

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: P252422

Luminaire Tested: **LD6B60D010TE EU6B60709035 6LBLWW1LI**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252422
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1712-453-5)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LD6B60D010TE EU6B60709035 6LBLWW1LI
Description: PORTFOLIO 6 INCH LENS WALLWASH RECESSED DOWNLIGHT, WITH SPECULAR CLEAR TRIM
Light Source: (1) HIGH LUMEN LED 90CRI / 3500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4678.0 lumens
Efficiency: N/A
Efficacy: 74.9 lumens/watt
Spacing Criteria (0/90/45): 1.13 / 1.02 / 1.12
Luminous Opening: Circular (Dia: 0.46' x H: 0')
CIE Type: Direct

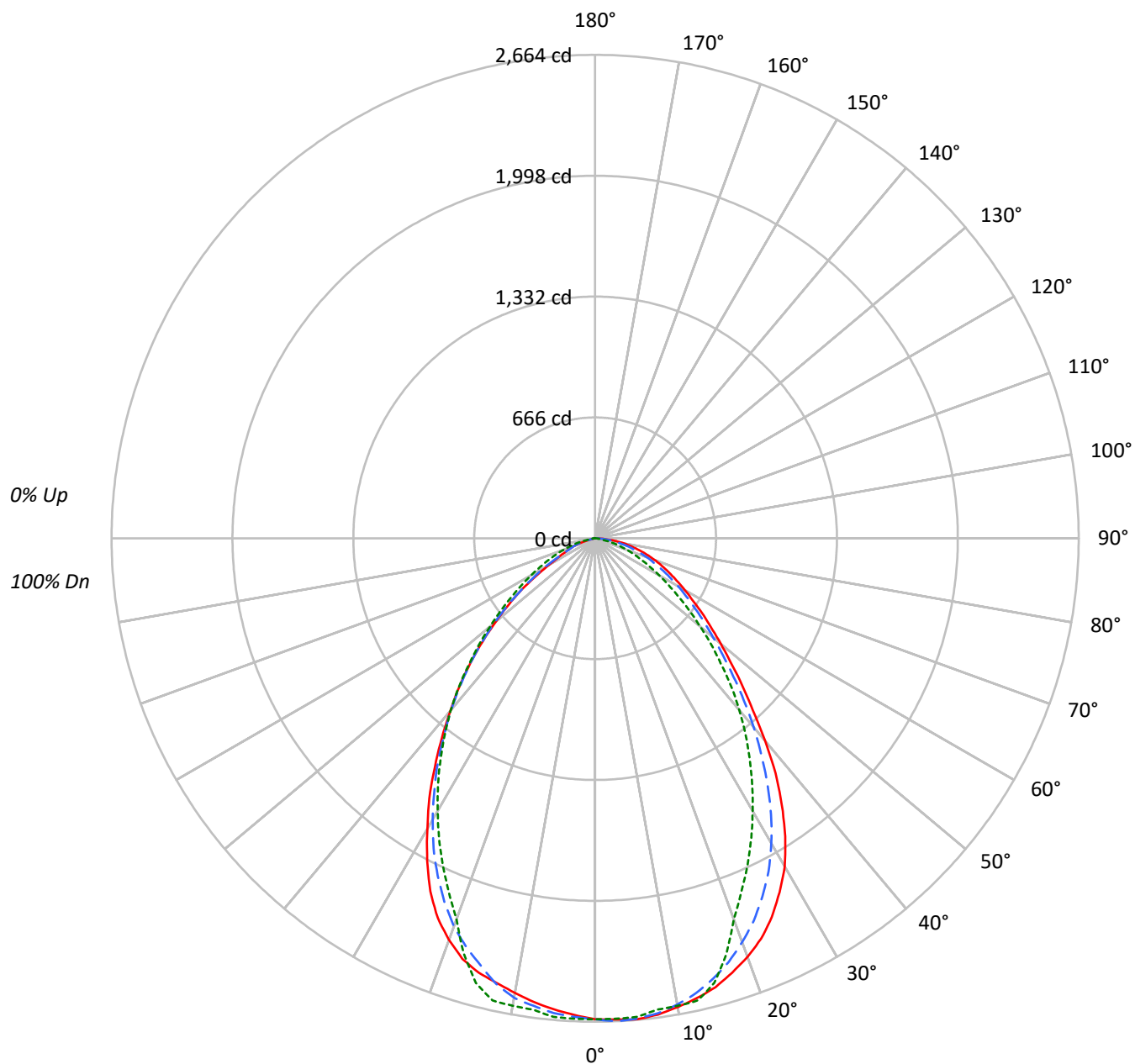
Input Watts (W): 62.48
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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				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	111	107	104	101	108	105	102	99	101	98	96	97	95	93	93	92	90	88			
2	103	96	90	86	100	94	89	85	91	86	83	88	84	81	85	82	79	77			
3	95	86	80	74	93	85	79	73	82	77	72	79	75	71	77	73	70	68			
4	88	78	71	65	86	77	70	64	74	68	64	72	67	63	70	66	62	60			
5	82	71	63	57	80	70	63	57	68	62	57	66	60	56	64	59	55	54			
6	77	65	57	51	75	64	57	51	62	56	51	61	55	50	59	54	50	48			
7	72	60	52	46	70	59	51	46	57	51	46	56	50	46	55	49	45	44			
8	67	55	47	42	66	54	47	42	53	46	42	52	46	42	51	45	41	40			
9	63	51	43	38	62	50	43	38	49	43	38	48	42	38	47	42	38	36			
10	59	47	40	35	58	47	40	35	46	40	35	45	39	35	44	39	35	33			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	172927	172927	172927
5°	174262	173365	170653
10°	173773	173316	168526
15°	172982	171354	167403
20°	170403	155108	163474
25°	165774	142977	154624
30°	157409	130696	139254
35°	142842	118160	122548
40°	124010	105248	105537
45°	105762	90520	89561
50°	91540	76518	72326
55°	81827	63822	55996
60°	74557	53001	37735
65°	69607	43579	28158
70°	66324	35461	23634
75°	62463	25157	7814
80°	59474	12924	2592
85°	48955	7710	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	250.3	5.4
10°-20°	700.1	15.0
20°-30°	966.3	20.7
30°-40°	983.3	21.0
40°-50°	790.3	16.9
50°-60°	525.5	11.2
60°-70°	299.4	6.4
70°-80°	134.5	2.9
