

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: P208855

Luminaire Tested: **LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P208855
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29056)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°
Description: PORTFOLIO 6" SQUARE ADJUSTABLE REFLECTOR, ANGLE-CUT TRIM,
SELF-FLANGED, 20° NARROW FLOOD, 30° Tilt
Light Source: (1) HIGH LUMEN LED 80CRI / 4000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1686.1 lumens
Efficiency: N/A
Efficacy: 77.4 lumens/watt
Spacing Criteria (0/90/45): 2.38 / 0.63 / 1.23
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')
CIE Type: Direct

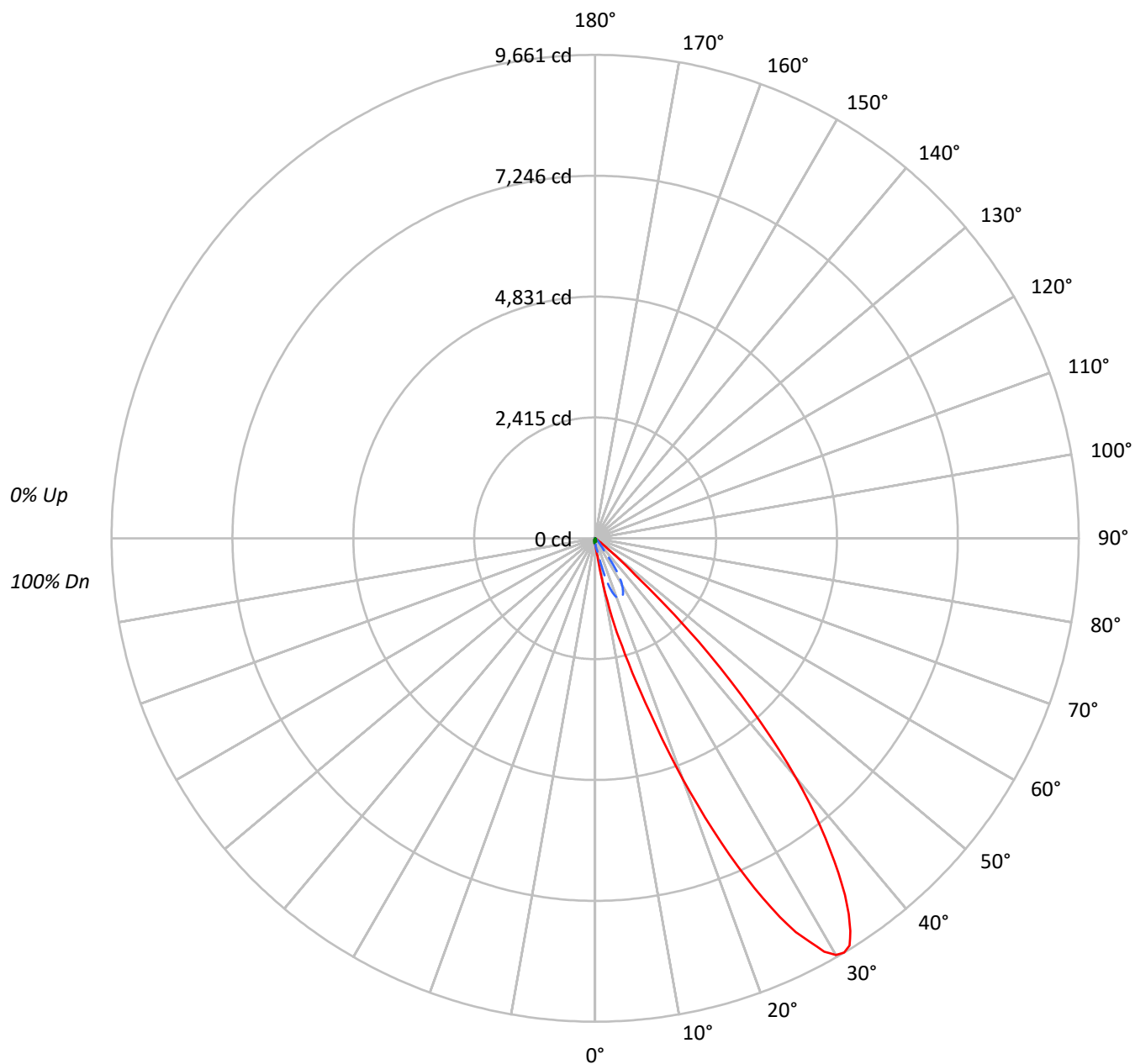
Input Watts (W): 21.79
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

