

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: P#

Luminaire Tested: **LD4C75D010 EX4C759035 4LBSQLWWH**

Issue Date: 2/18/2022

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: P#
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P219529)
Test Lab: INNOVATION CENTER
Issue Date: 2/18/2022
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LD4C75D010 EX4C759035 4LBSQLWWH
Description: 4 INCH 7500 LUMEN PORTFOLIO LED DOWNLIGHT WITH, 3500K, 90CRI LEDS
AND 4LBSQLWW TRIM WITH H FINISH
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

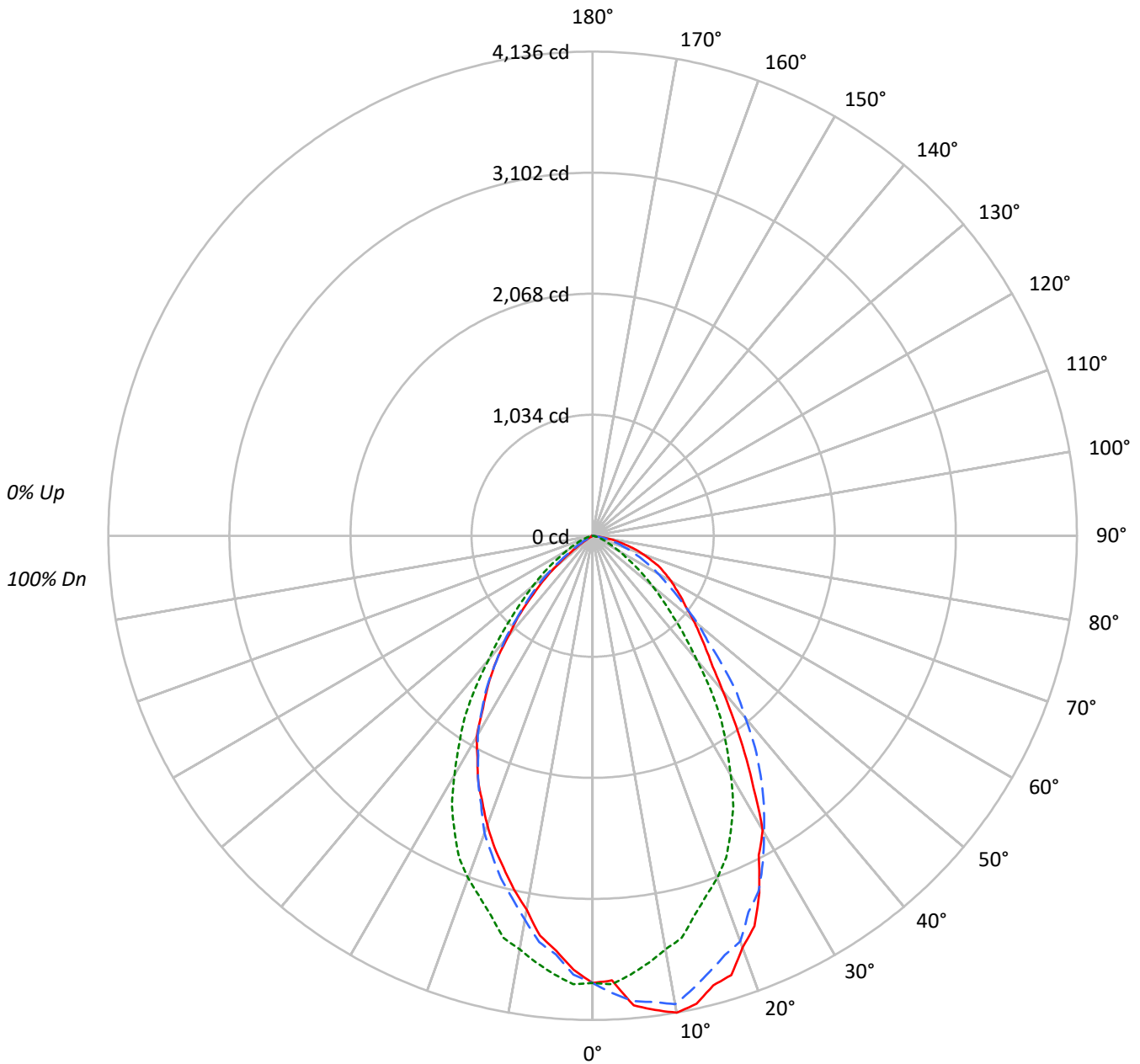
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5476.0 lumens
Efficiency: N/A
Efficacy: 67.2 lumens/watt
Spacing Criteria (0/90/45): 1.01 / 1 / 1.06
Luminous Opening: Rectangular (W 0.33' x L: 0.33' x H: 0')
CIE Type: Direct