80°-90°	28.3	0.6
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°	1916.7	41.0
0°-40°	2900.0	62.0
0°-60°	4215.8	90.1
0°-90°	4678.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4678.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	2651	2651	2651	2651	2651	
5°	2661	2658	2647	2626	2606	253
15°	2561	2513	2537	2437	2478	721
25°	2303	2179	1986	2052	2148	1055
35°	1794	1656	1484	1511	1539	1115
45°	1146	1077	981	971	971	889
55°	719	671	561	499	492	646
65°	451	403	282	182	182	449
75°	248	206	100	41	31	265
85°	65	45	10	3	0	78
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°	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6
2.5°	2654.0	2667.8	2664.4	2660.9	2664.4	2660.9	2654.0	2654.0	2647.2	2647.2	2664.4
5°	2660.9	2667.8	2664.4	2660.9	2660.9	2664.4	2650.6	2650.6	2643.7	2640.3	2657.5
7.5°	2647.2	2657.5	2650.6	2650.6	2647.2	2650.6	2636.8	2636.8	2626.5	2623.1	2640.3
10°	2623.1	2636.8	2629.9	2629.9	2629.9	2623.1	2616.2	2612.7	2602.4	2599.0	2609.3
12.5°	2595.5	2605.8	2602.4	2595.5	2595.5	2595.5	2581.7	2578.3	2564.5	2557.7	2568.0
15°	2561.1	2568.0	2564.5	2561.1	2554.2	2554.2	2540.4	2533.6	2519.8	2506.0	2512.9
17.5°	2509.5	2519.8	2512.9	2509.5	2499.1	2499.1	2485.4	2478.5	2457.8	2444.1	2447.5
20°	2454.4	2457.8	2454.4	2447.5	2437.2	2433.7	2420.0	2406.2	2389.0	2371.8	2368.3
22.5°	2389.0	2392.4	2382.1	2375.2	2364.9	2361.4	2344.2	2333.9	2306.4	2285.7	2282.3
25°	2302.9	2306.4	2306.4	2289.1	2282.3	2275.4	2258.2	2241.0	2216.9	2189.3	2179.0
27.5°	2199.6	2210.0	2203.1	2185.9	2172.1	2168.7	2151.5	2137.7	2106.7	2082.6	2068.8
30°	2089.5	2086.1	2082.6	2072.3	2051.6	2048.2	2031.0	2013.8	1989.7	1958.7	1941.5
32.5°	1948.4	1948.4	1944.9	1934.6	1913.9	1907.1	1893.3	1872.6	1845.1	1821.0	1803.8
35°	1793.5	1796.9	1793.5	1772.8	1759.0	1752.1	1745.3	1721.2	1697.1	1669.5	1655.8
37.5°	1631.7	1621.3	1624.8	1607.6	1590.4	1597.2	1576.6	1566.3	1538.7	1518.1	1504.3
40°	1456.1	1463.0	1449.2	1442.3	1432.0	1421.7	1421.7	1404.5	1390.7	1366.6	1359.7
42.5°	1284.0	1294.3	1290.9	1284.0	1270.2	1273.7	1256.5	1249.6	1232.4	1222.0	1211.7
45°	1146.3	1146.3	1146.3	1139.4	1136.0	1129.1	1118.8	1108.4	1098.1	1084.3	1077.4
47.5°	1012.0	1012.0	1015.5	1008.6	1001.7	998.3	991.4	991.4	974.2	960.4	953.5
