

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: PORTFOLIO

Report Number: P879404

Luminaire Tested: **LD4C30D010 EU4309040 4LBDWWH**

Issue Date: 10/1/2024

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.



Test Information

Test Method: LM-79-08
Report Number: P879404
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2107-320-6)
Test Lab: INNOVATION CENTER
Issue Date: 10/1/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LD4C30D010 EU4309040 4LBLDWWH
Description: 4 INCH 3000 LUMEN PORTFOLIO LED DOWNLIGHT WITH, 4000K, 90CRI LEDS
AND 4LBLDWW TRIM WITH H FINISH
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

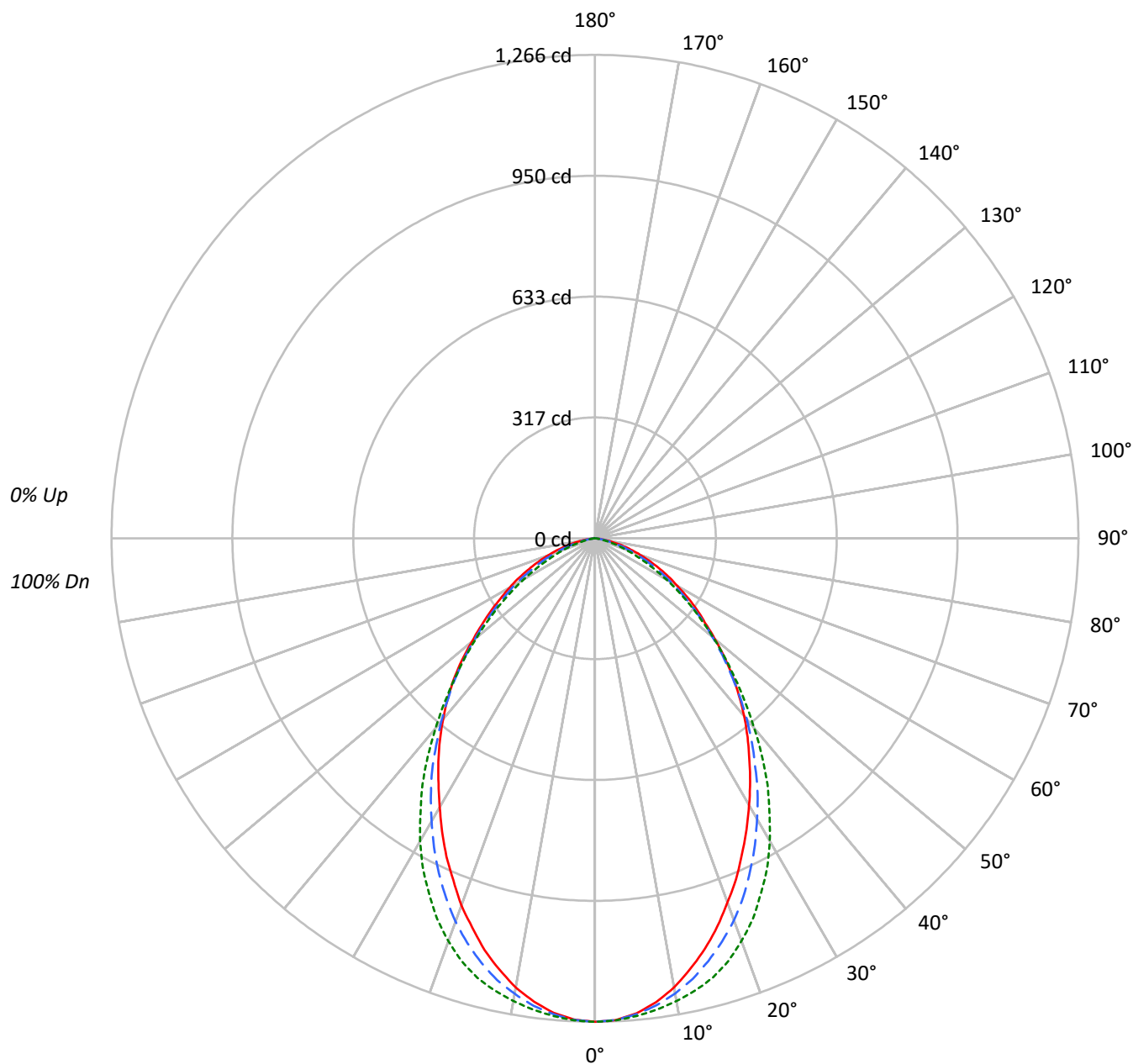
Lumens per Lamp: N/A
Luminaire Lumens: 2265.0 lumens
Efficiency: N/A
Efficacy: 71.7 lumens/watt
Spacing Criteria (0/90/45): 1 / 1.1 / 1.12
Luminous Opening: Circular (Dia: 0.33' x H: 0')
CIE Type: Direct

