

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: P249523

Luminaire Tested: **LSR8B60D010 EC8B60830 8LBDW0MW**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P249523
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: LSR8B60D010 EC8B60830 8LBDW0MW
Description: PORTFOLIO 8 INCH DOUBLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF
RECESSED DOWNLIGHT- CYLINDEC
80 CRI 3000 CCT WITH MATTE WHITE TRIM
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6012.0 lumens
Efficiency: N/A
Efficacy: 101.0 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

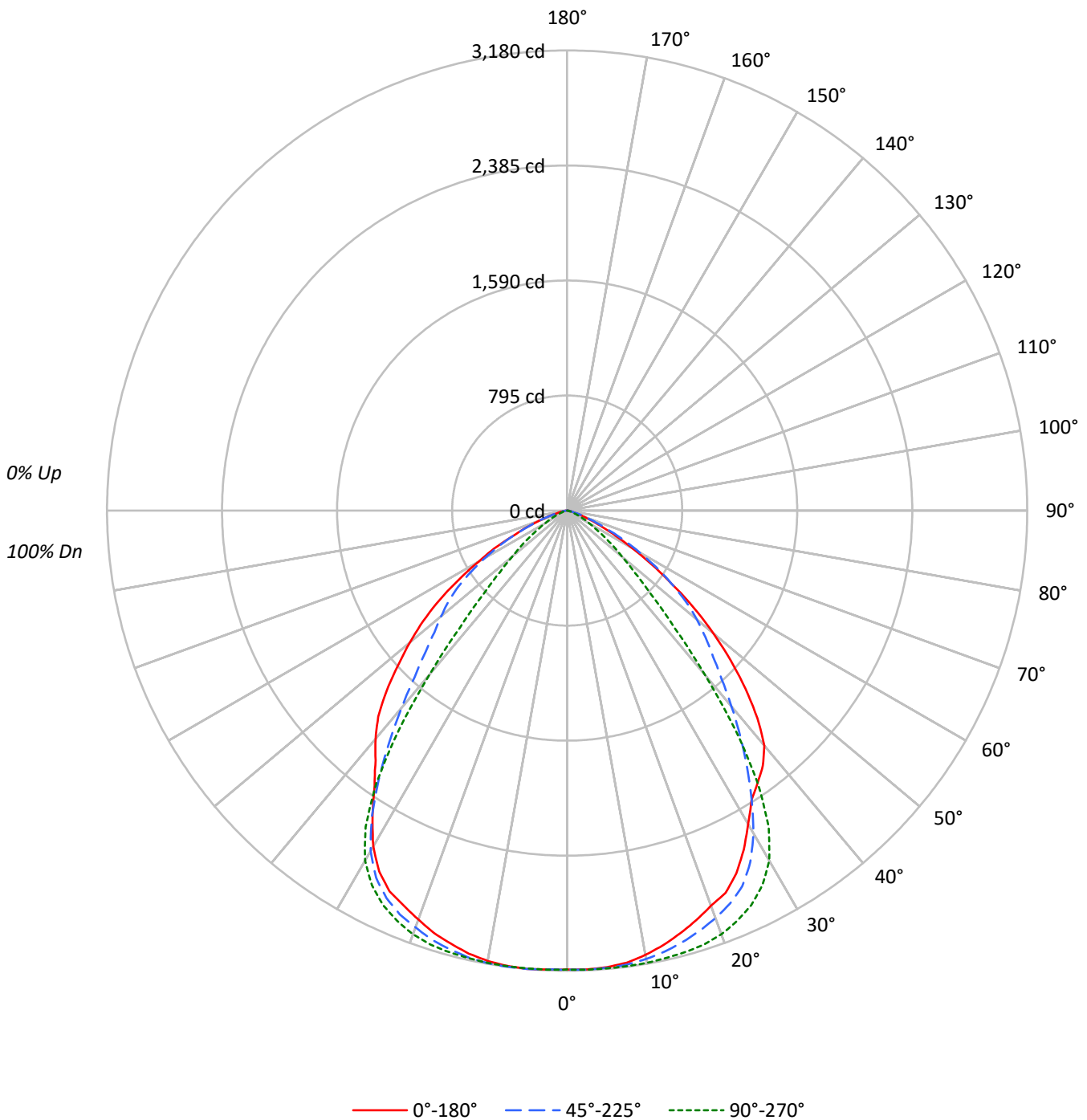
Input Watts (W): 59.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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°	97813	97813	97813
5°	98029	98295	98400
10°	97618	99378	98949
15°	96535	100829	98926
20°	95378	102246	98672
25°	94138	102365	98772
30°	89059	99489	95426
35°	86401	86465	87361
40°	85330	59491	82931
45°	76033	35716	77075
50°	63223	23771	68121
55°	47418	16386	57761
60°	32131	10922	43578
65°	19379	7085	29938
70°	10747	3841	18420
75°	4873	1620	9531
80°	4226	1811	6659
85°	4812	2406	6616



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	302.7	5.0
10°-20°	879.2	14.6
20°-30°	1334.4	22.2
30°-40°	1401.5	23.3
40°-50°	1050.8	17.5
50°-60°	674.2	11.2
60°-70°	288.4	4.8
70°-80°	68.1	1.1
80°-90°	12.7	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°	2516.3	41.9
0°-40°	3917.8	65.2
0°-60°	5642.8	93.9
0°-90°	6012.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	6012.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	3172	3172	3172	3172	3172	
5°	3167	3172	3176	3180	3179	301
15°	3024	3087	3158	3138	3099	853
25°	2767	2864	3009	2954	2903	1264
35°	2295	2168	2297	2270	2321	1441
45°	1744	1425	819	1384	1767	1335
55°	882	882	305	919	1074	800
65°	266	313	97	404	410	284
75°	41	48	14	82	80	60
85°	14	8	7	14	19	14
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°	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0
2.5°	3173.8	3177.2	3175.5	3175.5	3173.8	3175.5	3175.5	3178.9	3178.9	3175.5	3173.8
5°	3166.9	3170.3	3170.3	3166.9	3166.9	3175.5	3170.3	3173.8	3173.8	3172.0	3172.0
7.5°	3151.6	3151.6	3158.4	3153.3	3153.3	3158.4	3156.7	3160.1	3163.5	3165.3	3165.3
10°	3117.6	3121.0	3122.7	3122.7	3124.4	3129.5	3132.9	3139.7	3143.1	3146.5	3148.2
