

Scaled data based on original data using

LM-41-14 Approved Method for Photometric Testing Of Indoor Fluorescent Luminaires

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: io LED

Report Number: P252300

Luminaire Tested: **LD6B50D010TE EU6B30508040 6LBSW1H**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252300
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1712-453-7)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LD6B50D010TE EU6B30508040 6LBSW1H
Description: PORTFOLIO 6 INCH SINGLE WALLWASH RECESSED DOWNLIGHT, WITH HAZE TRIM
Light Source: (1) HIGH LUMEN LED 80CRI / 4000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5117.0 lumens
Efficiency: N/A
Efficacy: 87.1 lumens/watt
Spacing Criteria (0/90/45): 1.17 / 1.18 / 1.16
Luminous Opening: Circular (Dia: 0.46' x H: 0')
CIE Type: Direct

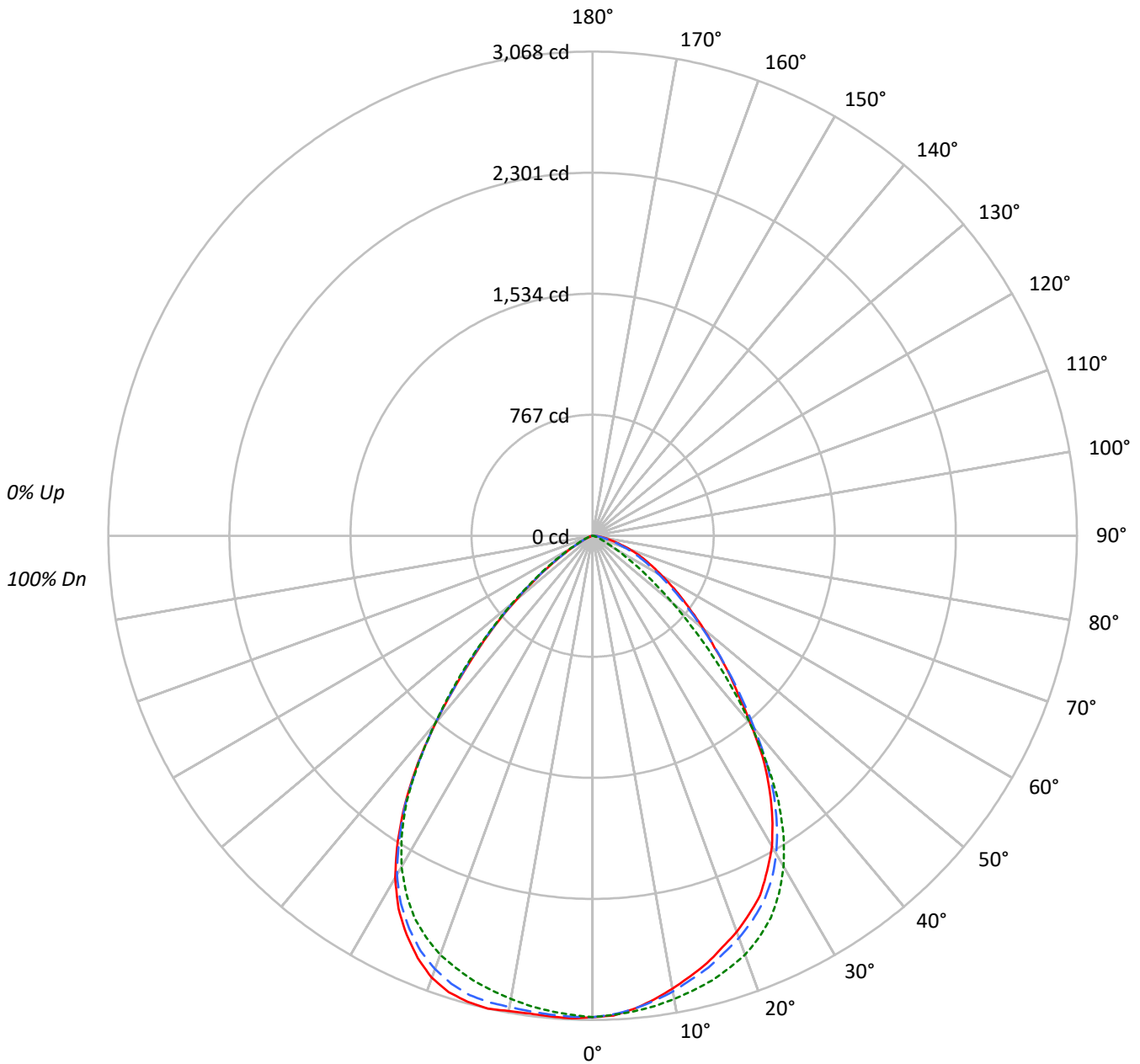
Input Watts (W): 58.77
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P252300

