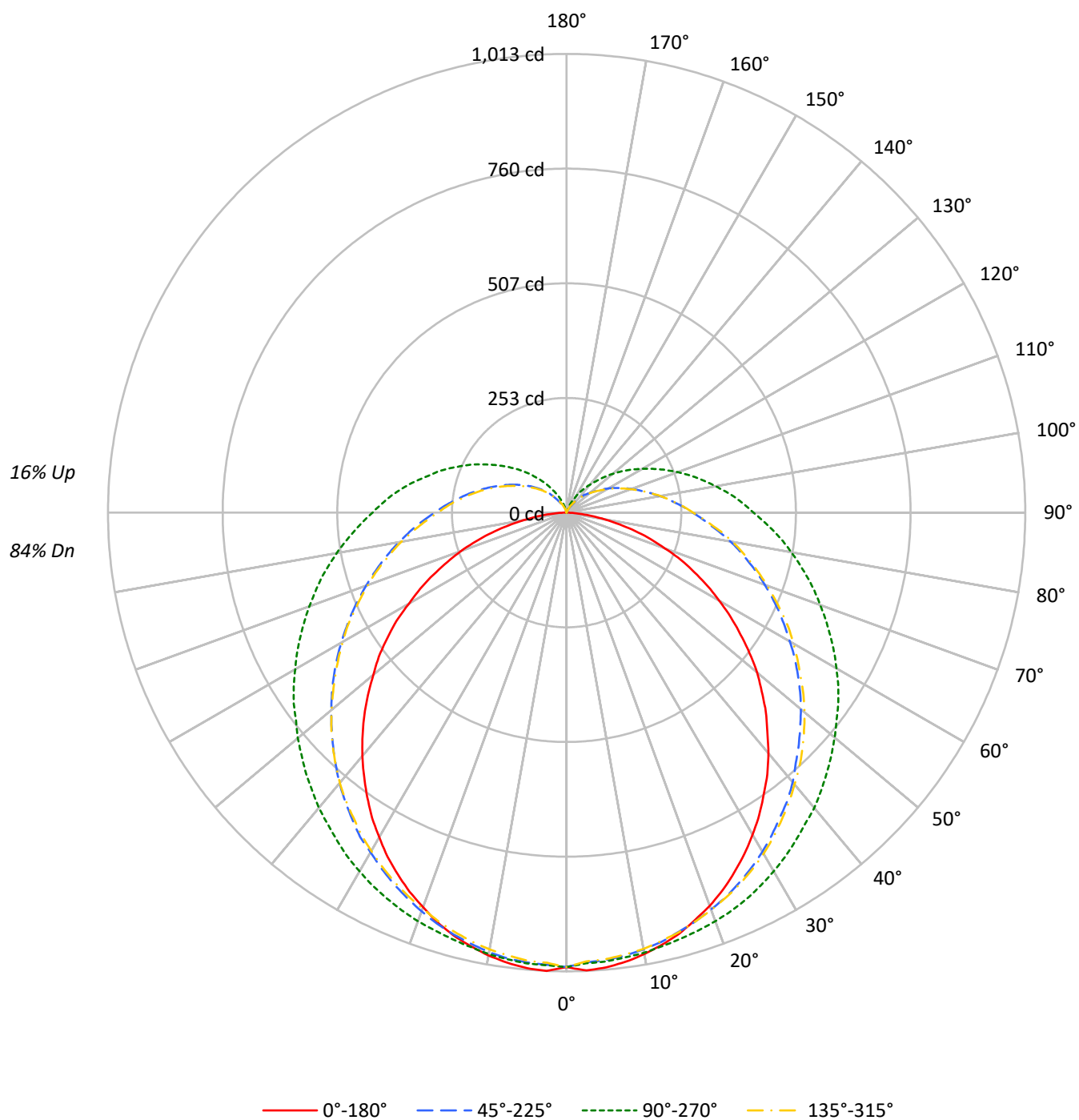
Lumens per Lamp: N/A
Luminaire Lumens: 4360.0 lumens
Efficiency: N/A
Efficacy: 90.8 lumens/watt
Spacing Criteria (0/90/45): 1.22 / 1.36 / 1.44
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.12')
CIE Type: Semi-Direct

Input Watts (W): 48
Input Voltage (V): NR
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: 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				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
RCR																				
0	115	115	115	115	111	111	111	111	102	102	102	94	94	94	87	87	87	84		
1	102	96	91	86	98	92	87	83	85	81	77	78	75	72	72	70	67	64		
2	92	82	74	68	87	79	72	66	73	67	62	67	62	58	62	58	54	51		
3	83	71	62	55	79	69	60	54	63	56	51	58	52	48	54	49	45	42		
4	76	63	53	46	72	60	52	45	56	48	42	51	45	40	47	42	38	35		
5	69	56	46	39	66	54	45	38	50	42	36	46	39	34	42	37	33	30		
6	64	50	41	34	61	48	39	33	45	37	31	41	35	30	38	33	28	26		
7	59	45	36	30	56	43	35	29	40	33	28	38	31	26	35	29	25	23		
8	55	41	32	26	52	40	31	26	37	30	24	34	28	23	32	26	22	20		
9	51	37	29	23	49	36	28	23	34	27	22	32	25	21	30	24	20	18		
10	48	34	26	21	46	33	26	21	31	24	20	29	23	19	27	22	18	16		

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	8109	8109	8109	8109
5°	8153	7815	8170	7848
10°	8077	7593	8104	7618
15°	7984	7403	8019	7411
20°	7858	7264	7885	7264
25°	7703	7141	7750	7133
30°	7530	7014	7587	7014
35°	7327	6897	7409	6905
40°	7128	6828	7214	6828
45°	6899	6755	7004	6765
50°	6659	6713	6749	6731
55°	6325	6718	6525	6748
60°	5973	6739	6168	6781
65°	5577	6807	5824	6874
70°	5022	6932	5414	7031
75°	4382	7159	4795	7297
80°	3388	7495	3850	7667
85°	2022	8034	2535	8256

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 270°

Vertical Angle: 90°

Luminance: 9229 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	95.1	2.2
10°-20°	273.2	6.3
20°-30°	418.9	9.6
30°-40°	516.8	11.9
40°-50°	560.7	12.9
50°-60°	552.6	12.7
60°-70°	499.6	11.5
70°-80°	416.2	9.5
80°-90°	322.4	7.4
90°-100°	244.5	5.6
100°-110°	180.9	4.2
110°-120°	125.9	2.9
120°-130°	80.3	1.8
130°-140°	45.1	1.0
140°-150°	20.6	0.5
150°-160°	6.4	0.1
160°-170°	0.8	0.0
170°-180°	0.0	0.0
0°-30°	787.2	18.1
0°-40°	1304.0	29.9
0°-60°	2417.3	55.4
0°-90°	3655.6	83.8
90°-120°	551.3	12.6
90°-150°	697.3	16.0
90°-180°	704.0	16.1
0°-180°	4360.0	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	1004	1004	1004	1004	1004	
5°	1008	995	1010	999	1008	96
15°	962	974	966	975	962	271
25°	876	941	882	940	876	404
35°	759	883	768	884	759	475
45°	622	813	632	814	622	480
55°	469	732	484	736	469	420
65°	311	643	325	649	311	308
75°	157	550	172	561	157	166
85°	30	458	37	471	30	36
90°	1	413	2	429	1	2
95°	1	375	1	393	1	1
105°	1	298	1	316	1	1
115°	1	226	1	247	1	1
125°	1	163	1	181	1	1
135°	1	106	1	125	1	1
145°	1	61	1	75	1	1
155°	1	25	1	35	1	1
165°	1	4	1	6	1	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5
2.5°	1012.0	1012.0	1011.0	1008.8	1009.9	1013.1	1011.0	1005.7	1002.5	994.0	996.1
5°	1007.8	1007.8	1006.7	1004.6	1005.7	1009.9	1007.8	1003.5	999.3	991.9	995.1
7.5°	1000.4	1000.4	999.3	997.2	999.3	1003.5	1001.4	997.2	994.0	986.6	989.8
10°	989.8	990.8	989.8	986.6	990.8	995.1	994.0	988.7	985.5	979.2	982.4
12.5°	977.1	978.1	977.1	976.0	978.1	984.5	982.4	978.1	976.0	970.7	973.9
15°	962.3	963.3	961.2	961.2	963.3	969.7	969.7	965.4	963.3	958.0	964.4
17.5°	943.2	944.3	943.2	943.2	945.3	951.7	952.7	950.6	948.5	946.4	952.7
20°	924.1	923.1	923.1	922.0	926.3	935.8	934.7	934.7	932.6	932.6	940.0
22.5°	901.9	901.9	900.9	900.9	906.2	914.6	914.6	916.7	914.6	918.9	925.2
25°	876.5	877.6	876.5	878.6	882.9	892.4	893.5	896.6	897.7	901.9	909.3
27.5°	850.0	851.1	850.0	852.2	859.6	867.0	872.3	876.5	877.6	883.9	893.5
30°	821.5	821.5	822.5	824.6	833.1	844.8	849.0	854.3	854.3	864.9	874.4
32.5°	791.8	791.8	791.8	796.1	805.6	819.3	824.6	831.0	833.1	843.7	854.3
35°	759.0	760.1	760.1	763.2	775.9	789.7	797.1	804.5	808.8	821.5	832.1
37.5°	728.3	730.4	727.3	731.5	749.5	761.1	769.6	777.0	784.4	801.4	809.8
40°	693.4	695.5	694.4	702.9	717.7	732.5	742.1	749.5	760.1	777.0	786.5
42.5°	656.3	658.4	660.6	670.1	686.0	700.8	712.4	722.0	734.7	749.5	765.4
45°	622.5	622.5	625.6	637.3	654.2	670.1	683.8	694.4	709.3	725.1	741.0
47.5°	584.3	585.4	589.6	603.4	621.4	640.4	653.2	666.9	682.8	699.7	717.7
