

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: P209367

Luminaire Tested: **LDSQ6B50D010 EU6B30508027 6LBSQ1LI**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-41-14  
Report Number: P209367  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P35360)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: io LED  
Catalog Number: LDSQ6B50D010 EU6B30508027 6LBSQ1LI  
Description: PORTFOLIO LD6 SERIES 6" RECESSED FIXTURE WITH A SQUARE LOW  
IRIDESCENT TRIM.  
MEDIUM DISTRIBUTION WITH SPECULAR CLEAR TRIM  
D010TE  
Light Source: HIGH LUMEN LED 2700 K  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 5030.1 lumens  
Efficiency: N/A  
Efficacy: 85.6 lumens/watt  
Spacing Criteria (0/90/45): 0.92 / 0.92 / 0.95  
Luminous Opening: Point Source (0' x 0' x 0')  
CIE Type: Direct

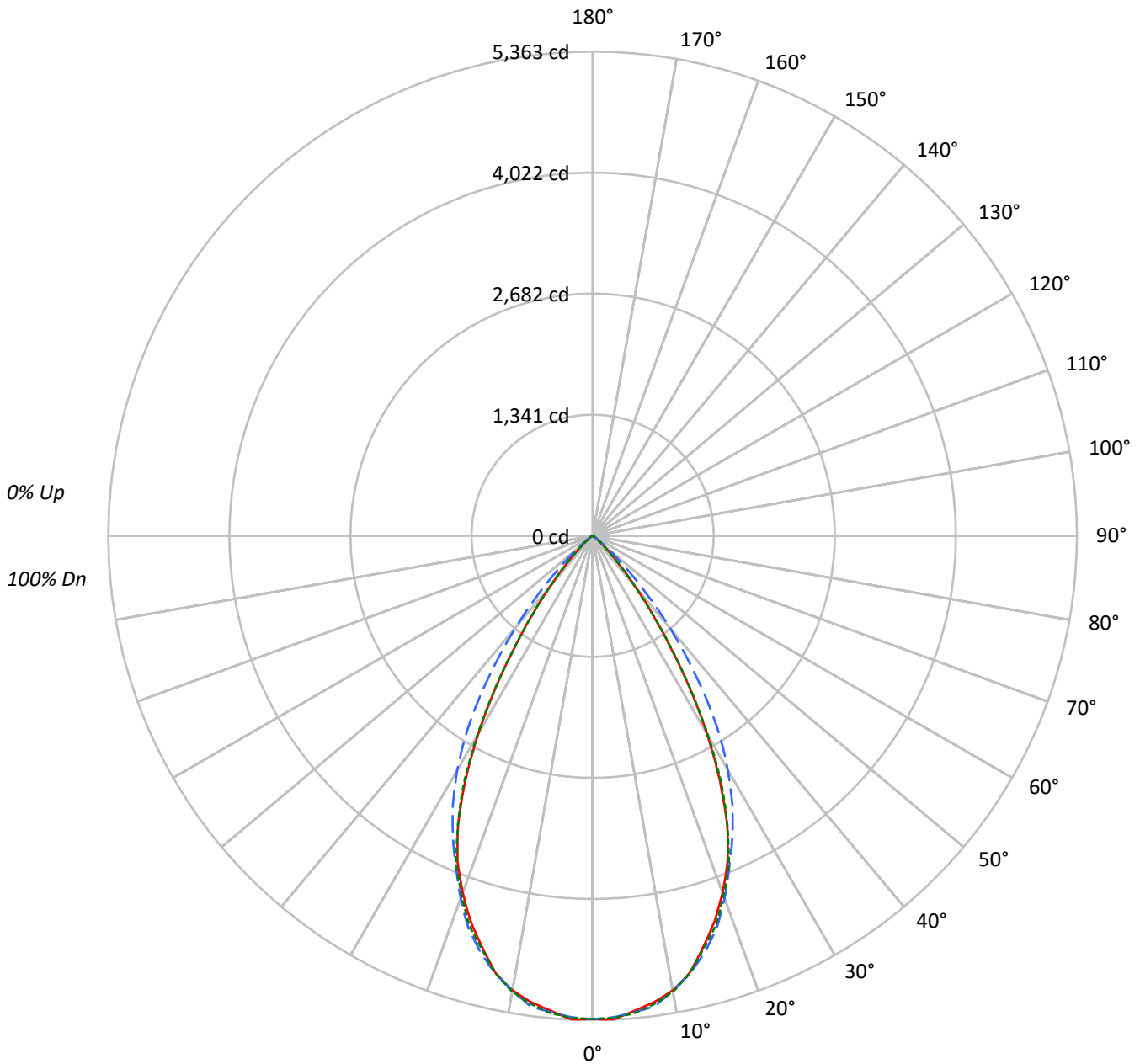
Input Watts (W): 58.77  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	113	111	108	106	111	108	106	104	104	103	101	101	99	98	97	96	95	93																			
2	108	103	99	95	106	101	97	94	98	95	92	95	92	90	92	90	88	87																			
3	102	96	91	87	100	94	90	86	92	88	85	89	86	83	87	84	82	80																			
4	97	89	84	79	95	88	83	79	86	81	78	84	80	77	82	79	76	75																			
5	92	83	78	73	90	82	77	73	81	76	72	79	75	72	77	74	71	69																			
6	87	78	72	68	86	77	72	67	76	71	67	74	70	67	73	69	66	65																			
7	83	73	67	63	81	73	67	63	71	66	62	70	66	62	69	65	62	60																			
8	79	69	63	59	77	68	63	59	67	62	58	66	62	58	65	61	58	56																			
9	75	65	59	55	74	64	59	55	64	58	55	63	58	54	62	57	54	53																			
10	71	61	55	52	70	61	55	51	60	55	51	59	55	51	59	54	51	50																			

