

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: P252313

Luminaire Tested: **LD6B60D010TE EU6B60708040 6LBSW1H**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252313
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: LD6B60D010TE EU6B60708040 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: 5717.0 lumens
Efficiency: N/A
Efficacy: 91.5 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

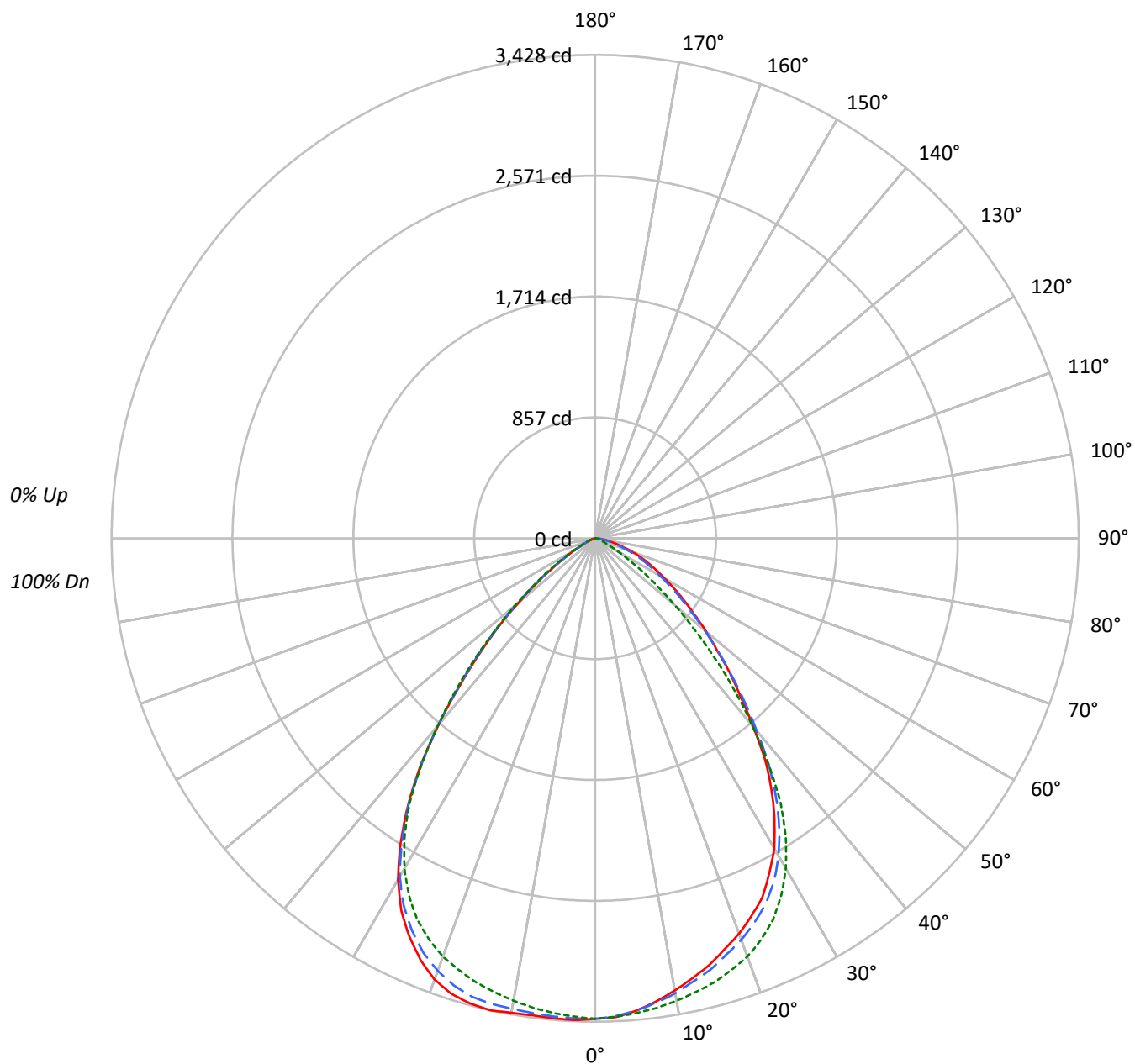
Input Watts (W): 62.48
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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
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		
1	112	108	105	102	109	106	103	101	102	100	98	98	96	95	95	93	92	90		
2	104	98	93	89	102	96	92	88	93	89	86	90	87	84	87	85	82	80		
3	97	89	83	78	95	88	82	77	85	80	76	82	78	75	80	77	74	72		
4	91	81	74	69	89	80	74	69	78	72	68	76	71	67	74	69	66	64		
5	85	74	67	62	83	73	66	61	71	65	61	70	64	60	68	63	60	58		
6	79	68	61	55	78	67	60	55	66	59	55	64	59	54	63	58	54	52		
7	74	63	55	50	73	62	55	50	61	54	50	59	54	49	58	53	49	47		
8	70	58	51	46	68	57	50	46	56	50	45	55	49	45	54	49	45	43		
9	65	54	47	42	64	53	46	42	52	46	42	51	46	41	50	45	41	40		
10	62	50	43	39	61	50	43	38	49	43	38	48	42	38	47	42	38	37		

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	222320	222320	222320
5°	220203	221284	223707
10°	215661	220570	226293
15°	211535	220153	230717
20°	207158	219155	231159
25°	202048	214789	224269
30°	191294	203694	210519
35°	173720	182576	184209
40°	148265	147566	146860
45°	124547	110496	107082
50°	104014	74772	71007
55°	87537	45873	41664
60°	74100	24165	20942
65°	64173	12705	10158
70°	53391	7859	5494
75°	39424	5193	3100
80°	30921	3081	1540
85°	24627	3069	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	321.2	5.6
10°-20°	919.6	16.1
20°-30°	1357.9	23.8
30°-40°	1399.4	24.5
40°-50°	966.6	16.9
50°-60°	476.4	8.3
60°-70°	193.0	3.4
70°-80°	68.8	1.2
80°-90°	14.2	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°	2598.6	45.5
0°-40°	3998.0	69.9
0°-60°	5440.9	95.2
0°-90°	5717.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5717.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	3408	3408	3408	3408	3408	