Input Watts (W): 31.6
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

TEST NUMBER: P879404

CATALOG NUMBER: LD4C30D010 EU4309040 4LBLDWWH

Luminous Intensity Polar Plot





TEST NUMBER: P879404

CATALOG NUMBER: LD4C30D010 EU4309040 4LBLDWWH

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
RCR																				
0	119	119	119	119	116	116	116	116		111	111	111			106	106	106			102
1	111	107	104	100	108	105	102	99		101	98	96			97	95	93			93
2	103	96	90	85	100	94	89	84		90	86	82			87	84	80			84
3	95	86	79	73	92	84	78	73		81	76	71			79	74	70			76
4	88	77	70	64	86	76	69	63		74	68	63			71	66	62			69
5	81	70	62	56	80	69	62	56		67	61	56			65	59	55			63
6	76	64	56	50	74	63	56	50		61	55	50			60	54	49			58
7	71	59	51	45	69	58	50	45		56	50	45			55	49	44			54
8	66	54	46	41	65	53	46	41		52	45	41			51	45	40			50
9	62	50	42	37	61	49	42	37		48	42	37			47	41	37			46
10	59	46	39	34	57	46	39	34		45	39	34			44	38	34			43

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	155569	155569	155569
5°	153981	154844	153820
10°	148975	153503	149037
15°	141547	151531	142017
20°	132660	146766	133758
25°	123557	139254	124696
30°	114466	129900	115317
35°	105598	118076	107203
40°	97411	104034	99191
45°	88226	90172	90901
50°	78209	77234	80177
55°	69718	65049	71325
60°	61009	52802	63294
65°	53401	40814	55290
70°	44936	29885	47271
75°	35078	19414	37072
80°	23064	10188	25328
85°	7894	4652	10431



TEST NUMBER: P879404

CATALOG NUMBER: LD4C30D010 EU4309040 4LBLDWWH

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	118.2	5.2
10°-20°	323.0	14.3
20°-30°	444.2	19.6
30°-40°	463.4	20.5
40°-50°	396.5	17.5
50°-60°	283.6	12.5
60°-70°	164.6	7.3
70°-80°	63.4	2.8
80°-90°	8.1	0.4
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°	885.4	39.1
0°-40°	1348.8	59.6
0°-60°	2028.9	89.6
0°-90°	2265.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2265.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	1266	1266	1266	1266	1266	
5°	1249	1251	1256	1251	1247	117
15°	1113	1146	1191	1150	1117	312
25°	912	962	1027	968	920	419
35°	704	732	787	744	715	441
45°	508	504	519	516	523	391
55°	326	309	304	318	333	291
65°	184	162	140	168	190	183
75°	74	55	41	59	78	80
85°	6	4	3	5	7	11
90°	0	0	0	0	0	



