

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: PORTFOLIO

Report Number: P249753

Luminaire Tested: **LSR8B150D010 EC8B150935 8LBSW0LI**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P249753
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P13955)
Test Lab: INNOVATION CENTER-P1
Issue Date: 03/03/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LSR8B150D010 EC8B150935 8LBSW0LI
Description: PORTFOLIO 8 INCH SINGLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF
RECESSED DOWNLIGHT- CYLINDEC
90 CRI 3500 CCT WITH SPECULAR CLEAR TRIM
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 14650.0 lumens
Efficiency: N/A
Efficacy: 92.4 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.28 / 1.15
Luminous Opening: Circular (Dia: 0.67' x H: 0')
CIE Type: Direct

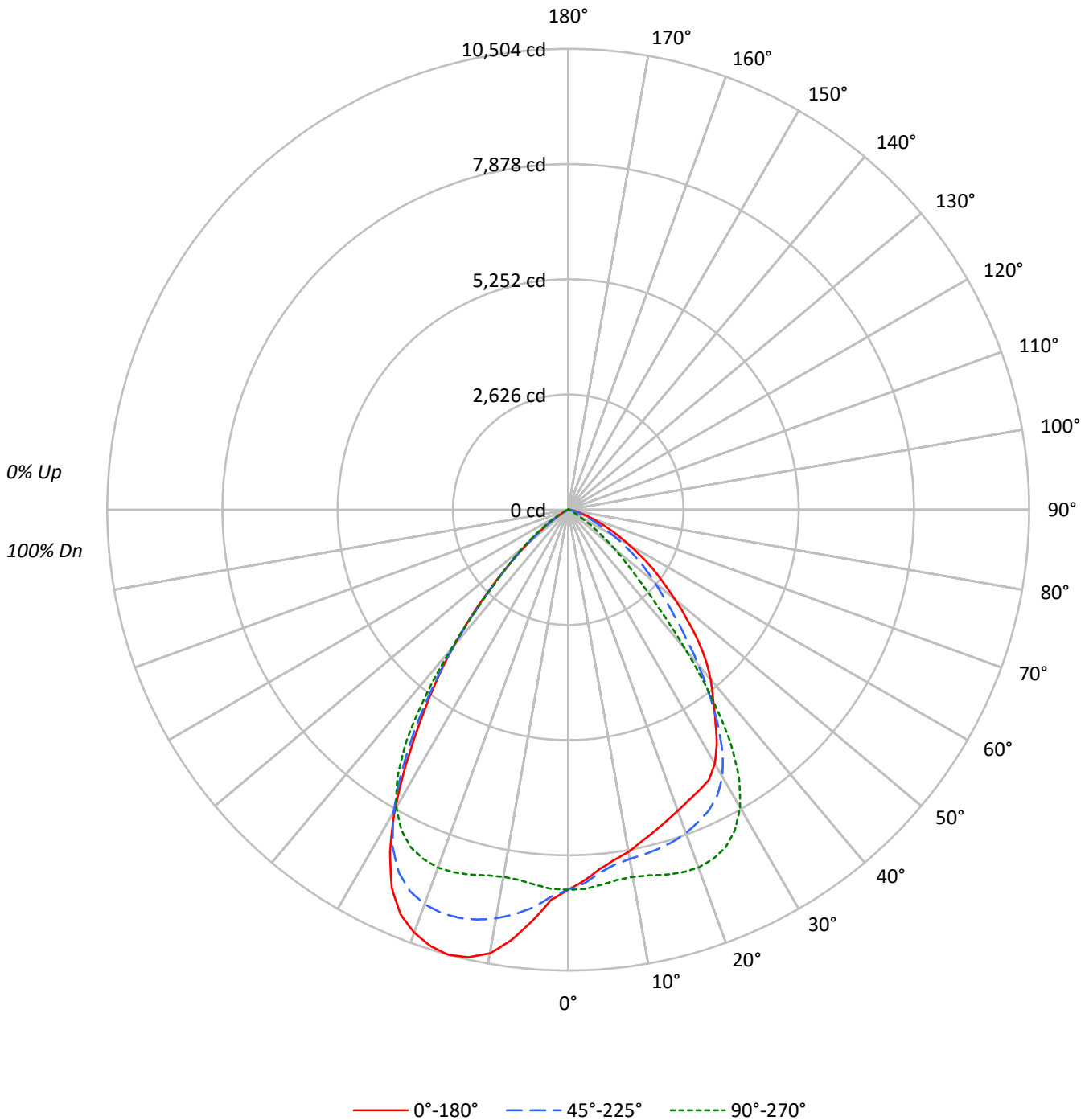
Input Watts (W): 158.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	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	112	109	106	103	110	107	104	102	103	100	98	99	97	96	95	94	93	91					91			
2	105	99	94	90	103	97	93	89	94	90	87	91	88	85	88	86	83	82					82			
3	98	90	84	80	96	89	83	79	86	82	78	84	80	76	81	78	75	73					73			
4	92	83	76	71	90	81	75	70	79	74	70	77	72	69	75	71	68	66					66			
5	86	76	69	64	84	75	68	63	73	67	63	71	66	62	69	65	61	60					60			
6	80	70	63	57	79	69	62	57	67	61	57	66	60	56	64	60	56	54					54			
7	75	64	57	52	74	64	57	52	62	56	52	61	55	51	60	55	51	49					49			
8	71	60	53	48	70	59	52	48	58	52	47	57	51	47	56	51	47	45					45			
9	67	55	48	44	66	55	48	44	54	48	43	53	47	43	52	47	43	42					42			
10	63	52	45	40	62	51	45	40	50	44	40	49	44	40	49	43	40	38					38			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	267123	267123	267123
5°	254486	265636	291201
10°	247922	266046	321437
15°	242301	274863	335344
20°	239634	284794	336600
25°	240197	288817	323525
30°	237967	278900	281350
35°	219891	241371	220192
40°	203194	167348	163274
45°	180939	100977	104326
50°	152246	65056	59035
55°	126662	35687	26988
60°	98861	15474	8486
65°	72958	7683	4130
70°	50733	4751	1821