12.5°	3075.0	3080.1	3081.8	3080.1	3085.2	3092.0	3100.6	3109.1	3114.2	3121.0	3126.1
15°	3023.9	3023.9	3027.3	3032.4	3035.9	3046.1	3054.6	3064.8	3078.4	3086.9	3095.4
17.5°	2967.7	2971.2	2976.2	2976.2	2983.1	3000.1	3005.2	3020.5	3035.9	3044.4	3061.4
20°	2906.5	2909.8	2915.0	2918.4	2926.9	2940.5	2950.7	2964.3	2981.4	2996.7	3013.7
22.5°	2858.8	2852.0	2855.3	2858.8	2867.3	2879.2	2891.1	2908.1	2925.2	2940.5	2957.5
25°	2766.8	2768.5	2773.6	2777.0	2787.3	2797.5	2811.1	2831.5	2846.8	2863.9	2882.6
27.5°	2642.5	2644.2	2652.7	2652.7	2661.2	2678.3	2686.8	2703.8	2724.3	2741.3	2763.4
30°	2501.2	2504.6	2504.6	2511.4	2516.5	2525.0	2533.5	2550.6	2560.8	2576.1	2606.8
32.5°	2371.8	2375.2	2373.5	2371.8	2366.7	2365.0	2363.3	2366.7	2370.1	2375.2	2387.1
35°	2295.2	2286.7	2279.9	2268.0	2254.3	2237.3	2222.0	2201.5	2182.8	2167.5	2150.5
37.5°	2222.0	2220.3	2210.0	2193.0	2165.8	2135.1	2099.4	2055.1	2010.8	1963.2	1917.2
40°	2119.8	2114.7	2106.2	2082.4	2051.7	2014.2	1966.6	1912.1	1840.6	1767.4	1692.4
42.5°	1946.1	1947.8	1937.6	1918.9	1890.0	1854.2	1804.8	1745.2	1668.6	1581.8	1484.7
45°	1743.5	1743.5	1740.1	1724.8	1704.4	1675.4	1638.0	1588.6	1513.7	1425.1	1321.2
47.5°	1532.4	1534.1	1529.0	1525.6	1517.1	1498.3	1471.1	1433.6	1380.9	1295.7	1191.8
50°	1317.9	1317.9	1326.4	1324.7	1324.7	1317.9	1306.0	1283.8	1237.8	1169.7	1072.7
52.5°	1103.3	1106.7	1111.9	1118.6	1127.1	1140.8	1127.1	1116.9	1088.0	1035.2	951.8
55°	882.0	885.4	893.9	905.8	916.0	929.7	933.0	933.0	917.7	882.0	819.0
57.5°	693.0	687.9	694.7	704.9	718.5	732.2	742.4	754.3	752.6	728.7	677.7
60°	521.0	522.7	527.8	538.1	548.3	560.2	573.8	584.0	589.1	577.2	544.8
62.5°	379.7	379.7	386.5	396.7	401.8	418.9	427.4	432.5	437.6	435.9	415.4
65°	265.6	269.0	272.4	277.5	282.6	292.8	298.0	308.2	311.6	313.3	298.0
67.5°	187.3	182.2	185.6	189.0	194.1	200.9	211.1	211.1	216.2	216.2	206.0
70°	119.2	119.2	120.9	126.0	129.4	131.1	134.5	137.9	143.0	141.3	141.3
72.5°	80.0	78.3	80.0	81.7	83.4	88.5	88.5	90.2	93.7	95.4	88.5
75°	40.9	42.6	46.0	44.3	49.4	46.0	47.7	52.8	51.1	47.7	47.7
77.5°	34.0	34.0	34.0	32.4	35.7	35.7	34.0	37.5	35.7	35.7	34.0
80°	23.8	25.5	23.8	22.1	23.8	22.1	22.1	22.1	22.1	22.1	20.4
82.5°	18.7	15.3	17.0	15.3	17.0	17.0	15.3	13.6	13.6	15.3	13.6
85°	13.6	10.2	11.9	11.9	10.2	10.2	10.2	10.2	10.2	8.5	8.5