TEST NUMBER: P879404

CATALOG NUMBER: LD4C30D010 EU4309040 4LBLDWWH

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3
2.5°	1263.1	1262.1	1262.6	1262.6	1262.6	1262.1	1263.1	1263.1	1262.6	1262.6	1262.6
5°	1248.6	1247.7	1248.2	1248.6	1248.6	1248.6	1249.1	1249.6	1250.0	1250.5	1251.0
7.5°	1225.4	1224.0	1225.4	1227.3	1227.3	1227.7	1228.2	1228.7	1230.0	1232.4	1233.8
10°	1194.2	1194.2	1194.7	1196.1	1198.4	1198.0	1199.4	1201.7	1204.5	1207.7	1210.1
12.5°	1154.7	1155.6	1157.0	1158.4	1160.8	1162.2	1164.5	1167.3	1171.9	1176.6	1181.7
15°	1112.9	1113.3	1113.8	1117.0	1119.4	1122.6	1124.5	1130.1	1134.2	1140.8	1146.3
17.5°	1065.9	1065.4	1066.8	1069.6	1075.2	1076.6	1078.9	1085.0	1091.0	1099.8	1107.3
20°	1014.7	1017.5	1019.4	1023.1	1026.4	1030.1	1031.9	1039.4	1046.4	1054.7	1064.5
22.5°	966.4	964.0	967.3	971.5	974.3	977.1	980.3	988.2	995.7	1005.9	1015.7
25°	911.5	912.9	915.2	918.5	922.2	925.9	929.6	938.0	942.2	952.9	961.7
27.5°	859.4	861.7	862.7	866.8	870.1	872.9	874.8	884.5	888.2	897.5	906.4
30°	806.9	809.2	809.2	813.8	816.2	818.9	823.6	830.1	835.7	842.2	848.7
32.5°	756.2	756.2	758.0	762.2	764.5	767.8	769.2	773.8	779.4	785.9	792.9
35°	704.1	705.5	707.3	707.3	711.5	713.4	715.2	719.9	723.6	726.4	732.0
37.5°	656.2	656.2	654.8	657.1	659.9	659.4	662.2	664.6	666.9	670.1	674.8
40°	607.4	607.4	605.5	606.9	608.7	608.3	607.4	609.7	611.5	613.9	618.5
42.5°	557.6	556.7	556.2	556.2	557.1	556.2	557.1	557.6	557.6	557.6	560.4
45°	507.8	510.2	507.4	506.4	505.0	503.6	503.2	503.6	505.5	503.2	503.6
47.5°	459.0	459.9	458.1	456.7	455.3	454.4	455.3	452.5	453.4	453.9	452.0
50°	409.2	407.4	407.4	406.0	406.5	406.0	405.1	404.1	404.1	401.8	400.4
52.5°	363.2	364.1	365.1	361.8	362.3	359.9	360.4	358.1	358.1	355.3	356.2
55°	325.5	324.1	324.1	322.7	322.3	320.0	319.5	318.1	314.8	313.0	309.3
57.5°	286.5	286.0	284.1	284.6	281.8	281.4	280.4	278.1	275.8	273.4	269.3
60°	248.3	248.8	248.8	247.9	246.5	244.1	244.6	241.4	238.1	233.9	230.2
62.5°	216.7	215.3	214.9	213.9	211.1	211.1	208.8	206.5	203.2	199.0	195.8
65°	183.7	184.2	182.8	181.4	178.6	178.1	176.3	174.4	171.1	167.0	162.3
67.5°	153.9	153.0	152.5	151.1	148.3	147.9	146.5	142.3	139.5	135.3	131.6
70°	125.1	124.2	124.6	122.3	119.5	118.1	117.7	114.4	110.2	107.0	103.2
72.5°	98.1	98.1	97.7	95.3	93.9	93.0	91.1	87.4	85.1	81.4	78.6
75°	73.9	73.5	72.5	71.2	69.3	68.4	67.4	65.1	61.9	57.7	55.3
77.5°	51.2	51.6	50.7	50.2	47.9	46.5	46.0	44.6	41.9	39.1	36.7
80°	32.6	32.1	31.6	30.7	30.2	29.8	28.4	27.4	24.6	23.3	21.9
82.5°	17.7	16.7	16.7	16.3	15.3	14.9	14.4	13.5	13.0	12.1	11.2
85°	5.6	6.0	5.6	5.6	5.6	5.1	5.1	5.1	4.7	4.7	4.2
87.5°	0.5	0.9	0.5	0.5	0.9	0.5	0.5	0.9	0.5	0.5	0.9
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: P879404