CATALOG NUMBER: LD6B50D010TE EU6B30508040 6LBSW1H

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	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	101	102	100	98	98	96	95	95	93	92	90			90
2	104	98	93	89	102	96	92	88	93	89	86	90	87	84	87	85	82	80			80
3	97	89	83	78	95	88	82	77	85	80	76	82	78	75	80	77	74	72			72
4	91	81	74	69	89	80	74	69	78	72	68	76	71	67	74	69	66	64			64
5	85	74	67	62	83	73	66	61	71	65	61	70	64	60	68	63	60	58			58
6	79	68	61	55	78	67	60	55	66	59	55	64	59	54	63	58	54	52			52
7	74	63	55	50	73	62	55	50	61	54	50	59	54	49	58	53	49	47			47
8	70	58	51	46	68	57	50	46	56	50	45	55	49	45	54	49	45	43			43
9	65	54	47	42	64	53	46	42	52	46	42	51	46	41	50	45	41	40			40
10	62	50	43	39	61	50	43	38	49	43	38	48	42	38	47	42	38	37			37

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	198984	198984	198984
5°	197092	198061	200229
10°	193031	197423	202544
15°	189334	197047	206503
20°	185413	196154	206901
25°	180841	192243	200730
30°	171218	182314	188424
35°	155489	163414	164879
40°	132705	132075	131445
45°	111474	98898	95844
50°	93092	66927	63557
55°	78347	41061	37285
60°	66324	21634	18750
65°	57427	11377	9093
70°	47783	7020	4921
75°	35290	4638	2798
80°	27690	2780	1390
85°	22082	2770	0



TEST NUMBER: P252300

CATALOG NUMBER: LD6B50D010TE EU6B30508040 6LBSW1H

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	287.4	5.6
10°-20°	823.0	16.1
20°-30°	1215.4	23.8
30°-40°	1252.5	24.5
40°-50°	865.1	16.9
50°-60°	426.4	8.3
60°-70°	172.8	3.4
70°-80°	61.6	1.2
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°	2325.9	45.5
0°-40°	3578.4	69.9
0°-60°	4869.9	95.2
0°-90°	5117.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5117.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	3050	3050	3050	3050	3050	
5°	3010	3010	3024	3046	3057	284
15°	2803	2833	2917	3013	3057	789
25°	2512	2560	2671	2748	2788	1148
35°	1952	2000	2052	2063	2070	1210
45°	1208	1216	1072	1057	1039	934
55°	689	663	361	339	328	622
65°	372	335	74	59	59	370
75°	140	118	18	11	11	157
85°	30	22	4	0	0	36
90°	0	0	0	0	0	