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	109	106	104	110	107	104	102	103	101	99	99	97	96	96	94	93	91			
2	105	100	95	91	103	98	94	90	95	91	88	92	89	86	89	86	84	82			
3	99	91	85	80	96	89	84	80	87	82	78	84	80	77	82	79	76	74			
4	92	83	76	71	90	82	75	71	79	74	70	77	73	69	75	71	68	66			
5	86	76	69	63	84	75	68	63	73	67	62	71	66	62	69	65	61	60			
6	80	69	62	57	78	68	61	56	67	61	56	65	60	56	64	59	55	53			
7	75	63	56	51	73	63	56	51	61	55	50	60	54	50	59	54	50	48			
8	70	58	51	46	68	57	50	46	56	50	45	55	49	45	54	49	45	43			
9	65	53	46	41	64	53	46	41	52	45	41	51	45	41	50	44	41	39			
10	61	49	42	37	60	48	42	37	48	41	37	47	41	37	46	41	37	35			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	4895	4895	4895
5°	9772	4746	3211
10°	43943	4153	2400
15°	115203	3397	1930
20°	234556	2575	1627
25°	377426	1900	1382
30°	478063	1347	1218
35°	457304	883	1088
40°	350647	545	1017
45°	178334	353	944
50°	27342	261	824
55°	3588	240	586
60°	388	224	388
65°	61	265	326
70°	76	403	403
75°	0	532	316
80°	0	645	322
85°	0	1284	296



TEST NUMBER: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	15.2	0.9
10°-20°	166.7	9.9
20°-30°	545.9	32.4
30°-40°	664.5	39.4
40°-50°	269.9	16.0
50°-60°	16.0	1.0
60°-70°	3.1	0.2
70°-80°	2.7	0.2
80°-90°	2.0	0.1
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°	727.8	43.2
0°-40°	1392.3	82.6
0°-60°	1678.3	99.5
0°-90°	1686.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1686.1	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	114	114	114	114	114	
5°	226	172	110	81	74	43
15°	2584	862	76	46	43	841
25°	7945	1282	40	27	29	3651
35°	8700	512	17	16	21	5262
45°	2929	58	6	10	16	2247
55°	48	6	3	7	8	82
65°	1	2	3	4	3	1
75°	0	2	3	4	2	0
85°	0	2	3	3	1	0
90°	0	0	0	0	0	



TEST NUMBER: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

CANDELA DISTRIBUTION (FULL):

