

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: P252195

Luminaire Tested: **LD6B50D010TE EU6B30508035 6LBSW1LI**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252195
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1712-453-1)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LD6B50D010TE EU6B30508035 6LBSW1LI
Description: PORTFOLIO 6 INCH SINGLE WALLWASH RECESSED DOWNLIGHT, WITH SPECULAR CLEAR TRIM
Light Source: (1) HIGH LUMEN LED 80CRI / 3500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6978.0 lumens
Efficiency: N/A
Efficacy: 118.7 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.29 / 1.21
Luminous Opening: Circular (Dia: 0.46' x H: 0')
CIE Type: Direct

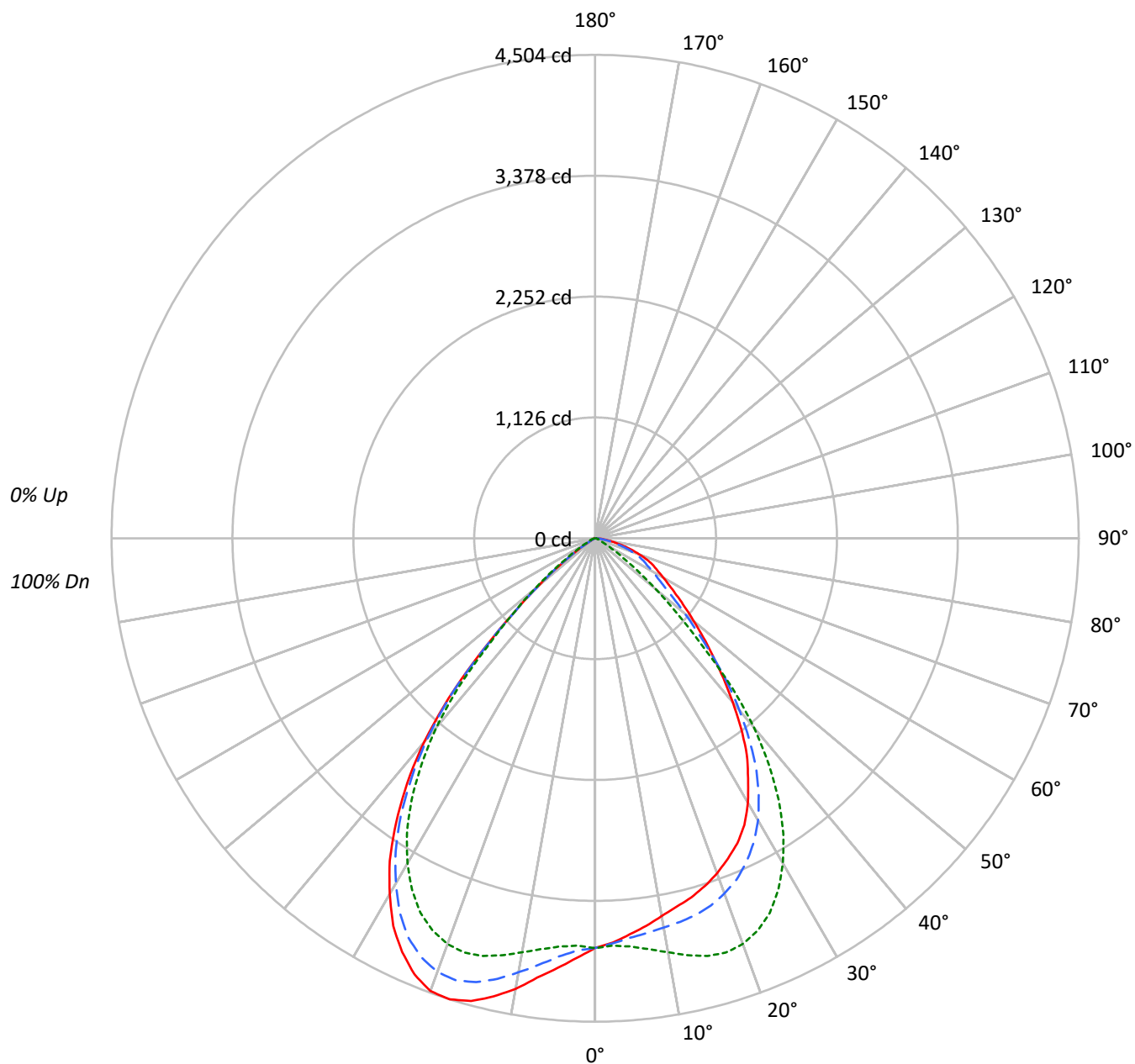
Input Watts (W): 58.77
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	0			
RCR																					
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100			
1	112	108	105	103	109	106	103	101	102	100	98	98	96	95	95	93	92	90			
2	105	98	93	89	102	97	92	88	93	89	86	90	87	84	87	85	82	80			
3	98	89	83	78	95	88	82	78	85	80	76	83	78	75	80	77	74	72			
4	91	82	75	69	89	80	74	69	78	72	68	76	71	67	74	70	66	65			
5	85	75	67	62	83	74	67	62	72	66	61	70	65	61	68	64	60	58			
6	80	69	61	56	78	68	61	56	66	60	55	64	59	55	63	58	54	53			
7	74	63	56	51	73	62	55	50	61	55	50	60	54	50	58	53	50	48			
8	70	58	51	46	69	58	51	46	57	50	46	55	50	46	54	49	45	44			
9	66	54	47	42	64	54	47	42	53	46	42	52	46	42	51	45	42	40			
10	62	50	43	39	61	50	43	39	49	43	39	48	43	39	47	42	38	37			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	249056	249056	249056
5°	242601	250007	263151
10°	236701	259430	282398
15°	233932	272140	301474
20°	230583	279231	311661
25°	225673	277171	306066
30°	214452	263388	288135
35°	196203	237483	257242
40°	169709	196128	211049
45°	143111	128635	138055
50°	121501	74458	70012
55°	105440	35704	26980
60°	95238	16662	6668
65°	92392	9571	2254
70°	82843	7649	2079
75°	68084	5520	907
80°	50720	2743	0
85°	43715	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	368.7	5.3
10°-20°	1123.8	16.1
20°-30°	1717.0	24.6
30°-40°	1795.9	25.7
40°-50°	1165.0	16.7
50°-60°	462.6	6.6
60°-70°	219.4	3.1