TEST NUMBER: P252300

CATALOG NUMBER: LD6B50D010TE EU6B30508040 6LBSW1H

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0
2.5°	3042.7	3031.6	3039.0	3024.3	3042.7	3024.3	3027.9	3031.6	3027.9	3031.6	3035.3
5°	3009.5	2998.5	3009.5	2991.1	3009.5	2998.5	2998.5	3002.2	3002.2	3005.8	3009.5
7.5°	2965.3	2954.3	2965.3	2946.9	2969.0	2958.0	2958.0	2965.3	2961.6	2965.3	2972.7
10°	2913.8	2899.0	2910.1	2899.0	2921.1	2906.4	2913.8	2913.8	2913.8	2924.8	2932.2
12.5°	2858.5	2843.8	2858.5	2840.1	2862.2	2851.1	2854.8	2865.9	2869.5	2876.9	2880.6
15°	2803.2	2784.8	2792.2	2781.1	2803.2	2792.2	2795.9	2810.6	2810.6	2821.7	2832.7
17.5°	2733.3	2718.5	2733.3	2718.5	2736.9	2729.6	2736.9	2748.0	2748.0	2759.0	2770.1
20°	2670.6	2655.9	2666.9	2655.9	2678.0	2666.9	2670.6	2685.4	2689.1	2700.1	2711.2
22.5°	2593.3	2582.2	2589.6	2578.5	2600.6	2593.3	2597.0	2611.7	2615.4	2622.7	2641.2
25°	2512.2	2490.1	2501.2	2493.8	2515.9	2504.9	2512.2	2527.0	2534.3	2545.4	2560.1
27.5°	2394.4	2383.3	2390.7	2390.7	2409.1	2398.0	2401.7	2416.5	2427.5	2438.6	2457.0
30°	2272.8	2254.4	2261.7	2265.4	2280.2	2272.8	2280.2	2294.9	2298.6	2313.3	2328.1
32.5°	2118.1	2110.7	2125.5	2118.1	2125.5	2125.5	2129.1	2140.2	2147.6	2154.9	2173.3
35°	1952.3	1937.6	1952.3	1945.0	1963.4	1952.3	1963.4	1974.4	1974.4	1989.2	2000.2
37.5°	1771.8	1753.4	1760.8	1760.8	1768.1	1764.5	1764.5	1782.9	1786.6	1797.6	1808.7
40°	1558.2	1550.8	1565.5	1561.9	1565.5	1565.5	1569.2	1580.3	1587.6	1591.3	1595.0
42.5°	1366.6	1370.3	1374.0	1374.0	1374.0	1374.0	1374.0	1388.7	1385.0	1396.1	1399.8
45°	1208.2	1193.5	1200.9	1197.2	1208.2	1197.2	1208.2	1219.3	1211.9	1223.0	1215.6
47.5°	1046.2	1046.2	1046.2	1042.5	1049.8	1046.2	1053.5	1057.2	1057.2	1057.2	1053.5
50°	917.2	906.2	909.9	909.9	913.5	909.9	917.2	920.9	920.9	913.5	898.8
52.5°	792.0	788.3	788.3	795.7	795.7	792.0	792.0	792.0	792.0	780.9	773.6
55°	688.8	681.5	685.2	685.2	685.2	685.2	688.8	685.2	685.2	674.1	663.1
57.5°	596.7	589.4	589.4	589.4	593.1	589.4	589.4	589.4	585.7	574.6	559.9
60°	508.3	504.7	508.3	508.3	512.0	508.3	508.3	508.3	501.0	489.9	475.2
62.5°	434.7	434.7	434.7	438.4	438.4	434.7	434.7	431.0	427.3	412.6	397.8
65°	372.0	368.4	372.0	372.0	375.7	375.7	372.0	368.4	364.7	349.9	335.2
67.5°	309.4	305.7	309.4	309.4	313.1	309.4	309.4	309.4	298.4	291.0	276.3
70°	250.5	246.8	246.8	246.8	250.5	243.1	246.8	246.8	239.4	228.4	213.7
72.5°	191.5	191.5	191.5	191.5	191.5	191.5	187.9	187.9	180.5	169.4	162.1
75°	140.0	140.0	143.7	143.7	140.0	140.0	140.0	136.3	132.6	125.2	117.9
77.5°	103.1	103.1	103.1	103.1	99.5	99.5	99.5	95.8	92.1	88.4	81.0
80°	73.7	73.7	73.7	70.0	73.7	70.0	70.0	70.0	62.6	58.9	55.3
82.5°	51.6	47.9	47.9	47.9	47.9	47.9	47.9	44.2	44.2	40.5	36.8
85°	29.5	29.5	29.5	29.5	29.5	29.5	29.5	29.5	25.8	22.1	22.1
87.5°	14.7	18.4	18.4	18.4	18.4	18.4	18.4	14.7	14.7	14.7	11.1
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: P252300