Input Watts (W): 81.5
Input Voltage (V):
Input Current (A_{in}): 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									
RC	80									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	84	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	70	66	64																			
5	85	75	67	62	83	74	67	62	72	66	61	70	65	60	68	64	60	58																			
6	80	69	61	56	78	68	61	56	66	60	55	65	59	55	63	58	54	53																			
7	75	63	56	51	73	63	56	51	61	55	50	60	54	50	59	54	50	48																			
8	70	59	52	47	69	58	51	46	57	51	46	56	50	46	55	50	46	44																			
9	66	55	48	43	65	54	47	43	53	47	43	52	46	42	51	46	42	41																			
10	62	51	44	40	61	51	44	40	50	44	39	49	43	39	48	43	39	38																			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	368607	368607	368607
5°	389987	364262	344735
10°	405274	351416	317741
15°	397173	335390	293305
20°	384285	319359	269980
25°	358453	296981	246283
30°	323574	262830	220481
35°	266538	225005	182918
40°	217528	173670	140782
45°	186890	131898	101264
50°	169144	100409	63947
55°	155657	72420	23131
60°	149403	49480	3531
65°	144316	33471	1073
70°	129209	23246	1326
75°	105914	11967	0
80°	66234	5112	0
85°	0	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	357.9	6.5
10°-20°	964.3	17.6
20°-30°	1287.7	23.5
30°-40°	1222.4	22.3
40°-50°	845.0	15.4
50°-60°	466.9	8.5
60°-70°	231.8	4.2
70°-80°	91.3	1.7
80°-90°	8.7	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°	2609.9	47.7
0°-40°	3832.3	70.0
0°-60°	5144.1	93.9
0°-90°	5476.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5476.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	3820	3820	3820	3820	3820	
5°	4026	3990	3761	3591	3559	385
15°	3976	3857	3358	3028	2936	1125
25°	3367	3353	2790	2313	2313	1535
35°	2263	2501	1910	1571	1553	1418
45°	1370	1571	967	792	742	1068
55°	925	870	430	220	138	833
65°	632	458	147	5	5	614
75°	284	174	32	0	0	303
85°	0	5	0	0	0	26
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°	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2
2.5°	3801.9	3907.2	3916.4	3907.2	3921.0	3916.4	3939.3	3916.4	3944.0	3902.7	3911.9
5°	4026.4	3985.1	4072.1	4026.4	4026.4	4021.9	4008.1	4003.4	4021.9	3962.3	3989.8
7.5°	4086.0	4145.5	4223.4	4127.2	4131.7	4131.7	4104.3	4095.1	4095.1	3985.1	4017.2
10°	4136.4	4099.6	4140.9	4104.3	4136.4	4131.7	4150.0	4090.5	4131.7	4067.7	4063.0
12.5°	4095.1	4081.3	4136.4	4076.8	4058.5	4063.0	4040.2	4026.4	4040.2	3966.8	3962.3
15°	3976.0	3989.8	4072.1	4008.1	3998.9	3989.8	3962.3	3916.4	3953.2	3852.3	3857.0