CATALOG NUMBER: LD4C30D010 EU4309040 4LBLDWWH

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
0°	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3
2.5°	1262.6	1263.1	1263.1	1263.5	1263.5	1263.5	1263.5	1263.5	1263.5	1263.5	1263.5
5°	1252.4	1252.4	1253.3	1254.2	1254.2	1254.2	1254.7	1255.6	1255.6	1255.6	1255.2
7.5°	1235.6	1237.5	1239.3	1241.2	1241.7	1242.1	1243.1	1244.9	1244.9	1244.9	1244.9
10°	1213.8	1218.0	1220.3	1223.1	1224.5	1225.4	1228.2	1228.7	1230.0	1230.5	1230.0
12.5°	1185.9	1191.4	1196.6	1201.2	1203.1	1204.9	1207.7	1210.5	1211.9	1213.3	1212.8
15°	1154.7	1160.8	1168.7	1173.8	1177.5	1180.3	1184.5	1188.2	1190.5	1191.4	1191.4
17.5°	1117.0	1124.5	1132.9	1141.2	1143.5	1148.2	1152.9	1158.0	1160.8	1161.2	1160.8
20°	1075.2	1083.6	1090.5	1098.9	1104.0	1106.3	1112.9	1119.4	1122.2	1122.6	1122.2
22.5°	1025.4	1033.3	1042.6	1051.5	1055.7	1059.8	1066.8	1073.3	1077.0	1079.8	1077.0
25°	970.1	981.2	990.1	997.5	1003.6	1007.8	1016.6	1021.7	1027.8	1027.3	1027.8
27.5°	915.7	925.0	934.7	943.6	947.3	952.0	958.9	967.3	972.4	975.7	975.2
30°	859.9	867.3	875.7	883.6	889.6	893.4	903.6	907.3	913.8	915.7	914.3
32.5°	800.8	805.9	814.3	825.0	827.3	831.0	837.5	846.8	849.2	850.1	850.6
35°	738.0	747.8	754.8	761.3	763.1	766.4	773.8	780.8	783.1	787.3	785.5
37.5°	679.9	685.5	688.7	695.2	700.8	703.6	707.3	712.0	716.6	718.5	718.0
40°	621.8	624.6	627.3	634.3	634.8	634.8	640.4	646.9	646.9	648.7	648.7
42.5°	562.2	562.7	566.4	570.1	571.1	572.0	577.6	578.5	581.3	582.7	584.6
45°	504.6	507.4	509.7	510.2	512.5	512.9	514.3	515.7	519.9	519.0	519.9
47.5°	452.0	453.4	454.8	454.8	456.2	455.7	458.1	456.7	459.5	460.4	461.8
50°	400.4	402.7	401.3	402.3	401.8	403.2	402.3	402.3	402.3	404.1	405.5
52.5°	353.0	353.4	352.0	352.5	352.5	351.6	352.5	352.0	351.6	351.6	352.0
55°	309.3	307.4	306.5	304.6	302.3	305.1	303.7	302.7	304.6	303.7	304.6
57.5°	266.9	264.6	262.8	261.8	258.6	260.4	258.6	257.6	257.6	257.6	260.0
60°	226.9	224.6	222.3	219.5	219.0	218.1	217.2	214.9	215.3	214.9	215.8
62.5°	192.1	187.4	184.2	181.8	181.4	180.0	178.6	176.3	176.7	176.7	177.2
65°	160.0	154.9	150.2	147.0	147.0	144.6	142.3	142.3	139.5	140.4	140.9
67.5°	127.9	123.7	119.1	116.7	115.3	113.5	112.1	111.1	109.8	109.8	110.7
70°	99.1	94.9	92.5	88.8	88.4	87.0	85.1	83.7	83.2	83.2	82.8
72.5°	74.9	71.2	68.4	66.0	64.6	63.2	61.4	60.9	60.0	60.0	60.9
75°	52.1	49.8	47.4	45.1	44.2	43.7	42.3	41.4	41.4	40.9	41.4
77.5°	34.9	32.6	30.2	29.3	28.4	27.4	27.0	26.5	25.1	25.1	25.1
80°	20.0	19.1	18.1	16.7	16.7	16.3	15.3	14.9	14.4	14.4	14.4
82.5°	10.2	9.8	8.8	8.4	8.4	8.4	7.9	7.9	7.4	7.4	7.4
85°	4.2	3.7	3.3	3.3	3.3	3.3	3.3	3.3	3.7	3.3	3.7
87.5°	0.5	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9
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: P879404

