

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: P252406

Luminaire Tested: **LD6B50D010TE EU6B30509024 6LBLWW1LI**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P252406
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: LD6B50D010TE EU6B30509024 6LBLWW1LI
Description: PORTFOLIO 6 INCH LENS WALLWASH RECESSED DOWNLIGHT, WITH SPECULAR CLEAR TRIM
Light Source: (1) HIGH LUMEN LED 90CRI / 2400K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3493.0 lumens
Efficiency: N/A
Efficacy: 59.4 lumens/watt
Spacing Criteria (0/90/45): 1.13 / 1.03 / 1.12
Luminous Opening: Circular (Dia: 0.46' x H: 0')
CIE Type: Direct

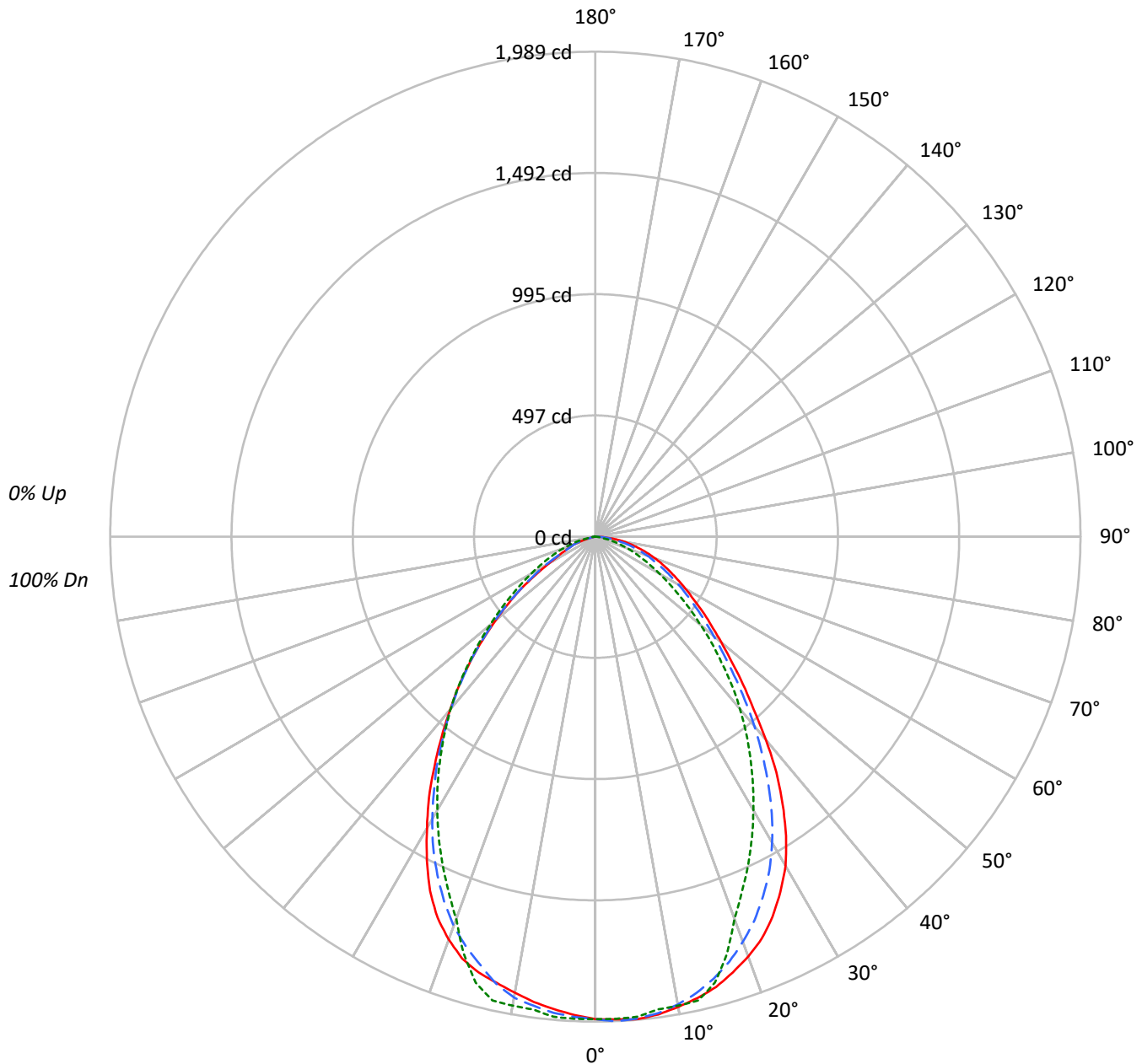
Input Watts (W): 58.77
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	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°	129124	129124	129124
5°	130122	129447	127424
10°	129752	129414	125836
15°	129161	127945	124993
20°	127240	115819	122061
25°	123786	106761	115457
30°	117535	97594	103983
35°	106651	88230	91503
40°	92601	78591	78804
45°	78969	67584	66873
50°	68348	57132	54006
55°	61103	47659	41812
60°	55676	39575	28171
65°	51977	32542	21026
70°	49519	26476	17644
75°	46658	18779	5823
80°	44408	9656	1916
85°	36529	5764	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	186.9	5.4
10°-20°	522.7	15.0
20°-30°	721.5	20.7
30°-40°	734.2	21.0
40°-50°	590.1	16.9
50°-60°	392.4	11.2
60°-70°	223.6	6.4
70°-80°	100.4	2.9
80°-90°	21.2	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°	1431.2	41.0
0°-40°	2165.4	62.0
0°-60°	3147.8	90.1
0°-90°	3493.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3493.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	1979	1979	1979	1979	1979	
5°	1987	1984	1977	1961	1946	189
15°	1912	1876	1894	1820	1851	538
25°	1720	1627	1483	1532	1604	788
35°	1339	1236	1108	1128	1149	832
45°	856	804	732	725	725	664
55°	537	501	419	373	368	483
65°	337	301	211	136	136	335
75°	185	154	74	31	23	198
85°	49	33	8	3	0	58
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°	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2