70°-80°	104.3	1.5
80°-90°	21.3	0.3
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°	3209.5	46.0
0°-40°	5005.4	71.7
0°-60°	6632.9	95.1
0°-90°	6978.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	6978.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	3818	3818	3818	3818	3818	
5°	3704	3737	3818	3912	4018	350
15°	3464	3631	4029	4281	4464	976
25°	3135	3332	3850	4110	4252	1436
35°	2464	2613	2982	3157	3230	1523
45°	1551	1536	1394	1478	1496	1207
55°	927	788	314	244	237	840
65°	598	496	62	15	15	585
75°	270	219	22	7	4	291
85°	58	36	0	0	0	68
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°	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5
2.5°	3770.1	3777.4	3737.2	3726.3	3755.5	3766.4	3770.1	3759.1	3762.8	3777.4	3777.4
5°	3704.4	3711.7	3675.2	3664.2	3693.4	3700.7	3711.7	3708.0	3719.0	3740.9	3737.2
7.5°	3642.3	3653.3	3613.1	3598.5	3635.0	3653.3	3660.6	3660.6	3675.2	3704.4	3708.0
10°	3573.0	3587.6	3551.1	3543.8	3583.9	3602.2	3605.8	3613.1	3635.0	3675.2	3682.5
12.5°	3514.6	3529.2	3503.6	3492.7	3536.5	3554.7	3562.0	3576.6	3602.2	3653.3	3660.6
15°	3463.5	3474.5	3445.3	3438.0	3481.8	3503.6	3507.3	3529.2	3562.0	3620.4	3631.4
17.5°	3397.8	3405.1	3383.2	3375.9	3419.7	3441.6	3445.3	3470.8	3510.9	3569.3	3587.6
20°	3321.2	3328.5	3306.6	3299.3	3343.1	3368.6	3372.3	3394.2	3441.6	3503.6	3521.9
22.5°	3229.9	3244.5	3219.0	3211.7	3255.5	3277.4	3288.3	3306.6	3354.0	3416.1	3441.6
25°	3135.0	3135.0	3116.8	3113.1	3153.3	3178.8	3175.2	3200.7	3248.2	3310.2	3332.1
27.5°	3010.9	3007.3	2989.0	2985.4	3029.2	3051.1	3043.8	3069.3	3113.1	3175.2	3197.1
30°	2846.7	2854.0	2828.5	2821.2	2857.7	2894.2	2890.5	2916.1	2959.9	3018.2	3032.8
32.5°	2649.6	2656.9	2653.3	2642.3	2675.2	2693.4	2704.4	2722.6	2759.1	2821.2	2835.8
35°	2463.5	2452.6	2438.0	2438.0	2470.8	2500.0	2489.1	2510.9	2547.4	2609.5	2613.1
37.5°	2233.6	2229.9	2222.6	2215.3	2251.8	2259.1	2262.8	2277.4	2310.2	2361.3	2354.0
40°	1992.7	1996.3	1992.7	1978.1	2000.0	2029.2	2025.5	2032.8	2062.0	2098.5	2087.6
42.5°	1766.4	1766.4	1766.4	1751.8	1777.4	1792.0	1799.3	1795.6	1802.9	1835.8	1821.2
45°	1551.1	1554.7	1551.1	1547.4	1551.1	1558.4	1551.1	1547.4	1547.4	1558.4	1536.5