17.5°	3934.9	3911.9	3925.7	3870.6	3884.4	3875.3	3870.6	3829.5	3820.2	3756.1	3756.1
20°	3742.5	3792.7	3792.7	3756.1	3756.1	3751.6	3692.0	3728.7	3687.4	3669.1	3687.4
22.5°	3609.5	3614.2	3614.2	3582.0	3586.7	3568.4	3536.3	3513.3	3536.3	3513.3	3476.7
25°	3366.9	3376.0	3430.9	3371.4	3362.2	3380.5	3353.0	3339.2	3334.7	3279.8	3353.0
27.5°	3073.6	3165.2	3160.7	3137.7	3165.2	3128.5	3114.9	3119.4	3133.2	3128.5	3146.8
30°	2904.2	2917.9	2931.7	2913.4	2917.9	2904.2	2904.2	2908.7	2945.3	2931.7	2927.0
32.5°	2560.5	2606.3	2643.1	2643.1	2647.6	2661.4	2656.7	2752.9	2775.9	2730.1	2721.0
35°	2262.8	2294.9	2326.9	2331.6	2391.1	2395.6	2400.3	2427.7	2491.8	2505.6	2501.0
37.5°	1978.9	2010.9	2020.0	2061.3	2093.4	2125.4	2162.1	2198.8	2253.7	2299.4	2276.6
40°	1727.0	1740.6	1763.6	1781.9	1845.9	1845.9	1864.2	1937.6	1997.2	2033.8	2029.2
42.5°	1516.3	1520.8	1539.1	1571.2	1630.8	1616.9	1630.8	1681.2	1768.0	1772.7	1823.1
45°	1369.6	1365.0	1378.8	1383.3	1420.1	1438.4	1447.5	1484.1	1557.4	1566.5	1571.2
47.5°	1236.8	1232.2	1255.1	1264.3	1277.9	1296.2	1296.2	1300.9	1328.4	1351.3	1333.0
50°	1126.8	1126.8	1126.8	1136.0	1159.0	1154.3	1159.0	1177.3	1190.9	1181.7	1177.3
52.5°	1007.7	1026.0	1039.8	1044.5	1048.9	1048.9	1053.6	1044.5	1039.8	1026.0	998.5
55°	925.3	943.6	943.6	943.6	943.6	961.9	939.1	943.6	943.6	907.0	870.4
57.5°	842.9	861.2	874.9	856.6	874.9	856.6	847.4	842.9	833.6	797.0	742.1
60°	774.2	783.3	778.7	774.2	783.3	769.5	760.4	742.1	732.9	682.5	645.9
62.5°	696.3	700.8	705.5	696.3	687.2	682.5	664.2	636.7	618.4	577.1	545.0
65°	632.1	618.4	613.8	609.3	600.1	586.3	572.7	540.5	526.7	490.1	458.0
67.5°	535.9	531.4	540.5	526.7	503.9	503.9	490.1	462.7	430.5	407.7	375.6
70°	458.0	453.5	444.3	430.5	426.0	407.7	407.7	375.6	366.5	325.2	297.7
72.5°	375.6	375.6	361.8	348.2	334.3	325.2	320.7	297.7	284.1	261.1	238.1
75°	284.1	284.1	279.4	265.6	256.4	247.3	242.8	224.5	210.7	187.9	174.1
77.5°	201.5	201.5	183.2	174.1	178.6	169.4	160.3	155.8	151.1	137.5	119.2
80°	119.2	114.5	100.9	105.3	100.9	100.9	96.2	91.5	82.4	73.2	64.1
82.5°	32.1	36.6	36.6	36.6	41.3	32.1	32.1	32.1	36.6	36.6	23.0
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	4.7	4.7	4.7
87.5°	4.7	9.2	18.3	18.3	18.3	18.3	18.3	13.8	13.8	13.8	9.2
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°	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2
2.5°	3866.1	3861.5	3866.1	3834.0	3907.2	3852.3	3843.2	3834.0	3866.1	3834.0	3788.2
5°	3948.5	3902.7	3888.9	3875.3	3916.4	3852.3	3838.7	3843.2	3820.2	3760.8	3765.3
7.5°	3976.0	3934.9	3893.6	3806.5	3843.2	3829.5	3792.7	3765.3	3728.7	3678.2	3669.1