2.5°	1981.7	1992.0	1989.4	1986.9	1989.4	1986.9	1981.7	1981.7	1976.6	1976.6	1989.4
5°	1986.9	1992.0	1989.4	1986.9	1986.9	1989.4	1979.2	1979.2	1974.0	1971.5	1984.3
7.5°	1976.6	1984.3	1979.2	1979.2	1976.6	1979.2	1968.9	1968.9	1961.2	1958.6	1971.5
10°	1958.6	1968.9	1963.7	1963.7	1963.7	1958.6	1953.5	1950.9	1943.2	1940.6	1948.3
12.5°	1938.0	1945.7	1943.2	1938.0	1938.0	1938.0	1927.8	1925.2	1914.9	1909.8	1917.5
15°	1912.3	1917.5	1914.9	1912.3	1907.2	1907.2	1896.9	1891.8	1881.5	1871.2	1876.3
17.5°	1873.8	1881.5	1876.3	1873.8	1866.1	1866.1	1855.8	1850.6	1835.2	1824.9	1827.5
20°	1832.7	1835.2	1832.7	1827.5	1819.8	1817.2	1807.0	1796.7	1783.8	1771.0	1768.4
22.5°	1783.8	1786.4	1778.7	1773.5	1765.8	1763.3	1750.4	1742.7	1722.1	1706.7	1704.1
25°	1719.6	1722.1	1722.1	1709.3	1704.1	1699.0	1686.1	1673.3	1655.3	1634.7	1627.0
27.5°	1642.4	1650.2	1645.0	1632.2	1621.9	1619.3	1606.5	1596.2	1573.0	1555.1	1544.8
30°	1560.2	1557.6	1555.1	1547.3	1531.9	1529.4	1516.5	1503.6	1485.7	1462.5	1449.7
32.5°	1454.8	1454.8	1452.2	1444.5	1429.1	1424.0	1413.7	1398.3	1377.7	1359.7	1346.9
35°	1339.1	1341.7	1339.1	1323.7	1313.4	1308.3	1303.2	1285.2	1267.2	1246.6	1236.3
37.5°	1218.3	1210.6	1213.2	1200.3	1187.5	1192.6	1177.2	1169.5	1148.9	1133.5	1123.2
40°	1087.3	1092.4	1082.1	1077.0	1069.3	1061.6	1061.6	1048.7	1038.4	1020.4	1015.3
42.5°	958.7	966.4	963.9	958.7	948.5	951.0	938.2	933.0	920.2	912.5	904.8
45°	855.9	855.9	855.9	850.8	848.2	843.1	835.4	827.6	819.9	809.7	804.5
47.5°	755.7	755.7	758.3	753.1	748.0	745.4	740.3	740.3	727.4	717.1	712.0
50°	673.4	673.4	673.4	668.3	663.1	663.1	658.0	652.9	645.2	637.4	632.3
52.5°	598.9	598.9	598.9	593.7	591.2	588.6	586.0	583.5	573.2	568.0	562.9
55°	537.2	534.6	534.6	532.1	526.9	526.9	524.3	519.2	511.5	503.8	501.2
57.5°	475.5	478.1	475.5	475.5	470.4	470.4	465.2	462.7	455.0	449.8	444.7
60°	426.7	426.7	426.7	424.1	419.0	421.5	416.4	413.8	406.1	398.4	393.3
62.5°	377.8	380.4	380.4	377.8	372.7	372.7	370.1	367.6	359.8	352.1	344.4
65°	336.7	336.7	336.7	334.1	331.6	331.6	329.0	326.4	318.7	308.4	300.7