50°	549.4	549.4	555.8	570.6	587.5	608.7	622.5	638.3	655.3	675.4	693.4
52.5°	509.2	511.3	520.8	534.6	556.8	575.9	591.8	608.7	628.8	650.0	670.1
55°	469.0	473.2	480.6	499.7	522.9	540.9	560.0	581.2	600.2	623.5	646.8
57.5°	429.8	433.0	444.6	463.7	488.0	510.2	530.4	550.5	573.8	597.0	621.4
60°	389.6	393.8	407.6	426.6	453.1	476.4	499.7	520.8	545.2	569.5	594.9
62.5°	351.5	354.6	370.5	392.7	419.2	444.6	467.9	493.3	519.8	543.1	568.5
65°	311.2	316.5	334.5	354.6	385.3	410.7	437.2	464.7	492.2	517.7	542.0
67.5°	274.2	277.4	296.4	319.7	350.4	379.0	406.5	436.1	464.7	491.2	515.5
70°	230.8	241.4	260.4	284.8	317.6	347.2	376.9	407.6	438.3	465.8	489.1
72.5°	194.8	203.2	224.4	250.9	282.6	317.6	348.3	381.1	411.8	440.4	464.7
75°	156.7	165.1	189.5	219.1	251.9	289.0	320.8	354.6	386.4	415.0	440.4
77.5°	119.6	130.2	156.7	187.4	223.4	261.5	294.3	328.2	361.0	391.7	417.1
80°	85.7	97.4	126.0	160.9	195.8	233.9	269.9	303.8	336.6	367.3	393.8
82.5°	55.0	67.7	98.4	133.4	170.4	208.5	245.6	279.5	312.3	343.0	370.5
85°	29.6	43.4	75.2	110.1	147.1	185.3	222.3	258.3	290.1	318.6	348.3
87.5°	8.5	25.4	56.1	91.0	129.1	164.1	200.1	236.1	267.8	298.5	325.0
90°	1.1	14.8	42.3	75.2	112.2	146.1	182.1	216.0	247.7	278.4	304.9
92.5°	1.1	9.5	32.8	62.5	96.3	131.3	167.3	200.1	229.7	260.4	286.9
95°	1.1	7.4	26.5	52.9	84.7	117.5	151.4	183.1	213.8	242.4	268.9
97.5°	1.1	5.3	21.2	45.5	74.1	104.8	137.6	169.4	199.0	226.5	250.9
100°	1.1	4.2	16.9	39.2	64.6	94.2	123.9	154.6	183.1	209.6	235.0
102.5°	1.1	3.2	14.8	32.8	57.2	83.6	112.2	140.8	168.3	193.7	219.1
105°	1.1	3.2	12.7	28.6	50.8	75.2	101.6	129.1	154.6	178.9	202.2
107.5°	1.1	2.1	10.6	24.3	44.5	67.7	92.1	118.6	141.9	165.1	187.4
110°	1.1	2.1	8.5	22.2	39.2	60.3	83.6	108.0	130.2	152.4	173.6

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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	1.1	2.1	7.4	19.1	33.9	54.0	75.2	97.4	118.6	140.8	159.8
115°	1.1	2.1	6.4	16.9	31.8	46.6	67.7	87.9	109.0	129.1	147.1
117.5°	1.1	2.1	5.3	13.8	27.5	42.3	59.3	79.4	98.4	117.5	134.4
120°	1.1	2.1	4.2	12.7	24.3	38.1	52.9	70.9	88.9	106.9	124.9
122.5°	1.1	1.1	4.2	10.6	21.2	33.9	48.7	62.5	79.4	96.3	112.2
125°	1.1	1.1	4.2	9.5	18.0	30.7	43.4	56.1	70.9	85.7	99.5
127.5°	1.1	1.1	3.2	7.4	15.9	26.5	38.1	51.9	62.5	76.2	90.0
130°	1.1	1.1	3.2	6.4	13.8	22.2	33.9	45.5	58.2	67.7	79.4
132.5°	1.1	1.1	3.2	5.3	10.6	18.0	28.6	39.2	50.8	61.4	70.9
135°	1.1	1.1	2.1	4.2	8.5	14.8	23.3	32.8	44.5	55.0	64.6
137.5°	1.1	1.1	2.1	4.2	6.4	12.7	18.0	26.5	37.1	46.6	56.1
140°	1.1	1.1	2.1	3.2	5.3	9.5	14.8	21.2	29.6	38.1	48.7
142.5°	1.1	1.1	1.1	3.2	4.2	7.4	11.6	16.9	23.3	30.7	39.2
145°	1.1	1.1	1.1	3.2	4.2	5.3	9.5	13.8	18.0	23.3	30.7
147.5°	1.1	1.1	1.1	2.1	3.2	4.2	7.4	10.6	13.8	18.0	22.2
150°	1.1	1.1	1.1	2.1	3.2	4.2	5.3	7.4	10.6	14.8	18.0
152.5°	1.1	1.1	1.1	2.1	2.1	3.2	4.2	5.3	7.4	10.6	12.7
155°	1.1	1.1	1.1	1.1	2.1	3.2	4.2	4.2	5.3	7.4	9.5
157.5°	1.1	1.1	1.1	1.1	2.1	2.1	3.2	3.2	4.2	4.2	6.4
160°	1.1	1.1	1.1	1.1	1.1	2.1	2.1	3.2	3.2	3.2	3.2
162.5°	1.1	1.1	1.1	1.1	1.1	1.1	2.1	2.1	2.1	3.2	3.2
165°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	2.1	2.1	2.1
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5
2.5°	996.1	997.2	1000.4	1000.4	998.3	998.3	997.2	996.1	997.2	999.3	999.3
5°	994.0	995.1	998.3	999.3	997.2	996.1	996.1	995.1	996.1	998.3	998.3
7.5°	989.8	990.8	994.0	995.1	993.0	993.0	991.9	990.8	993.0	994.0	994.0
10°	983.4	984.5	988.7	989.8	988.7	987.7	987.7	986.6	987.7	989.8	989.8
12.5°	975.0	977.1	982.4	982.4	982.4	981.3	981.3	980.3	981.3	983.4	982.4
15°	965.4	969.7	973.9	976.0	976.0	976.0	975.0	973.9	976.0	977.1	976.0
17.5°	954.8	960.1	966.5	968.6	968.6	969.7	968.6	967.6	969.7	969.7	968.6
20°	944.3	949.6	955.9	958.0	960.1	961.2	961.2	960.1	961.2	962.3	961.2
22.5°	930.5	936.9	944.3	947.4	949.6	951.7	951.7	951.7	952.7	953.8	951.7
25°	915.7	923.1	931.6	934.7	939.0	940.0	941.1	941.1	942.1	943.2	940.0
27.5°	899.8	908.3	916.7	922.0	925.2	927.3	927.3	928.4	929.4	930.5	927.3
30°	880.7	893.5	900.9	905.1	909.3	912.5	913.6	914.6	915.7	916.7	913.6
32.5°	863.8	874.4	883.9	889.2	894.5	898.7	899.8	899.8	901.9	901.9	898.7
35°	843.7	856.4	865.9	871.2	877.6	880.7	882.9	882.9	885.0	885.0	881.8
37.5°	823.6	836.3	846.9	853.2	860.6	864.9	865.9	865.9	868.0	868.0	863.8
