

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: P252315

Luminaire Tested: **LD6B60D010TE EU6B60709024 6LBSW1H**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252315
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 EU6B60709024 6LBSW1H
Description: PORTFOLIO 6 INCH SINGLE WALLWASH RECESSED DOWNLIGHT, WITH HAZE TRIM
Light Source: (1) HIGH LUMEN LED 90CRI / 2400K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3989.0 lumens
Efficiency: N/A
Efficacy: 63.8 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

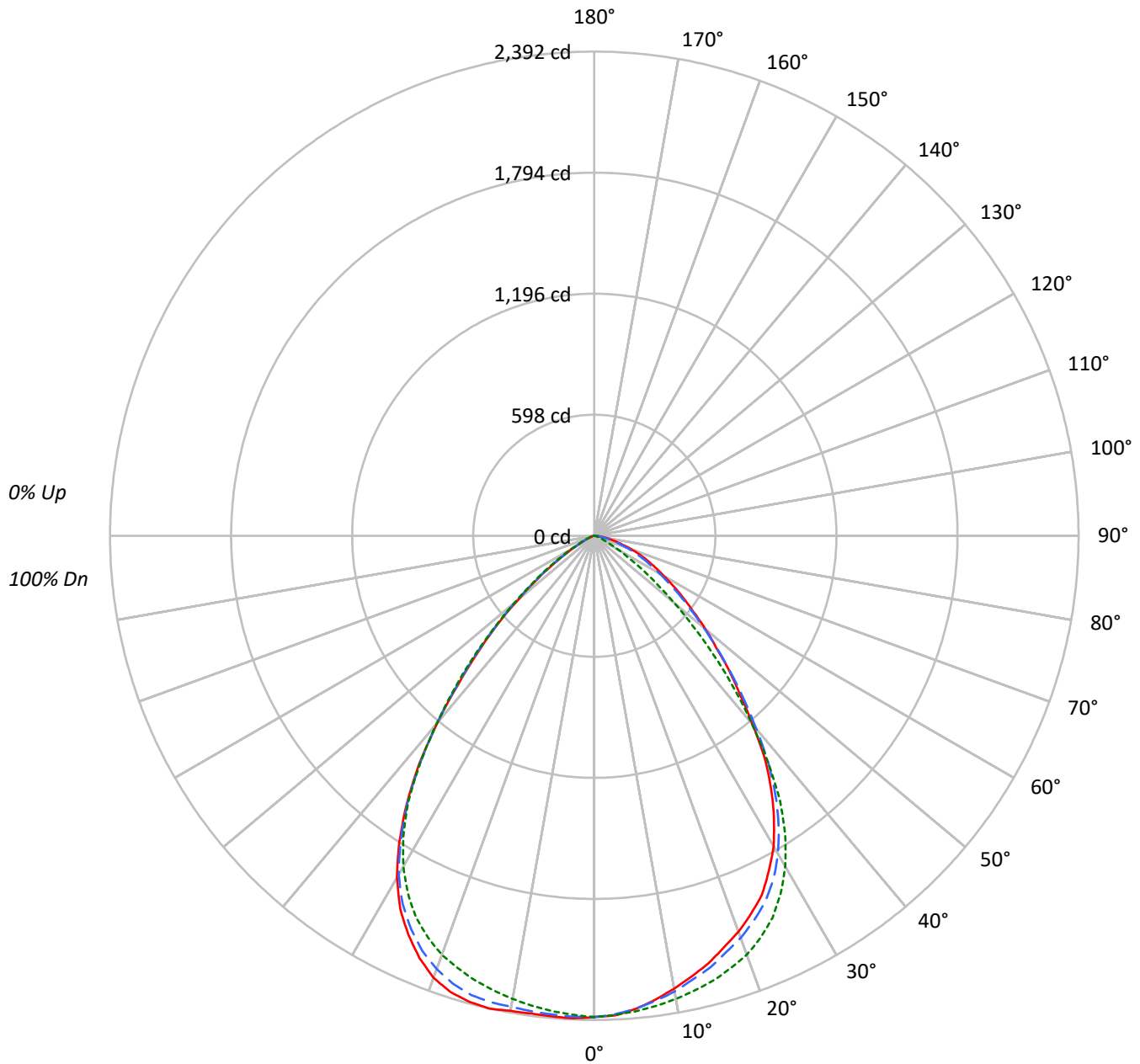
Input Watts (W): 62.48
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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				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						
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°	155123	155123	155123
5°	153646	154399	156088
10°	150474	153899	157893
15°	147600	153611	160980
20°	144541	152914	161287
25°	140976	149866	156481
30°	133476	142124	146885
35°	121218	127391	128530
40°	103451	102957	102471
45°	86904	77096	74716
50°	72570	52169	49551
55°	61080	32007	29073
60°	51710	16858	14614
65°	44768	8861	7086
70°	37254	5475	3834
75°	27501	3630	2168
80°	21566	2142	1090
85°	17217	2171	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	224.1	5.6
10°-20°	641.6	16.1
20°-30°	947.4	23.8
30°-40°	976.4	24.5
40°-50°	674.4	16.9
50°-60°	332.4	8.3
60°-70°	134.7	3.4
70°-80°	48.0	1.2
80°-90°	9.9	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°	1813.1	45.5
0°-40°	2789.6	69.9
0°-60°	3796.4	95.2
0°-90°	3989.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3989.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	2378	2378	2378	2378	2378	
5°	2346	2346	2358	2375	2383	222
15°	2185	2208	2274	2349	2383	615
25°	1958	1996	2082	2142	2174	895
35°	1522	1559	1600	1608	1614	943
45°	942	948	836	824	810	728
55°	537	517	281	264	256	485
65°	290	261	57	46	46	288
75°	109	92	14	9	9	122
85°	23	17	3	0	0	28
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°	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7
2.5°	2371.9	2363.3	2369.1	2357.6	2371.9	2357.6	2360.5	2363.3	2360.5	2363.3	2366.2
5°	2346.1	2337.5	2346.1	2331.7	2346.1	2337.5	2337.5	2340.4	2340.4	2343.2	2346.1
7.5°	2311.6	2303.0	2311.6	2297.3	2314.5	2305.9	2305.9	2311.6	2308.8	2311.6	2317.4
10°	2271.4	2260.0	2268.6	2260.0	2277.2	2265.7	2271.4	2271.4	2271.4	2280.1	2285.8