CATALOG NUMBER: LD4C30D010 EU4309040 4LBLDWWH

CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3
2.5°	1263.5	1263.1	1263.1	1263.1	1263.1	1263.1	1262.6	1262.6	1262.1	1262.1	1262.1
5°	1255.6	1255.2	1254.7	1254.2	1253.8	1253.3	1252.8	1252.4	1251.0	1250.5	1249.6
7.5°	1244.5	1243.5	1242.1	1241.7	1240.7	1239.3	1237.5	1236.6	1234.7	1232.4	1231.4
10°	1229.6	1227.7	1226.3	1224.0	1223.5	1221.7	1217.0	1214.7	1211.4	1208.7	1205.4
12.5°	1211.4	1209.6	1206.3	1203.1	1201.2	1197.0	1192.8	1189.1	1184.9	1178.9	1174.2
15°	1189.1	1186.3	1179.8	1178.9	1176.1	1169.6	1164.0	1157.0	1150.5	1144.0	1138.4
17.5°	1159.4	1153.3	1150.1	1145.9	1142.6	1134.2	1128.2	1120.3	1111.5	1104.0	1096.1
20°	1120.3	1113.8	1108.2	1105.9	1101.7	1094.3	1086.8	1077.0	1068.2	1058.9	1051.9
22.5°	1073.8	1069.6	1061.2	1058.4	1053.3	1045.9	1037.1	1027.8	1019.4	1009.2	999.8
25°	1024.0	1018.0	1011.5	1005.9	1002.2	995.2	984.0	977.1	967.8	956.6	949.6
27.5°	971.0	964.0	954.7	951.0	947.8	938.5	929.2	920.3	912.9	903.1	897.1
30°	909.6	904.5	898.5	893.8	889.2	881.7	873.4	863.1	855.2	850.6	842.2
32.5°	847.3	843.1	835.2	832.9	827.8	821.7	815.7	808.3	799.9	792.9	786.4
35°	780.8	776.6	771.0	766.9	765.0	760.8	754.3	747.8	743.6	735.7	732.4
37.5°	714.3	712.9	707.3	703.2	701.8	696.6	693.4	688.7	682.7	680.8	677.1
40°	645.9	645.0	641.8	641.3	638.5	637.1	632.5	628.7	626.0	624.6	622.2
42.5°	583.2	582.2	579.4	579.9	577.1	576.2	575.7	572.5	570.1	567.4	567.8
45°	521.3	520.4	518.5	517.6	519.0	518.5	517.6	516.2	516.2	516.7	515.3
47.5°	461.8	462.7	460.9	461.8	461.8	460.4	460.4	462.3	462.7	463.7	464.6
50°	405.5	408.3	407.4	408.8	409.2	409.7	408.3	410.6	410.2	414.4	413.4
52.5°	354.4	354.8	356.7	357.2	357.6	358.1	360.4	362.3	362.7	364.6	367.9
55°	305.1	305.5	309.3	309.3	311.6	312.0	315.3	316.2	317.6	322.7	323.7
57.5°	258.6	261.4	263.2	264.1	265.5	267.9	269.7	273.9	276.2	279.5	282.7
60°	216.7	220.0	222.3	223.2	225.1	227.9	230.2	234.8	239.0	242.8	245.1
62.5°	178.1	180.9	182.8	186.0	186.0	188.3	193.9	196.7	201.4	204.6	208.8
65°	143.7	145.6	148.8	148.8	150.7	154.4	159.0	163.2	167.9	172.5	176.7
67.5°	112.5	113.9	115.8	117.7	118.6	123.2	127.0	133.0	137.2	140.4	145.6
70°	85.1	86.0	88.4	90.2	91.6	94.9	99.1	103.2	107.4	111.1	116.3
72.5°	60.9	62.8	65.1	66.5	67.4	69.8	73.9	78.1	81.8	85.6	88.4
75°	41.9	43.2	44.2	45.6	47.0	48.8	51.6	54.4	58.6	62.3	65.6
77.5°	26.0	27.4	28.8	29.3	29.8	31.6	33.5	36.3	39.1	41.9	44.2
80°	15.3	15.8	16.3	16.7	17.7	19.1	20.0	21.9	23.7	25.6	27.9
82.5°	7.9	8.4	8.8	8.8	8.8	9.3	10.7	11.6	12.1	13.0	14.4
85°	3.3	3.3	3.3	3.7	3.7	4.2	4.2	4.7	4.7	5.1	5.6
87.5°	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9
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: P879404