40°	802.4	816.2	827.8	835.2	841.6	846.9	847.9	851.1	851.1	850.0	845.8
42.5°	781.2	793.9	806.6	815.1	823.6	828.9	831.0	832.1	832.1	831.0	827.8
45°	758.0	772.8	784.4	795.0	803.5	808.8	811.9	813.0	813.0	810.9	807.7
47.5°	735.7	750.5	762.2	773.8	782.3	788.7	791.8	792.9	791.8	790.8	787.6
50°	712.4	729.4	741.0	752.7	761.1	766.4	771.7	772.8	771.7	770.7	764.3
52.5°	688.1	706.1	718.8	730.4	740.0	746.3	750.5	751.6	751.6	749.5	745.2
55°	663.7	679.6	695.5	708.2	718.8	725.1	730.4	732.5	730.4	728.3	723.0
57.5°	641.5	656.3	672.2	686.0	696.6	705.0	709.3	711.4	709.3	706.1	700.8
60°	615.0	630.9	648.9	661.6	673.3	681.7	683.8	688.1	686.0	682.8	677.5
62.5°	589.6	608.7	624.6	640.4	650.0	659.5	663.7	665.9	663.7	660.6	655.3
65°	563.2	584.3	600.2	616.1	626.7	636.2	641.5	642.6	640.4	637.3	632.0
67.5°	538.8	558.9	575.9	592.8	602.3	611.9	617.2	619.3	617.2	612.9	607.6
70°	514.5	534.6	554.7	567.4	579.0	589.6	592.8	596.0	593.9	589.6	583.3
72.5°	490.1	511.3	531.4	544.1	556.8	566.3	570.6	573.8	571.6	567.4	560.0
75°	464.7	487.0	507.1	520.8	533.5	543.1	547.3	550.5	548.4	544.1	535.6
77.5°	441.4	463.7	482.7	497.5	510.2	518.7	526.1	527.2	525.1	520.8	512.4
80°	417.1	439.3	459.4	474.2	487.0	495.4	500.7	503.9	501.8	497.5	489.1
82.5°	395.9	416.0	436.1	451.0	463.7	474.2	478.5	481.7	480.6	474.2	467.9
85°	372.6	395.9	411.8	427.7	440.4	451.0	454.1	458.4	457.3	452.0	443.5
87.5°	349.3	372.6	391.7	407.6	419.2	427.7	433.0	435.1	434.0	428.7	419.2
90°	330.3	351.5	370.5	387.4	397.0	406.5	411.8	412.9	412.9	406.5	399.1
92.5°	312.3	332.4	351.5	367.3	379.0	387.4	391.7	393.8	392.7	387.4	379.0
95°	292.2	314.4	332.4	348.3	359.9	368.4	372.6	374.7	373.7	368.4	359.9
97.5°	275.2	295.3	313.3	328.2	339.8	348.3	352.5	354.6	354.6	349.3	340.9
100°	258.3	278.4	295.3	310.2	320.8	329.2	333.5	334.5	333.5	329.2	320.8
102.5°	241.4	260.4	277.4	291.1	302.8	310.2	314.4	315.5	315.5	310.2	301.7
105°	224.4	243.5	259.4	274.2	283.7	291.1	294.3	297.5	296.4	292.2	283.7
107.5°	208.5	227.6	242.4	256.2	265.7	273.1	276.3	279.5	278.4	274.2	265.7
110°	193.7	211.7	225.5	239.2	247.7	255.1	260.4	261.5	259.4	255.1	247.7

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	180.0	195.8	209.6	222.3	231.8	237.1	241.4	243.5	241.4	237.1	231.8
115°	165.1	181.0	194.8	206.4	214.9	221.2	224.4	226.5	224.4	220.2	214.9
117.5°	151.4	166.2	180.0	191.6	199.0	204.3	207.5	209.6	207.5	204.3	199.0
120°	139.7	152.4	165.1	175.7	184.2	188.4	191.6	193.7	192.7	188.4	183.1
122.5°	126.0	139.7	151.4	162.0	169.4	173.6	175.7	177.8	176.8	173.6	168.3
125°	114.3	126.0	137.6	147.1	154.6	158.8	160.9	163.0	162.0	158.8	152.4
127.5°	101.6	114.3	123.9	133.4	138.7	145.0	146.1	148.2	147.1	144.0	138.7
130°	92.1	101.6	111.2	119.6	126.0	130.2	132.3	133.4	131.3	129.1	123.9
132.5°	80.5	91.0	99.5	106.9	111.2	115.4	117.5	118.6	118.6	115.4	111.2
135°	72.0	79.4	86.8	94.2	98.4	102.7	104.8	105.9	104.8	102.7	98.4
137.5°	64.6	70.9	76.2	82.6	87.9	90.0	92.1	92.1	91.0	90.0	86.8
140°	56.1	63.5	68.8	73.0	77.3	78.3	80.5	80.5	79.4	78.3	76.2
142.5°	47.6	54.0	59.3	64.6	67.7	69.9	70.9	72.0	70.9	69.9	66.7
145°	38.1	45.5	50.8	54.0	58.2	59.3	60.3	61.4	60.3	59.3	56.1
147.5°	29.6	36.0	41.3	45.5	48.7	49.8	50.8	51.9	50.8	48.7	47.6
150°	21.2	26.5	32.8	37.1	39.2	41.3	41.3	41.3	42.3	40.2	38.1
152.5°	16.9	19.1	23.3	27.5	30.7	31.8	32.8	32.8	31.8	31.8	29.6
155°	11.6	13.8	16.9	20.1	23.3	24.3	25.4	25.4	24.3	24.3	23.3
157.5°	7.4	9.5	11.6	13.8	16.9	18.0	19.1	19.1	19.1	18.0	16.9
160°	4.2	5.3	6.4	8.5	10.6	11.6	12.7	12.7	12.7	12.7	11.6
162.5°	3.2	3.2	3.2	4.2	5.3	6.4	7.4	7.4	7.4	7.4	6.4
165°	2.1	2.1	2.1	2.1	2.1	3.2	4.2	4.2	4.2	4.2	4.2
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5
2.5°	998.3	998.3	999.3	997.2	990.8	991.9	991.9	996.1	998.3	999.3	1004.6
5°	996.1	996.1	998.3	995.1	989.8	989.8	989.8	994.0	995.1	997.2	1001.4
7.5°	993.0	993.0	994.0	990.8	984.5	984.5	983.4	987.7	989.8	990.8	995.1
10°	987.7	987.7	988.7	985.5	978.1	978.1	977.1	980.3	981.3	983.4	986.6
12.5°	980.3	980.3	980.3	977.1	969.7	968.6	967.6	970.7	970.7	971.8	975.0
15°	973.9	971.8	971.8	968.6	961.2	959.1	957.0	958.0	960.1	959.1	961.2
17.5°	966.5	964.4	962.3	959.1	949.6	946.4	944.3	945.3	944.3	943.2	945.3
20°	958.0	954.8	953.8	948.5	939.0	933.7	929.4	927.3	928.4	925.2	926.3