	0°	2.5°	5°	7.5°	10°	12.5°	15°	17.5°	20°	22.5°	25°
0°	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7
2.5°	160.2	153.1	156.3	155.7	153.1	153.7	155.0	152.4	153.7	149.9	150.5
5°	226.1	215.8	221.6	215.1	218.3	215.1	215.1	211.2	208.0	207.4	204.1
7.5°	394.7	369.5	377.2	349.5	354.0	344.9	336.5	327.5	312.0	304.2	287.5
10°	1005.1	934.1	950.9	890.1	888.8	867.5	828.1	801.0	743.5	702.8	644.7
11°	1271.2	1222.8	1237.7	1171.1	1167.9	1138.8	1092.3	1020.0	987.7	933.4	861.1
12°	1618.8	1537.4	1546.4	1473.4	1466.3	1427.6	1375.2	1286.1	1247.3	1181.5	1096.2
13°	1934.7	1862.3	1862.9	1783.5	1775.1	1726.0	1668.5	1560.6	1517.4	1443.7	1341.0
14°	2224.7	2169.8	2158.8	2116.2	2070.9	2013.5	1952.7	1830.7	1782.8	1700.2	1582.6
15°	2584.5	2477.3	2455.9	2402.3	2347.4	2275.1	2200.8	2061.3	2008.3	1917.2	1800.3
17.5°	3645.8	3513.4	3455.2	3346.1	3242.7	3103.8	2943.0	2695.6	2573.5	2410.1	2227.3
20°	5119.2	4910.6	4793.7	4618.6	4452.0	4224.6	3946.8	3557.3	3376.4	3059.9	2760.2
21°	5702.5	5523.0	5376.3	5179.3	4982.3	4712.9	4382.8	3970.7	3691.7	3321.5	2970.1
22°	6291.7	6121.1	5949.9	5733.5	5513.3	5198.7	4818.2	4340.2	4005.0	3572.8	3167.8
23°	6871.7	6698.6	6566.8	6270.3	6019.7	5665.1	5243.3	4696.8	4307.3	3811.8	3353.8
24°	7428.5	7239.3	7075.2	6776.1	6492.5	6097.9	5643.8	5043.0	4599.2	4039.8	3526.3
25°	7944.7	7736.0	7534.5	7227.0	6918.9	6488.0	5997.1	5356.3	4865.4	4246.5	3683.3
26°	8419.4	8134.6	7915.6	7631.4	7281.3	6829.1	6307.8	5627.0	5094.7	4419.0	3806.6
27°	8830.9	8542.8	8291.5	7987.3	7596.5	7109.4	6564.2	5821.4	5276.2	4548.2	3892.6
28°	9130.0	8886.5	8597.1	8269.6	7840.0	7302.6	6738.0	5976.4	5385.4	4615.4	3928.1
29°	9447.2	9170.0	8832.9	8460.8	7993.1	7424.0	6833.6	6057.2	5430.6	4630.9	3921.0
30°	9615.8	9360.6	8964.0	8558.3	8059.0	7462.8	6854.3	6069.4	5416.4	4593.4	3874.5
31°	9661.0	9422.6	8983.4	8560.3	8038.3	7424.7	6803.3	6006.1	5339.5	4506.2	3787.9
32°	9595.7	9357.4	8901.3	8477.6	7943.4	7318.1	6690.9	5893.1	5214.2	4375.7	3664.5
33°	9361.3	9168.1	8728.2	8320.6	7798.7	7159.8	6525.5	5709.0	5019.1	4206.5	3516.0
34°	9061.5	8881.3	8475.6	8057.7	7569.4	6942.8	6297.5	5486.1	4795.0	3998.5	3339.6
35°	8700.4	8522.8	8148.8	7733.4	7265.8	6654.0	6005.5	5206.4	4530.1	3763.4	3143.9
36°	8274.7	8090.0	7744.4	7349.1	6923.4	6305.2	5659.9	4884.7	4229.1	3507.6	2934.6
37°	7806.4	7620.4	7311.6	6945.4	6524.2	5912.5	5273.0	4530.1	3911.3	3242.1	2715.6
38°	7312.3	7139.1	6858.8	6493.2	6076.5	5475.8	4849.9	4205.8	3587.7	2973.4	2494.1
39°	6805.2	6623.0	6358.8	5999.7	5590.1	4997.1	4408.7	3833.1	3308.6	2709.2	2290.6
40°	6238.7	6066.9	5760.7	5479.0	5068.2	4503.6	3966.8	3421.7	2998.5	2455.3	2105.8
42.5°	4614.7	4480.4	4317.0	4028.2	3724.6	3319.6	2944.3	2566.4	2258.9	1950.8	1694.4
45°	2928.8	2830.0	2746.0	2566.4	2443.7	2215.6	2021.9	1828.7	1683.4	1521.9	1237.0
47.5°	1083.9	1037.4	1007.7	928.9	921.8	848.8	841.7	934.7	989.6	931.5	700.9
50°	408.2	396.6	389.5	365.0	348.2	314.6	289.4	270.7	232.5	206.1	184.7
51°	268.1	259.7	247.4	245.5	238.4	219.6	208.0	204.1	178.3	150.5	129.2
52°	170.5	165.4	157.6	158.3	154.4	142.8	138.9	144.7	131.1	115.6	100.1
53°	107.2	104.6	99.5	99.5	98.8	91.1	89.8	95.0	92.4	85.3	76.2
54°	69.8	69.1	64.6	65.2	65.2	60.7	60.1	62.0	61.4	58.8	54.3
55°	47.8	47.2	46.5	44.6	43.3	42.0	42.0	42.6	42.0	40.7	38.1
57.5°	16.8	16.1	16.8	16.1	16.1	16.8	16.1	17.4	18.1	18.1	16.8
60°	4.5	4.5	4.5	4.5	4.5	4.5	4.5	5.8	6.5	6.5	6.5