10°	3985.1	3939.3	3879.8	3852.3	3797.4	3779.1	3765.3	3719.5	3673.7	3586.7	3563.7
12.5°	3957.6	3902.7	3829.5	3806.5	3765.3	3705.7	3673.7	3627.8	3586.7	3518.0	3467.5
15°	3838.7	3792.7	3769.9	3692.0	3673.7	3637.0	3572.9	3508.8	3449.2	3357.5	3330.1
17.5°	3701.2	3682.9	3659.9	3600.3	3595.9	3559.2	3499.7	3444.6	3366.9	3224.7	3179.0
20°	3559.2	3559.2	3485.8	3463.1	3508.8	3435.4	3389.7	3339.2	3179.0	3110.2	3027.9
22.5°	3453.9	3403.5	3362.2	3325.6	3330.1	3284.3	3220.2	3119.4	3059.8	2977.4	2881.2
25°	3247.7	3266.0	3174.5	3160.7	3174.5	3069.0	3037.0	2954.5	2867.4	2789.5	2716.3
27.5°	3119.4	3069.0	3009.6	2959.1	2959.1	2917.9	2826.3	2808.0	2675.0	2601.8	2510.1
30°	2927.0	2890.4	2840.0	2766.7	2757.6	2725.5	2652.3	2606.3	2469.0	2359.0	2308.6
32.5°	2684.2	2670.6	2629.3	2546.9	2519.5	2482.7	2391.1	2313.3	2249.2	2125.4	2066.0
35°	2510.1	2459.9	2372.8	2304.1	2281.1	2217.1	2143.7	2088.7	2020.0	1910.2	1832.3
37.5°	2249.2	2198.8	2116.2	2033.8	2033.8	1969.8	1868.9	1814.0	1717.8	1653.6	1589.5
40°	2020.0	1955.9	1873.6	1777.4	1763.6	1671.9	1630.8	1539.1	1479.5	1378.8	1369.6
42.5°	1763.6	1704.0	1630.8	1557.4	1502.4	1456.7	1351.3	1282.6	1218.5	1168.1	1154.3
45°	1529.9	1452.0	1388.0	1296.2	1241.3	1186.4	1117.7	1071.9	1021.5	966.6	934.5
47.5°	1328.4	1264.3	1172.6	1090.2	1035.3	1007.7	929.8	879.5	838.3	801.7	778.7
50°	1122.3	1044.5	994.0	902.3	893.2	829.1	765.0	723.8	700.8	668.9	636.7
52.5°	966.6	893.2	824.4	755.9	719.1	696.3	636.7	595.5	563.5	540.5	522.2
55°	815.3	751.2	696.3	627.6	604.6	572.7	503.9	494.8	462.7	430.5	407.7
57.5°	700.8	641.2	577.1	531.4	490.1	467.3	412.2	375.6	357.3	329.8	306.9
60°	595.5	531.4	481.0	426.0	407.7	375.6	334.3	302.4	279.4	256.4	233.7
62.5°	499.3	444.3	389.4	343.5	316.0	297.7	265.6	238.1	215.4	197.0	178.6
65°	412.2	361.8	316.0	270.3	256.4	233.7	210.7	187.9	169.4	146.6	128.3
67.5°	339.0	293.2	247.3	215.4	201.5	192.4	164.9	142.0	128.3	114.5	96.2
70°	265.6	233.7	197.0	169.4	155.8	142.0	123.6	110.0	91.5	82.4	68.7
72.5°	206.2	178.6	146.6	123.6	114.5	105.3	87.0	73.2	64.1	54.9	45.8
75°	146.6	123.6	105.3	82.4	77.9	73.2	59.6	50.4	41.3	32.1	27.5
77.5°	100.9	82.4	64.1	54.9	50.4	41.3	36.6	27.5	23.0	18.3	13.8
80°	54.9	41.3	32.1	27.5	23.0	18.3	18.3	13.8	9.2	9.2	4.7
82.5°	18.3	13.8	9.2	4.7	4.7	4.7	4.7	4.7	4.7	0.0	4.7
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	4.7	4.7	4.7	4.7	4.7	4.7	4.7	4.7	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°	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2