87.5°	8.5	5.1	5.1	5.1	6.8	6.8	6.8	5.1	6.8	6.8	3.4
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°	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0
2.5°	3177.2	3175.5	3178.9	3177.2	3177.2	3175.5	3177.2	3175.5	3178.9	3172.0	3173.8
5°	3177.2	3173.8	3175.5	3177.2	3178.9	3175.5	3175.5	3175.5	3178.9	3175.5	3177.2
7.5°	3170.3	3168.6	3173.8	3177.2	3175.5	3173.8	3177.2	3175.5	3178.9	3177.2	3180.5
10°	3156.7	3158.4	3161.8	3166.9	3168.6	3170.3	3173.8	3173.8	3178.9	3172.0	3175.5
12.5°	3136.3	3143.1	3151.6	3155.0	3161.8	3161.8	3165.3	3166.9	3170.3	3168.6	3173.8
15°	3110.8	3119.3	3129.5	3138.0	3146.5	3151.6	3156.7	3158.4	3163.5	3158.4	3160.1
17.5°	3080.1	3090.3	3105.6	3115.8	3129.5	3134.6	3141.4	3144.8	3149.9	3146.5	3148.2
20°	3037.5	3049.5	3066.5	3081.8	3090.3	3102.2	3110.8	3115.8	3119.3	3115.8	3117.6
22.5°	2977.9	2995.0	3017.1	3029.0	3046.1	3056.3	3058.0	3069.9	3078.4	3069.9	3073.3
25°	2908.1	2925.2	2942.2	2967.7	2983.1	2995.0	3006.9	3008.6	3017.1	3015.4	3013.7
27.5°	2792.3	2814.5	2843.4	2863.9	2884.3	2903.0	2916.7	2920.0	2928.6	2925.2	2926.9
30°	2634.0	2657.9	2685.1	2717.4	2746.4	2765.1	2782.1	2794.1	2802.6	2797.5	2795.8
32.5°	2409.3	2433.1	2462.1	2494.4	2528.5	2555.7	2576.1	2591.5	2601.7	2598.2	2589.7
35°	2152.2	2159.0	2177.7	2203.3	2232.2	2261.1	2279.9	2296.9	2308.8	2312.2	2312.2
37.5°	1888.3	1866.1	1852.5	1852.5	1869.5	1881.4	1898.5	1908.7	1927.4	1934.2	1939.3
40°	1632.8	1581.8	1534.1	1498.3	1474.5	1472.8	1472.8	1477.9	1494.9	1517.1	1537.5
42.5°	1404.7	1323.0	1249.8	1183.3	1135.7	1108.4	1096.5	1098.2	1111.9	1132.3	1166.3
45°	1222.5	1120.4	1028.4	948.4	883.7	841.1	820.7	819.0	829.2	853.0	890.5
47.5°	1081.2	972.2	868.3	776.4	706.6	660.6	636.8	630.0	636.8	658.9	703.2
50°	963.7	851.3	744.1	648.7	573.8	526.1	504.0	495.5	504.0	522.7	567.0
52.5°	854.7	738.9	638.5	546.6	466.5	425.7	401.8	396.7	401.8	423.9	459.7
55°	728.7	630.0	531.2	439.3	369.5	328.6	309.9	304.8	309.9	330.3	367.8
57.5°	604.5	519.3	432.5	349.0	289.5	253.7	236.7	229.8	241.8	255.4	299.7
60°	488.6	420.6	347.3	274.1	224.8	192.4	178.8	177.1	180.5	197.5	228.1
62.5°	383.1	326.9	269.0	209.4	168.6	154.9	137.9	136.2	139.6	149.8	173.7
65°	275.8	240.1	195.8	153.2	120.9	102.2	95.4	97.1	100.4	107.3	129.4
67.5°	192.4	166.9	136.2	107.3	83.4	74.9	68.1	66.4	68.1	80.0	91.9
