

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: P249520

Luminaire Tested: **LSR8B150D010 EC8B150827 8LBDW0MW**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P249520
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: LSR8B150D010 EC8B150827 8LBDW0MW
Description: PORTFOLIO 8 INCH DOUBLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF
RECESSED DOWNLIGHT- CYLINDEC
80 CRI 2700 CCT WITH MATTE WHITE TRIM
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 15273.0 lumens
Efficiency: N/A
Efficacy: 96.4 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

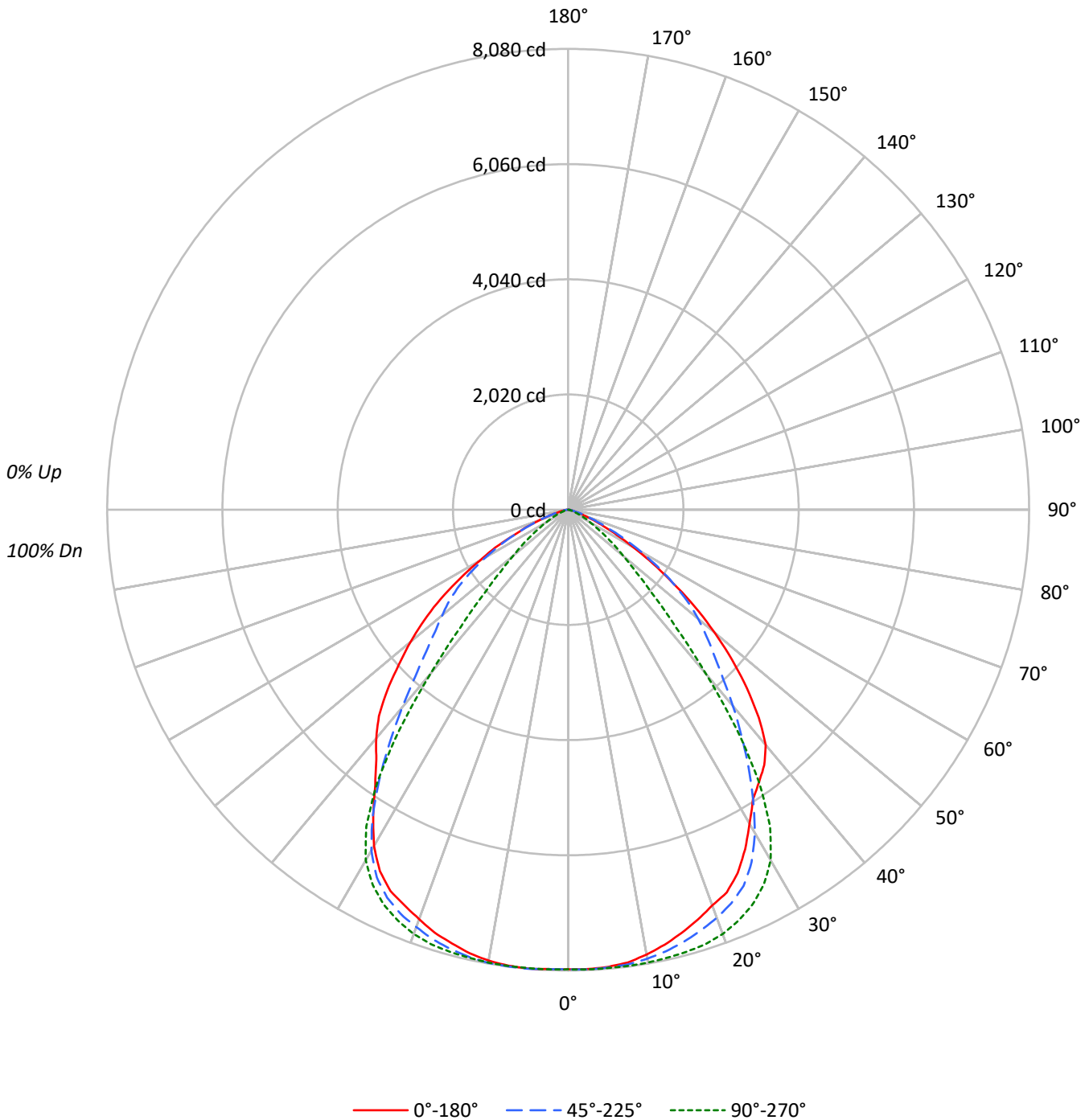
Input Watts (W): 158.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	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°	248488	248488	248488
5°	249035	249707	249976
10°	247988	252459	251376
15°	245241	256149	251319
20°	242295	259753	250670
25°	239152	260050	250924
30°	226249	252740	242421
35°	219496	219654	221939
40°	216776	151133	210685
45°	193158	90729	195796
50°	160608	60383	173062
55°	120458	41628	146731
60°	81630	27740	110709
65°	49237	17993	76059
70°	27300	9755	46793
75°	12367	4122	24222
80°	10744	4599	16888
85°	12242	6121	16841



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	769.1	5.0
10°-20°	2233.4	14.6
20°-30°	3389.9	22.2
30°-40°	3560.5	23.3
40°-50°	2669.4	17.5
50°-60°	1712.7	11.2
60°-70°	732.7	4.8
70°-80°	173.1	1.1
80°-90°	32.2	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°	6392.4	41.9
0°-40°	9952.9	65.2
0°-60°	14335.0	93.9
0°-90°	15273.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	15273.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	8058	8058	8058	8058	8058	
5°	8045	8058	8067	8080	8076	764
15°	7682	7842	8024	7972	7872	2167
25°	7029	7276	7643	7505	7375	3211
35°	5831	5506	5835	5766	5896	3659
45°	4429	3620	2080	3517	4490	3392
55°	2241	2241	774	2336	2729	2032
65°	675	796	247	1025	1042	720
75°	104	121	35	208	203	151
85°	35	22	17	35	48	36
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°	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3
2.5°	8062.7	8071.4	8067.0	8067.0	8062.7	8067.0	8067.0	8075.7	8075.7	8067.0	8062.7
5°	8045.3	8054.0	8054.0	8045.3	8045.3	8067.0	8054.0	8062.7	8062.7	8058.3	8058.3
7.5°	8006.5	8006.5	8023.7	8010.8	8010.8	8023.7	8019.4	8028.1	8036.7	8041.1	8041.1
10°	7919.9	7928.6	7932.9	7932.9	7937.3	7950.2	7958.8	7976.2	7984.8	7993.5	7997.8