CATALOG NUMBER: LD6B50D010TE EU6B30508040 6LBSW1H

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
0°	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0
2.5°	3035.3	3035.3	3042.7	3031.6	3050.0	3039.0	3035.3	3053.7	3042.7	3039.0	3046.4
5°	3009.5	3013.2	3016.9	3009.5	3027.9	3016.9	3016.9	3035.3	3027.9	3024.3	3035.3
7.5°	2976.4	2980.1	2987.4	2983.7	2998.5	2991.1	2994.8	3013.2	3005.8	3005.8	3016.9
10°	2935.9	2943.2	2950.6	2950.6	2969.0	2961.6	2961.6	2983.7	2976.4	2980.1	2994.8
12.5°	2888.0	2899.0	2910.1	2913.8	2932.2	2921.1	2924.8	2950.6	2946.9	2950.6	2965.3
15°	2836.4	2851.1	2862.2	2862.2	2884.3	2873.2	2884.3	2910.1	2902.7	2917.4	2935.9
17.5°	2777.5	2792.2	2806.9	2810.6	2832.7	2825.3	2840.1	2865.9	2865.9	2873.2	2895.3
20°	2722.2	2740.6	2748.0	2759.0	2781.1	2777.5	2784.8	2814.3	2814.3	2825.3	2847.4
22.5°	2648.5	2666.9	2681.7	2692.7	2711.2	2711.2	2722.2	2748.0	2748.0	2755.4	2777.5
25°	2567.5	2589.6	2600.6	2611.7	2630.1	2626.4	2637.5	2659.6	2663.3	2670.6	2692.7
27.5°	2464.3	2482.8	2497.5	2504.9	2530.7	2515.9	2527.0	2552.8	2549.1	2556.4	2574.9
30°	2335.4	2353.8	2368.6	2368.6	2390.7	2390.7	2401.7	2412.8	2412.8	2420.1	2434.9
32.5°	2184.4	2206.5	2206.5	2217.5	2232.3	2217.5	2232.3	2247.0	2239.6	2250.7	2261.7
35°	2011.3	2022.3	2026.0	2026.0	2037.0	2033.4	2029.7	2040.7	2033.4	2051.8	2062.8
37.5°	1801.3	1816.0	1808.7	1816.0	1812.3	1801.3	1801.3	1819.7	1805.0	1808.7	1819.7
40°	1598.7	1598.7	1595.0	1576.6	1580.3	1569.2	1565.5	1569.2	1554.5	1550.8	1565.5
42.5°	1388.7	1385.0	1374.0	1348.2	1351.9	1333.5	1318.7	1318.7	1311.4	1307.7	1311.4
45°	1200.9	1189.8	1171.4	1141.9	1134.6	1119.8	1090.4	1083.0	1071.9	1071.9	1075.6
47.5°	1027.7	1013.0	983.5	950.4	932.0	913.5	884.1	873.0	854.6	847.2	854.6
50°	884.1	858.3	821.4	773.6	755.1	733.0	703.6	685.2	666.7	659.4	655.7
52.5°	751.5	714.6	677.8	618.9	604.1	582.0	541.5	523.1	504.7	489.9	489.9
55°	637.3	604.1	552.5	497.3	475.2	453.1	412.6	386.8	368.4	361.0	353.6
57.5°	534.1	497.3	449.4	390.5	368.4	346.3	305.7	280.0	261.5	250.5	243.1
60°	449.4	408.9	361.0	309.4	283.6	261.5	221.0	195.2	176.8	165.8	158.4
62.5°	368.4	335.2	287.3	239.4	217.3	195.2	162.1	136.3	117.9	110.5	99.5
65°	309.4	276.3	232.1	191.5	173.1	151.0	121.6	99.5	84.7	73.7	66.3
67.5°	250.5	224.7	187.9	151.0	132.6	117.9	92.1	73.7	58.9	51.6	47.9
70°	198.9	173.1	143.7	114.2	103.1	88.4	70.0	51.6	44.2	36.8	33.2
72.5°	147.3	128.9	106.8	84.7	73.7	66.3	47.9	40.5	29.5	25.8	22.1
75°	106.8	92.1	77.4	58.9	51.6	47.9	36.8	25.8	22.1	18.4	14.7
77.5°	73.7	66.3	51.6	40.5	36.8	33.2	25.8	18.4	14.7	11.1	11.1
80°	47.9	40.5	33.2	25.8	25.8	22.1	14.7	11.1	11.1	7.4	7.4
82.5°	29.5	25.8	22.1	18.4	14.7	14.7	11.1	7.4	7.4	3.7	3.7
85°	18.4	14.7	11.1	11.1	7.4	7.4	7.4	3.7	3.7	3.7	3.7
87.5°	7.4	7.4	7.4	3.7	3.7	3.7	3.7	0.0	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: P252300