67.5°	298.2	295.6	295.6	295.6	293.0	290.4	287.9	285.3	277.6	269.9	259.6
70°	259.6	259.6	259.6	257.0	251.9	254.5	251.9	249.3	241.6	233.9	226.2
72.5°	223.6	223.6	221.0	218.5	218.5	215.9	215.9	213.3	205.6	195.3	187.6
75°	185.1	185.1	185.1	185.1	179.9	182.5	177.4	174.8	169.6	161.9	154.2
77.5°	151.7	151.7	151.7	149.1	146.5	146.5	143.9	141.4	133.7	128.5	118.2
80°	118.2	118.2	118.2	118.2	115.7	113.1	110.5	108.0	102.8	95.1	87.4
82.5°	87.4	87.4	84.8	84.8	84.8	82.3	79.7	77.1	72.0	66.8	61.7
85°	48.8	51.4	51.4	46.3	48.8	46.3	46.3	41.1	41.1	36.0	33.4
87.5°	18.0	15.4	15.4	15.4	15.4	15.4	15.4	12.9	12.9	12.9	10.3
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°	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2
2.5°	1979.2	1976.6	1986.9	1986.9	1971.5	1979.2	1981.7	1976.6	1976.6	1979.2	1971.5
5°	1974.0	1968.9	1979.2	1981.7	1966.3	1974.0	1976.6	1971.5	1974.0	1976.6	1966.3
7.5°	1956.0	1956.0	1963.7	1966.3	1950.9	1958.6	1958.6	1953.5	1956.0	1956.0	1948.3
10°	1938.0	1930.3	1938.0	1938.0	1925.2	1927.8	1932.9	1930.3	1940.6	1953.5	1953.5
12.5°	1904.6	1896.9	1909.8	1909.8	1902.1	1912.3	1925.2	1932.9	1943.2	1948.3	1932.9
15°	1863.5	1866.1	1889.2	1907.2	1899.5	1914.9	1927.8	1922.6	1909.8	1894.3	1871.2
17.5°	1809.5	1801.8	1822.4	1832.7	1822.4	1827.5	1837.8	1827.5	1807.0	1794.1	1763.3
20°	1747.8	1727.3	1727.3	1722.1	1704.1	1704.1	1701.6	1683.6	1675.9	1668.2	1655.3
22.5°	1678.4	1655.3	1647.6	1632.2	1616.7	1614.2	1606.5	1588.5	1578.2	1573.0	1557.6
25°	1598.8	1578.2	1565.3	1549.9	1526.8	1521.6	1513.9	1495.9	1490.8	1483.1	1470.2
27.5°	1516.5	1490.8	1472.8	1457.4	1436.8	1434.3	1418.8	1406.0	1395.7	1390.6	1380.3
30°	1421.4	1393.1	1380.3	1359.7	1344.3	1339.1	1326.3	1308.3	1300.6	1295.5	1287.7
32.5°	1316.0	1292.9	1280.0	1262.0	1241.5	1244.0	1228.6	1213.2	1208.1	1202.9	1195.2
35°	1213.2	1190.1	1174.6	1159.2	1146.4	1141.2	1131.0	1118.1	1110.4	1107.8	1102.7
37.5°	1100.1	1082.1	1069.3	1053.8	1043.6	1038.4	1033.3	1020.4	1015.3	1015.3	1005.0
40°	989.6	974.2	963.9	956.2	943.3	940.7	935.6	927.9	925.3	922.8	915.0