50°	901.9	901.9	901.9	895.0	888.1	888.1	881.2	874.4	864.0	853.7	846.8
52.5°	802.1	802.1	802.1	795.2	791.7	788.3	784.9	781.4	767.6	760.8	753.9
55°	719.4	716.0	716.0	712.6	705.7	705.7	702.2	695.4	685.0	674.7	671.3
57.5°	636.8	640.3	636.8	636.8	629.9	629.9	623.1	619.6	609.3	602.4	595.5
60°	571.4	571.4	571.4	568.0	561.1	564.5	557.7	554.2	543.9	533.6	526.7
62.5°	506.0	509.5	509.5	506.0	499.1	499.1	495.7	492.3	481.9	471.6	461.3
65°	450.9	450.9	450.9	447.5	444.1	444.1	440.6	437.2	426.8	413.1	402.8
67.5°	399.3	395.9	395.9	395.9	392.4	389.0	385.5	382.1	371.8	361.4	347.7
70°	347.7	347.7	347.7	344.2	337.3	340.8	337.3	333.9	323.6	313.3	302.9
72.5°	299.5	299.5	296.0	292.6	292.6	289.2	289.2	285.7	275.4	261.6	251.3
75°	247.8	247.8	247.8	247.8	241.0	244.4	237.5	234.1	227.2	216.9	206.5
77.5°	203.1	203.1	203.1	199.7	196.2	196.2	192.8	189.3	179.0	172.1	158.3
80°	158.3	158.3	158.3	158.3	154.9	151.5	148.0	144.6	137.7	127.4	117.0
82.5°	117.0	117.0	113.6	113.6	113.6	110.2	106.7	103.3	96.4	89.5	82.6
85°	65.4	68.8	68.8	62.0	65.4	62.0	62.0	55.1	55.1	48.2	44.8
87.5°	24.1	20.7	20.7	20.7	20.7	20.7	20.7	17.2	17.2	17.2	13.8
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):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
0°	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6
2.5°	2650.6	2647.2	2660.9	2660.9	2640.3	2650.6	2654.0	2647.2	2647.2	2650.6	2640.3
5°	2643.7	2636.8	2650.6	2654.0	2633.4	2643.7	2647.2	2640.3	2643.7	2647.2	2633.4
7.5°	2619.6	2619.6	2629.9	2633.4	2612.7	2623.1	2623.1	2616.2	2619.6	2619.6	2609.3
10°	2595.5	2585.2	2595.5	2595.5	2578.3	2581.7	2588.6	2585.2	2599.0	2616.2	2616.2
12.5°	2550.8	2540.4	2557.7	2557.7	2547.3	2561.1	2578.3	2588.6	2602.4	2609.3	2588.6
15°	2495.7	2499.1	2530.1	2554.2	2543.9	2564.5	2581.7	2574.9	2557.7	2537.0	2506.0
17.5°	2423.4	2413.1	2440.6	2454.4	2440.6	2447.5	2461.3	2447.5	2420.0	2402.7	2361.4
20°	2340.8	2313.2	2313.2	2306.4	2282.3	2282.3	2278.8	2254.7	2244.4	2234.1	2216.9
22.5°	2247.8	2216.9	2206.5	2185.9	2165.2	2161.8	2151.5	2127.4	2113.6	2106.7	2086.1
25°	2141.1	2113.6	2096.4	2075.7	2044.7	2037.9	2027.5	2003.4	1996.6	1986.2	1969.0
27.5°	2031.0	1996.6	1972.5	1951.8	1924.3	1920.8	1900.2	1883.0	1869.2	1862.3	1848.5