5°	3362	3362	3379	3404	3416	318
15°	3132	3165	3260	3366	3416	882
25°	2807	2860	2984	3070	3116	1283
35°	2181	2235	2292	2305	2313	1352
45°	1350	1358	1198	1181	1161	1043
55°	770	741	403	379	366	695
65°	416	374	82	66	66	413
75°	156	132	21	12	12	176
85°	33	25	4	0	0	40
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7
2.5°	3399.5	3387.1	3395.3	3378.9	3399.5	3378.9	3383.0	3387.1	3383.0	3387.1	3391.2
5°	3362.4	3350.1	3362.4	3341.8	3362.4	3350.1	3350.1	3354.2	3354.2	3358.3	3362.4
7.5°	3313.0	3300.7	3313.0	3292.4	3317.1	3304.8	3304.8	3313.0	3308.9	3313.0	3321.3
10°	3255.4	3238.9	3251.3	3238.9	3263.6	3247.2	3255.4	3255.4	3255.4	3267.8	3276.0
12.5°	3193.7	3177.2	3193.7	3173.1	3197.8	3185.4	3189.6	3201.9	3206.0	3214.3	3218.4
15°	3131.9	3111.4	3119.6	3107.2	3131.9	3119.6	3123.7	3140.2	3140.2	3152.5	3164.9
17.5°	3053.7	3037.3	3053.7	3037.3	3057.9	3049.6	3057.9	3070.2	3070.2	3082.6	3094.9
20°	2983.8	2967.3	2979.7	2967.3	2992.0	2979.7	2983.8	3000.2	3004.4	3016.7	3029.1
22.5°	2897.4	2885.0	2893.2	2880.9	2905.6	2897.4	2901.5	2917.9	2922.0	2930.3	2950.9
25°	2806.8	2782.1	2794.5	2786.2	2810.9	2798.6	2806.8	2823.3	2831.5	2843.9	2860.3
27.5°	2675.1	2662.8	2671.0	2671.0	2691.6	2679.2	2683.3	2699.8	2712.2	2724.5	2745.1
30°	2539.3	2518.7	2527.0	2531.1	2547.5	2539.3	2547.5	2564.0	2568.1	2584.6	2601.0
32.5°	2366.4	2358.2	2374.7	2366.4	2374.7	2374.7	2378.8	2391.1	2399.4	2407.6	2428.2
35°	2181.2	2164.8	2181.2	2173.0	2193.6	2181.2	2193.6	2205.9	2205.9	2222.4	2234.7
37.5°	1979.6	1959.0	1967.2	1967.2	1975.5	1971.4	1971.4	1991.9	1996.0	2008.4	2020.7
40°	1740.9	1732.7	1749.1	1745.0	1749.1	1749.1	1753.2	1765.6	1773.8	1777.9	1782.0
42.5°	1526.9	1531.0	1535.1	1535.1	1535.1	1535.1	1535.1	1551.6	1547.5	1559.8	1563.9
45°	1349.9	1333.4	1341.7	1337.6	1349.9	1337.6	1349.9	1362.3	1354.0	1366.4	1358.1
47.5°	1168.8	1168.8	1168.8	1164.7	1172.9	1168.8	1177.1	1181.2	1181.2	1181.2	1177.1
50°	1024.8	1012.4	1016.5	1016.5	1020.7	1016.5	1024.8	1028.9	1028.9	1020.7	1004.2
52.5°	884.8	880.7	880.7	889.0	889.0	884.8	884.8	884.8	884.8	872.5	864.3
55°	769.6	761.4	765.5	765.5	765.5	765.5	769.6	765.5	765.5	753.1	740.8