12.5°	7811.8	7824.8	7829.1	7824.8	7837.8	7855.0	7876.7	7898.3	7911.3	7928.6	7941.6
15°	7682.0	7682.0	7690.7	7703.7	7712.4	7738.3	7759.9	7785.8	7820.4	7842.1	7863.7
17.5°	7539.3	7548.0	7560.9	7560.9	7578.3	7621.4	7634.5	7673.4	7712.4	7733.9	7777.2
20°	7383.6	7392.2	7405.2	7413.9	7435.5	7470.1	7496.0	7530.6	7573.9	7612.9	7656.0
22.5°	7262.4	7245.2	7253.8	7262.4	7284.1	7314.4	7344.7	7387.9	7431.1	7470.1	7513.4
25°	7028.9	7033.2	7046.2	7054.8	7080.8	7106.8	7141.4	7193.2	7232.2	7275.5	7323.0
27.5°	6713.1	6717.5	6739.1	6739.1	6760.7	6804.0	6825.5	6868.8	6920.8	6964.0	7020.3
30°	6354.1	6362.7	6362.7	6380.1	6393.0	6414.7	6436.3	6479.6	6505.5	6544.4	6622.3
32.5°	6025.4	6034.0	6029.7	6025.4	6012.4	6008.1	6003.7	6012.4	6021.1	6034.0	6064.3
35°	5830.8	5809.1	5791.8	5761.6	5727.0	5683.7	5644.7	5592.9	5545.2	5506.3	5463.1
37.5°	5644.7	5640.4	5614.4	5571.2	5501.9	5424.2	5333.3	5220.8	5108.3	4987.3	4870.5
40°	5385.2	5372.2	5350.6	5290.1	5212.2	5117.0	4995.9	4857.5	4675.8	4489.8	4299.5
42.5°	4944.0	4948.3	4922.4	4874.8	4801.3	4710.4	4585.0	4433.6	4239.0	4018.3	3771.8
45°	4429.3	4429.3	4420.6	4381.7	4329.8	4256.2	4161.1	4035.7	3845.4	3620.4	3356.5
47.5°	3892.9	3897.2	3884.2	3875.6	3854.0	3806.4	3737.2	3642.1	3508.0	3291.6	3027.8
50°	3347.9	3347.9	3369.5	3365.2	3365.2	3347.9	3317.7	3261.4	3144.6	2971.6	2725.1
52.5°	2802.9	2811.6	2824.6	2841.8	2863.4	2898.0	2863.4	2837.5	2763.9	2629.8	2418.0
55°	2240.6	2249.3	2270.8	2301.1	2327.1	2361.8	2370.3	2370.3	2331.4	2240.6	2080.5
57.5°	1760.5	1747.5	1764.8	1790.8	1825.4	1860.0	1885.9	1916.2	1911.8	1851.3	1721.5
60°	1323.6	1327.9	1340.9	1366.9	1392.8	1423.1	1457.7	1483.6	1496.6	1466.4	1384.1
62.5°	964.6	964.6	981.9	1007.8	1020.8	1064.1	1085.7	1098.7	1111.6	1107.3	1055.4
65°	674.8	683.4	692.1	705.1	718.0	743.9	756.9	782.9	791.6	795.9	756.9
67.5°	475.8	462.8	471.5	480.1	493.1	510.5	536.4	536.4	549.3	549.3	523.4
70°	302.8	302.8	307.1	320.1	328.7	333.1	341.7	350.3	363.3	359.0	359.0
72.5°	203.3	199.0	203.3	207.7	212.0	224.9	224.9	229.2	237.9	242.3	224.9
75°	103.8	108.2	116.7	112.5	125.4	116.7	121.1	134.1	129.8	121.1	121.1
77.5°	86.5	86.5	86.5	82.2	90.8	90.8	86.5	95.1	90.8	90.8	86.5
80°	60.5	64.9	60.5	56.2	60.5	56.2	56.2	56.2	56.2	56.2	51.9
82.5°	47.6	38.9	43.3	38.9	43.3	43.3	38.9	34.6	34.6	38.9	34.6
85°	34.6	25.9	30.3	30.3	25.9	25.9	25.9	25.9	25.9	21.6	21.6
