

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: P248431

Luminaire Tested: **LSR8B150D010 EC8B1509730 8LBDW0LI**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P248431
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P13956)
Test Lab: INNOVATION CENTER-P1
Issue Date: 03/03/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LSR8B150D010 EC8B1509730 8LBDW0LI
Description: PORTFOLIO 8 INCH DOUBLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF
RECESSED DOWNLIGHT- CYLINDEC
97 CRI 3000 CCT WITH SPECULAR CLEAR TRIM
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 12570.0 lumens
Efficiency: N/A
Efficacy: 79.3 lumens/watt
Spacing Criteria (0/90/45): 1.16 / 1.33 / 1.2
Luminous Opening: Point Source (0' x 0' x 0')
CIE Type: Direct

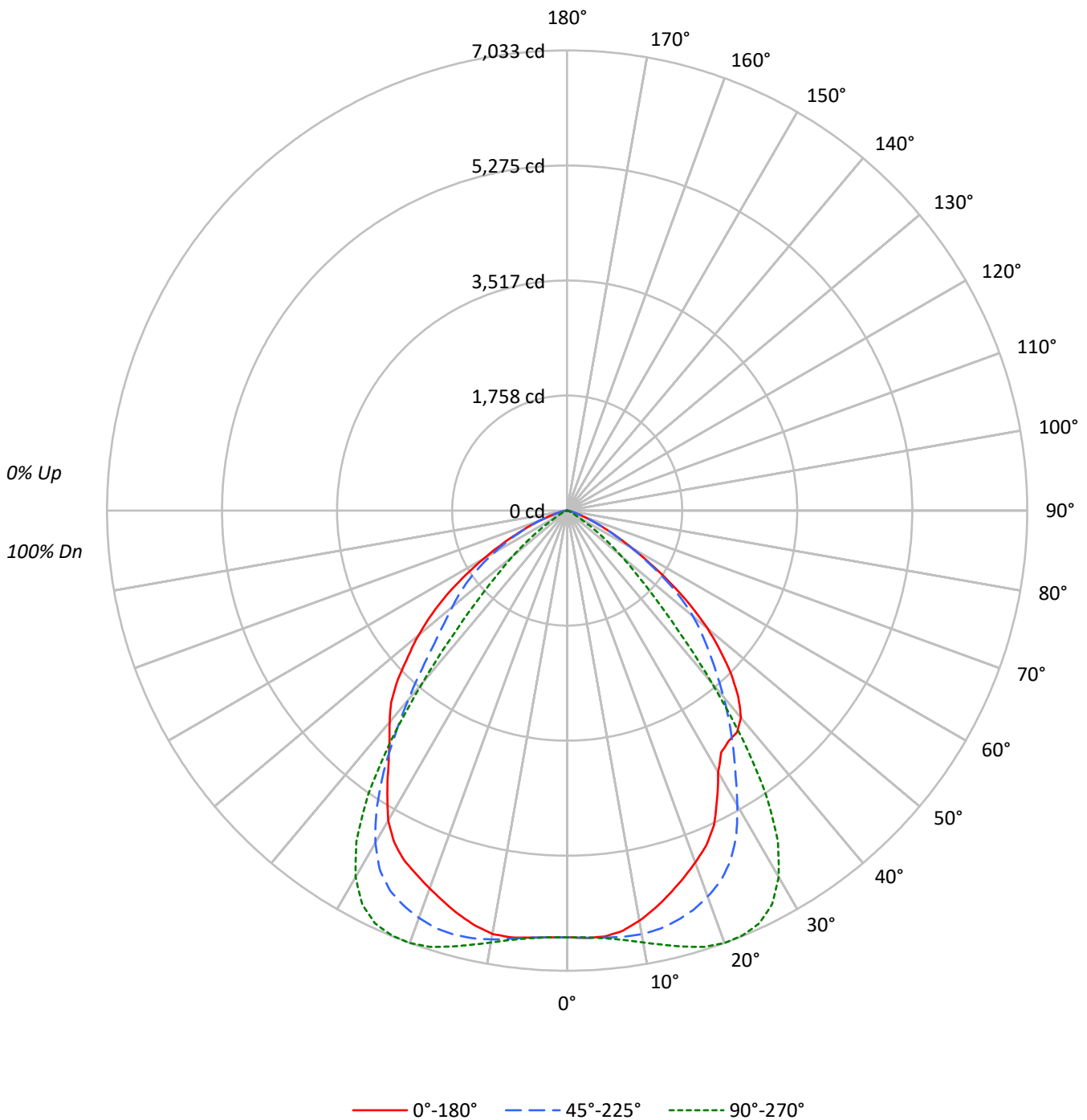
Input Watts (W): 158.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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				
RCR																								
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100	100	100	100			
1	112	108	105	102	109	106	103	100	102	99	97	98	96	94	94	93	92	90	90	90	90			
2	104	98	92	88	102	96	91	87	92	88	85	89	86	83	86	84	81	79	79	79	79			
3	97	88	82	76	94	87	81	76	84	79	74	81	77	73	79	75	72	70	70	70	70			
4	90	80	73	67	88	79	72	67	76	70	66	74	69	65	72	68	64	62	62	62	62			
5	84	73	65	60	82	72	65	59	70	63	59	68	62	58	66	61	58	56	56	56	56			
6	78	66	59	53	76	66	58	53	64	57	53	62	57	52	61	56	52	50	50	50	50			
7	73	61	53	48	71	60	53	48	59	52	48	57	52	47	56	51	47	45	45	45	45			
8	68	56	49	44	67	56	48	43	54	48	43	53	47	43	52	47	43	41	41	41	41			
9	64	52	45	40	63	51	44	40	50	44	39	49	44	39	48	43	39	38	38	38	38			
10	60	48	41	36	59	48	41	36	47	41	36	46	40	36	45	40	36	34	34	34	34			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	Luminaire represents a point source (luminous area is zero).		
5°	No luminance values can be calculated.		
10°			
15°			
20°			
25°			
30°			
35°			
40°			
45°			
50°			
55°			
60°			
65°			
70°			
75°			
80°			
85°			



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	627.1	5.0