57.5°	666.7	658.5	658.5	658.5	662.6	658.5	658.5	658.5	654.4	642.0	625.6
60°	567.9	563.8	567.9	567.9	572.1	567.9	567.9	567.9	559.7	547.4	530.9
62.5°	485.6	485.6	485.6	489.8	489.8	485.6	485.6	481.5	477.4	460.9	444.5
65°	415.7	411.6	415.7	415.7	419.8	419.8	415.7	411.6	407.4	391.0	374.5
67.5°	345.7	341.6	345.7	345.7	349.8	345.7	345.7	345.7	333.4	325.1	308.7
70°	279.9	275.7	275.7	275.7	279.9	271.6	275.7	275.7	267.5	255.2	238.7
72.5°	214.0	214.0	214.0	214.0	214.0	214.0	209.9	209.9	201.7	189.3	181.1
75°	156.4	156.4	160.5	160.5	156.4	156.4	156.4	152.3	148.2	139.9	131.7
77.5°	115.2	115.2	115.2	115.2	111.1	111.1	111.1	107.0	102.9	98.8	90.5
80°	82.3	82.3	82.3	78.2	82.3	78.2	78.2	78.2	70.0	65.8	61.7
82.5°	57.6	53.5	53.5	53.5	53.5	53.5	53.5	49.4	49.4	45.3	41.2
85°	32.9	32.9	32.9	32.9	32.9	32.9	32.9	32.9	28.8	24.7	24.7
87.5°	16.5	20.6	20.6	20.6	20.6	20.6	20.6	16.5	16.5	16.5	12.3
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):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
0°	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7
2.5°	3391.2	3391.2	3399.5	3387.1	3407.7	3395.3	3391.2	3411.8	3399.5	3395.3	3403.6
5°	3362.4	3366.5	3370.6	3362.4	3383.0	3370.6	3370.6	3391.2	3383.0	3378.9	3391.2
7.5°	3325.4	3329.5	3337.7	3333.6	3350.1	3341.8	3346.0	3366.5	3358.3	3358.3	3370.6
10°	3280.1	3288.3	3296.6	3296.6	3317.1	3308.9	3308.9	3333.6	3325.4	3329.5	3346.0
12.5°	3226.6	3238.9	3251.3	3255.4	3276.0	3263.6	3267.8	3296.6	3292.4	3296.6	3313.0
15°	3169.0	3185.4	3197.8	3197.8	3222.5	3210.1	3222.5	3251.3	3243.1	3259.5	3280.1
17.5°	3103.1	3119.6	3136.1	3140.2	3164.9	3156.6	3173.1	3201.9	3201.9	3210.1	3234.8
20°	3041.4	3062.0	3070.2	3082.6	3107.2	3103.1	3111.4	3144.3	3144.3	3156.6	3181.3
22.5°	2959.1	2979.7	2996.1	3008.5	3029.1	3029.1	3041.4	3070.2	3070.2	3078.4	3103.1
25°	2868.5	2893.2	2905.6	2917.9	2938.5	2934.4	2946.7	2971.4	2975.5	2983.8	3008.5
27.5°	2753.3	2773.9	2790.3	2798.6	2827.4	2810.9	2823.3	2852.1	2848.0	2856.2	2876.8
30°	2609.3	2629.8	2646.3	2646.3	2671.0	2671.0	2683.3	2695.7	2695.7	2703.9	2720.4
32.5°	2440.5	2465.2	2465.2	2477.6	2494.0	2477.6	2494.0	2510.5	2502.3	2514.6	2527.0