CATALOG NUMBER: LD4C30D010 EU4309040 4LBLDWWH

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3	1266.3
2.5°	1261.7	1261.7	1261.7	1261.2	1261.7	1261.7	1261.7	1261.2
5°	1249.6	1248.6	1248.6	1248.2	1247.7	1247.7	1248.2	1247.3
7.5°	1229.6	1228.2	1227.3	1227.3	1226.8	1226.3	1226.3	1224.0
10°	1203.5	1200.7	1200.7	1199.8	1196.1	1195.6	1194.7	1194.7
12.5°	1171.0	1167.7	1165.9	1163.5	1161.2	1159.4	1158.9	1157.0
15°	1132.4	1128.2	1124.9	1124.0	1120.3	1117.5	1117.5	1116.6
17.5°	1090.5	1084.0	1081.7	1079.4	1074.3	1073.8	1072.9	1068.7
20°	1043.1	1037.1	1033.8	1031.5	1028.2	1023.6	1022.6	1023.1
22.5°	993.3	985.0	982.2	979.9	976.6	972.4	972.4	969.2
25°	941.7	934.3	931.5	928.7	923.6	921.7	919.4	919.9
27.5°	889.2	882.2	879.9	874.8	871.5	869.2	866.8	866.8
30°	834.3	830.6	826.9	826.4	819.9	817.1	814.8	812.9
32.5°	781.3	776.6	774.8	772.9	769.7	765.9	765.5	762.2
35°	729.2	724.5	722.2	720.4	716.6	715.2	713.8	714.8
37.5°	674.3	673.4	672.0	669.7	667.3	666.9	665.0	667.3
40°	620.4	619.9	618.0	618.5	618.5	617.6	618.5	618.5
42.5°	568.3	568.3	566.4	567.4	567.8	568.8	570.1	571.1
45°	517.6	517.1	517.6	518.5	517.6	519.9	521.8	523.2
47.5°	465.5	466.0	467.8	468.3	469.2	472.5	472.5	472.5
50°	415.8	418.1	417.1	419.9	419.5	421.3	419.5	419.5
52.5°	368.3	370.6	371.1	371.6	374.4	374.8	374.8	374.4
55°	326.0	329.3	327.9	330.2	331.6	332.5	333.9	333.0
57.5°	286.9	288.3	289.7	290.2	292.0	293.0	293.9	293.0
60°	248.3	251.1	253.5	253.9	254.8	255.8	256.2	257.6
62.5°	212.1	216.7	217.6	218.1	220.4	221.8	222.8	223.7
65°	180.0	183.2	185.6	186.9	188.8	188.8	190.2	190.2
67.5°	148.8	152.1	153.5	154.4	157.2	157.7	160.0	160.0
70°	120.4	122.8	123.7	125.1	127.9	129.7	130.7	131.6
72.5°	93.0	95.8	97.2	99.1	100.9	102.3	102.8	104.2
75°	67.9	72.1	72.5	74.4	75.8	77.7	78.6	78.1
77.5°	47.4	48.8	50.7	51.6	53.0	54.4	55.8	55.8
80°	29.3	31.2	31.6	32.1	33.9	34.9	35.8	35.8
82.5°	15.3	16.3	17.2	17.7	18.6	18.6	19.1	19.5
85°	6.0	6.5	6.5	6.5	7.0	7.4	7.4	7.4
87.5°	0.9	1.4	0.9	0.9	1.4	1.4	1.4	1.4
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



Report Generated By 670246072 / DESKTOP-50001EG





— 0°-180° - - 45°-225° - - - 90°-270°













(END OF REPORT)