2.5°	3815.7	3765.3	3779.1	3779.1	3769.9	3769.9	3760.8	3747.0	3751.6	3724.0	3664.6
5°	3774.4	3710.4	3701.2	3710.4	3673.7	3664.6	3646.3	3673.7	3591.2	3623.3	3586.7
7.5°	3655.4	3595.9	3582.0	3614.2	3568.4	3540.8	3536.3	3572.9	3499.7	3463.1	3421.8
10°	3522.5	3499.7	3458.4	3435.4	3421.8	3426.3	3389.7	3343.9	3330.1	3320.9	3284.3
12.5°	3403.5	3353.0	3316.4	3289.0	3279.8	3279.8	3220.2	3211.1	3169.8	3160.7	3105.7
15°	3261.3	3201.9	3179.0	3142.4	3110.2	3128.5	3059.8	3041.5	3027.9	2968.3	2977.4
17.5°	3137.7	3073.6	3018.7	2995.7	2968.3	2940.8	2876.6	2890.4	2858.3	2858.3	2775.9
20°	2977.4	2908.7	2867.4	2821.7	2821.7	2785.1	2739.3	2743.8	2702.5	2661.4	2588.0
22.5°	2808.0	2734.6	2684.2	2665.9	2620.1	2611.0	2556.1	2542.2	2487.3	2491.8	2427.7
25°	2629.3	2556.1	2487.3	2491.8	2450.7	2432.4	2400.3	2336.2	2313.3	2285.8	2267.5
27.5°	2418.6	2368.2	2308.6	2304.1	2226.2	2230.7	2189.6	2171.3	2116.2	2130.0	2088.7
30°	2226.2	2153.0	2097.9	2084.3	2052.1	2043.0	1978.9	1951.3	1960.6	1923.8	1901.0
32.5°	2029.2	1919.3	1896.4	1868.9	1850.6	1827.6	1781.9	1800.2	1758.9	1768.0	1731.4
35°	1768.0	1722.3	1662.7	1662.7	1644.4	1626.1	1594.2	1612.5	1571.2	1552.9	1516.3
37.5°	1548.2	1507.1	1447.5	1465.8	1433.7	1406.3	1378.8	1383.3	1346.7	1342.2	1305.4
40°	1310.1	1287.1	1246.0	1246.0	1223.0	1223.0	1209.2	1195.6	1172.6	1145.1	1103.9
42.5°	1085.6	1067.3	1048.9	1053.6	1021.5	1048.9	1012.3	1035.3	961.9	957.4	929.8
45°	920.6	879.5	884.0	865.7	847.4	856.6	824.4	833.6	792.5	783.3	755.9
47.5°	746.7	732.9	705.5	696.3	696.3	682.5	668.9	664.2	645.9	622.9	586.3
50°	613.8	563.5	554.2	540.5	531.4	531.4	513.1	485.6	490.1	467.3	430.5
52.5°	481.0	439.7	421.4	416.9	398.6	389.4	366.5	348.2	334.3	325.2	302.4
55°	370.9	334.3	311.5	311.5	284.1	284.1	252.0	238.1	219.8	201.5	187.9
57.5°	279.4	261.1	238.1	219.8	210.7	187.9	169.4	146.6	132.8	105.3	87.0
60°	210.7	192.4	169.4	155.8	146.6	123.6	100.9	82.4	50.4	41.3	36.6
62.5°	155.8	137.5	114.5	105.3	96.2	77.9	54.9	27.5	13.8	13.8	13.8
65°	114.5	91.5	73.2	64.1	54.9	41.3	18.3	9.2	4.7	4.7	4.7
67.5°	77.9	59.6	41.3	36.6	27.5	13.8	4.7	4.7	4.7	4.7	4.7
70°	50.4	36.6	18.3	13.8	9.2	4.7	4.7	4.7	4.7	4.7	4.7
72.5°	32.1	18.3	9.2	4.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0
75°	18.3	9.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
77.5°	9.2	4.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
80°	4.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	0.0	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	0.0	0.0	0.0	0.0	0.0	0.0	4.7	4.7	4.7
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: P#