87.5°	21.6	13.0	13.0	13.0	17.3	17.3	17.3	13.0	17.3	17.3	8.7
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°	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3
2.5°	8071.4	8067.0	8075.7	8071.4	8071.4	8067.0	8071.4	8067.0	8075.7	8058.3	8062.7
5°	8071.4	8062.7	8067.0	8071.4	8075.7	8067.0	8067.0	8067.0	8075.7	8067.0	8071.4
7.5°	8054.0	8049.7	8062.7	8071.4	8067.0	8062.7	8071.4	8067.0	8075.7	8071.4	8079.9
10°	8019.4	8023.7	8032.4	8045.3	8049.7	8054.0	8062.7	8062.7	8075.7	8058.3	8067.0
12.5°	7967.5	7984.8	8006.5	8015.0	8032.4	8032.4	8041.1	8045.3	8054.0	8049.7	8062.7
15°	7902.6	7924.2	7950.2	7971.9	7993.5	8006.5	8019.4	8023.7	8036.7	8023.7	8028.1
17.5°	7824.8	7850.7	7889.6	7915.6	7950.2	7963.2	7980.4	7989.1	8002.1	7993.5	7997.8
20°	7716.6	7747.0	7790.1	7829.1	7850.7	7881.0	7902.6	7915.6	7924.2	7915.6	7919.9
22.5°	7565.2	7608.5	7664.7	7695.0	7738.3	7764.2	7768.6	7798.8	7820.4	7798.8	7807.5
25°	7387.9	7431.1	7474.4	7539.3	7578.3	7608.5	7638.8	7643.1	7664.7	7660.4	7656.0
27.5°	7093.7	7150.0	7223.5	7275.5	7327.3	7374.9	7409.6	7418.1	7439.8	7431.1	7435.5
30°	6691.5	6752.1	6821.3	6903.4	6977.0	7024.5	7067.8	7098.1	7119.7	7106.8	7102.4
32.5°	6120.6	6181.1	6254.7	6336.8	6423.4	6492.5	6544.4	6583.4	6609.3	6600.6	6579.0
35°	5467.4	5484.7	5532.3	5597.2	5670.7	5744.2	5791.8	5835.0	5865.3	5874.0	5874.0
37.5°	4797.0	4740.8	4706.2	4706.2	4749.3	4779.6	4822.9	4848.8	4896.4	4913.7	4926.7
40°	4148.1	4018.3	3897.2	3806.4	3745.9	3741.6	3741.6	3754.5	3797.8	3854.0	3905.9
42.5°	3568.5	3360.9	3174.9	3006.2	2885.1	2815.9	2785.6	2790.0	2824.6	2876.4	2962.9
45°	3105.7	2846.2	2612.6	2409.3	2244.9	2136.7	2084.9	2080.5	2106.5	2167.0	2262.3
47.5°	2746.7	2469.8	2206.0	1972.4	1795.1	1678.3	1617.7	1600.5	1617.7	1673.9	1786.4
50°	2448.2	2162.8	1890.3	1648.0	1457.7	1336.6	1280.3	1258.7	1280.3	1327.9	1440.3
52.5°	2171.4	1877.2	1622.1	1388.5	1185.2	1081.3	1020.8	1007.8	1020.8	1077.0	1167.9
55°	1851.3	1600.5	1349.5	1115.9	938.7	834.8	787.2	774.3	787.2	839.2	934.3
57.5°	1535.6	1319.3	1098.7	886.7	735.4	644.4	601.3	583.9	614.2	648.8	761.3
60°	1241.4	1068.4	882.4	696.4	571.0	488.8	454.1	449.8	458.5	501.8	579.6
62.5°	973.3	830.5	683.4	532.0	428.2	393.6	350.3	346.1	354.7	380.6	441.2
65°	700.7	609.9	497.4	389.3	307.1	259.5	242.3	246.6	255.2	272.5	328.7
67.5°	488.8	423.9	346.1	272.5	212.0	190.3	173.0	168.7	173.0	203.3	233.6