42.5°	889.3	868.8	861.1	855.9	848.2	843.1	840.5	835.4	832.8	830.2	822.5
45°	794.2	776.2	768.5	763.4	755.7	753.1	750.5	742.8	737.7	732.5	730.0
47.5°	701.7	688.9	686.3	673.4	668.3	663.1	658.0	652.9	650.3	647.7	637.4
50°	622.0	614.3	601.5	593.7	588.6	586.0	575.8	568.0	565.5	562.9	555.2
52.5°	550.1	539.8	532.1	519.2	516.6	511.5	506.4	496.1	490.9	488.4	480.7
55°	485.8	478.1	467.8	457.5	449.8	447.2	439.5	429.2	424.1	419.0	413.8
57.5°	431.8	419.0	408.7	398.4	393.3	385.6	377.8	372.7	365.0	357.3	349.6
60°	380.4	370.1	357.3	347.0	341.9	336.7	326.4	318.7	311.0	303.3	295.6
62.5°	331.6	321.3	308.4	298.2	293.0	287.9	277.6	269.9	262.2	254.5	244.2
65°	287.9	277.6	267.3	257.0	251.9	246.8	236.5	226.2	218.5	210.8	200.5
67.5°	251.9	239.0	228.8	218.5	213.3	208.2	197.9	190.2	179.9	172.2	161.9
70°	213.3	203.1	195.3	185.1	179.9	174.8	164.5	154.2	146.5	138.8	128.5
72.5°	179.9	167.1	159.4	149.1	143.9	141.4	131.1	123.4	115.7	105.4	97.7
75°	143.9	133.7	123.4	115.7	110.5	108.0	97.7	90.0	82.3	74.5	66.8
77.5°	110.5	102.8	92.5	84.8	79.7	77.1	66.8	59.1	51.4	46.3	38.6
80°	82.3	72.0	66.8	59.1	56.5	51.4	46.3	38.6	33.4	25.7	20.6
82.5°	56.5	48.8	43.7	38.6	36.0	33.4	28.3	23.1	18.0	15.4	12.9
85°	30.8	25.7	23.1	20.6	18.0	18.0	15.4	12.9	10.3	7.7	5.1
87.5°	10.3	7.7	7.7	7.7	7.7	5.1	5.1	5.1	2.6	2.6	2.6
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):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2
2.5°	1976.6	1976.6	1976.6	1974.0	1974.0	1974.0	1971.5	1981.7	1971.5	1968.9	1976.6
5°	1974.0	1968.9	1968.9	1968.9	1968.9	1966.3	1963.7	1968.9	1961.2	1958.6	1958.6
7.5°	1958.6	1956.0	1956.0	1953.5	1950.9	1948.3	1945.7	1948.3	1940.6	1938.0	1938.0
10°	1961.2	1956.0	1956.0	1948.3	1943.2	1935.5	1927.8	1930.3	1920.0	1912.3	1912.3
12.5°	1930.3	1917.5	1909.8	1902.1	1896.9	1894.3	1884.1	1889.2	1878.9	1876.3	1876.3
15°	1860.9	1845.5	1832.7	1827.5	1827.5	1822.4	1814.7	1824.9	1819.8	1822.4	1835.2
17.5°	1753.0	1745.3	1737.6	1735.0	1737.6	1742.7	1747.8	1763.3	1763.3	1771.0	1783.8