12.5°	2228.4	2216.9	2228.4	2214.0	2231.2	2222.6	2225.5	2234.1	2237.0	2242.7	2245.6
15°	2185.3	2170.9	2176.7	2168.1	2185.3	2176.7	2179.5	2191.0	2191.0	2199.6	2208.3
17.5°	2130.7	2119.2	2130.7	2119.2	2133.6	2127.9	2133.6	2142.2	2142.2	2150.8	2159.4
20°	2081.9	2070.4	2079.0	2070.4	2087.7	2079.0	2081.9	2093.4	2096.3	2104.9	2113.5
22.5°	2021.6	2013.0	2018.7	2010.1	2027.4	2021.6	2024.5	2036.0	2038.8	2044.6	2058.9
25°	1958.4	1941.2	1949.8	1944.1	1961.3	1952.7	1958.4	1969.9	1975.7	1984.3	1995.8
27.5°	1866.5	1857.9	1863.7	1863.7	1878.0	1869.4	1872.3	1883.8	1892.4	1901.0	1915.4
30°	1771.8	1757.4	1763.2	1766.0	1777.5	1771.8	1777.5	1789.0	1791.9	1803.4	1814.9
32.5°	1651.2	1645.4	1656.9	1651.2	1656.9	1656.9	1659.8	1668.4	1674.1	1679.9	1694.2
35°	1522.0	1510.5	1522.0	1516.2	1530.6	1522.0	1530.6	1539.2	1539.2	1550.7	1559.3
37.5°	1381.2	1366.9	1372.6	1372.6	1378.4	1375.5	1375.5	1389.9	1392.7	1401.3	1410.0
40°	1214.7	1208.9	1220.4	1217.6	1220.4	1220.4	1223.3	1231.9	1237.7	1240.5	1243.4
42.5°	1065.4	1068.2	1071.1	1071.1	1071.1	1071.1	1071.1	1082.6	1079.7	1088.3	1091.2
45°	941.9	930.4	936.1	933.3	941.9	933.3	941.9	950.5	944.8	953.4	947.6
47.5°	815.5	815.5	815.5	812.7	818.4	815.5	821.3	824.2	824.2	824.2	821.3
50°	715.0	706.4	709.3	709.3	712.2	709.3	715.0	717.9	717.9	712.2	700.7
52.5°	617.4	614.5	614.5	620.3	620.3	617.4	617.4	617.4	617.4	608.8	603.0
55°	537.0	531.2	534.1	534.1	534.1	534.1	537.0	534.1	534.1	525.5	516.9
57.5°	465.2	459.5	459.5	459.5	462.3	459.5	459.5	459.5	456.6	448.0	436.5
60°	396.3	393.4	396.3	396.3	399.2	396.3	396.3	396.3	390.5	381.9	370.4
62.5°	338.8	338.8	338.8	341.7	341.7	338.8	338.8	336.0	333.1	321.6	310.1
65°	290.0	287.2	290.0	290.0	292.9	292.9	290.0	287.2	284.3	272.8	261.3
67.5°	241.2	238.3	241.2	241.2	244.1	241.2	241.2	241.2	232.6	226.9	215.4
70°	195.3	192.4	192.4	192.4	195.3	189.5	192.4	192.4	186.7	178.0	166.6
72.5°	149.3	149.3	149.3	149.3	149.3	149.3	146.5	146.5	140.7	132.1	126.4
75°	109.1	109.1	112.0	112.0	109.1	109.1	109.1	106.2	103.4	97.6	91.9
77.5°	80.4	80.4	80.4	80.4	77.5	77.5	77.5	74.7	71.8	68.9	63.2
80°	57.4	57.4	57.4	54.6	57.4	54.6	54.6	54.6	48.8	45.9	43.1
82.5°	40.2	37.3	37.3	37.3	37.3	37.3	37.3	34.5	34.5	31.6	28.7
85°	23.0	23.0	23.0	23.0	23.0	23.0	23.0	23.0	20.1	17.2	17.2
87.5°	11.5	14.4	14.4	14.4	14.4	14.4	14.4	11.5	11.5	11.5	8.6
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°	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7