70°	129.4	114.1	91.9	81.7	57.9	46.0	47.7	42.6	49.4	49.4	59.6
72.5°	85.1	74.9	61.3	47.7	40.9	32.4	32.4	30.7	34.0	35.7	44.3
75°	44.3	34.0	34.0	23.8	17.0	8.5	15.3	13.6	11.9	13.6	17.0
77.5°	30.7	25.5	23.8	18.7	17.0	13.6	13.6	13.6	13.6	15.3	17.0
80°	18.7	18.7	13.6	11.9	10.2	8.5	10.2	10.2	10.2	10.2	11.9
82.5°	11.9	10.2	10.2	8.5	8.5	6.8	6.8	6.8	6.8	6.8	10.2
85°	10.2	6.8	6.8	5.1	6.8	11.9	5.1	6.8	6.8	6.8	5.1
87.5°	3.4	5.1	5.1	5.1	3.4	1.7	3.4	5.1	5.1	8.5	6.8
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°	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0	3172.0
2.5°	3177.2	3178.9	3178.9	3177.2	3177.2	3173.8	3180.5	3175.5	3177.2	3184.0	3178.9
5°	3180.5	3182.3	3182.3	3180.5	3180.5	3180.5	3182.3	3182.3	3180.5	3178.9	3182.3
7.5°	3187.4	3185.7	3185.7	3182.3	3182.3	3178.9	3182.3	3177.2	3180.5	3177.2	3182.3
10°	3178.9	3180.5	3178.9	3177.2	3177.2	3175.5	3175.5	3170.3	3172.0	3166.9	3170.3
12.5°	3173.8	3172.0	3172.0	3168.6	3165.3	3161.8	3160.1	3155.0	3155.0	3143.1	3148.2
15°	3160.1	3161.8	3156.7	3149.9	3146.5	3138.0	3134.6	3127.8	3121.0	3112.5	3114.2
17.5°	3148.2	3143.1	3136.3	3129.5	3115.8	3109.1	3102.2	3092.0	3088.6	3078.4	3075.0
20°	3112.5	3109.1	3100.6	3088.6	3080.1	3064.8	3058.0	3047.8	3039.2	3029.0	3023.9
22.5°	3066.5	3063.1	3052.9	3040.9	3027.3	3020.5	3013.7	2995.0	2986.4	2976.2	2974.5
25°	3008.6	3003.5	2993.3	2979.7	2972.8	2954.1	2947.3	2933.7	2930.3	2920.0	2918.4
27.5°	2920.0	2913.2	2901.3	2884.3	2872.4	2860.5	2853.7	2843.4	2840.0	2829.8	2828.1
30°	2787.3	2778.7	2754.9	2748.1	2727.6	2715.7	2715.7	2702.1	2703.8	2697.0	2697.0
32.5°	2577.8	2564.2	2545.5	2531.8	2518.2	2511.4	2511.4	2506.3	2509.7	2509.7	2513.1
35°	2300.3	2281.6	2271.3	2262.8	2262.8	2269.6	2290.1	2295.2	2305.4	2313.9	2320.7
37.5°	1944.4	1942.7	1954.7	1964.9	1990.4	2019.4	2055.1	2085.8	2114.7	2135.1	2155.6
40°	1559.6	1602.2	1636.2	1683.9	1723.1	1779.3	1844.0	1896.8	1946.1	1981.9	2019.4
42.5°	1217.4	1271.9	1343.4	1413.2	1483.0	1559.6	1644.8	1718.0	1782.7	1832.1	1871.2
45°	948.4	1023.3	1110.1	1198.7	1288.9	1384.3	1472.8	1547.7	1615.8	1666.9	1706.1
47.5°	764.5	846.2	945.0	1042.0	1144.2	1244.6	1343.4	1408.1	1464.3	1505.1	1540.9
50°	631.7	718.5	822.4	933.0	1035.2	1135.7	1220.8	1283.8	1329.8	1365.5	1387.7
52.5°	527.8	619.8	730.4	841.1	943.3	1035.2	1111.9	1159.5	1197.0	1222.5	1242.9