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	Luminaire represents a point source (luminous area is zero).		
5°	No luminance values can be calculated.		
10°			
15°			
20°			
25°			
30°			
35°			
40°			
45°			
50°			
55°			
60°			
65°			
70°			
75°			
80°			
85°			



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	501.1	10.0
10°-20°	1333.0	26.5
20°-30°	1636.0	32.5
30°-40°	1129.4	22.5
40°-50°	353.1	7.0
50°-60°	55.1	1.1
60°-70°	15.9	0.3
70°-80°	5.2	0.1
80°-90°	1.2	0.0
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°	3470.2	69.0
0°-40°	4599.5	91.4
0°-60°	5007.8	99.6
0°-90°	5030.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5030.1	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	5353	5353	5353	5353	5353	
5°	5282	5302	5295	5297	5309	499
15°	4722	4790	4783	4776	4739	1321
25°	3525	3616	3663	3639	3528	1579
35°	1487	1759	2182	1776	1494	950
45°	280	383	614	379	287	251
55°	47	51	57	51	44	46
65°	14	17	14	17	14	15
75°	3	3	3	3	3	5
85°	0	0	0	0	0	0
90°	0	0	0	0	0	0



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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8
2.5°	5362.9	5288.7	5335.9	5325.8	5352.8	5369.6	5352.8	5383.1	5362.9	5339.3	5346.0
5°	5281.9	5292.0	5288.7	5295.4	5302.2	5302.2	5335.9	5339.3	5346.0	5295.4	5308.9
7.5°	5211.1	5211.1	5228.0	5221.2	5244.8	5238.1	5241.4	5268.4	5271.8	5258.3	5248.2
10°	5113.3	5099.8	5082.9	5082.9	5113.3	5116.7	5143.6	5147.0	5167.2	5113.3	5120.0
12.5°	4961.5	4954.8	4927.8	4941.3	4964.9	4951.4	4995.2	4998.6	4991.9	4968.2	4981.7
15°	4722.0	4749.0	4742.3	4738.9	4792.9	4786.1	4782.7	4792.9	4796.2	4782.7	4772.6
17.5°	4482.6	4506.2	4509.5	4516.3	4526.4	4536.5	4550.0	4587.1	4573.6	4563.5	4597.2
20°	4206.0	4195.9	4222.8	4249.8	4259.9	4259.9	4280.2	4307.2	4286.9	4273.4	4276.8
22.5°	3905.8	3922.7	3909.2	3936.1	3949.6	3966.5	3986.7	4010.3	3993.5	3956.4	4000.2
25°	3524.7	3534.8	3578.6	3575.2	3595.5	3636.0	3666.3	3666.3	3666.3	3662.9	3662.9
27.5°	3045.7	3039.0	3092.9	3130.0	3180.6	3244.7	3285.2	3349.3	3359.4	3349.3	3325.7
