

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: P249230

Luminaire Tested: **LSR8B100D010 EC8B100850 8LBDW0WMH**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P249230
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P13957)
Test Lab: INNOVATION CENTER-P1
Issue Date: 03/03/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LSR8B100D010 EC8B100850 8LBDW0WMH
Description: PORTFOLIO 8 INCH DOUBLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF
RECESSED DOWNLIGHT- CYLINDEC
80 CRI 5000 CCT WITH WARM HAZE TRIM
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 11114.0 lumens
Efficiency: N/A
Efficacy: 104.6 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.26 / 1.18
Luminous Opening: Circular (Dia: 0.67' x H: 0')
CIE Type: Direct

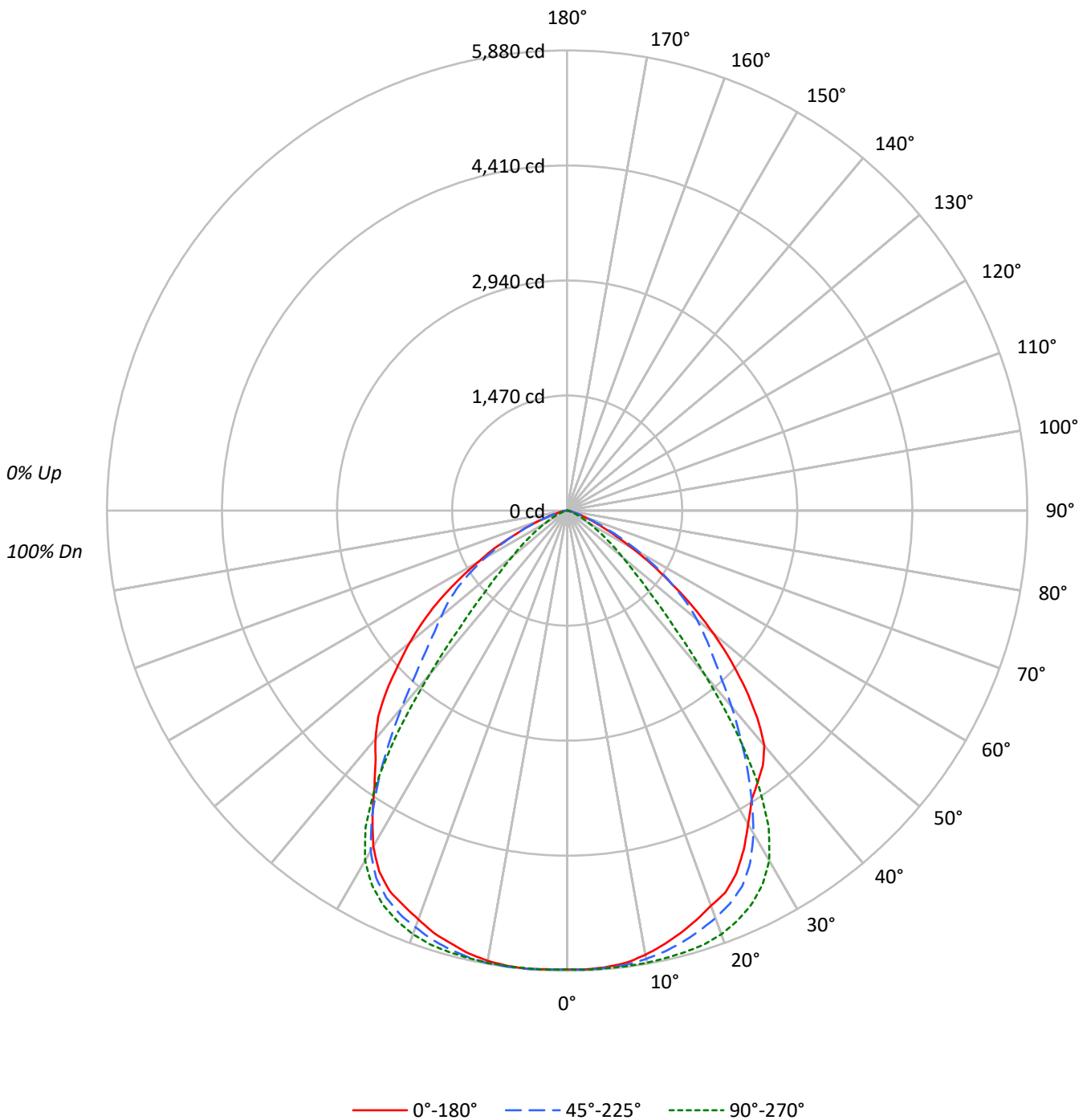
Input Watts (W): 106.3
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	108	105	102	109	106	103	100	102	99	97	98	96	94	94	93	91	90					90			
2	104	97	92	88	101	96	91	87	92	88	85	89	86	83	86	83	81	79					79			
3	96	88	81	76	94	86	80	75	84	78	74	81	77	73	79	75	72	70					70			
4	89	80	72	67	87	78	72	66	76	70	66	74	69	65	72	67	64	62					62			
5	83	72	65	59	81	71	64	59	69	63	58	68	62	58	66	61	57	55					55			
6	78	66	58	53	76	65	58	53	64	57	52	62	56	52	61	55	51	50					50			
7	72	61	53	48	71	60	53	48	59	52	47	57	51	47	56	51	47	45					45			
8	68	56	48	43	66	55	48	43	54	48	43	53	47	43	52	46	42	41					41			
9	64	52	44	39	62	51	44	39	50	44	39	49	43	39	48	43	39	37					37			
10	60	48	41	36	59	48	41	36	47	40	36	46	40	36	45	40	36	34					34			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	180824	180824	180824
5°	181221	181710	181905
10°	180457	183711	182922
15°	178459	186398	182880
20°	176317	189020	182411
25°	174027	189235	182597
30°	164638	183916	176406
35°	159724	159841	161501
40°	157747	109978	153311
45°	140557	66024	142480
50°	116876	43943	125933
55°	87653	30295	106776
60°	59403	20185	80563
65°	35833	13090	55344
70°	19862	7096	34053
75°	9007	3002	17621
80°	7831	3356	12288
85°	8916	4458	12277



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	559.6	5.0