10°-20°	1857.7	14.8
20°-30°	2834.1	22.5
30°-40°	2957.5	23.5
40°-50°	2221.4	17.7
50°-60°	1366.8	10.9
60°-70°	556.2	4.4
70°-80°	131.0	1.0
80°-90°	18.0	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°	5319.0	42.3
0°-40°	8276.4	65.8
0°-60°	11864.7	94.4
0°-90°	12570.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	12570.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	6521	6521	6521	6521	6521	
5°	6535	6552	6559	6552	6552	618
15°	6061	6486	6898	6708	6393	1707
25°	5310	5905	6957	6407	5898	2414
35°	4302	4423	5299	4898	4759	2716
45°	3551	3074	1918	2862	3662	2709
55°	1918	1821	502	1821	2246	1724
65°	599	606	76	813	862	624
75°	104	104	14	183	190	125
85°	10	10	4	24	31	15
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°	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9
2.5°	6538.2	6527.8	6538.2	6538.2	6541.7	6534.8	6538.2	6541.7	6534.8	6534.8	6534.8
5°	6534.8	6527.8	6534.8	6531.3	6538.2	6538.2	6545.2	6545.2	6552.0	6552.0	6562.5
7.5°	6479.4	6465.6	6479.4	6489.8	6496.7	6510.5	6527.8	6541.7	6555.5	6569.4	6586.7
10°	6365.1	6365.1	6375.5	6396.3	6417.0	6441.3	6472.4	6507.1	6541.7	6572.8	6604.0
12.5°	6223.3	6212.9	6233.6	6261.3	6292.5	6330.6	6379.0	6430.9	6486.3	6548.6	6597.1
15°	6060.6	6050.2	6074.4	6102.1	6140.2	6195.6	6254.4	6323.6	6403.2	6486.3	6565.9
17.5°	5894.4	5890.9	5915.2	5953.3	5984.4	6043.2	6119.4	6202.4	6292.5	6403.2	6507.1
20°	5724.9	5721.4	5745.6	5776.8	5818.3	5873.7	5949.8	6046.7	6154.0	6278.7	6399.8
22.5°	5548.3	5551.8	5572.5	5607.2	5641.8	5700.6	5780.2	5877.1	5994.8	6129.8	6264.8
25°	5309.5	5292.2	5319.9	5354.5	5413.3	5461.7	5538.0	5641.8	5762.9	5904.8	6064.1
27.5°	4963.3	4959.9	4984.2	5015.3	5067.2	5126.0	5209.1	5316.4	5444.5	5600.2	5756.0
30°	4617.2	4624.2	4634.6	4665.7	4700.3	4759.2	4842.2	4932.3	5053.4	5202.2	5368.3
32.5°	4381.9	4381.9	4395.7	4416.5	4440.7	4471.9	4530.7	4596.5	4690.0	4793.8	4914.9
35°	4302.3	4288.4	4302.3	4305.7	4309.2	4316.1	4326.5	4347.3	4378.4	4423.4	4468.4
37.5°	4267.7	4257.3	4257.3	4243.5	4226.1	4205.4	4177.7	4146.5	4111.9	4066.9	4032.3