35°	2247.1	2259.4	2263.6	2263.6	2275.9	2271.8	2267.7	2280.0	2271.8	2292.4	2304.7
37.5°	2012.5	2029.0	2020.7	2029.0	2024.9	2012.5	2012.5	2033.1	2016.6	2020.7	2033.1
40°	1786.2	1786.2	1782.0	1761.5	1765.6	1753.2	1749.1	1753.2	1736.8	1732.7	1749.1
42.5°	1551.6	1547.5	1535.1	1506.3	1510.4	1489.8	1473.4	1473.4	1465.1	1461.0	1465.1
45°	1341.7	1329.3	1308.7	1275.8	1267.6	1251.1	1218.2	1210.0	1197.6	1197.6	1201.7
47.5°	1148.2	1131.8	1098.9	1061.8	1041.2	1020.7	987.7	975.4	954.8	946.6	954.8
50°	987.7	958.9	917.8	864.3	843.7	819.0	786.1	765.5	744.9	736.7	732.6
52.5°	839.6	798.4	757.3	691.4	675.0	650.3	605.0	584.4	563.8	547.4	547.4
55°	712.0	675.0	617.3	555.6	530.9	506.2	460.9	432.1	411.6	403.3	395.1
57.5°	596.8	555.6	502.1	436.2	411.6	386.9	341.6	312.8	292.2	279.9	271.6
60°	502.1	456.8	403.3	345.7	316.9	292.2	246.9	218.1	197.5	185.2	177.0
62.5°	411.6	374.5	321.0	267.5	242.8	218.1	181.1	152.3	131.7	123.5	111.1
65°	345.7	308.7	259.3	214.0	193.4	168.7	135.8	111.1	94.7	82.3	74.1
67.5°	279.9	251.0	209.9	168.7	148.2	131.7	102.9	82.3	65.8	57.6	53.5
70°	222.2	193.4	160.5	127.6	115.2	98.8	78.2	57.6	49.4	41.2	37.0
72.5°	164.6	144.0	119.4	94.7	82.3	74.1	53.5	45.3	32.9	28.8	24.7
75°	119.4	102.9	86.4	65.8	57.6	53.5	41.2	28.8	24.7	20.6	16.5
77.5°	82.3	74.1	57.6	45.3	41.2	37.0	28.8	20.6	16.5	12.3	12.3
80°	53.5	45.3	37.0	28.8	28.8	24.7	16.5	12.3	12.3	8.2	8.2
82.5°	32.9	28.8	24.7	20.6	16.5	16.5	12.3	8.2	8.2	4.1	4.1
85°	20.6	16.5	12.3	12.3	8.2	8.2	8.2	4.1	4.1	4.1	4.1
87.5°	8.2	8.2	8.2	4.1	4.1	4.1	4.1	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



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CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7
2.5°	3403.6	3403.6	3411.8	3399.5	3407.7	3407.7	3415.9	3399.5	3407.7	3411.8	3420.0
5°	3387.1	3391.2	3399.5	3395.3	3399.5	3399.5	3407.7	3387.1	3403.6	3403.6	3415.9
7.5°	3370.6	3370.6	3378.9	3374.8	3383.0	3387.1	3395.3	3378.9	3395.3	3395.3	3407.7
10°	3350.1	3350.1	3362.4	3358.3	3370.6	3374.8	3387.1	3370.6	3387.1	3391.2	3403.6
12.5°	3321.3	3325.4	3337.7	3337.7	3350.1	3358.3	3370.6	3362.4	3383.0	3387.1	3403.6