TEST NUMBER: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

CANDELA DISTRIBUTION (continued):

	0°	2.5°	5°	7.5°	10°	12.5°	15°	17.5°	20°	22.5°	25°
63°	1.3	1.3	1.3	1.3	1.3	1.3	0.6	0.6	1.3	1.3	1.3
64°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	1.3
65°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	1.3
66°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
67.5°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
70°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	1.3
72.5°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	1.3
75°	0.0	0.0	0.0	0.0	0.0	0.0	0.6	0.6	0.6	0.6	0.6
77.5°	0.0	0.0	0.0	0.0	0.0	0.6	0.6	0.6	0.6	0.6	0.6
80°	0.0	0.0	0.0	0.0	0.0	0.0	0.6	0.6	0.6	0.6	0.6
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.6	0.6	0.6	0.6	0.6
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.6	0.6	0.6	0.6	0.6
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.6	0.6	0.6	0.6	0.6
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):

	27.5°	30°	32.5°	35°	37.5°	40°	42.5°	45°	47.5°	50°	52.5°
0°	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7
2.5°	148.6	149.2	146.6	146.0	145.3	142.1	140.2	138.2	136.3	133.1	134.4
5°	199.0	199.0	193.1	189.3	187.3	180.2	177.0	172.5	167.3	163.4	161.5
7.5°	277.8	273.2	260.3	250.6	244.8	230.6	222.2	209.9	202.8	195.1	190.6
10°	589.1	558.8	495.5	450.2	407.6	355.9	308.8	271.9	248.0	230.6	219.6
11°	793.9	753.8	673.1	610.4	554.9	481.2	408.9	339.8	290.0	259.7	237.1
12°	1018.7	967.0	870.1	792.6	724.8	632.4	540.0	448.9	377.2	320.4	273.9
13°	1252.5	1186.0	1073.6	984.4	906.3	799.7	689.9	580.7	493.5	416.0	345.6
14°	1484.4	1403.0	1279.6	1176.9	1089.1	970.2	845.6	724.1	622.1	524.5	438.6
15°	1695.0	1605.9	1497.3	1363.0	1268.0	1115.6	998.0	861.7	745.4	632.4	532.3
17.5°	2072.9	1952.7	1824.8	1686.0	1595.5	1445.0	1295.8	1131.1	990.3	850.1	715.7
20°	2488.2	2273.8	2063.2	1856.5	1725.4	1565.2	1419.2	1256.4	1107.8	948.9	802.9
21°	2651.7	2406.2	2149.8	1917.9	1769.3	1598.1	1447.0	1278.4	1122.0	952.8	799.1
22°	2806.7	2513.4	2225.3	1969.5	1807.4	1632.3	1469.6	1292.6	1125.9	948.3	787.4
23°	2948.2	2616.8	2295.1	2014.7	1835.2	1649.1	1481.2	1298.4	1124.0	937.9	770.0
24°	3076.7	2711.7	2354.5	2048.3	1852.0	1654.3	1479.9	1293.9	1114.3	922.4	746.1
25°	3187.8	2786.7	2397.8	2066.4	1856.5	1651.7	1473.4	1282.2	1094.9	895.9	718.3
26°	3271.8	2834.5	2418.5	2069.0	1850.0	1643.3	1458.6	1260.9	1064.5	860.4	680.8
27°	3320.2	2851.9	2418.5	2058.0	1837.1	1627.8	1434.7	1228.0	1025.1	816.5	634.3