75°	30870	977	0
80°	22286	1456	0
85°	14329	1415	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	832.8	5.7
10°-20°	2492.4	17.0
20°-30°	3816.8	26.1
30°-40°	3741.8	25.5
40°-50°	2253.3	15.4
50°-60°	1037.1	7.1
60°-70°	364.3	2.5
70°-80°	95.3	0.7
80°-90°	16.2	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°	7142.0	48.8
0°-40°	10883.7	74.3
0°-60°	14174.1	96.8
0°-90°	14650.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	14650.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	8663	8663	8663	8663	8663	
5°	8221	8298	8582	9096	9408	777
15°	7590	7999	8610	9630	10504	2144
25°	7060	7570	8489	9128	9509	3252
35°	5841	5922	6412	6044	5849	3658
45°	4149	3416	2316	2332	2392	3182
55°	2356	1866	664	522	502	2102
65°	1000	692	105	53	57	1019
75°	259	150	8	0	0	314
85°	40	20	4	0	0	56
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6
2.5°	8460.1	8468.3	8468.3	8468.3	8484.5	8488.6	8484.5	8488.6	8496.6	8525.0	8537.1
5°	8221.4	8209.2	8217.4	8213.2	8233.5	8245.7	8237.5	8249.7	8278.0	8298.4	8318.5
7.5°	8051.4	8051.4	8051.4	8059.4	8071.6	8095.9	8091.9	8099.9	8128.2	8156.6	8184.9
10°	7917.8	7913.8	7913.8	7934.0	7950.1	7978.4	7986.6	8010.9	8047.3	8083.7	8116.1
12.5°	7743.7	7747.8	7768.0	7788.3	7824.7	7869.1	7893.5	7926.0	7982.6	8043.3	8079.8
15°	7589.9	7593.9	7610.2	7650.5	7695.2	7747.8	7800.3	7853.0	7921.8	7998.8	8063.6
17.5°	7440.1	7444.1	7456.3	7500.9	7557.6	7626.4	7687.0	7755.8	7845.0	7934.0	8014.9
20°	7302.5	7298.5	7318.6	7359.1	7432.1	7496.8	7557.6	7638.5	7735.7	7845.0	7938.0
22.5°	7168.9	7168.9	7189.2	7229.7	7294.5	7359.1	7423.9	7508.9	7606.1	7711.4	7820.7
25°	7059.6	7055.6	7083.9	7104.2	7152.7	7217.5	7286.3	7355.1	7452.3	7569.7	7674.9
27.5°	6942.3	6938.3	6942.3	6966.6	7011.1	7059.6	7112.2	7173.0	7254.0	7351.1	7452.3
30°	6683.2	6687.2	6687.2	6707.5	6731.8	6784.3	6812.6	6873.4	6946.3	7027.2	7116.4
32.5°	6298.6	6302.6	6302.6	6310.8	6330.9	6355.3	6379.6	6424.1	6480.7	6549.5	6630.5
35°	5841.3	5841.3	5837.1	5841.3	5853.4	5853.4	5873.6	5853.4	5881.7	5922.2	5982.9
37.5°	5420.2	5412.0	5404.1	5395.9	5383.7	5363.6	5335.2	5286.6	5274.4	5258.3	5262.3