40°	4132.7	4125.8	4118.8	4105.0	4066.9	4025.4	3980.3	3907.7	3828.1	3717.3	3606.6
42.5°	3873.1	3866.2	3862.7	3835.0	3800.4	3751.9	3700.0	3623.9	3523.5	3381.6	3222.4
45°	3551.2	3537.3	3527.0	3502.8	3478.5	3437.0	3388.5	3319.3	3218.9	3073.6	2883.2
47.5°	3177.4	3170.5	3167.0	3156.6	3132.4	3108.1	3077.0	3021.7	2931.6	2793.2	2595.9
50°	2800.1	2786.3	2793.2	2789.8	2779.4	2762.1	2741.2	2703.2	2633.9	2509.4	2329.4
52.5°	2367.4	2367.4	2364.0	2374.4	2377.8	2374.4	2377.8	2336.3	2277.5	2184.0	2031.7
55°	1917.5	1917.5	1927.9	1941.8	1955.6	1959.0	1955.6	1938.3	1896.7	1820.6	1685.6
57.5°	1495.2	1488.3	1509.1	1529.8	1543.7	1557.5	1547.1	1533.3	1509.1	1446.8	1342.9
60°	1138.7	1138.7	1152.5	1166.4	1180.2	1194.1	1190.7	1187.2	1166.4	1124.9	1041.9
62.5°	837.6	841.1	841.1	851.5	865.3	879.2	889.5	879.2	868.8	841.1	785.7
65°	598.8	595.3	598.8	609.2	619.6	633.4	640.3	636.9	626.5	605.7	564.2
67.5°	401.5	398.0	411.8	415.3	422.3	436.2	432.7	436.2	432.7	415.3	380.8
70°	263.0	256.1	263.0	259.6	270.0	273.5	280.3	283.8	280.3	270.0	259.6
72.5°	162.7	159.2	162.7	166.2	169.6	173.0	180.0	180.0	176.5	169.6	155.7
75°	103.8	93.4	96.9	90.0	96.9	96.9	103.8	107.3	103.8	103.8	96.9
77.5°	62.3	62.3	62.3	62.3	62.3	62.3	62.3	65.8	69.2	62.3	58.9
80°	31.2	31.2	34.6	34.6	34.6	38.1	34.6	34.6	34.6	38.1	27.7
82.5°	24.2	20.7	20.7	20.7	24.2	20.7	20.7	20.7	20.7	20.7	20.7
85°	10.4	13.8	10.4	6.9	10.4	10.4	13.8	10.4	10.4	10.4	13.8
87.5°	3.5	3.5	0.0	0.0	0.0	3.5	0.0	3.5	3.5	6.9	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):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9
2.5°	6538.2	6531.3	6531.3	6527.8	6534.8	6527.8	6531.3	6527.8	6527.8	6534.8	6527.8
5°	6562.5	6565.9	6559.0	6555.5	6565.9	6565.9	6565.9	6559.0	6559.0	6562.5	6559.0
7.5°	6597.1	6604.0	6607.4	6610.9	6617.8	6621.3	6621.3	6617.8	6614.4	6624.8	6610.9
10°	6635.1	6645.5	6666.3	6676.7	6694.0	6694.0	6700.9	6700.9	6694.0	6700.9	6697.4
12.5°	6621.3	6683.6	6718.2	6742.4	6766.6	6787.4	6794.3	6797.8	6794.3	6808.2	6794.3
15°	6645.5	6697.4	6752.8	6794.3	6839.3	6863.5	6870.5	6898.2	6905.1	6908.6	6887.8
17.5°	6607.4	6700.9	6759.7	6822.0	6887.8	6932.8	6974.3	6991.7	6995.1	7002.0	6974.3