47.5°	1365.0	1365.0	1354.0	1343.1	1354.0	1357.7	1346.7	1335.8	1332.1	1328.5	1292.0
50°	1197.1	1193.4	1189.8	1171.5	1182.5	1186.1	1171.5	1164.2	1149.6	1131.4	1087.6
52.5°	1051.1	1047.4	1043.8	1025.5	1032.8	1036.5	1021.9	1007.3	989.1	974.5	919.7
55°	927.0	923.4	923.4	912.4	905.1	912.4	897.8	886.9	861.3	843.1	788.3
57.5°	821.2	821.2	813.9	802.9	806.6	806.6	792.0	777.4	755.5	733.6	689.8
60°	729.9	729.9	729.9	719.0	719.0	719.0	711.7	697.1	678.8	656.9	613.1
62.5°	656.9	656.9	653.3	642.3	646.0	646.0	638.7	624.1	605.8	591.2	547.4
65°	598.5	598.5	598.5	587.6	587.6	591.2	583.9	569.3	554.7	536.5	496.4
67.5°	525.5	521.9	521.9	514.6	518.2	521.9	514.6	503.6	485.4	474.5	438.0
70°	434.3	438.0	441.6	430.7	434.3	434.3	430.7	419.7	408.8	397.8	365.0
72.5°	354.0	354.0	350.4	346.7	346.7	350.4	343.1	332.1	324.8	317.5	292.0
75°	270.1	266.4	270.1	262.8	262.8	262.8	255.5	251.8	248.2	237.2	219.0
77.5°	197.1	193.4	193.4	186.1	189.8	189.8	186.1	178.8	171.5	167.9	153.3
80°	135.0	135.0	135.0	131.4	131.4	127.7	127.7	124.1	116.8	113.1	105.8
82.5°	91.2	91.2	91.2	87.6	87.6	87.6	83.9	80.3	76.6	73.0	65.7
85°	58.4	58.4	58.4	54.7	54.7	54.7	51.1	51.1	47.4	43.8	36.5
87.5°	32.8	32.8	32.8	29.2	29.2	29.2	29.2	29.2	25.5	21.9	18.2
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°	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5
2.5°	3802.9	3751.8	3784.7	3784.7	3773.7	3802.9	3821.2	3835.8	3832.1	3799.3	3795.6
5°	3773.7	3729.9	3766.4	3770.1	3759.1	3799.3	3824.8	3843.1	3846.7	3817.5	3821.2
7.5°	3751.8	3715.3	3762.8	3777.4	3773.7	3810.2	3839.4	3868.6	3883.2	3861.3	3865.0
10°	3740.9	3711.7	3762.8	3784.7	3788.3	3828.5	3872.3	3912.4	3930.7	3916.1	3927.0
12.5°	3726.3	3708.0	3766.4	3799.3	3813.9	3854.0	3908.8	3956.2	3985.4	3978.1	4000.0
15°	3711.7	3697.1	3766.4	3813.9	3832.1	3868.6	3930.7	4000.0	4032.8	4029.2	4058.4
17.5°	3675.2	3671.5	3744.5	3795.6	3821.2	3865.0	3923.4	4007.3	4040.1	4047.4	4083.9
20°	3616.8	3616.8	3697.1	3751.8	3781.0	3821.2	3894.2	3974.5	4014.6	4021.9	4062.0
22.5°	3536.5	3543.8	3620.4	3675.2	3719.0	3748.2	3824.8	3908.8	3945.3	3956.2	4000.0
25°	3430.7	3438.0	3510.9	3565.7	3613.1	3646.0	3719.0	3795.6	3839.4	3850.4	3883.2