10°-20°	1625.3	14.6
20°-30°	2466.8	22.2
30°-40°	2590.9	23.3
40°-50°	1942.5	17.5
50°-60°	1246.3	11.2
60°-70°	533.2	4.8
70°-80°	126.0	1.1
80°-90°	23.4	0.2
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°	4651.7	41.9
0°-40°	7242.6	65.2
0°-60°	10431.4	93.9
0°-90°	11114.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	11114.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	5864	5864	5864	5864	5864	
5°	5854	5864	5870	5880	5877	556
15°	5590	5707	5839	5801	5729	1577
25°	5115	5294	5562	5461	5367	2337
35°	4243	4007	4246	4196	4290	2663
45°	3223	2634	1514	2559	3267	2468
55°	1630	1630	564	1700	1986	1479
65°	491	579	179	746	758	524
75°	76	88	25	151	148	110
85°	25	16	13	25	35	27
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°	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0
2.5°	5867.1	5873.4	5870.3	5870.3	5867.1	5870.3	5870.3	5876.6	5876.6	5870.3	5867.1
5°	5854.5	5860.8	5860.8	5854.5	5854.5	5870.3	5860.8	5867.1	5867.1	5864.0	5864.0
7.5°	5826.2	5826.2	5838.8	5829.4	5829.4	5838.8	5835.6	5841.9	5848.3	5851.4	5851.4
10°	5763.2	5769.5	5772.7	5772.7	5775.9	5785.3	5791.6	5804.2	5810.4	5816.8	5819.9
12.5°	5684.6	5694.0	5697.1	5694.0	5703.5	5716.0	5731.8	5747.5	5757.0	5769.5	5779.0
15°	5590.1	5590.1	5596.4	5605.9	5612.2	5631.1	5646.8	5665.6	5690.8	5706.6	5722.3
17.5°	5486.3	5492.6	5502.0	5502.0	5514.6	5546.0	5555.5	5583.9	5612.2	5627.9	5659.4
20°	5373.0	5379.2	5388.7	5395.0	5410.7	5435.9	5454.8	5480.0	5511.5	5539.8	5571.2
22.5°	5284.8	5272.2	5278.5	5284.8	5300.6	5322.6	5344.6	5376.1	5407.6	5435.9	5467.4
25°	5114.8	5118.0	5127.5	5133.7	5152.6	5171.5	5196.7	5234.4	5262.8	5294.3	5328.9
27.5°	4885.1	4888.2	4904.0	4904.0	4919.7	4951.2	4966.9	4998.4	5036.2	5067.6	5108.6
30°	4623.8	4630.1	4630.1	4642.7	4652.1	4667.9	4683.6	4715.1	4734.0	4762.3	4819.0
32.5°	4384.6	4390.9	4387.7	4384.6	4375.2	4372.0	4368.8	4375.2	4381.5	4390.9	4412.9
35°	4243.0	4227.2	4214.7	4192.6	4167.4	4135.9	4107.6	4069.9	4035.2	4006.9	3975.4
37.5°	4107.6	4104.4	4085.6	4054.1	4003.7	3947.1	3881.0	3799.2	3717.3	3629.2	3544.2