30°	1903.6	1865.7	1848.5	1821.0	1800.3	1793.5	1776.2	1752.1	1741.8	1734.9	1724.6
32.5°	1762.5	1731.5	1714.3	1690.2	1662.6	1666.1	1645.4	1624.8	1617.9	1611.0	1600.7
35°	1624.8	1593.8	1573.1	1552.5	1535.3	1528.4	1514.6	1497.4	1487.1	1483.6	1476.8
37.5°	1473.3	1449.2	1432.0	1411.4	1397.6	1390.7	1383.8	1366.6	1359.7	1359.7	1346.0
40°	1325.3	1304.6	1290.9	1280.5	1263.3	1259.9	1253.0	1242.7	1239.2	1235.8	1225.5
42.5°	1191.0	1163.5	1153.2	1146.3	1136.0	1129.1	1125.6	1118.8	1115.3	1111.9	1101.5
45°	1063.7	1039.6	1029.3	1022.4	1012.0	1008.6	1005.2	994.8	987.9	981.1	977.6
47.5°	939.8	922.5	919.1	901.9	895.0	888.1	881.2	874.4	870.9	867.5	853.7
50°	833.0	822.7	805.5	795.2	788.3	784.9	771.1	760.8	757.3	753.9	743.5
52.5°	736.7	722.9	712.6	695.4	691.9	685.0	678.1	664.4	657.5	654.0	643.7
55°	650.6	640.3	626.5	612.7	602.4	599.0	588.6	574.9	568.0	561.1	554.2
57.5°	578.3	561.1	547.3	533.6	526.7	516.3	506.0	499.1	488.8	478.5	468.2
60°	509.5	495.7	478.5	464.7	457.8	450.9	437.2	426.8	416.5	406.2	395.9
62.5°	444.1	430.3	413.1	399.3	392.4	385.5	371.8	361.4	351.1	340.8	327.0
65°	385.5	371.8	358.0	344.2	337.3	330.5	316.7	302.9	292.6	282.3	268.5
67.5°	337.3	320.1	306.4	292.6	285.7	278.8	265.1	254.7	241.0	230.6	216.9
70°	285.7	271.9	261.6	247.8	241.0	234.1	220.3	206.5	196.2	185.9	172.1
72.5°	241.0	223.8	213.4	199.7	192.8	189.3	175.6	165.2	154.9	141.1	130.8
75°	192.8	179.0	165.2	154.9	148.0	144.6	130.8	120.5	110.2	99.8	89.5
77.5°	148.0	137.7	123.9	113.6	106.7	103.3	89.5	79.2	68.8	62.0	51.6
80°	110.2	96.4	89.5	79.2	75.7	68.8	62.0	51.6	44.8	34.4	27.5
82.5°	75.7	65.4	58.5	51.6	48.2	44.8	37.9	31.0	24.1	20.7	17.2
85°	41.3	34.4	31.0	27.5	24.1	24.1	20.7	17.2	13.8	10.3	6.9
87.5°	13.8	10.3	10.3	10.3	10.3	6.9	6.9	6.9	3.4	3.4	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):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6
2.5°	2647.2	2647.2	2647.2	2643.7	2643.7	2643.7	2640.3	2654.0	2640.3	2636.8	2647.2
5°	2643.7	2636.8	2636.8	2636.8	2636.8	2633.4	2629.9	2636.8	2626.5	2623.1	2623.1
7.5°	2623.1	2619.6	2619.6	2616.2	2612.7	2609.3	2605.8	2609.3	2599.0	2595.5	2595.5
10°	2626.5	2619.6	2619.6	2609.3	2602.4	2592.1	2581.7	2585.2	2571.4	2561.1	2561.1