20°	1657.9	1652.7	1657.9	1657.9	1660.4	1670.7	1681.0	1693.9	1699.0	1706.7	1724.7
22.5°	1565.3	1565.3	1570.5	1578.2	1575.6	1593.6	1596.2	1619.3	1619.3	1634.7	1650.2
25°	1475.4	1475.4	1480.5	1483.1	1488.2	1498.5	1508.8	1526.8	1531.9	1547.3	1560.2
27.5°	1388.0	1385.4	1385.4	1388.0	1393.1	1406.0	1411.1	1431.7	1439.4	1449.7	1462.5
30°	1290.3	1287.7	1292.9	1298.0	1295.5	1308.3	1316.0	1331.4	1336.6	1346.9	1357.1
32.5°	1197.8	1197.8	1197.8	1202.9	1202.9	1213.2	1213.2	1231.2	1231.2	1238.9	1249.2
35°	1102.7	1102.7	1105.2	1107.8	1110.4	1113.0	1115.5	1125.8	1128.4	1131.0	1136.1
37.5°	1012.7	1010.1	1012.7	1012.7	1007.6	1017.9	1017.9	1028.1	1020.4	1028.1	1030.7
40°	920.2	920.2	917.6	917.6	917.6	922.8	917.6	925.3	920.2	925.3	922.8
42.5°	825.1	825.1	819.9	825.1	822.5	822.5	822.5	827.6	819.9	825.1	827.6
45°	730.0	727.4	727.4	724.8	724.8	724.8	727.4	727.4	724.8	730.0	730.0
47.5°	637.4	634.9	634.9	634.9	634.9	637.4	629.7	634.9	629.7	629.7	629.7
50°	557.8	555.2	552.6	550.1	547.5	547.5	544.9	544.9	539.8	537.2	534.6
52.5°	480.7	478.1	472.9	472.9	470.4	467.8	460.1	460.1	452.4	449.8	449.8
55°	411.3	403.5	401.0	395.8	395.8	390.7	385.6	380.4	372.7	367.6	367.6
57.5°	347.0	339.3	334.1	331.6	329.0	323.9	313.6	311.0	300.7	298.2	295.6
60°	290.4	282.7	275.0	269.9	267.3	259.6	249.3	244.2	239.0	231.3	223.6
62.5°	236.5	228.8	218.5	215.9	210.8	203.1	195.3	187.6	182.5	174.8	169.6
65°	190.2	182.5	174.8	169.6	164.5	156.8	149.1	141.4	136.2	133.7	131.1
67.5°	154.2	143.9	136.2	133.7	128.5	123.4	115.7	113.1	108.0	108.0	108.0
70°	120.8	113.1	105.4	102.8	100.2	95.1	90.0	90.0	90.0	90.0	90.0
72.5°	90.0	84.8	77.1	74.5	72.0	69.4	64.3	66.8	64.3	64.3	64.3
75°	56.5	51.4	46.3	43.7	41.1	38.6	36.0	33.4	30.8	28.3	28.3
77.5°	30.8	25.7	23.1	20.6	20.6	18.0	15.4	15.4	12.9	12.9	12.9
80°	18.0	15.4	12.9	10.3	10.3	7.7	7.7	7.7	7.7	5.1	5.1
82.5°	10.3	7.7	5.1	5.1	5.1	5.1	2.6	2.6	2.6	2.6	2.6
85°	5.1	5.1	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	0.0
87.5°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
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: P252406