28°	3328.6	2844.2	2401.0	2035.4	1812.6	1600.7	1399.8	1186.0	978.6	764.2	583.3
29°	3306.7	2813.2	2363.6	1996.7	1776.4	1565.8	1354.6	1133.0	923.1	706.7	530.3
30°	3252.4	2756.3	2308.0	1947.6	1733.1	1519.9	1297.7	1074.2	860.4	647.3	469.6
31°	3167.8	2674.3	2237.0	1888.1	1679.5	1465.0	1235.1	1006.4	790.0	573.6	403.7
32°	3055.4	2559.3	2158.2	1820.3	1620.1	1402.4	1156.9	919.8	697.0	483.8	327.5
33°	2923.0	2446.9	2070.3	1747.3	1555.5	1316.5	1049.0	790.7	583.3	383.7	248.0
34°	2771.8	2326.1	1976.0	1670.5	1470.9	1190.5	914.7	657.6	458.6	280.3	175.1
35°	2604.5	2197.6	1877.2	1580.0	1337.1	1036.8	760.9	512.2	332.0	189.9	131.8
36°	2426.2	2053.5	1764.1	1450.8	1176.9	864.3	598.2	368.8	220.3	141.5	113.7
37°	2258.3	1928.2	1647.2	1288.7	996.1	684.1	436.7	246.1	160.8	123.4	100.8
38°	2100.0	1807.4	1494.8	1109.1	810.0	512.9	287.5	181.5	139.5	108.5	89.1
39°	1952.1	1686.0	1316.5	916.6	624.0	361.7	208.6	155.7	121.4	96.2	78.8
40°	1809.3	1512.2	1122.0	747.4	454.8	252.6	175.7	137.6	107.2	84.6	66.5
42.5°	1357.2	971.5	621.4	340.4	213.8	164.7	125.3	96.9	71.1	52.3	40.0
45°	852.0	494.2	266.8	191.2	149.2	111.8	81.4	58.1	42.6	31.7	25.2
47.5°	387.6	212.5	165.4	127.9	96.2	66.5	47.8	34.9	25.8	20.0	14.9
50°	142.1	120.8	98.2	73.0	53.0	38.1	27.8	20.7	15.5	11.6	8.4
51°	111.1	96.9	78.2	54.9	42.0	31.0	22.6	16.8	12.3	9.0	6.5
52°	87.2	76.9	60.1	42.6	32.9	24.5	18.1	12.9	9.0	7.1	5.2
53°	67.2	58.8	45.2	32.9	25.8	19.4	14.2	10.3	7.1	5.2	3.9
54°	49.7	43.3	33.6	25.2	20.0	14.9	10.3	7.8	5.2	3.9	3.2
55°	35.5	31.7	25.2	20.0	15.5	11.6	7.8	5.8	3.9	2.6	2.6
57.5°	14.9	14.2	11.6	9.7	7.8	5.8	3.9	2.6	2.6	1.9	2.6
60°	5.8	5.8	5.2	3.9	3.2	2.6	1.9	1.9	1.9	1.9	1.9



TEST NUMBER: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

CANDELA DISTRIBUTION (continued):

	27.5°	30°	32.5°	35°	37.5°	40°	42.5°	45°	47.5°	50°	52.5°
63°	1.3	1.9	1.9	1.9	1.9	1.9	1.9	1.9	1.9	1.9	2.6
64°	1.3	1.3	1.3	1.3	1.9	1.9	1.9	1.9	1.9	1.9	2.6
65°	1.3	1.3	1.3	1.3	1.3	1.9	1.9	1.9	1.9	1.9	2.6
66°	1.3	1.3	1.3	1.3	1.3	1.9	1.9	1.9	1.9	1.9	2.6
67.5°	1.3	1.3	1.3	1.3	1.3	1.9	1.9	1.9	1.9	2.6	2.6
70°	1.3	1.3	1.3	1.3	1.3	1.9	1.9	1.9	1.9	2.6	2.6
72.5°	1.3	1.3	1.3	1.3	1.3	1.9	1.9	1.9	2.6	2.6	2.6
75°	0.6	1.3	1.3	1.3	1.3	1.9	1.9	1.9	2.6	2.6	2.6
77.5°	0.6	1.3	1.3	1.3	1.9	1.9	1.9	1.9	2.6	2.6	2.6
80°	0.6	1.3	1.3	1.3	1.3	1.9	1.9	1.9	2.6	2.6	2.6
82.5°	0.6	1.3	1.3	1.3	1.3	1.9	1.9	1.9	2.6	2.6	2.6
85°	0.6	1.3	1.3	1.3	1.3	1.9	1.9	1.9	2.6	2.6	2.6
87.5°	0.6	1.3	1.3	1.3	1.3	1.9	1.9	1.9	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: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