22.5°	948.5	944.3	942.1	935.8	926.3	919.9	914.6	910.4	909.3	905.1	906.2
25°	936.9	931.6	928.4	923.1	912.5	905.1	898.7	892.4	889.2	883.9	882.9
27.5°	923.1	917.8	913.6	908.3	897.7	888.2	880.7	872.3	868.0	861.7	858.5
30°	909.3	903.0	896.6	892.4	880.7	870.2	858.5	851.1	844.8	837.3	832.1
32.5°	892.4	886.0	879.7	873.3	862.8	850.0	840.5	828.9	821.5	813.0	806.6
35°	875.5	867.0	860.6	852.2	842.6	827.8	816.2	804.5	795.0	785.5	778.1
37.5°	856.4	850.0	840.5	833.1	821.5	806.6	793.9	779.1	770.7	758.0	748.4
40°	838.4	831.0	821.5	811.9	800.3	783.4	769.6	752.7	743.1	728.3	718.8
42.5°	820.4	809.8	800.3	789.7	777.0	761.1	744.2	727.3	714.5	700.8	687.0
45°	800.3	788.7	777.0	765.4	752.7	736.8	718.8	700.8	684.9	672.2	655.3
47.5°	779.1	767.5	753.7	741.0	727.3	711.4	692.3	673.3	656.3	641.5	623.5
50°	758.0	746.3	731.5	717.7	701.8	686.0	665.9	643.6	625.6	606.6	590.7
52.5°	735.7	724.1	710.3	692.3	675.4	659.5	638.3	615.0	594.9	579.0	558.9
55°	713.5	701.8	686.0	668.0	651.0	630.9	610.8	587.5	565.3	546.2	526.1
57.5°	690.2	679.6	661.6	646.8	625.6	604.5	583.3	561.1	536.7	514.5	491.2
60°	666.9	655.3	638.3	620.3	599.2	578.0	555.8	531.4	506.0	481.7	460.5
62.5°	645.7	630.9	615.0	596.0	573.8	553.6	528.2	501.8	476.4	451.0	425.6
65°	621.4	605.5	590.7	571.6	548.4	525.1	499.7	473.2	445.7	418.1	392.7
67.5°	597.0	581.2	565.3	546.2	521.9	497.5	471.1	444.6	413.9	387.4	357.8
70°	572.7	560.0	539.9	519.8	497.5	471.1	444.6	416.0	384.3	355.7	325.0
72.5°	548.4	535.6	515.5	494.4	473.2	445.7	417.1	388.5	358.9	326.0	293.2
75°	525.1	509.2	491.2	471.1	448.8	420.3	391.7	362.0	327.1	296.4	262.5
77.5°	502.8	488.0	470.0	447.8	423.4	395.9	366.3	335.6	300.6	267.8	230.8
80°	478.5	463.7	445.7	423.4	399.1	372.6	340.9	309.1	275.2	239.2	201.1
82.5°	455.2	441.4	421.3	401.2	374.7	348.3	316.5	284.8	248.8	213.8	176.8
85°	430.8	417.1	398.0	376.9	351.5	322.9	293.2	261.5	225.5	189.5	152.4
87.5°	409.7	393.8	374.7	353.6	328.2	300.6	272.1	238.2	203.2	168.3	130.2
90°	387.4	372.6	353.6	332.4	307.0	279.5	249.8	218.1	184.2	148.2	112.2
92.5°	368.4	352.5	334.5	313.3	287.9	261.5	231.8	200.1	167.3	132.3	97.4
95°	349.3	333.5	316.5	295.3	269.9	243.5	213.8	183.1	151.4	117.5	84.7
97.5°	328.2	314.4	297.5	277.4	251.9	226.5	198.0	168.3	137.6	104.8	74.1
100°	311.2	295.3	279.5	258.3	235.0	210.7	182.1	153.5	123.9	93.2	64.6
102.5°	292.2	277.4	261.5	241.4	218.1	193.7	167.3	139.7	112.2	83.6	56.1
105°	274.2	260.4	243.5	224.4	202.2	178.9	153.5	128.1	101.6	74.1	49.8
107.5°	256.2	242.4	226.5	208.5	187.4	164.1	140.8	115.4	91.0	66.7	44.5
110°	238.2	225.5	210.7	192.7	172.6	151.4	129.1	105.9	81.5	59.3	39.2

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	222.3	209.6	194.8	177.8	158.8	138.7	117.5	95.3	73.0	52.9	33.9
115°	206.4	194.8	180.0	165.1	146.1	127.0	106.9	85.7	65.6	47.6	29.6
117.5°	190.5	178.9	165.1	150.3	133.4	115.4	96.3	76.2	59.3	42.3	26.5
120°	174.7	164.1	151.4	137.6	122.8	104.8	85.7	68.8	52.9	37.1	23.3
122.5°	159.8	150.3	138.7	126.0	110.1	93.2	77.3	62.5	47.6	32.8	19.1
125°	146.1	136.6	126.0	113.3	98.4	83.6	69.9	56.1	41.3	28.6	15.9
127.5°	132.3	122.8	112.2	100.6	88.9	75.2	62.5	49.8	37.1	25.4	13.8
130°	118.6	110.1	100.6	91.0	79.4	66.7	56.1	43.4	31.8	20.1	11.6
132.5°	104.8	98.4	90.0	80.5	69.9	60.3	48.7	38.1	27.5	18.0	10.6
135°	93.2	86.8	79.4	70.9	62.5	52.9	42.3	32.8	23.3	14.8	8.5
137.5°	82.6	77.3	69.9	62.5	55.0	45.5	37.1	27.5	19.1	12.7	6.4
140°	73.0	67.7	61.4	54.0	47.6	39.2	30.7	22.2	16.9	10.6	5.3
142.5°	63.5	58.2	52.9	46.6	40.2	32.8	25.4	19.1	13.8	8.5	5.3
145°	54.0	49.8	44.5	39.2	32.8	26.5	21.2	15.9	10.6	6.4	4.2
147.5°	44.5	41.3	36.0	31.8	26.5	21.2	16.9	12.7	8.5	5.3	3.2
150°	36.0	32.8	28.6	24.3	21.2	16.9	13.8	9.5	6.4	5.3	3.2
152.5°	27.5	25.4	22.2	20.1	16.9	12.7	9.5	7.4	5.3	4.2	2.1
155°	22.2	20.1	18.0	14.8	12.7	9.5	7.4	5.3	4.2	3.2	2.1
157.5°	15.9	14.8	12.7	10.6	8.5	6.4	5.3	5.3	3.2	2.1	1.1
160°	10.6	9.5	8.5	6.4	5.3	5.3	4.2	3.2	2.1	2.1	1.1
162.5°	6.4	5.3	5.3	5.3	4.2	4.2	3.2	2.1	2.1	1.1	1.1
165°	4.2	4.2	4.2	3.2	3.2	3.2	2.1	1.1	1.1	1.1	1.1
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
0°	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5
2.5°	1004.6	1001.4	1005.7	1013.1	1014.1	1013.1	1011.0	1014.1	1018.4	1017.3	1009.9
5°	1002.5	998.3	1002.5	1009.9	1009.9	1008.8	1007.8	1011.0	1015.2	1014.1	1007.8