CATALOG NUMBER: LD6B50D010TE EU6B30509024 6LBLWW1LI

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2	1979.2
2.5°	1963.7	1971.5	1963.7	1971.5	1971.5	1971.5	1971.5	1963.7
5°	1950.9	1956.0	1948.3	1953.5	1956.0	1953.5	1953.5	1945.7
7.5°	1927.8	1932.9	1925.2	1932.9	1935.5	1932.9	1930.3	1925.2
10°	1904.6	1907.2	1899.5	1904.6	1909.8	1909.8	1907.2	1899.5
12.5°	1868.6	1876.3	1868.6	1873.8	1878.9	1881.5	1881.5	1873.8
15°	1827.5	1840.4	1835.2	1842.9	1850.6	1853.2	1853.2	1850.6
17.5°	1786.4	1799.2	1791.5	1804.4	1812.1	1817.2	1819.8	1814.7
20°	1727.3	1742.7	1737.6	1747.8	1758.1	1765.8	1765.8	1758.1
22.5°	1650.2	1670.7	1668.2	1675.9	1688.7	1691.3	1696.4	1691.3
25°	1565.3	1580.8	1578.2	1585.9	1601.3	1601.3	1603.9	1603.9
27.5°	1467.7	1483.1	1480.5	1485.7	1495.9	1498.5	1501.1	1495.9
30°	1362.3	1370.0	1370.0	1377.7	1385.4	1388.0	1388.0	1380.3
32.5°	1246.6	1256.9	1262.0	1259.5	1267.2	1272.3	1269.7	1269.7
35°	1141.2	1143.8	1146.4	1148.9	1151.5	1156.7	1151.5	1148.9
37.5°	1028.1	1035.8	1030.7	1035.8	1041.0	1038.4	1035.8	1035.8
40°	925.3	927.9	922.8	927.9	930.5	930.5	930.5	925.3
42.5°	822.5	827.6	822.5	827.6	827.6	827.6	827.6	825.1
45°	719.7	724.8	724.8	727.4	727.4	724.8	724.8	724.8
47.5°	624.6	629.7	624.6	629.7	632.3	627.2	627.2	627.2
50°	534.6	532.1	532.1	534.6	534.6	534.6	534.6	532.1
52.5°	442.1	444.7	444.7	444.7	447.2	444.7	447.2	447.2
55°	362.4	362.4	362.4	365.0	362.4	362.4	365.0	367.6
57.5°	290.4	287.9	285.3	285.3	287.9	285.3	285.3	285.3
60°	223.6	221.0	218.5	218.5	218.5	218.5	218.5	215.9
62.5°	167.1	167.1	167.1	169.6	169.6	169.6	169.6	172.2
65°	133.7	133.7	133.7	133.7	133.7	133.7	133.7	136.2
67.5°	108.0	108.0	108.0	110.5	110.5	110.5	110.5	110.5
70°	90.0	90.0	92.5	90.0	92.5	92.5	92.5	92.5
72.5°	61.7	61.7	61.7	61.7	61.7	59.1	61.7	59.1
75°	25.7	25.7	25.7	25.7	25.7	25.7	25.7	23.1
77.5°	10.3	10.3	10.3	10.3	10.3	10.3	10.3	10.3
80°	5.1	5.1	5.1	5.1	5.1	5.1	5.1	5.1
82.5°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	2.6	2.6	2.6	2.6	2.6	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)