40°	3918.8	3909.3	3893.6	3849.5	3792.8	3723.6	3635.5	3534.8	3402.5	3267.2	3128.7
42.5°	3597.7	3600.8	3582.0	3547.3	3493.9	3427.7	3336.4	3226.3	3084.7	2924.1	2744.7
45°	3223.1	3223.1	3216.8	3188.5	3150.7	3097.2	3028.0	2936.7	2798.2	2634.5	2442.5
47.5°	2832.8	2836.0	2826.5	2820.3	2804.5	2769.9	2719.5	2650.3	2552.7	2395.3	2203.3
50°	2436.3	2436.3	2452.0	2448.8	2448.8	2436.3	2414.2	2373.3	2288.3	2162.4	1983.0
52.5°	2039.6	2045.9	2055.4	2068.0	2083.7	2108.9	2083.7	2064.8	2011.3	1913.7	1759.5
55°	1630.4	1636.8	1652.5	1674.5	1693.4	1718.6	1724.9	1724.9	1696.5	1630.4	1514.0
57.5°	1281.1	1271.6	1284.2	1303.1	1328.3	1353.5	1372.4	1394.4	1391.2	1347.2	1252.8
60°	963.2	966.3	975.7	994.7	1013.5	1035.6	1060.7	1079.6	1089.1	1067.1	1007.2
62.5°	701.9	701.9	714.5	733.4	742.8	774.3	790.0	799.5	808.9	805.7	768.0
65°	491.1	497.3	503.6	513.1	522.5	541.4	550.8	569.7	576.0	579.2	550.8
67.5°	346.3	336.8	343.1	349.3	358.8	371.4	390.3	390.3	399.7	399.7	380.8
70°	220.3	220.3	223.5	232.9	239.2	242.4	248.7	254.9	264.4	261.2	261.2
72.5°	147.9	144.8	147.9	151.1	154.3	163.7	163.7	166.8	173.1	176.3	163.7
75°	75.6	78.7	85.0	81.9	91.3	85.0	88.1	97.6	94.4	88.1	88.1
77.5°	62.9	62.9	62.9	59.8	66.1	66.1	62.9	69.2	66.1	66.1	62.9
80°	44.1	47.2	44.1	40.9	44.1	40.9	40.9	40.9	40.9	40.9	37.7
82.5°	34.7	28.3	31.5	28.3	31.5	31.5	28.3	25.2	25.2	28.3	25.2
85°	25.2	18.9	22.0	22.0	18.9	18.9	18.9	18.9	18.9	15.7	15.7
87.5°	15.7	9.5	9.5	9.5	12.6	12.6	12.6	9.5	12.6	12.6	6.3
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°	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0
2.5°	5873.4	5870.3	5876.6	5873.4	5873.4	5870.3	5873.4	5870.3	5876.6	5864.0	5867.1
5°	5873.4	5867.1	5870.3	5873.4	5876.6	5870.3	5870.3	5870.3	5876.6	5870.3	5873.4
7.5°	5860.8	5857.7	5867.1	5873.4	5870.3	5867.1	5873.4	5870.3	5876.6	5873.4	5879.7
10°	5835.6	5838.8	5845.1	5854.5	5857.7	5860.8	5867.1	5867.1	5876.6	5864.0	5870.3
12.5°	5797.9	5810.4	5826.2	5832.5	5845.1	5845.1	5851.4	5854.5	5860.8	5857.7	5867.1
15°	5750.7	5766.4	5785.3	5801.0	5816.8	5826.2	5835.6	5838.8	5848.3	5838.8	5841.9
17.5°	5694.0	5712.9	5741.2	5760.1	5785.3	5794.7	5807.3	5813.6	5823.1	5816.8	5819.9