7.5°	996.1	991.9	996.1	1002.5	1003.5	1001.4	1001.4	1004.6	1008.8	1007.8	1002.5
10°	987.7	983.4	985.5	993.0	995.1	993.0	993.0	996.1	1001.4	1000.4	994.0
12.5°	975.0	971.8	973.9	980.3	982.4	981.3	980.3	984.5	989.8	989.8	983.4
15°	961.2	957.0	959.1	966.5	967.6	965.4	966.5	969.7	976.0	976.0	970.7
17.5°	945.3	940.0	943.2	948.5	949.6	949.6	949.6	953.8	961.2	960.1	955.9
20°	927.3	919.9	922.0	927.3	929.4	929.4	929.4	936.9	942.1	942.1	937.9
22.5°	906.2	900.9	900.9	906.2	909.3	908.3	908.3	914.6	922.0	921.0	921.0
25°	881.8	877.6	875.5	881.8	882.9	883.9	886.0	892.4	900.9	900.9	901.9
27.5°	856.4	852.2	851.1	856.4	857.5	858.5	860.6	868.0	876.5	877.6	879.7
30°	832.1	825.7	823.6	827.8	829.9	831.0	831.0	842.6	850.0	853.2	857.5
32.5°	803.5	797.1	791.8	799.2	800.3	802.4	803.5	815.1	823.6	828.9	835.2
35°	774.9	764.3	762.2	767.5	769.6	770.7	772.8	785.5	797.1	801.4	809.8
37.5°	743.1	735.7	729.4	734.7	736.8	737.8	744.2	755.8	767.5	773.8	782.3
40°	713.5	704.0	698.7	701.8	704.0	705.0	712.4	725.1	738.9	746.3	756.9
42.5°	680.7	668.0	663.7	666.9	668.0	671.1	677.5	694.4	708.2	718.8	727.3
45°	647.9	638.3	628.8	632.0	633.0	635.2	644.7	662.7	677.5	690.2	699.7
47.5°	614.0	602.3	592.8	594.9	599.2	600.2	610.8	632.0	645.7	659.5	672.2
50°	580.1	564.2	556.8	556.8	558.9	564.2	578.0	599.2	614.0	629.9	643.6
52.5°	545.2	530.4	521.9	522.9	525.1	531.4	544.1	565.3	582.2	599.2	616.1
55°	510.2	494.4	485.9	483.8	485.9	494.4	509.2	531.4	548.4	568.5	586.5
57.5°	475.3	456.3	448.8	445.7	447.8	458.4	473.2	496.5	517.7	536.7	557.9
60°	437.2	422.4	409.7	402.3	407.6	421.3	437.2	461.5	483.8	504.9	528.2
62.5°	404.4	385.3	371.6	364.2	369.4	381.1	403.3	426.6	451.0	475.3	498.6
65°	367.3	348.3	332.4	325.0	330.3	344.0	366.3	391.7	418.1	442.5	470.0
67.5°	331.3	311.2	292.2	284.8	291.1	305.9	330.3	358.9	387.4	412.9	442.5
70°	296.4	274.2	254.1	248.8	253.0	273.1	296.4	325.0	354.6	384.3	415.0
72.5°	264.6	237.1	216.0	209.6	214.9	237.1	263.6	293.2	325.0	356.7	389.6
75°	227.6	202.2	178.9	171.5	177.8	198.0	230.8	262.5	296.4	330.3	361.0
77.5°	198.0	168.3	144.0	132.3	142.9	168.3	200.1	233.9	268.9	303.8	338.7
80°	167.3	136.6	110.1	97.4	109.0	136.6	168.3	205.4	244.5	279.5	311.2
82.5°	139.7	106.9	79.4	65.6	78.3	109.0	144.0	181.0	219.1	254.1	291.1
85°	114.3	80.5	51.9	37.1	55.0	82.6	119.6	157.7	196.9	232.9	268.9
87.5°	93.2	60.3	31.8	15.9	33.9	64.6	99.5	137.6	176.8	212.8	246.7
90°	76.2	43.4	16.9	2.1	20.1	48.7	82.6	119.6	156.7	193.7	227.6
92.5°	62.5	32.8	9.5	1.1	12.7	39.2	70.9	105.9	141.9	177.8	210.7
95°	51.9	25.4	6.4	1.1	9.5	30.7	60.3	94.2	128.1	163.0	195.8
97.5°	44.5	21.2	5.3	1.1	7.4	26.5	51.9	83.6	116.4	149.3	181.0
100°	38.1	16.9	4.2	1.1	6.4	22.2	45.5	74.1	104.8	136.6	167.3
102.5°	32.8	13.8	3.2	1.1	5.3	19.1	40.2	66.7	94.2	124.9	154.6
105°	28.6	11.6	3.2	1.1	4.2	16.9	36.0	59.3	86.8	114.3	142.9
107.5°	24.3	9.5	2.1	1.1	3.2	13.8	31.8	54.0	78.3	104.8	131.3
110°	21.2	8.5	2.1	1.1	3.2	12.7	27.5	48.7	70.9	95.3	120.7

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	18.0	6.4	2.1	1.1	2.1	10.6	24.3	43.4	64.6	86.8	111.2
115°	15.9	5.3	1.1	1.1	2.1	9.5	22.2	39.2	58.2	79.4	101.6
117.5°	12.7	4.2	1.1	1.1	1.1	7.4	19.1	34.9	52.9	73.0	93.2
120°	10.6	4.2	1.1	1.1	1.1	6.4	16.9	30.7	47.6	65.6	84.7
122.5°	9.5	3.2	1.1	1.1	1.1	5.3	14.8	27.5	42.3	59.3	77.3
125°	8.5	3.2	1.1	1.1	1.1	4.2	12.7	24.3	38.1	52.9	69.9
127.5°	6.4	3.2	1.1	1.1	1.1	3.2	11.6	21.2	33.9	47.6	62.5
130°	5.3	2.1	1.1	1.1	1.1	3.2	9.5	19.1	29.6	42.3	56.1
132.5°	4.2	2.1	1.1	1.1	1.1	2.1	7.4	14.8	25.4	37.1	49.8
135°	4.2	2.1	1.1	1.1	1.1	2.1	5.3	12.7	21.2	31.8	42.3
137.5°	4.2	1.1	1.1	1.1	1.1	2.1	4.2	9.5	16.9	25.4	34.9
140°	3.2	1.1	1.1	1.1	1.1	1.1	3.2	7.4	13.8	21.2	29.6
142.5°	3.2	1.1	1.1	1.1	1.1	1.1	3.2	5.3	10.6	16.9	23.3
145°	2.1	1.1	1.1	1.1	1.1	1.1	2.1	4.2	8.5	12.7	19.1
147.5°	2.1	1.1	1.1	1.1	1.1	1.1	2.1	3.2	6.4	10.6	14.8
150°	2.1	1.1	1.1	1.1	1.1	1.1	2.1	3.2	4.2	7.4	11.6
152.5°	1.1	1.1	1.1	1.1	1.1	1.1	2.1	2.1	3.2	5.3	7.4
155°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	2.1	3.2	4.2	5.3
157.5°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	2.1	2.1	3.2	4.2
160°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	2.1	2.1	3.2
162.5°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	2.1	2.1