CANDELA DISTRIBUTION (continued):

	55°	57.5°	60°	62.5°	65°	67.5°	70°	72.5°	75°	77.5°	80°
0°	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7
2.5°	132.4	132.4	127.9	126.6	126.0	124.7	121.4	121.4	119.5	116.9	115.6
5°	157.0	155.7	148.6	144.7	141.5	137.6	131.1	128.5	124.7	120.8	117.6
7.5°	180.9	176.3	165.4	159.6	155.0	148.6	140.2	134.4	127.9	121.4	116.9
10°	204.8	195.7	180.2	170.5	162.1	153.1	142.8	136.3	127.9	119.5	113.0
11°	214.5	202.8	185.4	173.1	163.4	153.1	142.8	134.4	126.6	118.2	111.1
12°	233.2	211.2	190.6	177.0	164.7	153.1	141.5	132.4	124.0	115.6	108.5
13°	271.3	230.6	196.4	180.2	166.7	153.1	140.2	130.5	121.4	113.0	105.3
14°	340.4	270.7	211.9	183.5	167.3	153.1	138.9	127.3	118.2	109.2	102.1
15°	418.6	332.0	243.5	195.1	167.9	151.8	136.3	124.0	114.3	105.3	98.2
17.5°	580.7	464.4	344.9	253.2	184.1	147.9	126.6	114.3	103.4	94.3	85.9
20°	646.6	511.6	377.2	271.3	190.6	141.5	115.6	102.7	91.1	82.0	74.9
21°	638.2	502.6	367.6	259.0	178.3	132.4	109.8	97.5	86.6	76.9	70.4
22°	620.8	481.2	344.9	236.4	163.4	123.4	104.6	91.7	81.4	72.3	65.9
23°	597.5	450.9	319.1	212.5	147.9	115.0	99.5	86.6	76.9	67.8	62.0
24°	568.4	420.5	289.4	188.6	133.1	108.5	93.7	81.4	71.7	64.0	58.1
25°	536.1	388.9	257.7	168.6	124.0	102.1	87.2	75.6	67.2	60.1	54.3
26°	496.7	351.4	228.0	149.9	113.0	95.0	80.7	70.4	62.7	56.2	50.4
27°	451.5	312.6	195.1	130.5	104.0	87.9	74.9	65.9	58.8	52.3	46.5
28°	410.8	269.4	167.3	116.3	96.9	80.7	69.8	61.4	54.9	48.4	43.3
29°	359.8	228.0	142.8	105.3	89.1	75.6	64.6	56.8	50.4	43.9	39.4
30°	308.8	188.6	122.1	96.2	81.4	69.1	59.4	52.3	45.9	40.7	36.8
31°	255.8	156.3	107.2	88.5	74.3	64.0	54.9	48.4	42.0	37.5	33.6
32°	195.7	127.9	95.6	80.1	67.8	57.5	50.4	43.9	38.1	34.2	30.4
33°	147.3	107.9	86.6	72.3	61.4	53.0	45.9	39.4	34.9	31.0	27.8
34°	117.6	96.2	78.2	65.2	55.6	47.8	40.7	35.5	31.0	27.8	24.5
35°	103.4	86.6	69.8	58.8	49.7	42.0	36.2	31.7	27.8	24.5	22.0
36°	91.7	77.5	62.0	52.3	43.3	36.8	31.7	27.8	23.9	21.3	19.4
37°	82.0	68.5	54.9	45.2	37.5	32.3	27.8	23.9	20.7	18.7	17.4
38°	73.6	58.8	46.5	38.8	32.3	27.8	23.9	20.7	18.1	16.1	14.9
39°	62.7	49.7	38.8	32.9	27.1	23.3	20.0	18.1	15.5	14.2	12.9
40°	52.3	41.3	32.3	27.1	23.3	19.4	17.4	14.9	13.6	12.3	11.0
42.5°	32.3	25.8	20.7	17.4	14.9	12.9	11.6	10.3	9.0	8.4	7.8
45°	20.0	16.1	12.9	11.0	9.0	8.4	7.8	6.5	6.5	5.8	5.8
47.5°	11.6	9.7	7.1	6.5	5.2	5.2	4.5	4.5	3.9	4.5	3.9
50°	6.5	4.5	3.9	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2
51°	5.2	3.9	3.2	2.6	2.6	2.6	2.6	2.6	2.6	3.2	3.2
52°	3.9	3.2	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
53°	3.2	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
54°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
55°	2.6	2.6	2.6	2.6	2.6	1.9	2.6	2.6	2.6	2.6	2.6
57.5°	2.6	2.6	1.9	1.9	2.6	1.9	2.6	2.6	2.6	2.6	2.6
60°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6