CATALOG NUMBER: LD6B50D010TE EU6B30508040 6LBSW1H

CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0
2.5°	3046.4	3046.4	3053.7	3042.7	3050.0	3050.0	3057.4	3042.7	3050.0	3053.7	3061.1
5°	3031.6	3035.3	3042.7	3039.0	3042.7	3042.7	3050.0	3031.6	3046.4	3046.4	3057.4
7.5°	3016.9	3016.9	3024.3	3020.6	3027.9	3031.6	3039.0	3024.3	3039.0	3039.0	3050.0
10°	2998.5	2998.5	3009.5	3005.8	3016.9	3020.6	3031.6	3016.9	3031.6	3035.3	3046.4
12.5°	2972.7	2976.4	2987.4	2987.4	2998.5	3005.8	3016.9	3009.5	3027.9	3031.6	3046.4
15°	2943.2	2950.6	2965.3	2961.6	2972.7	2983.7	2998.5	2987.4	3013.2	3020.6	3035.3
17.5°	2906.4	2913.8	2924.8	2924.8	2935.9	2943.2	2961.6	2954.3	2976.4	2980.1	2998.5
20°	2851.1	2862.2	2876.9	2873.2	2884.3	2891.7	2906.4	2899.0	2921.1	2928.5	2946.9
22.5°	2784.8	2792.2	2803.2	2803.2	2814.3	2821.7	2836.4	2825.3	2847.4	2851.1	2865.9
25°	2696.4	2703.8	2711.2	2714.8	2725.9	2729.6	2736.9	2729.6	2748.0	2751.7	2770.1
27.5°	2582.2	2585.9	2597.0	2597.0	2604.3	2608.0	2619.1	2604.3	2630.1	2630.1	2641.2
30°	2445.9	2442.2	2457.0	2449.6	2457.0	2457.0	2468.0	2460.7	2479.1	2471.7	2482.8
32.5°	2265.4	2272.8	2272.8	2265.4	2280.2	2276.5	2276.5	2269.1	2280.2	2283.9	2291.2
35°	2055.5	2066.5	2066.5	2070.2	2073.9	2062.8	2066.5	2044.4	2062.8	2066.5	2070.2
37.5°	1827.1	1816.0	1823.4	1812.3	1830.8	1808.7	1808.7	1793.9	1808.7	1808.7	1812.3
40°	1565.5	1561.9	1569.2	1561.9	1558.2	1554.5	1547.1	1536.1	1550.8	1543.4	1554.5
42.5°	1318.7	1315.1	1315.1	1307.7	1304.0	1304.0	1296.6	1289.3	1285.6	1285.6	1304.0
45°	1064.6	1071.9	1064.6	1060.9	1068.3	1060.9	1064.6	1049.8	1057.2	1049.8	1057.2
47.5°	850.9	854.6	847.2	839.9	850.9	839.9	839.9	828.8	843.6	843.6	836.2
50°	659.4	655.7	648.3	655.7	652.0	652.0	652.0	641.0	648.3	637.3	644.6
52.5°	486.2	482.6	482.6	478.9	482.6	478.9	478.9	475.2	475.2	471.5	475.2
55°	353.6	349.9	342.6	342.6	342.6	346.3	342.6	338.9	338.9	335.2	338.9
57.5°	239.4	232.1	232.1	232.1	232.1	228.4	228.4	224.7	228.4	224.7	228.4
60°	154.7	154.7	147.3	147.3	147.3	147.3	147.3	143.7	147.3	147.3	147.3
62.5°	95.8	95.8	92.1	88.4	92.1	88.4	88.4	88.4	92.1	88.4	92.1
65°	62.6	58.9	58.9	58.9	58.9	58.9	58.9	58.9	58.9	58.9	58.9
67.5°	44.2	40.5	40.5	40.5	40.5	40.5	40.5	36.8	40.5	40.5	40.5
70°	29.5	29.5	25.8	25.8	25.8	25.8	25.8	25.8	25.8	25.8	25.8
72.5°	18.4	18.4	18.4	18.4	18.4	18.4	18.4	18.4	18.4	18.4	18.4
75°	14.7	11.1	11.1	11.1	11.1	11.1	11.1	11.1	11.1	11.1	11.1
77.5°	11.1	7.4	7.4	7.4	7.4	7.4	7.4	7.4	7.4	7.4	7.4
80°	7.4	7.4	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7
82.5°	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7
85°	3.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7
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: P252300