165°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
0°	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5
2.5°	1006.7	999.3	1001.4	1000.4	1002.5	1005.7	1005.7	1004.6	1004.6	1002.5	1000.4
5°	1004.6	997.2	1000.4	999.3	1001.4	1004.6	1004.6	1003.5	1003.5	1000.4	999.3
7.5°	998.3	993.0	995.1	995.1	997.2	1000.4	1000.4	999.3	999.3	996.1	995.1
10°	991.9	985.5	988.7	988.7	990.8	995.1	995.1	994.0	994.0	990.8	989.8
12.5°	981.3	975.0	980.3	981.3	983.4	987.7	986.6	986.6	986.6	983.4	982.4
15°	968.6	964.4	969.7	970.7	973.9	979.2	979.2	979.2	979.2	976.0	975.0
17.5°	954.8	951.7	957.0	959.1	963.3	968.6	968.6	969.7	970.7	968.6	967.6
20°	939.0	936.9	942.1	946.4	952.7	958.0	960.1	961.2	963.3	961.2	960.1
22.5°	921.0	921.0	928.4	932.6	940.0	945.3	948.5	951.7	953.8	951.7	950.6
25°	900.9	904.0	911.4	918.9	927.3	932.6	935.8	940.0	942.1	941.1	940.0
27.5°	881.8	886.0	895.6	903.0	910.4	918.9	922.0	927.3	929.4	929.4	928.4
30°	859.6	865.9	876.5	885.0	894.5	903.0	907.2	912.5	915.7	913.6	914.6
32.5°	838.4	849.0	857.5	867.0	877.6	886.0	891.3	897.7	900.9	899.8	900.9
35°	815.1	825.7	837.3	846.9	859.6	868.0	875.5	880.7	885.0	883.9	883.9
37.5°	789.7	803.5	815.1	827.8	839.5	849.0	856.4	862.8	867.0	867.0	867.0
40°	765.4	780.2	791.8	806.6	821.5	829.9	838.4	844.8	849.0	850.0	851.1
42.5°	738.9	754.8	768.5	784.4	799.2	809.8	819.3	826.8	831.0	833.1	832.1
45°	714.5	729.4	745.2	763.2	777.0	787.6	799.2	807.7	811.9	813.0	814.1
47.5°	687.0	704.0	722.0	740.0	753.7	767.5	778.1	786.5	790.8	793.9	793.9
50°	660.6	678.6	698.7	717.7	732.5	746.3	756.9	766.4	771.7	773.8	774.9
52.5°	636.2	653.2	674.3	693.4	708.2	722.0	735.7	746.3	751.6	753.7	753.7
55°	606.6	627.7	651.0	669.0	684.9	700.8	714.5	725.1	730.4	733.6	735.7
57.5°	579.0	601.3	625.6	644.7	663.7	678.6	691.3	705.0	709.3	713.5	714.5
60°	552.6	574.8	598.1	619.3	638.3	654.2	669.0	680.7	688.1	690.2	692.3
62.5°	525.1	548.4	572.7	593.9	614.0	633.0	646.8	657.4	665.9	669.0	671.1
65°	498.6	522.9	547.3	569.5	590.7	609.7	623.5	634.1	642.6	647.9	648.9
67.5°	470.0	496.5	521.9	545.2	566.3	586.5	600.2	610.8	619.3	625.6	626.7
70°	443.5	471.1	496.5	521.9	543.1	563.2	578.0	588.6	598.1	602.3	604.5
72.5°	418.1	446.7	473.2	498.6	519.8	539.9	555.8	566.3	575.9	581.2	582.2
75°	393.8	422.4	451.0	475.3	497.5	517.7	533.5	545.2	553.6	558.9	561.1
77.5°	369.4	399.1	427.7	452.0	475.3	495.4	509.2	522.9	531.4	537.8	537.8
80°	345.1	375.8	405.4	429.8	453.1	471.1	487.0	500.7	509.2	515.5	515.5
82.5°	323.9	353.6	382.2	406.5	429.8	449.9	465.8	478.5	488.0	492.2	493.3
85°	299.6	332.4	358.9	385.3	407.6	426.6	442.5	456.3	464.7	469.0	471.1
87.5°	279.5	311.2	339.8	363.1	385.3	404.4	422.4	434.0	442.5	447.8	449.9
90°	260.4	291.1	319.7	343.0	366.3	384.3	401.2	412.9	422.4	426.6	428.7
92.5°	243.5	274.2	301.7	325.0	347.2	367.3	383.2	394.9	403.3	407.6	410.7
95°	227.6	257.2	283.7	309.1	330.3	348.3	365.2	376.9	386.4	389.6	392.7
97.5°	211.7	240.3	266.8	291.1	313.3	330.3	346.2	357.8	365.2	370.5	373.7
100°	198.0	225.5	250.9	274.2	295.3	311.2	328.2	338.7	346.2	350.4	354.6
102.5°	183.1	210.7	235.0	257.2	279.5	294.3	310.2	320.8	327.1	334.5	334.5
105°	170.4	195.8	220.2	241.4	260.4	278.4	292.2	302.8	310.2	315.5	315.5
107.5°	156.7	182.1	205.4	227.6	245.6	262.5	275.2	284.8	293.2	296.4	299.6
110°	146.1	168.3	191.6	212.8	229.7	245.6	258.3	268.9	276.3	279.5	281.6

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	133.4	156.7	177.8	198.0	214.9	229.7	242.4	250.9	258.3	262.5	263.6
115°	122.8	145.0	164.1	183.1	201.1	213.8	225.5	233.9	241.4	244.5	246.7
117.5°	113.3	133.4	152.4	168.3	185.3	199.0	210.7	218.1	224.4	228.7	230.8
120°	103.7	122.8	139.7	155.6	171.5	184.2	194.8	202.2	209.6	212.8	212.8
122.5°	94.2	112.2	128.1	142.9	157.7	169.4	181.0	187.4	193.7	196.9	196.9
125°	85.7	102.7	117.5	131.3	145.0	155.6	165.1	172.6	178.9	181.0	181.0
127.5°	77.3	93.2	106.9	119.6	131.3	141.9	151.4	158.8	164.1	166.2	166.2
130°	69.9	83.6	96.3	109.0	120.7	129.1	138.7	145.0	148.2	151.4	152.4
132.5°	62.5	75.2	86.8	97.4	109.0	117.5	124.9	131.3	134.4	137.6	138.7
135°	55.0	66.7	77.3	87.9	97.4	105.9	112.2	117.5	121.7	123.9	124.9
137.5°	46.6	59.3	68.8	77.3	87.9	94.2	101.6	104.8	109.0	111.2	111.2
140°	39.2	48.7	59.3	67.7	76.2	82.6	88.9	94.2	97.4	98.4	98.4