20°	6520.9	6624.8	6714.7	6804.8	6880.9	6950.1	6984.7	7033.2	7019.4	7047.0	7008.9
22.5°	6403.2	6520.9	6635.1	6752.8	6832.4	6915.5	6988.2	7022.7	7040.1	7040.1	6998.5
25°	6216.3	6354.8	6479.4	6600.5	6721.7	6822.0	6905.1	6957.0	6967.4	6964.0	6915.5
27.5°	5925.6	6074.4	6219.8	6358.3	6507.1	6624.8	6721.7	6783.9	6801.3	6801.3	6749.4
30°	5524.1	5683.3	5825.2	5991.3	6143.7	6275.2	6410.2	6465.6	6496.7	6496.7	6437.9
32.5°	5046.4	5181.4	5312.9	5475.6	5641.8	5790.6	5918.6	5994.8	6032.9	6029.4	5977.5
35°	4527.3	4593.0	4693.4	4814.5	4963.3	5101.8	5226.4	5299.1	5364.9	5361.4	5312.9
37.5°	4008.0	3990.8	4001.2	4046.1	4139.6	4236.5	4333.4	4402.7	4458.0	4482.3	4471.9
40°	3499.3	3409.3	3322.7	3291.6	3298.5	3333.1	3385.1	3437.0	3499.3	3530.5	3544.3
42.5°	3042.4	2890.1	2737.8	2623.6	2557.8	2537.1	2561.3	2578.6	2616.7	2661.6	2706.7
45°	2675.5	2471.3	2270.5	2094.0	1983.3	1917.5	1903.7	1917.5	1938.3	1983.3	2042.1
47.5°	2374.4	2135.5	1910.6	1713.3	1550.6	1464.1	1439.9	1433.0	1453.7	1495.2	1574.8
50°	2107.8	1869.0	1619.9	1391.4	1221.8	1124.9	1090.3	1076.4	1100.6	1131.8	1204.5
52.5°	1817.1	1581.8	1325.7	1104.1	927.6	827.3	789.1	768.4	782.2	823.8	896.4
55°	1502.1	1284.1	1052.2	823.8	654.1	560.7	515.7	501.9	515.7	560.7	633.4
57.5°	1187.2	1003.7	809.9	595.3	443.0	349.6	304.5	290.7	328.8	346.1	422.3
60°	927.6	778.8	612.6	436.2	304.5	231.9	186.9	176.5	193.9	224.9	287.3
62.5°	695.7	602.2	470.7	311.5	224.9	148.8	124.6	114.2	124.6	148.8	197.3
65°	505.3	432.7	328.8	228.4	152.3	110.8	83.1	76.1	86.6	103.8	145.4
67.5°	346.1	290.7	228.4	159.2	103.8	69.2	58.9	58.9	62.3	76.1	107.3
70°	224.9	190.4	145.4	103.8	69.2	51.9	45.0	38.1	45.0	55.4	72.7
72.5°	141.9	121.1	93.4	72.7	51.9	38.1	31.2	27.7	34.6	41.5	55.4
75°	86.6	65.8	48.4	38.1	27.7	27.7	27.7	13.8	17.3	27.7	34.6
77.5°	51.9	45.0	38.1	31.2	24.2	13.8	13.8	13.8	17.3	20.7	31.2
80°	27.7	24.2	17.3	17.3	13.8	10.4	13.8	10.4	6.9	17.3	20.7
82.5°	17.3	13.8	13.8	13.8	17.3	6.9	10.4	6.9	10.4	13.8	10.4
85°	10.4	10.4	10.4	6.9	17.3	6.9	6.9	3.5	3.5	6.9	6.9
87.5°	0.0	3.5	3.5	0.0	3.5	0.0	3.5	3.5	3.5	3.5	3.5