2.5°	2366.2	2366.2	2371.9	2363.3	2377.7	2369.1	2366.2	2380.6	2371.9	2369.1	2374.8
5°	2346.1	2349.0	2351.8	2346.1	2360.5	2351.8	2351.8	2366.2	2360.5	2357.6	2366.2
7.5°	2320.3	2323.1	2328.9	2326.0	2337.5	2331.7	2334.6	2349.0	2343.2	2343.2	2351.8
10°	2288.7	2294.4	2300.2	2300.2	2314.5	2308.8	2308.8	2326.0	2320.3	2323.1	2334.6
12.5°	2251.3	2260.0	2268.6	2271.4	2285.8	2277.2	2280.1	2300.2	2297.3	2300.2	2311.6
15°	2211.1	2222.6	2231.2	2231.2	2248.5	2239.9	2248.5	2268.6	2262.8	2274.3	2288.7
17.5°	2165.2	2176.7	2188.2	2191.0	2208.3	2202.5	2214.0	2234.1	2234.1	2239.9	2257.1
20°	2122.1	2136.5	2142.2	2150.8	2168.1	2165.2	2170.9	2193.9	2193.9	2202.5	2219.8
22.5°	2064.7	2079.0	2090.5	2099.1	2113.5	2113.5	2122.1	2142.2	2142.2	2148.0	2165.2
25°	2001.5	2018.7	2027.4	2036.0	2050.3	2047.5	2056.1	2073.3	2076.2	2081.9	2099.1
27.5°	1921.1	1935.5	1946.9	1952.7	1972.8	1961.3	1969.9	1990.0	1987.2	1992.9	2007.3
30°	1820.6	1835.0	1846.4	1846.4	1863.7	1863.7	1872.3	1880.9	1880.9	1886.6	1898.1
32.5°	1702.9	1720.1	1720.1	1728.7	1740.2	1728.7	1740.2	1751.7	1745.9	1754.6	1763.2
35°	1567.9	1576.5	1579.4	1579.4	1588.0	1585.1	1582.3	1590.9	1585.1	1599.5	1608.1
37.5°	1404.2	1415.7	1410.0	1415.7	1412.8	1404.2	1404.2	1418.6	1407.1	1410.0	1418.6
40°	1246.3	1246.3	1243.4	1229.0	1231.9	1223.3	1220.4	1223.3	1211.8	1208.9	1220.4
42.5°	1082.6	1079.7	1071.1	1051.0	1053.9	1039.5	1028.0	1028.0	1022.3	1019.4	1022.3
45°	936.1	927.5	913.2	890.2	884.5	873.0	850.0	844.3	835.6	835.6	838.5
47.5°	801.2	789.7	766.7	740.9	726.5	712.2	689.2	680.6	666.2	660.5	666.2
50°	689.2	669.1	640.4	603.0	588.7	571.4	548.5	534.1	519.8	514.0	511.1
52.5°	585.8	557.1	528.4	482.4	470.9	453.7	422.1	407.8	393.4	381.9	381.9
55°	496.8	470.9	430.7	387.7	370.4	353.2	321.6	301.5	287.2	281.4	275.7
57.5°	416.4	387.7	350.3	304.4	287.2	269.9	238.3	218.2	203.9	195.3	189.5
60°	350.3	318.7	281.4	241.2	221.1	203.9	172.3	152.2	137.8	129.2	123.5
62.5°	287.2	261.3	224.0	186.7	169.4	152.2	126.4	106.2	91.9	86.1	77.5
65°	241.2	215.4	180.9	149.3	135.0	117.7	94.8	77.5	66.0	57.4	51.7
67.5°	195.3	175.2	146.5	117.7	103.4	91.9	71.8	57.4	45.9	40.2	37.3
70°	155.1	135.0	112.0	89.0	80.4	68.9	54.6	40.2	34.5	28.7	25.8
72.5°	114.9	100.5	83.3	66.0	57.4	51.7	37.3	31.6	23.0	20.1	17.2
75°	83.3	71.8	60.3	45.9	40.2	37.3	28.7	20.1	17.2	14.4	11.5
77.5°	57.4	51.7	40.2	31.6	28.7	25.8	20.1	14.4	11.5	8.6	8.6
80°	37.3	31.6	25.8	20.1	20.1	17.2	11.5	8.6	8.6	5.7	5.7
82.5°	23.0	20.1	17.2	14.4	11.5	11.5	8.6	5.7	5.7	2.9	2.9