CATALOG NUMBER: LD6B50D010TE EU6B30508040 6LBSW1H

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0	3050.0
2.5°	3050.0	3053.7	3046.4	3050.0	3042.7	3050.0	3053.7	3061.1
5°	3042.7	3046.4	3039.0	3046.4	3039.0	3046.4	3050.0	3057.4
7.5°	3035.3	3042.7	3035.3	3042.7	3035.3	3042.7	3046.4	3053.7
10°	3035.3	3046.4	3039.0	3050.0	3039.0	3046.4	3053.7	3057.4
12.5°	3035.3	3046.4	3042.7	3050.0	3046.4	3053.7	3061.1	3068.5
15°	3027.9	3039.0	3031.6	3042.7	3039.0	3042.7	3057.4	3057.4
17.5°	2987.4	2998.5	2998.5	3005.8	3005.8	3016.9	3024.3	3031.6
20°	2935.9	2946.9	2943.2	2954.3	2954.3	2965.3	2972.7	2980.1
22.5°	2858.5	2873.2	2869.5	2880.6	2876.9	2884.3	2899.0	2895.3
25°	2759.0	2777.5	2773.8	2781.1	2777.5	2777.5	2784.8	2788.5
27.5°	2637.5	2648.5	2644.8	2652.2	2644.8	2652.2	2659.6	2663.3
30°	2479.1	2486.5	2482.8	2486.5	2482.8	2490.1	2493.8	2501.2
32.5°	2287.5	2298.6	2287.5	2294.9	2291.2	2291.2	2306.0	2298.6
35°	2059.2	2062.8	2066.5	2066.5	2059.2	2062.8	2070.2	2070.2
37.5°	1805.0	1823.4	1801.3	1812.3	1808.7	1808.7	1808.7	1819.7
40°	1539.8	1543.4	1536.1	1536.1	1536.1	1532.4	1547.1	1543.4
42.5°	1289.3	1293.0	1289.3	1278.2	1281.9	1281.9	1293.0	1278.2
45°	1046.2	1053.5	1049.8	1049.8	1042.5	1042.5	1046.2	1038.8
47.5°	828.8	836.2	825.1	828.8	821.4	828.8	825.1	832.5
50°	629.9	637.3	633.6	637.3	637.3	629.9	641.0	626.2
52.5°	471.5	475.2	471.5	467.8	464.1	464.1	471.5	467.8
55°	335.2	331.5	331.5	331.5	335.2	335.2	331.5	327.8
57.5°	224.7	224.7	221.0	221.0	224.7	217.3	221.0	217.3
60°	143.7	143.7	143.7	143.7	140.0	143.7	143.7	143.7
62.5°	88.4	88.4	88.4	88.4	88.4	88.4	88.4	88.4
65°	58.9	58.9	58.9	58.9	58.9	58.9	58.9	58.9
67.5°	36.8	40.5	40.5	40.5	36.8	36.8	36.8	36.8
70°	25.8	25.8	25.8	25.8	25.8	25.8	25.8	25.8
72.5°	18.4	18.4	18.4	18.4	18.4	18.4	18.4	18.4
75°	11.1	11.1	11.1	11.1	11.1	11.1	11.1	11.1
77.5°	7.4	7.4	7.4	7.4	7.4	7.4	7.4	7.4
80°	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7
82.5°	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	3.7	3.7	3.7	3.7	3.7	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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— 0°-180° - - 45°-225° - - - - 90°-270°













(END OF REPORT)