55°	435.9	524.4	628.3	732.2	832.6	919.4	982.4	1018.2	1047.1	1062.4	1074.4
57.5°	355.9	437.6	532.9	628.3	715.1	786.6	836.0	871.8	885.4	897.3	895.6
60°	279.3	355.9	442.7	524.4	599.3	657.2	693.0	713.4	723.6	728.7	725.3
62.5°	219.6	289.5	355.9	427.4	481.9	531.2	565.3	565.3	570.4	572.1	577.2
65°	163.4	216.2	274.1	326.9	371.2	403.5	422.3	427.4	434.2	432.5	429.1
67.5°	120.9	160.1	202.6	241.8	272.4	292.8	306.5	318.4	316.7	313.3	311.6
70°	83.4	109.0	146.4	170.3	192.4	212.8	216.2	217.9	219.6	221.3	217.9
72.5°	57.9	76.6	97.1	117.5	131.1	139.6	148.1	149.8	149.8	149.8	148.1
75°	29.0	39.2	57.9	66.4	78.3	81.7	88.5	88.5	93.7	86.8	85.1
77.5°	25.5	30.7	40.9	47.7	52.8	57.9	59.6	64.7	63.0	59.6	61.3
80°	15.3	18.7	25.5	29.0	35.7	37.5	39.2	40.9	39.2	40.9	40.9
82.5°	11.9	13.6	17.0	17.0	22.1	22.1	23.8	23.8	25.5	25.5	25.5
85°	6.8	11.9	10.2	20.4	13.6	13.6	17.0	20.4	17.0	17.0	20.4
87.5°	6.8	6.8	5.1	6.8	6.8	6.8	8.5	10.2	10.2	11.9	10.2
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: P249523

CATALOG NUMBER: LSR8B60D010 EC8B60830 8LBDW0MW

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°
0°	3172.0	3172.0	3172.0	3172.0
2.5°	3177.2	3180.5	3175.5	3173.8
5°	3182.3	3182.3	3178.9	3178.9
7.5°	3182.3	3182.3	3177.2	3173.8
10°	3168.6	3168.6	3163.5	3160.1
12.5°	3143.1	3143.1	3141.4	3136.3
15°	3110.8	3110.8	3103.9	3098.8
17.5°	3066.5	3069.9	3061.4	3061.4
20°	3018.8	3017.1	3010.3	3006.9
22.5°	2969.4	2966.0	2964.3	2954.1
25°	2916.7	2913.2	2908.1	2903.0
27.5°	2826.4	2824.7	2819.6	2812.8
30°	2688.5	2686.8	2680.0	2680.0
32.5°	2509.7	2508.0	2501.2	2502.9
35°	2324.1	2330.9	2327.5	2320.7
37.5°	2169.2	2174.3	2177.7	2174.3
40°	2039.8	2055.1	2056.8	2060.2
42.5°	1901.9	1922.3	1929.1	1932.5
45°	1736.7	1755.4	1770.8	1767.4
47.5°	1568.1	1581.8	1595.4	1585.2
50°	1406.4	1414.9	1420.0	1420.0
52.5°	1253.2	1253.2	1251.5	1253.2
55°	1077.8	1077.8	1071.0	1074.4
57.5°	893.9	897.3	892.2	883.7
60°	723.6	715.1	711.7	706.6
62.5°	563.6	563.6	551.7	567.0
65°	422.3	417.2	412.0	410.3
67.5°	306.5	304.8	299.7	298.0
70°	216.2	209.4	207.7	204.3
72.5°	144.7	144.7	141.3	141.3
75°	88.5	80.0	78.3	80.0
77.5°	61.3	59.6	59.6	57.9
80°	40.9	39.2	42.6	37.5
82.5°	25.5	27.2	25.5	27.2
85°	17.0	20.4	18.7	18.7
87.5°	10.2	10.2	10.2	10.2
90°	0.0	0.0	0.0	0.0

(END OF REPORT)