40°	5047.8	5043.8	5019.5	4999.2	4958.7	4910.2	4841.4	4756.4	4687.6	4606.6	4537.8
42.5°	4634.9	4630.8	4610.6	4574.1	4529.6	4456.8	4347.5	4234.2	4096.6	3975.1	3849.7
45°	4149.1	4161.3	4132.9	4092.4	4039.8	3971.0	3849.7	3711.9	3574.3	3416.5	3258.5
47.5°	3643.1	3639.1	3618.9	3594.6	3550.1	3481.3	3400.3	3250.5	3104.7	2959.1	2797.2
50°	3173.6	3157.4	3149.2	3125.1	3096.7	3040.1	2954.9	2833.5	2704.0	2566.4	2416.6
52.5°	2728.4	2728.4	2708.0	2691.9	2667.5	2623.0	2550.2	2453.1	2343.8	2214.2	2056.4
55°	2356.0	2347.8	2327.6	2307.3	2283.0	2254.7	2190.0	2109.0	1991.6	1866.1	1728.5
57.5°	1959.2	1955.1	1947.1	1922.8	1910.6	1882.3	1809.5	1728.5	1627.3	1518.0	1404.6
60°	1603.0	1586.9	1570.5	1554.4	1534.2	1505.9	1457.2	1388.4	1303.4	1206.3	1093.0
62.5°	1283.3	1307.4	1259.0	1259.0	1218.5	1194.1	1149.7	1109.2	1020.0	931.1	833.9
65°	999.9	999.9	979.5	963.4	939.1	910.7	866.2	825.8	760.9	692.1	623.3
67.5°	765.1	760.9	740.8	724.6	704.3	688.1	655.8	607.2	558.7	502.0	445.2
70°	562.7	558.7	554.5	526.2	510.0	489.9	465.5	433.2	396.7	356.2	303.6
72.5°	404.7	404.7	392.7	380.6	364.4	348.1	323.9	303.6	271.3	242.9	206.4
75°	259.1	255.1	255.1	234.8	234.8	210.4	194.3	182.1	166.0	149.8	117.5
77.5°	186.3	182.1	178.1	169.9	162.0	153.8	141.6	125.5	113.3	97.1	85.0
80°	125.5	117.5	113.3	113.3	101.1	97.1	101.1	77.0	72.8	60.6	52.7
82.5°	77.0	77.0	72.8	72.8	68.8	64.8	52.7	52.7	48.7	44.5	36.5
85°	40.5	52.7	36.5	40.5	36.5	40.5	36.5	28.3	24.3	20.2	20.2
87.5°	24.3	16.2	16.2	24.3	20.2	16.2	16.2	16.2	12.2	8.2	8.2
90°	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°	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6
2.5°	8529.1	8557.4	8553.3	8589.8	8601.9	8630.3	8630.3	8650.4	8662.6	8690.9	8715.2
5°	8326.7	8371.2	8383.3	8427.8	8464.3	8508.8	8537.1	8581.6	8622.1	8682.9	8739.6
7.5°	8201.2	8237.5	8261.9	8314.5	8355.0	8403.5	8452.1	8512.8	8569.4	8642.4	8723.4
10°	8140.4	8189.1	8225.4	8278.0	8326.7	8379.3	8427.8	8496.6	8561.4	8654.6	8743.6
12.5°	8124.2	8180.9	8225.4	8298.4	8346.8	8403.5	8460.1	8537.1	8605.9	8703.1	8804.4