142.5°	31.8	40.2	48.7	59.3	66.7	72.0	78.3	82.6	84.7	85.7	86.8
145°	25.4	31.8	39.2	48.7	57.2	63.5	66.7	70.9	73.0	74.1	75.2
147.5°	19.1	25.4	31.8	38.1	46.6	52.9	56.1	60.3	62.5	63.5	63.5
150°	14.8	19.1	23.3	29.6	36.0	43.4	47.6	50.8	51.9	52.9	52.9
152.5°	10.6	14.8	18.0	22.2	26.5	32.8	39.2	41.3	42.3	43.4	43.4
155°	7.4	10.6	12.7	15.9	19.1	24.3	29.6	32.8	33.9	34.9	34.9
157.5°	5.3	7.4	8.5	11.6	13.8	15.9	20.1	25.4	26.5	26.5	26.5
160°	3.2	4.2	5.3	7.4	8.5	10.6	12.7	15.9	19.1	19.1	19.1
162.5°	2.1	3.2	3.2	4.2	4.2	6.4	7.4	8.5	11.6	12.7	12.7
165°	1.1	2.1	2.1	2.1	2.1	2.1	3.2	3.2	5.3	6.4	6.4
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
0°	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5
2.5°	1001.4	1003.5	1002.5	1002.5	1002.5	1004.6	1002.5	993.0	995.1	997.2	999.3
5°	1000.4	1001.4	1001.4	1000.4	1000.4	1002.5	1000.4	990.8	993.0	995.1	996.1
7.5°	996.1	997.2	997.2	997.2	996.1	998.3	995.1	986.6	986.6	988.7	989.8
10°	990.8	993.0	991.9	990.8	990.8	990.8	988.7	979.2	979.2	980.3	981.3
12.5°	984.5	984.5	984.5	983.4	982.4	982.4	980.3	970.7	969.7	971.8	970.7
15°	976.0	978.1	976.0	975.0	972.8	972.8	969.7	960.1	958.0	959.1	958.0
17.5°	968.6	969.7	967.6	965.4	963.3	962.3	959.1	948.5	945.3	946.4	944.3
20°	961.2	961.2	959.1	957.0	953.8	950.6	946.4	935.8	930.5	930.5	926.3
22.5°	951.7	951.7	949.6	946.4	943.2	939.0	934.7	924.1	915.7	913.6	910.4
25°	941.1	940.0	939.0	935.8	929.4	925.2	921.0	909.3	899.8	895.6	890.3
27.5°	928.4	928.4	925.2	922.0	915.7	910.4	905.1	894.5	881.8	876.5	869.1
30°	914.6	914.6	911.4	907.2	900.9	894.5	888.2	875.5	862.8	855.3	846.9
32.5°	900.9	899.8	896.6	892.4	886.0	876.5	871.2	858.5	843.7	835.2	823.6
35°	883.9	882.9	879.7	874.4	865.9	858.5	850.0	838.4	821.5	810.9	798.2
37.5°	867.0	865.9	863.8	856.4	847.9	839.5	828.9	817.2	801.4	787.6	774.9
40°	850.0	849.0	844.8	839.5	828.9	818.3	807.7	796.1	779.1	763.2	749.5
42.5°	832.1	831.0	825.7	819.3	807.7	797.1	784.4	771.7	754.8	735.7	722.0
45°	814.1	811.9	806.6	799.2	786.5	774.9	762.2	747.4	730.4	712.4	694.4
47.5°	795.0	791.8	786.5	775.9	765.4	752.7	737.8	722.0	705.0	684.9	665.9
50°	773.8	771.7	765.4	755.8	743.1	730.4	713.5	697.6	677.5	658.4	635.2
52.5°	753.7	749.5	744.2	733.6	720.9	707.1	689.1	670.1	650.0	632.0	607.6
55°	732.5	730.4	723.0	714.5	698.7	682.8	665.9	645.7	623.5	602.3	579.0
57.5°	712.4	708.2	701.8	690.2	676.4	660.6	642.6	621.4	597.0	574.8	549.4
60°	692.3	686.0	678.6	668.0	653.2	636.2	617.2	594.9	570.6	546.2	519.8
62.5°	670.1	664.8	656.3	645.7	630.9	612.9	592.8	569.5	546.2	520.8	492.2
65°	647.9	642.6	634.1	623.5	608.7	588.6	567.4	544.1	517.7	493.3	462.6
67.5°	625.6	620.3	610.8	599.2	584.3	565.3	543.1	518.7	492.2	465.8	434.0
70°	603.4	597.0	588.6	575.9	561.1	540.9	518.7	493.3	466.8	438.3	406.5
72.5°	581.2	575.9	565.3	553.6	537.8	517.7	495.4	470.0	442.5	412.9	381.1
75°	558.9	552.6	545.2	531.4	514.5	495.4	472.1	446.7	417.1	388.5	355.7
77.5°	536.7	531.4	521.9	508.1	492.2	472.1	448.8	423.4	393.8	364.2	329.2
80°	514.5	508.1	500.7	488.0	470.0	449.9	425.6	400.1	370.5	339.8	304.9
82.5°	492.2	485.9	477.4	464.7	447.8	427.7	404.4	376.9	347.2	315.5	282.6
85°	470.0	464.7	455.2	442.5	424.5	404.4	381.1	356.7	325.0	293.2	260.4
87.5°	447.8	442.5	433.0	420.3	403.3	383.2	359.9	334.5	303.8	274.2	238.2
90°	426.6	422.4	412.9	400.1	383.2	363.1	341.9	314.4	284.8	255.1	221.2
92.5°	407.6	403.3	394.9	382.2	367.3	345.1	323.9	297.5	267.8	237.1	204.3
95°	390.6	385.3	376.9	365.2	347.2	328.2	307.0	280.5	251.9	221.2	189.5
97.5°	371.6	366.3	357.8	345.1	330.3	310.2	289.0	263.6	235.0	206.4	174.7
100°	352.5	347.2	337.7	327.1	312.3	292.2	272.1	246.7	220.2	192.7	162.0
102.5°	333.5	328.2	319.7	309.1	294.3	276.3	256.2	231.8	205.4	177.8	149.3
105°	315.5	310.2	301.7	291.1	277.4	259.4	238.2	217.0	191.6	165.1	137.6
107.5°	297.5	292.2	284.8	274.2	260.4	243.5	223.4	201.1	177.8	152.4	126.0
110°	279.5	275.2	266.8	257.2	243.5	226.5	208.5	187.4	164.1	140.8	115.4

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	262.5	258.3	249.8	239.2	227.6	211.7	193.7	173.6	151.4	129.1	104.8
115°	245.6	240.3	232.9	223.4	211.7	196.9	180.0	162.0	139.7	118.6	96.3
117.5°	228.7	224.4	217.0	207.5	196.9	182.1	166.2	149.3	128.1	108.0	87.9
120°	211.7	208.5	201.1	192.7	182.1	168.3	153.5	136.6	117.5	98.4	79.4