20°	5615.3	5637.4	5668.8	5697.1	5712.9	5734.9	5750.7	5760.1	5766.4	5760.1	5763.2
22.5°	5505.1	5536.6	5577.5	5599.6	5631.1	5649.9	5653.1	5675.1	5690.8	5675.1	5681.4
25°	5376.1	5407.6	5439.1	5486.3	5514.6	5536.6	5558.7	5561.8	5577.5	5574.4	5571.2
27.5°	5162.0	5203.0	5256.5	5294.3	5332.0	5366.7	5391.9	5398.1	5413.9	5407.6	5410.7
30°	4869.3	4913.4	4963.8	5023.6	5077.1	5111.7	5143.2	5165.2	5180.9	5171.5	5168.4
32.5°	4453.9	4497.9	4551.4	4611.2	4674.2	4724.5	4762.3	4790.7	4809.5	4803.2	4787.5
35°	3978.6	3991.2	4025.8	4073.0	4126.5	4180.0	4214.7	4246.1	4268.1	4274.4	4274.4
37.5°	3490.7	3449.8	3424.6	3424.6	3456.0	3478.1	3509.6	3528.4	3563.1	3575.6	3585.1
40°	3018.5	2924.1	2836.0	2769.9	2725.8	2722.7	2722.7	2732.1	2763.6	2804.5	2842.3
42.5°	2596.8	2445.7	2310.3	2187.6	2099.5	2049.1	2027.1	2030.2	2055.4	2093.2	2156.1
45°	2260.0	2071.1	1901.2	1753.2	1633.6	1554.9	1517.1	1514.0	1532.9	1576.9	1646.2
47.5°	1998.7	1797.3	1605.3	1435.3	1306.3	1221.3	1177.2	1164.6	1177.2	1218.1	1300.0
50°	1781.5	1573.8	1375.5	1199.2	1060.7	972.6	931.7	916.0	931.7	966.3	1048.1
52.5°	1580.1	1366.0	1180.4	1010.4	862.4	786.9	742.8	733.4	742.8	783.7	849.9
55°	1347.2	1164.6	982.0	812.1	683.1	607.5	572.8	563.5	572.8	610.7	679.9
57.5°	1117.4	960.0	799.5	645.2	535.1	469.0	437.5	424.9	446.9	472.1	554.0
60°	903.3	777.5	642.1	506.8	415.5	355.7	330.5	327.3	333.6	365.1	421.7
62.5°	708.2	604.3	497.3	387.2	311.6	286.4	254.9	251.8	258.1	277.0	321.1
65°	509.9	443.8	362.0	283.3	223.5	188.8	176.3	179.4	185.7	198.3	239.2
67.5°	355.7	308.5	251.8	198.3	154.3	138.5	125.9	122.8	125.9	147.9	170.0
70°	239.2	210.9	170.0	151.1	107.1	85.0	88.1	78.7	91.3	91.3	110.1
72.5°	157.3	138.5	113.3	88.1	75.6	59.8	59.8	56.7	62.9	66.1	81.9
75°	81.9	62.9	62.9	44.1	31.5	15.7	28.3	25.2	22.0	25.2	31.5
77.5°	56.7	47.2	44.1	34.7	31.5	25.2	25.2	25.2	25.2	28.3	31.5
80°	34.7	34.7	25.2	22.0	18.9	15.7	18.9	18.9	18.9	18.9	22.0
82.5°	22.0	18.9	18.9	15.7	15.7	12.6	12.6	12.6	12.6	12.6	18.9
85°	18.9	12.6	12.6	9.5	12.6	22.0	9.5	12.6	12.6	12.6	9.5
87.5°	6.3	9.5	9.5	9.5	6.3	3.2	6.3	9.5	9.5	15.7	12.6