27.5°	3292.0	3306.6	3375.9	3430.7	3470.8	3492.7	3569.3	3649.6	3682.5	3693.4	3726.3
30°	3131.4	3135.0	3204.4	3251.8	3292.0	3310.2	3375.9	3459.9	3485.4	3496.3	3543.8
32.5°	2934.3	2930.7	2996.3	3040.1	3073.0	3094.9	3164.2	3219.0	3244.5	3262.8	3288.3
35°	2697.1	2693.4	2740.9	2792.0	2817.5	2824.8	2894.2	2952.6	2967.2	2981.8	3014.6
37.5°	2430.7	2430.7	2470.8	2496.3	2525.5	2536.5	2569.3	2635.0	2660.6	2656.9	2682.5
40°	2149.6	2135.0	2164.2	2189.8	2197.1	2200.7	2233.6	2284.7	2302.9	2302.9	2321.2
42.5°	1854.0	1832.1	1835.8	1850.4	1857.7	1832.1	1854.0	1886.9	1875.9	1890.5	1894.2
45°	1540.1	1507.3	1492.7	1459.9	1467.2	1441.6	1427.0	1434.3	1430.7	1394.2	1401.5
47.5°	1284.7	1226.3	1200.7	1153.3	1142.3	1113.1	1094.9	1062.0	1032.8	1032.8	1014.6
50°	1069.3	1010.9	959.9	905.1	886.9	861.3	821.2	777.4	755.5	733.6	715.3
52.5°	897.8	835.8	773.7	715.3	689.8	656.9	602.2	558.4	518.2	496.4	474.5
55°	759.1	689.8	624.1	562.0	529.2	496.4	441.6	390.5	343.1	313.9	295.6
57.5°	653.3	587.6	518.2	452.6	423.4	386.9	328.5	273.7	229.9	197.1	178.8
60°	576.6	510.9	448.9	379.6	350.4	313.9	251.8	200.7	156.9	127.7	105.8
62.5°	510.9	452.6	386.9	324.8	295.6	259.1	200.7	149.6	109.5	80.3	62.0
65°	463.5	405.1	350.4	288.3	262.8	226.3	171.5	124.1	87.6	62.0	43.8
67.5°	408.8	357.7	302.9	251.8	226.3	197.1	146.0	105.8	73.0	51.1	36.5
70°	343.1	302.9	255.5	208.0	189.8	164.2	120.4	87.6	58.4	40.1	29.2
72.5°	273.7	240.9	204.4	167.9	153.3	127.7	98.5	69.3	43.8	29.2	21.9
75°	208.0	182.5	153.3	127.7	113.1	98.5	73.0	51.1	32.8	21.9	14.6
77.5°	142.3	131.4	109.5	87.6	80.3	69.3	47.4	32.8	21.9	14.6	7.3
80°	98.5	87.6	73.0	58.4	51.1	43.8	29.2	21.9	10.9	7.3	3.6
82.5°	62.0	51.1	43.8	36.5	32.8	25.5	18.2	10.9	7.3	3.6	3.6
85°	32.8	29.2	25.5	18.2	18.2	14.6	10.9	7.3	3.6	0.0	0.0
87.5°	18.2	14.6	10.9	7.3	7.3	3.6	3.6	3.6	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°	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5
2.5°	3839.4	3839.4	3835.8	3879.6	3828.5	3879.6	3854.0	3879.6	3843.1	3839.4	3843.1
5°	3868.6	3879.6	3883.2	3923.4	3875.9	3938.0	3916.1	3938.0	3912.4	3919.7	3930.7
7.5°	3927.0	3945.3	3941.6	3992.7	3945.3	4014.6	4000.0	4032.8	4007.3	4014.6	4029.2
10°	3992.7	4014.6	4018.2	4069.3	4025.5	4109.5	4091.2	4127.7	4105.8	4116.8	4135.0