85°	14.4	11.5	8.6	8.6	5.7	5.7	5.7	2.9	2.9	2.9	2.9
87.5°	5.7	5.7	5.7	2.9	2.9	2.9	2.9	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°	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7
2.5°	2374.8	2374.8	2380.6	2371.9	2377.7	2377.7	2383.4	2371.9	2377.7	2380.6	2386.3
5°	2363.3	2366.2	2371.9	2369.1	2371.9	2371.9	2377.7	2363.3	2374.8	2374.8	2383.4
7.5°	2351.8	2351.8	2357.6	2354.7	2360.5	2363.3	2369.1	2357.6	2369.1	2369.1	2377.7
10°	2337.5	2337.5	2346.1	2343.2	2351.8	2354.7	2363.3	2351.8	2363.3	2366.2	2374.8
12.5°	2317.4	2320.3	2328.9	2328.9	2337.5	2343.2	2351.8	2346.1	2360.5	2363.3	2374.8
15°	2294.4	2300.2	2311.6	2308.8	2317.4	2326.0	2337.5	2328.9	2349.0	2354.7	2366.2
17.5°	2265.7	2271.4	2280.1	2280.1	2288.7	2294.4	2308.8	2303.0	2320.3	2323.1	2337.5
20°	2222.6	2231.2	2242.7	2239.9	2248.5	2254.2	2265.7	2260.0	2277.2	2282.9	2297.3
22.5°	2170.9	2176.7	2185.3	2185.3	2193.9	2199.6	2211.1	2202.5	2219.8	2222.6	2234.1
25°	2102.0	2107.8	2113.5	2116.4	2125.0	2127.9	2133.6	2127.9	2142.2	2145.1	2159.4
27.5°	2013.0	2015.9	2024.5	2024.5	2030.2	2033.1	2041.7	2030.2	2050.3	2050.3	2058.9
30°	1906.7	1903.9	1915.4	1909.6	1915.4	1915.4	1924.0	1918.2	1932.6	1926.8	1935.5
32.5°	1766.0	1771.8	1771.8	1766.0	1777.5	1774.7	1774.7	1768.9	1777.5	1780.4	1786.1
35°	1602.4	1611.0	1611.0	1613.8	1616.7	1608.1	1611.0	1593.7	1608.1	1611.0	1613.8
37.5°	1424.3	1415.7	1421.4	1412.8	1427.2	1410.0	1410.0	1398.5	1410.0	1410.0	1412.8
40°	1220.4	1217.6	1223.3	1217.6	1214.7	1211.8	1206.1	1197.5	1208.9	1203.2	1211.8
42.5°	1028.0	1025.2	1025.2	1019.4	1016.5	1016.5	1010.8	1005.1	1002.2	1002.2	1016.5
45°	829.9	835.6	829.9	827.0	832.8	827.0	829.9	818.4	824.2	818.4	824.2
47.5°	663.3	666.2	660.5	654.7	663.3	654.7	654.7	646.1	657.6	657.6	651.9
50°	514.0	511.1	505.4	511.1	508.3	508.3	508.3	499.7	505.4	496.8	502.5
52.5°	379.1	376.2	376.2	373.3	376.2	373.3	373.3	370.4	370.4	367.6	370.4
55°	275.7	272.8	267.1	267.1	267.1	269.9	267.1	264.2	264.2	261.3	264.2
57.5°	186.7	180.9	180.9	180.9	180.9	178.0	178.0	175.2	178.0	175.2	178.0
60°	120.6	120.6	114.9	114.9	114.9	114.9	114.9	112.0	114.9	114.9	114.9
62.5°	74.7	74.7	71.8	68.9	71.8	68.9	68.9	68.9	71.8	68.9	71.8
65°	48.8	45.9	45.9	45.9	45.9	45.9	45.9	45.9	45.9	45.9	45.9
67.5°	34.5	31.6	31.6	31.6	31.6	31.6	31.6	28.7	31.6	31.6	31.6
70°	23.0	23.0	20.1	20.1	20.1	20.1	20.1	20.1	20.1	20.1	20.1
72.5°	14.4	14.4	14.4	14.4	14.4	14.4	14.4	14.4	14.4	14.4	14.4