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°	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0	5864.0
2.5°	5873.4	5876.6	5876.6	5873.4	5873.4	5867.1	5879.7	5870.3	5873.4	5886.0	5876.6
5°	5879.7	5882.8	5882.8	5879.7	5879.7	5879.7	5882.8	5882.8	5879.7	5876.6	5882.8
7.5°	5892.3	5889.1	5889.1	5882.8	5882.8	5876.6	5882.8	5873.4	5879.7	5873.4	5882.8
10°	5876.6	5879.7	5876.6	5873.4	5873.4	5870.3	5870.3	5860.8	5864.0	5854.5	5860.8
12.5°	5867.1	5864.0	5864.0	5857.7	5851.4	5845.1	5841.9	5832.5	5832.5	5810.4	5819.9
15°	5841.9	5845.1	5835.6	5823.1	5816.8	5801.0	5794.7	5782.1	5769.5	5753.8	5757.0
17.5°	5819.9	5810.4	5797.9	5785.3	5760.1	5747.5	5734.9	5716.0	5709.7	5690.8	5684.6
20°	5753.8	5747.5	5731.8	5709.7	5694.0	5665.6	5653.1	5634.2	5618.4	5599.6	5590.1
22.5°	5668.8	5662.5	5643.6	5621.6	5596.4	5583.9	5571.2	5536.6	5520.9	5502.0	5498.8
25°	5561.8	5552.4	5533.5	5508.3	5495.7	5461.1	5448.5	5423.3	5417.0	5398.1	5395.0
27.5°	5398.1	5385.5	5363.5	5332.0	5310.0	5288.0	5275.4	5256.5	5250.2	5231.3	5228.2
30°	5152.6	5136.9	5092.8	5080.2	5042.4	5020.4	5020.4	4995.2	4998.4	4985.8	4985.8
32.5°	4765.5	4740.3	4705.6	4680.5	4655.3	4642.7	4642.7	4633.2	4639.6	4639.6	4645.9
35°	4252.4	4217.8	4198.9	4183.2	4183.2	4195.7	4233.5	4243.0	4261.9	4277.6	4290.2
37.5°	3594.5	3591.4	3613.5	3632.3	3679.5	3733.1	3799.2	3855.8	3909.3	3947.1	3984.8
40°	2883.2	2961.9	3024.8	3113.0	3185.3	3289.2	3408.8	3506.4	3597.7	3663.8	3733.1
42.5°	2250.5	2351.2	2483.5	2612.5	2741.6	2883.2	3040.6	3175.9	3295.5	3386.8	3459.2
45°	1753.2	1891.7	2052.3	2215.9	2382.7	2559.0	2722.7	2861.2	2987.1	3081.5	3153.9
47.5°	1413.3	1564.4	1746.9	1926.3	2115.2	2300.9	2483.5	2603.1	2706.9	2782.5	2848.6
50°	1167.7	1328.3	1520.3	1724.9	1913.7	2099.5	2256.8	2373.3	2458.3	2524.4	2565.3
52.5°	975.7	1145.7	1350.3	1554.9	1743.7	1913.7	2055.4	2143.5	2212.8	2260.0	2297.7
55°	805.7	969.5	1161.5	1353.5	1539.2	1699.7	1816.1	1882.3	1935.7	1964.1	1986.1
57.5°	657.9	808.9	985.2	1161.5	1322.0	1454.2	1545.5	1611.6	1636.8	1658.8	1655.6
60°	516.2	657.9	818.4	969.5	1108.0	1214.9	1281.1	1318.8	1337.7	1347.2	1340.9