70°	328.7	289.8	233.6	207.7	147.1	116.7	121.1	108.2	125.4	125.4	151.3
72.5°	216.2	190.3	155.7	121.1	103.8	82.2	82.2	77.9	86.5	90.8	112.5
75°	112.5	86.5	86.5	60.5	43.3	21.6	38.9	34.6	30.3	34.6	43.3
77.5°	77.9	64.9	60.5	47.6	43.3	34.6	34.6	34.6	34.6	38.9	43.3
80°	47.6	47.6	34.6	30.3	25.9	21.6	25.9	25.9	25.9	25.9	30.3
82.5°	30.3	25.9	25.9	21.6	21.6	17.3	17.3	17.3	17.3	17.3	25.9
85°	25.9	17.3	17.3	13.0	17.3	30.3	13.0	17.3	17.3	17.3	13.0
87.5°	8.7	13.0	13.0	13.0	8.7	4.3	8.7	13.0	13.0	21.6	17.3
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):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3	8058.3
2.5°	8071.4	8075.7	8075.7	8071.4	8071.4	8062.7	8079.9	8067.0	8071.4	8088.6	8075.7
5°	8079.9	8084.3	8084.3	8079.9	8079.9	8079.9	8084.3	8084.3	8079.9	8075.7	8084.3
7.5°	8097.3	8092.9	8092.9	8084.3	8084.3	8075.7	8084.3	8071.4	8079.9	8071.4	8084.3
10°	8075.7	8079.9	8075.7	8071.4	8071.4	8067.0	8067.0	8054.0	8058.3	8045.3	8054.0
12.5°	8062.7	8058.3	8058.3	8049.7	8041.1	8032.4	8028.1	8015.0	8015.0	7984.8	7997.8
15°	8028.1	8032.4	8019.4	8002.1	7993.5	7971.9	7963.2	7945.8	7928.6	7907.0	7911.3
17.5°	7997.8	7984.8	7967.5	7950.2	7915.6	7898.3	7881.0	7855.0	7846.3	7820.4	7811.8
20°	7907.0	7898.3	7876.7	7846.3	7824.8	7785.8	7768.6	7742.6	7720.9	7695.0	7682.0
22.5°	7790.1	7781.5	7755.5	7725.3	7690.7	7673.4	7656.0	7608.5	7586.8	7560.9	7556.6
25°	7643.1	7630.1	7604.2	7569.6	7552.2	7504.7	7487.3	7452.7	7444.2	7418.1	7413.9
27.5°	7418.1	7400.9	7370.6	7327.3	7297.0	7266.8	7249.5	7223.5	7214.9	7188.9	7184.6
30°	7080.8	7059.1	6998.6	6981.3	6929.4	6899.1	6899.1	6864.5	6868.8	6851.6	6851.6
32.5°	6548.8	6514.2	6466.5	6431.9	6397.3	6380.1	6380.1	6367.1	6375.7	6375.7	6384.4
35°	5843.7	5796.2	5770.1	5748.5	5748.5	5765.8	5817.8	5830.8	5856.7	5878.3	5895.7
37.5°	4939.6	4935.4	4965.7	4991.6	5056.5	5130.0	5220.8	5298.7	5372.2	5424.2	5476.0
40°	3962.1	4070.3	4156.8	4277.9	4377.3	4520.1	4684.5	4818.6	4944.0	5034.9	5130.0
42.5°	3092.7	3231.1	3412.8	3590.1	3767.5	3962.1	4178.4	4364.4	4528.8	4654.2	4753.7
45°	2409.3	2599.6	2820.2	3045.1	3274.4	3516.6	3741.6	3931.9	4104.9	4234.6	4334.1
47.5°	1942.1	2149.8	2400.6	2647.2	2906.7	3161.9	3412.8	3577.2	3719.9	3823.7	3914.6
50°	1604.7	1825.4	2089.2	2370.3	2629.8	2885.1	3101.3	3261.4	3378.2	3469.0	3525.2
52.5°	1340.9	1574.4	1855.6	2136.7	2396.3	2629.8	2824.6	2945.7	3040.8	3105.7	3157.5