12.5°	2585.2	2568.0	2557.7	2547.3	2540.4	2537.0	2523.2	2530.1	2516.3	2512.9	2512.9
15°	2492.2	2471.6	2454.4	2447.5	2447.5	2440.6	2430.3	2444.1	2437.2	2440.6	2457.8
17.5°	2347.7	2337.3	2327.0	2323.6	2327.0	2333.9	2340.8	2361.4	2361.4	2371.8	2389.0
20°	2220.3	2213.4	2220.3	2220.3	2223.7	2237.5	2251.3	2268.5	2275.4	2285.7	2309.8
22.5°	2096.4	2096.4	2103.3	2113.6	2110.1	2134.2	2137.7	2168.7	2168.7	2189.3	2210.0
25°	1975.9	1975.9	1982.8	1986.2	1993.1	2006.9	2020.6	2044.7	2051.6	2072.3	2089.5
27.5°	1858.9	1855.4	1855.4	1858.9	1865.7	1883.0	1889.8	1917.4	1927.7	1941.5	1958.7
30°	1728.0	1724.6	1731.5	1738.4	1734.9	1752.1	1762.5	1783.1	1790.0	1803.8	1817.6
32.5°	1604.1	1604.1	1604.1	1611.0	1611.0	1624.8	1624.8	1648.9	1648.9	1659.2	1673.0
35°	1476.8	1476.8	1480.2	1483.6	1487.1	1490.5	1494.0	1507.7	1511.2	1514.6	1521.5
37.5°	1356.3	1352.8	1356.3	1356.3	1349.4	1363.2	1363.2	1376.9	1366.6	1376.9	1380.4
40°	1232.4	1232.4	1228.9	1228.9	1228.9	1235.8	1228.9	1239.2	1232.4	1239.2	1235.8
42.5°	1105.0	1105.0	1098.1	1105.0	1101.5	1101.5	1101.5	1108.4	1098.1	1105.0	1108.4
45°	977.6	974.2	974.2	970.7	970.7	970.7	974.2	974.2	970.7	977.6	977.6
47.5°	853.7	850.3	850.3	850.3	850.3	853.7	843.4	850.3	843.4	843.4	843.4
50°	747.0	743.5	740.1	736.7	733.2	733.2	729.8	729.8	722.9	719.4	716.0
52.5°	643.7	640.3	633.4	633.4	629.9	626.5	616.2	616.2	605.9	602.4	602.4
55°	550.8	540.4	537.0	530.1	530.1	523.2	516.3	509.5	499.1	492.3	492.3
57.5°	464.7	454.4	447.5	444.1	440.6	433.7	420.0	416.5	402.8	399.3	395.9
60°	389.0	378.7	368.3	361.4	358.0	347.7	333.9	327.0	320.1	309.8	299.5
62.5°	316.7	306.4	292.6	289.2	282.3	271.9	261.6	251.3	244.4	234.1	227.2
65°	254.7	244.4	234.1	227.2	220.3	210.0	199.7	189.3	182.4	179.0	175.6
67.5°	206.5	192.8	182.4	179.0	172.1	165.2	154.9	151.5	144.6	144.6	144.6
70°	161.8	151.5	141.1	137.7	134.3	127.4	120.5	120.5	120.5	120.5	120.5
72.5°	120.5	113.6	103.3	99.8	96.4	92.9	86.1	89.5	86.1	86.1	86.1
75°	75.7	68.8	62.0	58.5	55.1	51.6	48.2	44.8	41.3	37.9	37.9
77.5°	41.3	34.4	31.0	27.5	27.5	24.1	20.7	20.7	17.2	17.2	17.2
80°	24.1	20.7	17.2	13.8	13.8	10.3	10.3	10.3	10.3	6.9	6.9
82.5°	13.8	10.3	6.9	6.9	6.9	6.9	3.4	3.4	3.4	3.4	3.4
85°	6.9	6.9	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	0.0