12.5°	4069.3	4094.9	4098.5	4156.9	4109.5	4197.1	4186.1	4222.6	4204.4	4215.3	4237.2
15°	4127.7	4164.2	4171.5	4229.9	4178.8	4270.1	4262.8	4310.2	4281.0	4299.3	4317.5
17.5°	4156.9	4189.8	4204.4	4259.1	4215.3	4306.6	4299.3	4339.4	4317.5	4335.8	4357.7
20°	4138.7	4178.8	4189.8	4244.5	4200.7	4292.0	4281.0	4321.2	4299.3	4313.9	4335.8
22.5°	4073.0	4113.1	4127.7	4178.8	4138.7	4222.6	4219.0	4255.5	4226.3	4244.5	4262.8
25°	3956.2	4000.0	4007.3	4054.7	4010.9	4098.5	4091.2	4131.4	4109.5	4120.4	4146.0
27.5°	3788.3	3839.4	3850.4	3890.5	3857.7	3930.7	3930.7	3963.5	3938.0	3938.0	3963.5
30°	3587.6	3638.7	3646.0	3678.8	3649.6	3715.3	3719.0	3751.8	3711.7	3733.6	3737.2
32.5°	3343.1	3375.9	3397.8	3427.0	3383.2	3467.2	3456.2	3481.8	3459.9	3459.9	3478.1
35°	3047.4	3087.6	3098.5	3135.0	3098.5	3164.2	3164.2	3178.8	3156.9	3156.9	3186.1
37.5°	2726.3	2755.5	2759.1	2795.6	2766.4	2821.2	2817.5	2828.5	2806.6	2821.2	2821.2
40°	2350.4	2372.3	2379.6	2397.8	2394.2	2434.3	2430.7	2438.0	2427.0	2430.7	2438.0
42.5°	1912.4	1941.6	1956.2	1970.8	1948.9	2003.6	1992.7	2003.6	2000.0	2003.6	2014.6
45°	1408.8	1430.7	1441.6	1445.3	1438.0	1470.8	1496.3	1474.5	1478.1	1470.8	1485.4
47.5°	1018.2	1021.9	1014.6	1036.5	1018.2	1032.8	1040.1	1043.8	1021.9	1018.2	1032.8
50°	697.1	715.3	689.8	700.7	697.1	711.7	704.4	708.0	686.1	697.1	689.8
52.5°	463.5	459.9	452.6	456.2	448.9	448.9	448.9	456.2	441.6	434.3	427.0
55°	281.0	273.7	259.1	255.5	255.5	259.1	251.8	244.5	244.5	240.9	240.9
57.5°	164.2	153.3	146.0	142.3	135.0	131.4	127.7	127.7	120.4	120.4	120.4
60°	91.2	80.3	73.0	65.7	65.7	62.0	58.4	54.7	54.7	54.7	51.1
62.5°	47.4	40.1	32.8	29.2	29.2	25.5	21.9	21.9	21.9	21.9	18.2
65°	32.8	25.5	21.9	18.2	18.2	14.6	14.6	14.6	14.6	14.6	14.6
67.5°	25.5	21.9	18.2	14.6	14.6	14.6	10.9	10.9	10.9	10.9	10.9
70°	21.9	14.6	14.6	10.9	10.9	10.9	10.9	10.9	10.9	10.9	10.9
72.5°	14.6	14.6	10.9	10.9	10.9	10.9	10.9	10.9	10.9	10.9	10.9
75°	10.9	7.3	7.3	7.3	7.3	7.3	7.3	7.3	7.3	7.3	7.3
77.5°	3.6	3.6	3.6	3.6	3.6	3.6	0.0	0.0	0.0	0.0	0.0
80°	3.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	0.0	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	0.0	0.0	0.0	0.0	0.0	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: P252195