15°	8124.2	8201.2	8261.9	8342.8	8399.5	8472.3	8533.1	8609.9	8686.9	8788.0	8885.2
17.5°	8108.1	8201.2	8278.0	8371.2	8444.0	8517.0	8593.8	8666.7	8747.6	8844.9	8954.0
20°	8043.3	8160.7	8253.7	8363.0	8440.0	8521.0	8597.9	8678.7	8763.9	8865.0	8958.2
22.5°	7930.0	8067.6	8172.9	8290.2	8379.3	8460.1	8537.1	8618.1	8711.2	8808.4	8905.5
25°	7780.2	7909.6	8023.1	8144.4	8233.5	8322.5	8395.5	8488.6	8573.6	8666.7	8743.6
27.5°	7553.4	7691.0	7800.3	7926.0	8006.8	8091.9	8152.6	8229.5	8310.5	8387.3	8448.1
30°	7213.5	7339.0	7452.3	7565.6	7646.5	7707.4	7772.0	7832.8	7885.5	7938.0	7990.6
32.5°	6715.5	6829.0	6938.3	7043.4	7108.2	7160.9	7209.3	7245.8	7274.2	7302.5	7306.5
35°	6031.5	6124.5	6193.3	6286.5	6347.3	6395.8	6395.8	6411.9	6407.9	6395.8	6383.6
37.5°	5266.4	5302.7	5331.1	5367.6	5371.6	5371.6	5347.4	5327.1	5294.7	5286.6	5262.3
40°	4469.0	4420.3	4383.9	4335.4	4307.0	4246.2	4193.7	4157.3	4104.6	4096.6	4088.4
42.5°	3711.9	3598.6	3497.5	3412.5	3315.3	3230.2	3153.4	3096.7	3056.3	3052.1	3056.3
45°	3096.7	2967.1	2817.3	2700.0	2590.7	2485.4	2384.3	2315.5	2279.0	2270.8	2279.0
47.5°	2631.2	2481.4	2335.6	2202.0	2084.7	1967.2	1866.1	1773.0	1728.5	1716.3	1712.3
50°	2262.8	2109.0	1955.1	1817.5	1688.0	1570.5	1445.1	1356.1	1299.4	1279.1	1263.0
52.5°	1902.6	1765.0	1607.0	1465.4	1335.8	1198.1	1068.7	967.4	910.7	886.6	870.2
55°	1586.9	1449.2	1303.4	1165.8	1028.2	890.6	760.9	663.8	603.2	574.8	554.5
57.5°	1267.0	1137.5	1012.0	874.4	760.9	627.5	497.9	412.9	360.2	327.9	311.7
60°	979.5	878.4	769.1	655.8	546.5	437.2	331.9	250.9	210.4	186.3	166.0
62.5°	740.8	655.8	582.8	485.7	400.7	307.6	226.8	162.0	125.5	105.3	97.1
65°	534.3	469.5	404.7	344.1	283.4	214.6	153.8	105.3	72.8	60.6	56.6
67.5°	380.6	327.9	279.2	238.8	194.3	153.8	109.3	72.8	56.6	48.7	44.5
70°	267.1	226.8	194.3	158.0	129.5	101.1	85.0	52.7	32.3	36.5	28.3
72.5°	178.1	149.8	133.6	109.3	89.0	72.8	52.7	36.5	36.5	28.3	24.3
75°	97.1	89.0	68.8	52.7	44.5	40.5	16.2	8.2	4.0	12.2	4.0
77.5°	68.8	60.6	52.7	44.5	36.5	28.3	16.2	16.2	12.2	16.2	8.2
80°	44.5	36.5	32.3	32.3	20.2	12.2	8.2	8.2	12.2	4.0	4.0