TEST NUMBER: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

CANDELA DISTRIBUTION (continued):

	55°	57.5°	60°	62.5°	65°	67.5°	70°	72.5°	75°	77.5°	80°
63°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
64°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
65°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
66°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
67.5°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
70°	2.6	2.6	2.6	3.2	3.2	3.2	3.2	2.6	2.6	2.6	2.6
72.5°	2.6	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	2.6
75°	2.6	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2
77.5°	2.6	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2
80°	2.6	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2
82.5°	2.6	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2
85°	2.6	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2
87.5°	2.6	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2
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: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

CANDELA DISTRIBUTION (continued):

	82.5°	85°	87.5°	90°	112.5°	135°	157.5°	180°
0°	113.7	113.7	113.7	113.7	113.7	113.7	113.7	113.7
2.5°	115.0	115.0	114.3	113.0	103.4	95.0	89.8	89.1
5°	115.6	114.3	111.8	109.8	92.4	81.4	74.9	74.3
7.5°	113.0	110.5	107.2	103.4	82.0	70.4	64.6	63.3
10°	108.5	104.0	100.1	95.0	72.3	61.4	56.2	54.9
11°	105.3	100.8	96.9	91.7	68.5	58.1	53.0	52.3
12°	102.7	97.5	92.4	87.9	64.6	54.9	50.4	49.7
13°	98.8	93.7	89.1	84.0	61.4	52.3	47.8	47.2
14°	95.6	89.8	85.3	80.7	58.1	49.1	45.9	45.2
15°	91.7	85.9	80.7	76.2	54.9	46.5	43.9	43.3
17.5°	81.4	74.9	70.4	65.9	47.2	40.7	38.8	39.4
20°	69.1	64.0	60.1	56.2	40.0	35.5	34.9	35.5
21°	64.6	60.1	56.8	53.0	37.5	33.6	33.6	34.2
22°	60.7	56.2	53.0	49.1	35.5	31.7	31.7	32.9
23°	56.8	52.3	49.1	45.9	32.9	30.4	30.4	31.7
24°	53.0	49.1	45.9	42.6	31.0	28.4	29.1	30.4
25°	49.1	45.9	42.6	40.0	29.1	27.1	27.8	29.1
26°	46.5	42.6	40.0	36.8	27.1	25.8	26.5	28.4
27°	42.6	39.4	36.8	34.2	25.8	24.5	25.8	27.1
28°	40.0	36.8	34.2	31.7	23.9	23.3	24.5	26.5
29°	36.8	34.2	31.7	29.7	22.6	22.0	23.9	25.2
30°	33.6	31.0	29.1	27.1	21.3	20.7	22.6	24.5
31°	31.0	29.1	27.1	25.2	20.0	20.0	22.0	23.9
32°	28.4	26.5	24.5	22.6	18.7	18.7	21.3	22.6
33°	25.8	23.9	22.0	20.7	17.4	18.1	20.0	22.0
34°	22.6	21.3	20.0	18.7	16.1	16.8	19.4	21.3
35°	20.7	19.4	18.1	16.8	15.5	16.1	18.7	20.7
36°	18.1	17.4	16.1	15.5	14.2	15.5	18.1	20.0
37°	16.1	15.5	14.2	13.6	13.6	14.9	17.4	19.4
38°	14.2	13.6	12.9	12.3	12.9	14.2	16.8	18.7
39°	12.3	11.6	11.6	11.0	12.3	13.6	16.1	18.1
40°	11.0	10.3	10.3	9.7	11.6	12.9	15.5	18.1
42.5°	7.8	7.8	7.8	7.8	9.7	11.6	14.2	16.8
45°	5.8	5.8	5.8	5.8	8.4	10.3	12.3	15.5
47.5°	4.5	4.5	4.5	4.5	7.8	9.7	11.6	13.6
50°	3.2	3.2	3.9	3.9	7.1	8.4	10.3	12.3
51°	3.2	3.2	3.2	3.9	6.5	8.4	9.7	11.6
52°	3.2	3.2	3.2	3.2	6.5	7.8	9.0	10.3
53°	2.6	3.2	3.2	3.2	5.8	7.8	8.4	9.7
54°	2.6	2.6	2.6	3.2	5.8	7.1	7.8	9.0
55°	2.6	2.6	2.6	3.2	5.2	7.1	7.8	7.8
57.5°	2.6	2.6	2.6	2.6	5.2	6.5	7.1	6.5
60°	2.6	2.6	2.6	2.6	4.5	5.8	6.5	4.5