55°	1107.3	1332.3	1596.1	1860.0	2115.2	2335.7	2495.7	2586.7	2660.1	2699.1	2729.3
57.5°	904.1	1111.6	1353.9	1596.1	1816.7	1998.4	2123.8	2214.6	2249.3	2279.5	2275.2
60°	709.4	904.1	1124.6	1332.3	1522.6	1669.6	1760.5	1812.4	1838.3	1851.3	1842.6
62.5°	558.0	735.4	904.1	1085.7	1224.1	1349.5	1436.1	1436.1	1449.0	1453.4	1466.4
65°	415.2	549.3	696.4	830.5	942.9	1025.1	1072.8	1085.7	1103.0	1098.7	1090.0
67.5°	307.1	406.6	514.7	614.2	692.1	743.9	778.5	808.9	804.6	795.9	791.6
70°	212.0	276.9	372.0	432.6	488.8	540.7	549.3	553.6	558.0	562.3	553.6
72.5°	147.1	194.6	246.6	298.5	333.1	354.7	376.4	380.6	380.6	380.6	376.4
75°	73.6	99.5	147.1	168.7	199.0	207.7	224.9	224.9	237.9	220.6	216.2
77.5°	64.9	77.9	103.8	121.1	134.1	147.1	151.3	164.4	160.0	151.3	155.7
80°	38.9	47.6	64.9	73.6	90.8	95.1	99.5	103.8	99.5	103.8	103.8
82.5°	30.3	34.6	43.3	43.3	56.2	56.2	60.5	60.5	64.9	64.9	64.9
85°	17.3	30.3	25.9	51.9	34.6	34.6	43.3	51.9	43.3	43.3	51.9
87.5°	17.3	17.3	13.0	17.3	17.3	17.3	21.6	25.9	25.9	30.3	25.9
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: P249520

CATALOG NUMBER: LSR8B150D010 EC8B150827 8LBDW0MW

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°
0°	8058.3	8058.3	8058.3	8058.3
2.5°	8071.4	8079.9	8067.0	8062.7
5°	8084.3	8084.3	8075.7	8075.7
7.5°	8084.3	8084.3	8071.4	8062.7
10°	8049.7	8049.7	8036.7	8028.1
12.5°	7984.8	7984.8	7980.4	7967.5
15°	7902.6	7902.6	7885.3	7872.4
17.5°	7790.1	7798.8	7777.2	7777.2
20°	7669.1	7664.7	7647.5	7638.8
22.5°	7543.6	7535.0	7530.6	7504.7
25°	7409.6	7400.9	7387.9	7374.9
27.5°	7180.3	7176.0	7163.0	7145.7
30°	6829.9	6825.5	6808.3	6808.3
32.5°	6375.7	6371.4	6354.1	6358.5
35°	5904.2	5921.6	5912.9	5895.7
37.5°	5510.6	5523.6	5532.3	5523.6
40°	5181.9	5220.8	5225.2	5233.9
42.5°	4831.6	4883.4	4900.8	4909.4
45°	4411.9	4459.6	4498.5	4489.8
47.5°	3983.7	4018.3	4052.9	4027.0
50°	3572.8	3594.4	3607.5	3607.5
52.5°	3183.6	3183.6	3179.2	3183.6
55°	2738.0	2738.0	2720.8	2729.3
57.5°	2270.8	2279.5	2266.5	2244.9
60°	1838.3	1816.7	1808.0	1795.1
62.5°	1431.8	1431.8	1401.5	1440.3
65°	1072.8	1059.7	1046.7	1042.4
67.5°	778.5	774.3	761.3	756.9
70°	549.3	532.0	527.7	519.0
72.5°	367.7	367.7	359.0	359.0
75°	224.9	203.3	199.0	203.3
77.5°	155.7	151.3	151.3	147.1
80°	103.8	99.5	108.2	95.1
82.5°	64.9	69.2	64.9	69.2
85°	43.3	51.9	47.6	47.6
87.5°	25.9	25.9	25.9	25.9
90°	0.0	0.0	0.0	0.0

(END OF REPORT)