62.5°	406.0	535.1	657.9	790.0	890.8	982.0	1045.0	1045.0	1054.4	1057.6	1067.1
65°	302.1	399.7	506.8	604.3	686.1	746.0	780.6	790.0	802.7	799.5	793.2
67.5°	223.5	295.9	374.5	446.9	503.6	541.4	566.5	588.6	585.5	579.2	576.0
70°	154.3	201.5	270.7	314.8	355.7	393.5	399.7	402.9	406.0	409.2	402.9
72.5°	107.1	141.6	179.4	217.2	242.4	258.1	273.9	277.0	277.0	277.0	273.9
75°	53.5	72.4	107.1	122.8	144.8	151.1	163.7	163.7	173.1	160.5	157.3
77.5°	47.2	56.7	75.6	88.1	97.6	107.1	110.1	119.6	116.4	110.1	113.3
80°	28.3	34.7	47.2	53.5	66.1	69.2	72.4	75.6	72.4	75.6	75.6
82.5°	22.0	25.2	31.5	31.5	40.9	40.9	44.1	44.1	47.2	47.2	47.2
85°	12.6	22.0	18.9	37.7	25.2	25.2	31.5	37.7	31.5	31.5	37.7
87.5°	12.6	12.6	9.5	12.6	12.6	12.6	15.7	18.9	18.9	22.0	18.9
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: P249230

CATALOG NUMBER: LSR8B100D010 EC8B100850 8LBDW0WMH

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°
0°	5864.0	5864.0	5864.0	5864.0
2.5°	5873.4	5879.7	5870.3	5867.1
5°	5882.8	5882.8	5876.6	5876.6
7.5°	5882.8	5882.8	5873.4	5867.1
10°	5857.7	5857.7	5848.3	5841.9
12.5°	5810.4	5810.4	5807.3	5797.9
15°	5750.7	5750.7	5738.0	5728.6
17.5°	5668.8	5675.1	5659.4	5659.4
20°	5580.7	5577.5	5565.0	5558.7
22.5°	5489.4	5483.1	5480.0	5461.1
25°	5391.9	5385.5	5376.1	5366.7
27.5°	5225.0	5221.9	5212.4	5199.8
30°	4970.0	4966.9	4954.3	4954.3
32.5°	4639.6	4636.4	4623.8	4627.0
35°	4296.4	4309.1	4302.8	4290.2
37.5°	4010.0	4019.5	4025.8	4019.5
40°	3770.8	3799.2	3802.3	3808.6
42.5°	3515.9	3553.6	3566.3	3572.5
45°	3210.5	3245.2	3273.5	3267.2
47.5°	2898.9	2924.1	2949.3	2930.4
50°	2599.9	2615.6	2625.1	2625.1
52.5°	2316.7	2316.7	2313.5	2316.7
55°	1992.4	1992.4	1979.9	1986.1
57.5°	1652.5	1658.8	1649.3	1633.6
60°	1337.7	1322.0	1315.7	1306.3
62.5°	1041.9	1041.9	1019.9	1048.1
65°	780.6	771.2	761.7	758.5
67.5°	566.5	563.5	554.0	550.8
70°	399.7	387.2	384.0	377.7
72.5°	267.6	267.6	261.2	261.2
75°	163.7	147.9	144.8	147.9
77.5°	113.3	110.1	110.1	107.1
80°	75.6	72.4	78.7	69.2
82.5°	47.2	50.4	47.2	50.4
85°	31.5	37.7	34.7	34.7
87.5°	18.9	18.9	18.9	18.9
90°	0.0	0.0	0.0	0.0

(END OF REPORT)