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°	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9	6520.9
2.5°	6531.3	6527.8	6531.3	6527.8	6527.8	6527.8	6531.3	6531.3	6527.8	6527.8	6534.8
5°	6559.0	6559.0	6559.0	6555.5	6552.0	6552.0	6559.0	6559.0	6548.6	6559.0	6559.0
7.5°	6617.8	6607.4	6617.8	6604.0	6597.1	6600.5	6604.0	6597.1	6590.1	6593.6	6593.6
10°	6694.0	6683.6	6683.6	6673.2	6662.8	6655.9	6649.0	6631.6	6614.4	6610.9	6597.1
12.5°	6783.9	6766.6	6756.3	6735.5	6718.2	6694.0	6673.2	6645.5	6610.9	6586.7	6562.5
15°	6873.9	6846.3	6822.0	6787.4	6749.4	6707.8	6662.8	6617.8	6562.5	6514.0	6472.4
17.5°	6946.6	6908.6	6863.5	6808.2	6752.8	6690.5	6624.8	6559.0	6479.4	6417.0	6368.6
20°	6970.8	6915.5	6856.7	6783.9	6711.3	6624.8	6541.7	6455.2	6365.1	6299.4	6244.0
22.5°	6939.7	6873.9	6801.3	6725.1	6628.2	6534.8	6437.9	6337.4	6257.8	6167.9	6116.0
25°	6853.2	6773.6	6694.0	6604.0	6510.5	6406.7	6302.9	6199.0	6102.1	6053.6	5987.9
27.5°	6676.7	6590.1	6503.6	6410.2	6302.9	6199.0	6091.7	5991.3	5908.3	5842.5	5804.5
30°	6365.1	6264.8	6164.4	6064.1	5970.6	5863.3	5762.9	5679.8	5596.7	5544.8	5506.8
32.5°	5887.5	5797.5	5697.2	5600.2	5513.7	5423.7	5340.6	5268.0	5209.1	5174.5	5146.8
35°	5243.7	5153.7	5077.6	5008.4	4935.6	4897.6	4845.7	4804.1	4779.9	4766.1	4762.6
37.5°	4433.8	4381.9	4357.6	4343.8	4329.9	4319.6	4326.5	4343.8	4357.6	4381.9	4409.6
40°	3568.5	3613.5	3627.4	3675.8	3720.8	3779.6	3845.4	3921.6	3983.8	4063.4	4118.8
42.5°	2779.4	2862.4	2959.3	3063.2	3173.9	3281.2	3412.8	3533.9	3644.6	3745.0	3831.5
45°	2135.5	2263.6	2409.0	2557.8	2706.7	2862.4	3021.7	3170.5	3302.0	3409.3	3499.3
47.5°	1664.8	1806.8	1993.7	2177.1	2357.1	2540.5	2717.0	2872.8	2983.5	3087.4	3167.0
50°	1318.7	1481.4	1685.6	1896.7	2094.0	2287.8	2474.7	2620.1	2730.9	2814.0	2872.8
52.5°	1021.0	1214.9	1422.5	1644.1	1855.2	2066.3	2239.4	2374.4	2464.4	2537.1	2582.0
55°	761.4	951.8	1173.4	1401.8	1616.4	1820.6	1983.3	2101.0	2180.6	2222.1	2246.3
57.5°	550.3	723.4	944.9	1173.4	1367.2	1561.0	1692.5	1799.8	1844.8	1869.0	1879.4
60°	401.5	560.7	758.0	955.3	1138.7	1294.5	1408.7	1481.4	1516.0	1529.8	1526.4