87.5°	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	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



TEST NUMBER: P252422

CATALOG NUMBER: LD6B60D010TE EU6B60709035 6LBLWW1LI

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6	2650.6
2.5°	2629.9	2640.3	2629.9	2640.3	2640.3	2640.3	2640.3	2629.9
5°	2612.7	2619.6	2609.3	2616.2	2619.6	2616.2	2616.2	2605.8
7.5°	2581.7	2588.6	2578.3	2588.6	2592.1	2588.6	2585.2	2578.3
10°	2550.8	2554.2	2543.9	2550.8	2557.7	2557.7	2554.2	2543.9
12.5°	2502.6	2512.9	2502.6	2509.5	2516.3	2519.8	2519.8	2509.5
15°	2447.5	2464.7	2457.8	2468.2	2478.5	2481.9	2481.9	2478.5
17.5°	2392.4	2409.6	2399.3	2416.5	2426.8	2433.7	2437.2	2430.3
20°	2313.2	2333.9	2327.0	2340.8	2354.6	2364.9	2364.9	2354.6
22.5°	2210.0	2237.5	2234.1	2244.4	2261.6	2265.1	2271.9	2265.1
25°	2096.4	2117.0	2113.6	2123.9	2144.6	2144.6	2148.0	2148.0
27.5°	1965.6	1986.2	1982.8	1989.7	2003.4	2006.9	2010.3	2003.4
30°	1824.4	1834.8	1834.8	1845.1	1855.4	1858.9	1858.9	1848.5
32.5°	1669.5	1683.3	1690.2	1686.7	1697.1	1704.0	1700.5	1700.5
35°	1528.4	1531.8	1535.3	1538.7	1542.2	1549.0	1542.2	1538.7
37.5°	1376.9	1387.3	1380.4	1387.3	1394.1	1390.7	1387.3	1387.3
40°	1239.2	1242.7	1235.8	1242.7	1246.1	1246.1	1246.1	1239.2
42.5°	1101.5	1108.4	1101.5	1108.4	1108.4	1108.4	1108.4	1105.0
45°	963.9	970.7	970.7	974.2	974.2	970.7	970.7	970.7
47.5°	836.5	843.4	836.5	843.4	846.8	839.9	839.9	839.9
50°	716.0	712.6	712.6	716.0	716.0	716.0	716.0	712.6
52.5°	592.1	595.5	595.5	595.5	599.0	595.5	599.0	599.0
55°	485.4	485.4	485.4	488.8	485.4	485.4	488.8	492.3
57.5°	389.0	385.5	382.1	382.1	385.5	382.1	382.1	382.1
60°	299.5	296.0	292.6	292.6	292.6	292.6	292.6	289.2
62.5°	223.8	223.8	223.8	227.2	227.2	227.2	227.2	230.6
65°	179.0	179.0	179.0	179.0	179.0	179.0	179.0	182.4
67.5°	144.6	144.6	144.6	148.0	148.0	148.0	148.0	148.0
70°	120.5	120.5	123.9	120.5	123.9	123.9	123.9	123.9
72.5°	82.6	82.6	82.6	82.6	82.6	79.2	82.6	79.2
75°	34.4	34.4	34.4	34.4	34.4	34.4	34.4	31.0
77.5°	13.8	13.8	13.8	13.8	13.8	13.8	13.8	13.8
80°	6.9	6.9	6.9	6.9	6.9	6.9	6.9	6.9
82.5°	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	3.4	3.4	3.4	3.4	3.4	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)