15°	3288.3	3296.6	3313.0	3308.9	3321.3	3333.6	3350.1	3337.7	3366.5	3374.8	3391.2
17.5°	3247.2	3255.4	3267.8	3267.8	3280.1	3288.3	3308.9	3300.7	3325.4	3329.5	3350.1
20°	3185.4	3197.8	3214.3	3210.1	3222.5	3230.7	3247.2	3238.9	3263.6	3271.9	3292.4
22.5°	3111.4	3119.6	3131.9	3131.9	3144.3	3152.5	3169.0	3156.6	3181.3	3185.4	3201.9
25°	3012.6	3020.8	3029.1	3033.2	3045.5	3049.6	3057.9	3049.6	3070.2	3074.3	3094.9
27.5°	2885.0	2889.1	2901.5	2901.5	2909.7	2913.8	2926.2	2909.7	2938.5	2938.5	2950.9
30°	2732.7	2728.6	2745.1	2736.8	2745.1	2745.1	2757.4	2749.2	2769.8	2761.5	2773.9
32.5°	2531.1	2539.3	2539.3	2531.1	2547.5	2543.4	2543.4	2535.2	2547.5	2551.6	2559.9
35°	2296.5	2308.8	2308.8	2312.9	2317.1	2304.7	2308.8	2284.1	2304.7	2308.8	2312.9
37.5°	2041.3	2029.0	2037.2	2024.9	2045.4	2020.7	2020.7	2004.3	2020.7	2020.7	2024.9
40°	1749.1	1745.0	1753.2	1745.0	1740.9	1736.8	1728.5	1716.2	1732.7	1724.4	1736.8
42.5°	1473.4	1469.3	1469.3	1461.0	1456.9	1456.9	1448.7	1440.4	1436.3	1436.3	1456.9
45°	1189.4	1197.6	1189.4	1185.3	1193.5	1185.3	1189.4	1172.9	1181.2	1172.9	1181.2
47.5°	950.7	954.8	946.6	938.3	950.7	938.3	938.3	926.0	942.5	942.5	934.2
50°	736.7	732.6	724.3	732.6	728.5	728.5	728.5	716.1	724.3	712.0	720.2
52.5°	543.3	539.1	539.1	535.0	539.1	535.0	535.0	530.9	530.9	526.8	530.9
55°	395.1	391.0	382.7	382.7	382.7	386.9	382.7	378.6	378.6	374.5	378.6
57.5°	267.5	259.3	259.3	259.3	259.3	255.2	255.2	251.0	255.2	251.0	255.2
60°	172.9	172.9	164.6	164.6	164.6	164.6	164.6	160.5	164.6	164.6	164.6
62.5°	107.0	107.0	102.9	98.8	102.9	98.8	98.8	98.8	102.9	98.8	102.9
65°	70.0	65.8	65.8	65.8	65.8	65.8	65.8	65.8	65.8	65.8	65.8
67.5°	49.4	45.3	45.3	45.3	45.3	45.3	45.3	41.2	45.3	45.3	45.3
70°	32.9	32.9	28.8	28.8	28.8	28.8	28.8	28.8	28.8	28.8	28.8
72.5°	20.6	20.6	20.6	20.6	20.6	20.6	20.6	20.6	20.6	20.6	20.6
75°	16.5	12.3	12.3	12.3	12.3	12.3	12.3	12.3	12.3	12.3	12.3
77.5°	12.3	8.2	8.2	8.2	8.2	8.2	8.2	8.2	8.2	8.2	8.2
80°	8.2	8.2	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1
82.5°	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1
85°	4.1	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	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1