122.5°	195.8	192.7	185.3	177.8	167.3	154.6	140.8	124.9	108.0	90.0	73.0
125°	181.0	176.8	170.4	163.0	153.5	141.9	128.1	113.3	97.4	81.5	65.6
127.5°	165.1	162.0	157.7	149.3	139.7	129.1	116.4	103.7	88.9	74.1	59.3
130°	152.4	148.2	142.9	136.6	128.1	117.5	105.9	93.2	80.5	66.7	51.9
132.5°	137.6	133.4	129.1	122.8	115.4	105.9	95.3	83.6	72.0	59.3	46.6
135°	123.9	120.7	116.4	110.1	102.7	95.3	84.7	74.1	63.5	51.9	41.3
137.5°	111.2	108.0	103.7	99.5	92.1	84.7	75.2	65.6	56.1	45.5	36.0
140°	98.4	96.3	92.1	87.9	81.5	74.1	65.6	57.2	48.7	39.2	30.7
142.5°	85.7	83.6	80.5	76.2	70.9	64.6	57.2	49.8	41.3	33.9	26.5
145°	74.1	73.0	69.9	65.6	61.4	55.0	48.7	42.3	34.9	28.6	21.2
147.5°	62.5	61.4	59.3	56.1	51.9	46.6	41.3	34.9	29.6	23.3	16.9
150°	51.9	50.8	49.8	45.5	43.4	38.1	33.9	28.6	24.3	18.0	13.8
152.5°	42.3	42.3	40.2	37.1	34.9	30.7	27.5	23.3	19.1	14.8	10.6
155°	33.9	32.8	31.8	29.6	27.5	24.3	21.2	18.0	14.8	10.6	7.4
157.5°	26.5	25.4	24.3	22.2	20.1	19.1	15.9	12.7	9.5	7.4	5.3
160°	19.1	18.0	16.9	15.9	14.8	12.7	10.6	8.5	6.4	4.2	3.2
162.5°	12.7	11.6	11.6	10.6	9.5	7.4	6.4	5.3	4.2	3.2	2.1
165°	6.4	6.4	5.3	5.3	4.2	3.2	3.2	3.2	2.1	2.1	1.1
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
0°	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5	1003.5
2.5°	998.3	998.3	1002.5	1001.4	998.3	1004.6	1012.0
5°	995.1	995.1	998.3	998.3	995.1	1001.4	1007.8
7.5°	989.8	988.7	991.9	991.9	987.7	993.0	1000.4
10°	980.3	979.2	982.4	982.4	978.1	983.4	989.8
12.5°	969.7	967.6	970.7	969.7	965.4	970.7	977.1
15°	955.9	954.8	957.0	954.8	950.6	955.9	962.3
17.5°	942.1	939.0	940.0	940.0	932.6	937.9	943.2
20°	924.1	919.9	921.0	919.9	914.6	917.8	924.1
22.5°	906.2	899.8	899.8	898.7	892.4	896.6	901.9
25°	883.9	876.5	876.5	875.5	868.0	871.2	876.5
27.5°	861.7	854.3	851.1	850.0	842.6	842.6	850.0
30°	838.4	827.8	825.7	822.5	815.1	815.1	821.5
32.5°	816.2	801.4	797.1	792.9	785.5	784.4	791.8
35°	786.5	774.9	767.5	763.2	754.8	752.7	759.0
37.5°	762.2	747.4	736.8	731.5	723.0	719.8	728.3
40°	735.7	719.8	706.1	702.9	690.2	686.0	693.4
42.5°	706.1	689.1	675.4	669.0	659.5	655.3	656.3
45°	676.4	658.4	643.6	635.2	625.6	618.2	622.5
47.5°	645.7	629.9	611.9	599.2	587.5	582.2	584.3
50°	615.0	596.0	579.0	565.3	551.5	545.2	549.4
52.5°	584.3	564.2	545.2	530.4	514.5	508.1	509.2
55°	554.7	533.5	511.3	495.4	480.6	471.1	469.0
57.5°	525.1	501.8	478.5	460.5	441.4	433.0	429.8
60°	493.3	469.0	444.6	423.4	403.3	393.8	389.6
62.5°	463.7	437.2	409.7	387.4	367.3	354.6	351.5
65°	435.1	404.4	376.9	351.5	329.2	315.5	311.2
67.5°	404.4	372.6	343.0	315.5	294.3	276.3	274.2
70°	375.8	341.9	309.1	280.5	257.2	239.2	230.8
72.5°	347.2	312.3	278.4	247.7	218.1	201.1	194.8
75°	319.7	283.7	247.7	216.0	183.1	163.0	156.7
77.5°	294.3	257.2	219.1	184.2	153.5	128.1	119.6
80°	269.9	231.8	191.6	155.6	122.8	95.3	85.7
82.5°	244.5	208.5	167.3	129.1	95.3	66.7	55.0
85°	222.3	186.3	145.0	106.9	73.0	42.3	29.6
87.5°	204.3	165.1	128.1	90.0	55.0	24.3	8.5
90°	186.3	148.2	111.2	74.1	41.3	13.8	1.1
92.5°	170.4	134.4	97.4	63.5	31.8	9.5	1.1
95°	155.6	120.7	85.7	52.9	25.4	6.4	1.1
97.5°	141.9	109.0	76.2	45.5	21.2	5.3	1.1
100°	130.2	98.4	67.7	40.2	18.0	4.2	1.1
102.5°	118.6	88.9	60.3	34.9	15.9	3.2	1.1
105°	109.0	80.5	54.0	31.8	13.8	3.2	1.1
107.5°	99.5	73.0	48.7	27.5	11.6	2.1	1.1
110°	90.0	66.7	43.4	24.3	10.6	2.1	1.1

TEST NUMBER: P1213118

CATALOG NUMBER: 4SNLED-LD5-55HL-LW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
112.5°	82.6	60.3	39.2	22.2	8.5	2.1	1.1
115°	75.2	54.0	34.9	19.1	7.4	1.1	1.1
117.5°	67.7	48.7	30.7	16.9	6.4	1.1	1.1
120°	61.4	43.4	27.5	14.8	5.3	1.1	1.1
122.5°	55.0	39.2	24.3	12.7	4.2	1.1	1.1
125°	49.8	34.9	21.2	10.6	3.2	1.1	1.1
127.5°	44.5	30.7	19.1	9.5	3.2	1.1	1.1
130°	39.2	27.5	15.9	7.4	2.1	1.1	1.1
132.5°	34.9	23.3	13.8	6.4	2.1	1.1	1.1
135°	30.7	20.1	11.6	4.2	2.1	1.1	1.1
137.5°	26.5	16.9	9.5	3.2	1.1	1.1	1.1
140°	22.2	14.8	7.4	3.2	1.1	1.1	1.1
142.5°	19.1	11.6	5.3	2.1	1.1	1.1	1.1
145°	14.8	9.5	4.2	2.1	1.1	1.1	1.1
147.5°	11.6	7.4	3.2	2.1	1.1	1.1	1.1
150°	8.5	5.3	3.2	1.1	1.1	1.1	1.1
152.5°	6.4	4.2	2.1	1.1	1.1	1.1	1.1
155°	4.2	3.2	2.1	1.1	1.1	1.1	1.1
157.5°	3.2	2.1	1.1	1.1	1.1	1.1	1.1
160°	2.1	1.1	1.1	1.1	1.1	1.1	1.1
162.5°	1.1	1.1	1.1	1.1	1.1	1.1	1.1
165°	1.1	1.1	1.1	1.1	1.1	1.1	1.1
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)