CATALOG NUMBER: LD4C75D010 EX4C759035 4LBSQLWWH

CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°
0°	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2	3820.2
2.5°	3728.7	3696.5	3714.8	3673.7	3692.0	3724.0	3701.2	3710.4
5°	3600.3	3582.0	3559.2	3499.7	3545.4	3582.0	3563.7	3559.2
7.5°	3463.1	3398.8	3430.9	3412.6	3403.5	3440.1	3398.8	3444.6
10°	3320.9	3275.2	3270.7	3238.6	3238.6	3266.0	3270.7	3243.0
12.5°	3110.2	3087.4	3087.4	3082.8	3078.1	3105.7	3110.2	3096.6
15°	2959.1	2950.0	2927.0	2922.5	2895.1	2936.2	2940.8	2936.2
17.5°	2775.9	2780.4	2757.6	2757.6	2775.9	2789.5	2752.9	2789.5
20°	2652.3	2629.3	2620.1	2578.9	2601.8	2624.8	2624.8	2629.3
22.5°	2473.5	2436.9	2450.7	2427.7	2413.9	2446.1	2446.1	2459.9
25°	2272.0	2272.0	2281.1	2267.5	2276.6	2294.9	2281.1	2313.3
27.5°	2079.6	2097.9	2097.9	2079.6	2088.7	2143.7	2166.6	2130.0
30°	1901.0	1905.5	1919.3	1910.2	1937.6	1955.9	1951.3	1978.9
32.5°	1699.5	1722.3	1731.4	1717.8	1727.0	1768.0	1745.3	1740.6
35°	1543.7	1502.4	1498.0	1502.4	1520.8	1529.9	1520.8	1552.9
37.5°	1319.2	1305.4	1287.1	1291.8	1305.4	1323.9	1333.0	1355.8
40°	1103.9	1085.6	1085.6	1081.1	1067.3	1117.7	1117.7	1117.7
42.5°	916.1	911.5	888.7	888.7	907.0	920.6	911.5	943.6
45°	751.2	732.9	719.1	719.1	732.9	732.9	746.7	742.1
47.5°	591.0	572.7	577.1	563.5	577.1	595.5	572.7	577.1
50°	444.3	444.3	435.2	444.3	439.7	444.3	435.2	426.0
52.5°	302.4	343.5	348.2	329.8	288.6	252.0	229.0	247.3
55°	174.1	155.8	155.8	151.1	142.0	137.5	123.6	137.5
57.5°	87.0	77.9	77.9	77.9	73.2	68.7	59.6	59.6
60°	36.6	32.1	32.1	27.5	23.0	18.3	13.8	18.3
62.5°	13.8	9.2	9.2	9.2	9.2	9.2	9.2	9.2
65°	4.7	4.7	4.7	4.7	4.7	4.7	4.7	4.7
67.5°	4.7	4.7	4.7	4.7	4.7	4.7	4.7	4.7
70°	4.7	4.7	4.7	4.7	4.7	4.7	4.7	4.7
72.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
75°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
77.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
80°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	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



Report Generated By 670246072 / DESKTOP-50001EG





— 0°-180° - - 45°-225° - - - - 90°-270°













(END OF REPORT)