62.5°	294.2	432.7	602.2	768.4	917.2	1045.2	1135.3	1183.7	1201.1	1207.9	1197.6
65°	224.9	332.2	477.7	605.7	719.9	813.4	879.2	910.3	920.7	917.2	910.3
67.5°	166.2	249.2	356.5	453.4	536.5	609.2	643.8	671.5	678.4	668.0	657.6
70°	117.7	183.4	259.6	325.4	387.6	429.2	467.2	470.7	470.7	467.2	460.4
72.5°	83.1	128.1	176.5	221.5	259.6	290.7	304.5	315.0	311.5	308.0	301.2
75°	55.4	79.6	128.1	138.5	173.0	183.4	197.3	197.3	200.7	190.4	190.4
77.5°	34.6	55.4	76.1	90.0	103.8	117.7	124.6	124.6	128.1	124.6	124.6
80°	20.7	34.6	41.5	62.3	62.3	72.7	76.1	79.6	72.7	83.1	72.7
82.5°	13.8	20.7	31.2	31.2	38.1	45.0	45.0	48.4	48.4	45.0	45.0
85°	10.4	13.8	17.3	20.7	20.7	24.2	20.7	20.7	24.2	27.7	24.2
87.5°	3.5	6.9	3.5	6.9	6.9	13.8	10.4	10.4	10.4	13.8	13.8
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: P248431

CATALOG NUMBER: LSR8B150D010 EC8B1509730 8LBDW0LI

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°
0°	6520.9	6520.9	6520.9	6520.9
2.5°	6527.8	6531.3	6527.8	6527.8
5°	6559.0	6555.5	6559.0	6552.0
7.5°	6583.2	6583.2	6579.7	6579.7
10°	6583.2	6569.4	6569.4	6569.4
12.5°	6531.3	6514.0	6503.6	6496.7
15°	6441.3	6410.2	6396.3	6392.8
17.5°	6323.6	6295.9	6278.7	6268.2
20°	6188.6	6160.9	6140.2	6143.7
22.5°	6070.9	6039.8	6025.9	6019.0
25°	5953.3	5915.2	5904.8	5897.9
27.5°	5762.9	5742.1	5731.7	5721.4
30°	5472.2	5461.7	5444.5	5468.7
32.5°	5136.4	5119.1	5105.3	5115.7
35°	4766.1	4755.7	4766.1	4759.2
37.5°	4426.9	4437.2	4451.1	4458.0
40°	4160.4	4198.4	4212.3	4219.2
42.5°	3893.9	3938.8	3966.5	3983.8
45°	3565.0	3610.0	3641.2	3662.0
47.5°	3225.8	3263.9	3295.0	3291.6
50°	2917.8	2938.6	2952.4	2966.3
52.5°	2606.3	2606.3	2609.7	2609.7
55°	2253.3	2246.3	2242.8	2246.3
57.5°	1865.6	1858.7	1855.2	1844.8
60°	1512.6	1491.8	1477.9	1477.9
62.5°	1183.7	1159.5	1149.2	1145.7
65°	889.5	886.0	865.3	861.8
67.5°	643.8	629.9	616.1	619.6
70°	453.4	432.7	432.7	425.7
72.5°	294.2	283.8	280.3	280.3
75°	183.4	183.4	176.5	190.4
77.5°	121.1	121.1	117.7	121.1
80°	72.7	72.7	72.7	69.2
82.5°	45.0	48.4	45.0	45.0
85°	24.2	27.7	20.7	31.2
87.5°	13.8	17.3	13.8	17.3
90°	0.0	0.0	0.0	0.0

(END OF REPORT)