82.5°	28.3	24.3	20.2	20.2	20.2	12.2	12.2	12.2	12.2	8.2	8.2
85°	16.2	12.2	8.2	8.2	4.0	8.2	0.0	4.0	4.0	0.0	0.0
87.5°	8.2	4.0	4.0	4.0	4.0	0.0	0.0	4.0	0.0	4.0	0.0
90°	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):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6	8662.6
2.5°	8731.4	8747.6	8767.9	8784.0	8820.5	8828.5	8844.9	8861.0	8873.2	8885.2	8889.3
5°	8788.0	8848.9	8905.5	8966.2	9043.1	9095.8	9156.4	9209.1	9261.7	9306.2	9338.5
7.5°	8804.4	8897.3	8982.5	9087.6	9200.9	9298.2	9399.4	9500.5	9605.8	9686.8	9755.6
10°	8836.7	8950.0	9059.3	9184.8	9330.5	9460.0	9585.5	9719.1	9852.7	9966.0	10067.3
12.5°	8893.3	9018.8	9136.3	9273.9	9423.7	9569.3	9706.9	9856.7	9998.5	10124.0	10237.3
15°	8986.5	9103.8	9217.2	9346.7	9496.5	9630.1	9767.7	9913.4	10055.2	10184.6	10289.9
17.5°	9047.1	9156.4	9269.7	9387.2	9512.7	9634.1	9763.6	9893.2	10022.7	10140.1	10237.3
20°	9047.1	9152.4	9237.4	9342.7	9460.0	9565.3	9670.6	9783.9	9897.2	9994.3	10087.5
22.5°	8974.3	9075.5	9140.3	9221.2	9322.4	9411.5	9468.2	9593.6	9678.6	9763.6	9832.4
25°	8804.4	8877.2	8929.8	8986.5	9067.5	9128.1	9176.8	9249.6	9334.5	9367.0	9415.5
27.5°	8496.6	8549.3	8577.6	8589.8	8630.3	8662.6	8670.7	8703.1	8739.6	8747.6	8767.9
30°	8010.9	8014.9	8002.8	7998.8	7978.4	7954.3	7950.1	7946.1	7930.0	7913.8	7917.8
32.5°	7278.2	7258.0	7209.3	7156.9	7104.2	7047.6	7015.1	6974.6	6950.3	6926.1	6897.8
35°	6330.9	6282.5	6213.6	6148.8	6088.2	6043.5	5970.7	5946.4	5922.2	5889.7	5881.7
37.5°	5217.8	5189.4	5124.6	5076.1	5043.8	5023.5	4987.0	4962.8	4962.8	4950.7	4942.5
40°	4068.1	4060.1	4035.8	4048.0	4031.8	4039.8	4035.8	4027.6	4048.0	4048.0	4056.1
42.5°	3052.1	3056.3	3068.4	3076.4	3100.7	3104.7	3125.1	3125.1	3137.2	3149.2	3157.4
45°	2270.8	2287.1	2287.1	2303.3	2327.6	2331.6	2339.6	2343.8	2351.8	2372.1	2380.1
47.5°	1704.2	1708.2	1708.2	1712.3	1720.3	1728.5	1724.5	1728.5	1740.6	1732.5	1740.6
50°	1259.0	1263.0	1250.8	1238.6	1250.8	1250.8	1246.8	1234.6	1246.8	1230.6	1238.6
52.5°	858.2	854.1	841.9	846.1	837.9	833.9	833.9	825.8	825.8	825.8	809.6
55°	542.5	542.5	534.3	534.3	530.3	522.2	518.2	514.0	510.0	506.0	506.0