CATALOG NUMBER: LD6B50D010TE EU6B30508035 6LBSW1LI

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5	3817.5
2.5°	3875.9	3872.3	3875.9	3883.2	3868.6	3912.4	3890.5	3912.4
5°	3959.9	3963.5	3967.2	3978.1	3959.9	4014.6	3985.4	4018.2
7.5°	4069.3	4073.0	4076.6	4087.6	4076.6	4131.4	4098.5	4127.7
10°	4182.5	4189.8	4189.8	4208.0	4197.1	4248.2	4226.3	4262.8
12.5°	4288.3	4295.6	4302.9	4313.9	4306.6	4361.3	4343.1	4372.3
15°	4372.3	4386.9	4390.5	4405.1	4397.8	4456.2	4434.3	4463.5
17.5°	4412.4	4427.0	4427.0	4445.3	4438.0	4500.0	4470.8	4503.6
20°	4390.5	4401.5	4405.1	4423.4	4416.1	4478.1	4448.9	4489.0
22.5°	4321.2	4324.8	4328.5	4346.7	4343.1	4397.8	4372.3	4397.8
25°	4193.4	4204.4	4200.7	4215.3	4215.3	4259.1	4229.9	4251.8
27.5°	4010.9	4021.9	4021.9	4040.1	4025.5	4069.3	4040.1	4073.0
30°	3788.3	3799.3	3792.0	3806.6	3792.0	3835.8	3813.9	3824.8
32.5°	3521.9	3521.9	3525.5	3529.2	3521.9	3562.0	3540.1	3562.0
35°	3204.4	3211.7	3215.3	3219.0	3211.7	3240.9	3215.3	3229.9
37.5°	2846.7	2865.0	2861.3	2865.0	2854.0	2890.5	2868.6	2875.9
40°	2463.5	2463.5	2459.9	2467.2	2456.2	2485.4	2470.8	2478.1
42.5°	2018.2	2029.2	2014.6	2032.8	2003.6	2043.8	2029.2	2018.2
45°	1514.6	1500.0	1496.3	1500.0	1489.1	1492.7	1503.6	1496.3
47.5°	1032.8	1032.8	1025.5	1014.6	1029.2	1032.8	1018.2	1018.2
50°	693.4	693.4	686.1	682.5	689.8	686.1	678.8	689.8
52.5°	441.6	427.0	427.0	434.3	427.0	419.7	430.7	423.4
55°	240.9	233.6	233.6	240.9	233.6	233.6	229.9	237.2
57.5°	116.8	120.4	116.8	116.8	116.8	116.8	113.1	116.8
60°	51.1	51.1	51.1	51.1	51.1	51.1	51.1	51.1
62.5°	21.9	21.9	18.2	18.2	18.2	18.2	18.2	18.2
65°	14.6	14.6	14.6	14.6	14.6	14.6	14.6	14.6
67.5°	10.9	10.9	10.9	10.9	10.9	14.6	10.9	10.9
70°	10.9	10.9	10.9	10.9	10.9	10.9	10.9	10.9
72.5°	10.9	10.9	14.6	14.6	14.6	14.6	14.6	14.6
75°	7.3	7.3	7.3	3.6	3.6	3.6	3.6	3.6
77.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
80°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	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



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— 0°-180° - - 45°-225° - - - 90°-270°













(END OF REPORT)