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: P252313

CATALOG NUMBER: LD6B60D010TE EU6B60708040 6LBSW1H

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7	3407.7
2.5°	3407.7	3411.8	3403.6	3407.7	3399.5	3407.7	3411.8	3420.0
5°	3399.5	3403.6	3395.3	3403.6	3395.3	3403.6	3407.7	3415.9
7.5°	3391.2	3399.5	3391.2	3399.5	3391.2	3399.5	3403.6	3411.8
10°	3391.2	3403.6	3395.3	3407.7	3395.3	3403.6	3411.8	3415.9
12.5°	3391.2	3403.6	3399.5	3407.7	3403.6	3411.8	3420.0	3428.3
15°	3383.0	3395.3	3387.1	3399.5	3395.3	3399.5	3415.9	3415.9
17.5°	3337.7	3350.1	3350.1	3358.3	3358.3	3370.6	3378.9	3387.1
20°	3280.1	3292.4	3288.3	3300.7	3300.7	3313.0	3321.3	3329.5
22.5°	3193.7	3210.1	3206.0	3218.4	3214.3	3222.5	3238.9	3234.8
25°	3082.6	3103.1	3099.0	3107.2	3103.1	3103.1	3111.4	3115.5
27.5°	2946.7	2959.1	2955.0	2963.2	2955.0	2963.2	2971.4	2975.5
30°	2769.8	2778.0	2773.9	2778.0	2773.9	2782.1	2786.2	2794.5
32.5°	2555.8	2568.1	2555.8	2564.0	2559.9	2559.9	2576.3	2568.1
35°	2300.6	2304.7	2308.8	2308.8	2300.6	2304.7	2312.9	2312.9
37.5°	2016.6	2037.2	2012.5	2024.9	2020.7	2020.7	2020.7	2033.1
40°	1720.3	1724.4	1716.2	1716.2	1716.2	1712.1	1728.5	1724.4
42.5°	1440.4	1444.6	1440.4	1428.1	1432.2	1432.2	1444.6	1428.1
45°	1168.8	1177.1	1172.9	1172.9	1164.7	1164.7	1168.8	1160.6
47.5°	926.0	934.2	921.9	926.0	917.8	926.0	921.9	930.1
50°	703.8	712.0	707.9	712.0	712.0	703.8	716.1	699.6
52.5°	526.8	530.9	526.8	522.7	518.6	518.6	526.8	522.7
55°	374.5	370.4	370.4	370.4	374.5	374.5	370.4	366.3
57.5°	251.0	251.0	246.9	246.9	251.0	242.8	246.9	242.8
60°	160.5	160.5	160.5	160.5	156.4	160.5	160.5	160.5
62.5°	98.8	98.8	98.8	98.8	98.8	98.8	98.8	98.8
65°	65.8	65.8	65.8	65.8	65.8	65.8	65.8	65.8
67.5°	41.2	45.3	45.3	45.3	41.2	41.2	41.2	41.2
70°	28.8	28.8	28.8	28.8	28.8	28.8	28.8	28.8
72.5°	20.6	20.6	20.6	20.6	20.6	20.6	20.6	20.6
75°	12.3	12.3	12.3	12.3	12.3	12.3	12.3	12.3
77.5°	8.2	8.2	8.2	8.2	8.2	8.2	8.2	8.2
80°	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1
82.5°	4.1	4.1	4.1	4.1	4.1	4.1	4.1	4.1
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	4.1	4.1	4.1	4.1	4.1	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)