75°	11.5	8.6	8.6	8.6	8.6	8.6	8.6	8.6	8.6	8.6	8.6
77.5°	8.6	5.7	5.7	5.7	5.7	5.7	5.7	5.7	5.7	5.7	5.7
80°	5.7	5.7	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9
82.5°	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9
85°	2.9	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	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9
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: P252315

CATALOG NUMBER: LD6B60D010TE EU6B60709024 6LBSW1H

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7	2377.7
2.5°	2377.7	2380.6	2374.8	2377.7	2371.9	2377.7	2380.6	2386.3
5°	2371.9	2374.8	2369.1	2374.8	2369.1	2374.8	2377.7	2383.4
7.5°	2366.2	2371.9	2366.2	2371.9	2366.2	2371.9	2374.8	2380.6
10°	2366.2	2374.8	2369.1	2377.7	2369.1	2374.8	2380.6	2383.4
12.5°	2366.2	2374.8	2371.9	2377.7	2374.8	2380.6	2386.3	2392.0
15°	2360.5	2369.1	2363.3	2371.9	2369.1	2371.9	2383.4	2383.4
17.5°	2328.9	2337.5	2337.5	2343.2	2343.2	2351.8	2357.6	2363.3
20°	2288.7	2297.3	2294.4	2303.0	2303.0	2311.6	2317.4	2323.1
22.5°	2228.4	2239.9	2237.0	2245.6	2242.7	2248.5	2260.0	2257.1
25°	2150.8	2165.2	2162.3	2168.1	2165.2	2165.2	2170.9	2173.8
27.5°	2056.1	2064.7	2061.8	2067.6	2061.8	2067.6	2073.3	2076.2
30°	1932.6	1938.3	1935.5	1938.3	1935.5	1941.2	1944.1	1949.8
32.5°	1783.3	1791.9	1783.3	1789.0	1786.1	1786.1	1797.6	1791.9
35°	1605.2	1608.1	1611.0	1611.0	1605.2	1608.1	1613.8	1613.8
37.5°	1407.1	1421.4	1404.2	1412.8	1410.0	1410.0	1410.0	1418.6
40°	1200.3	1203.2	1197.5	1197.5	1197.5	1194.6	1206.1	1203.2
42.5°	1005.1	1007.9	1005.1	996.4	999.3	999.3	1007.9	996.4
45°	815.5	821.3	818.4	818.4	812.7	812.7	815.5	809.8
47.5°	646.1	651.9	643.2	646.1	640.4	646.1	643.2	649.0
50°	491.0	496.8	493.9	496.8	496.8	491.0	499.7	488.2
52.5°	367.6	370.4	367.6	364.7	361.8	361.8	367.6	364.7
55°	261.3	258.4	258.4	258.4	261.3	261.3	258.4	255.6
57.5°	175.2	175.2	172.3	172.3	175.2	169.4	172.3	169.4
60°	112.0	112.0	112.0	112.0	109.1	112.0	112.0	112.0
62.5°	68.9	68.9	68.9	68.9	68.9	68.9	68.9	68.9
65°	45.9	45.9	45.9	45.9	45.9	45.9	45.9	45.9
67.5°	28.7	31.6	31.6	31.6	28.7	28.7	28.7	28.7
70°	20.1	20.1	20.1	20.1	20.1	20.1	20.1	20.1
72.5°	14.4	14.4	14.4	14.4	14.4	14.4	14.4	14.4
75°	8.6	8.6	8.6	8.6	8.6	8.6	8.6	8.6
77.5°	5.7	5.7	5.7	5.7	5.7	5.7	5.7	5.7
80°	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9
82.5°	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	2.9	2.9	2.9	2.9	2.9	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)