TEST NUMBER: P208855

CATALOG NUMBER: LDSQA6A15840D010TE LARL20NF 6LSQA1H 30°

CANDELA DISTRIBUTION (continued):

	82.5°	85°	87.5°	90°	112.5°	135°	157.5°	180°
63°	2.6	2.6	2.6	2.6	4.5	5.2	5.2	3.9
64°	2.6	2.6	2.6	2.6	4.5	5.2	5.2	3.9
65°	2.6	2.6	2.6	2.6	4.5	4.5	4.5	3.2
66°	2.6	2.6	2.6	2.6	4.5	4.5	4.5	3.2
67.5°	2.6	2.6	2.6	2.6	4.5	4.5	3.9	3.2
70°	2.6	2.6	2.6	3.2	3.9	3.9	3.9	3.2
72.5°	2.6	2.6	2.6	3.2	3.9	3.9	3.2	2.6
75°	3.2	3.2	3.2	3.2	3.9	3.9	3.2	1.9
77.5°	3.2	3.2	3.2	3.2	3.9	3.2	2.6	1.9
80°	3.2	3.2	2.6	2.6	3.2	3.2	1.9	1.3
82.5°	3.2	3.2	2.6	2.6	3.2	2.6	1.9	1.3
85°	3.2	3.2	2.6	2.6	3.2	2.6	1.3	0.6
87.5°	3.2	2.6	2.6	2.6	3.2	2.6	0.6	0.6
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



Report Generated By E9808895 / USPTCWHP6082093





— 0°-180° - - 45°-225° - - - 90°-270°







61°	1.9	1.9	1.9	1.9	2.6	1.9	2.6	3.2	3.9	3.9	3.9
62°	1.3	1.3	1.3	1.3	1.3	1.3	1.3	1.9	1.9	1.9	2.6





61°	3.9	3.9	3.2	3.2	2.6	1.9	1.9	1.9	1.9	1.9	1.9
62°	2.6	2.6	1.9	1.9	1.9	1.9	1.9	1.9	1.9	1.9	2.6





61°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6
62°	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6	2.6





61°	2.6	2.6	2.6	2.6	4.5	5.8	5.8	4.5
62°	2.6	2.6	2.6	2.6	4.5	5.2	5.8	3.9



(END OF REPORT)