57.5°	303.6	307.6	295.6	291.4	295.6	291.4	283.4	283.4	283.4	271.3	279.2
60°	166.0	162.0	158.0	153.8	149.8	153.8	153.8	145.8	145.8	145.8	149.8
62.5°	89.0	89.0	85.0	85.0	81.0	81.0	89.0	77.0	81.0	77.0	81.0
65°	48.7	60.6	44.5	44.5	56.6	52.7	48.7	48.7	52.7	44.5	48.7
67.5°	52.7	36.5	32.3	36.5	32.3	32.3	32.3	40.5	36.5	28.3	36.5
70°	24.3	28.3	28.3	20.2	32.3	16.2	28.3	16.2	24.3	20.2	24.3
72.5°	24.3	24.3	24.3	16.2	24.3	16.2	20.2	20.2	16.2	16.2	24.3
75°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
77.5°	8.2	8.2	4.0	4.0	4.0	4.0	8.2	8.2	8.2	0.0	4.0
80°	8.2	8.2	0.0	4.0	0.0	0.0	4.0	0.0	4.0	0.0	8.2
82.5°	4.0	8.2	4.0	4.0	8.2	8.2	8.2	4.0	4.0	4.0	4.0
85°	0.0	4.0	0.0	0.0	0.0	0.0	8.2	0.0	0.0	0.0	4.0
87.5°	0.0	4.0	0.0	0.0	0.0	0.0	4.0	4.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P249753

CATALOG NUMBER: LSR8B150D010 EC8B150935 8LBSW0LI

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°
0°	8662.6	8662.6	8662.6	8662.6
2.5°	8893.3	8897.3	8905.5	8901.5
5°	9362.9	9395.4	9411.5	9407.5
7.5°	9804.1	9860.9	9893.2	9893.2
10°	10144.1	10208.9	10257.4	10265.6
12.5°	10326.2	10399.2	10464.0	10447.7
15°	10378.9	10451.9	10516.5	10504.4
17.5°	10318.2	10391.1	10439.7	10431.5
20°	10152.3	10212.9	10261.6	10257.4
22.5°	9893.2	9945.9	9986.3	9982.2
25°	9456.0	9492.5	9524.8	9508.7
27.5°	8784.0	8796.2	8816.4	8792.2
30°	7889.5	7897.5	7905.6	7901.6
32.5°	6885.6	6881.4	6873.4	6865.3
35°	5869.6	5869.6	5873.6	5849.3
37.5°	4946.5	4942.5	4954.7	4942.5
40°	4064.1	4060.1	4076.3	4056.1
42.5°	3169.6	3181.7	3185.7	3185.7
45°	2384.3	2388.3	2392.3	2392.3
47.5°	1740.6	1744.6	1765.0	1740.6
50°	1230.6	1234.6	1238.6	1230.6
52.5°	813.6	817.8	813.6	801.4
55°	497.9	502.0	502.0	502.0
57.5°	267.1	271.3	271.3	267.1
60°	145.8	141.6	145.8	137.6
62.5°	77.0	85.0	81.0	72.8
65°	48.7	48.7	48.7	56.6
67.5°	40.5	32.3	36.5	28.3
70°	24.3	28.3	28.3	20.2
72.5°	20.2	20.2	20.2	24.3
75°	0.0	0.0	0.0	0.0
77.5°	8.2	8.2	8.2	4.0
80°	4.0	0.0	4.0	0.0
82.5°	4.0	4.0	8.2	4.0
85°	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0

(END OF REPORT)