30°	2533.0	2526.3	2593.7	2641.0	2732.0	2762.4	2873.7	2934.4	2998.5	2995.1	2978.2
32.5°	2000.1	2013.6	2067.6	2135.0	2209.2	2303.7	2408.2	2543.1	2600.5	2614.0	2583.6
35°	1487.4	1507.7	1558.3	1615.6	1706.7	1811.2	1956.3	2084.4	2182.3	2182.3	2158.6
37.5°	1072.6	1079.3	1126.5	1163.6	1258.1	1352.5	1477.3	1652.7	1713.4	1737.0	1713.4
40°	731.9	731.9	758.9	799.4	876.9	957.9	1072.6	1204.1	1291.8	1328.9	1288.4
42.5°	465.5	472.2	492.4	519.4	576.8	647.6	735.3	833.1	897.2	924.2	887.1
45°	279.9	286.7	303.6	323.8	360.9	404.7	465.5	536.3	590.3	613.9	597.0
47.5°	168.6	175.4	182.1	195.6	222.6	253.0	283.3	323.8	357.5	360.9	354.2
50°	97.8	97.8	104.6	114.7	128.2	145.0	161.9	185.5	195.6	209.1	195.6
52.5°	64.1	64.1	64.1	67.5	74.2	80.9	87.7	101.2	107.9	107.9	104.6
55°	47.2	47.2	47.2	47.2	50.6	50.6	50.6	54.0	57.3	57.3	57.3
57.5°	33.7	33.7	33.7	37.1	37.1	37.1	33.7	33.7	33.7	33.7	33.7
60°	27.0	27.0	27.0	27.0	27.0	27.0	27.0	27.0	23.6	23.6	23.6
62.5°	20.2	20.2	20.2	20.2	20.2	20.2	20.2	20.2	20.2	20.2	20.2
65°	13.5	13.5	13.5	16.9	16.9	16.9	16.9	13.5	13.5	13.5	13.5
67.5°	10.1	10.1	10.1	13.5	13.5	13.5	13.5	13.5	10.1	10.1	10.1
70°	6.7	6.7	10.1	10.1	10.1	10.1	10.1	10.1	10.1	10.1	10.1
72.5°	6.7	6.7	6.7	6.7	6.7	6.7	6.7	6.7	6.7	6.7	6.7
75°	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4
77.5°	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4
80°	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4
82.5°	0.0	0.0	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4
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	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):**

	55°	60°	65°	70°	75°	80°	85°	90°
0°	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8	5352.8
2.5°	5366.2	5349.4	5349.4	5349.4	5342.6	5349.4	5359.5	5342.6
5°	5308.9	5315.7	5285.3	5308.9	5319.0	5302.2	5342.6	5308.9
7.5°	5258.3	5248.2	5201.0	5234.7	5254.9	5261.7	5258.3	5231.3
10°	5157.1	5133.5	5113.3	5113.3	5106.5	5103.2	5140.3	5126.8
12.5°	4975.0	4991.9	4961.5	4978.4	4964.9	4968.2	4971.6	4964.9
15°	4819.8	4803.0	4762.5	4789.5	4772.6	4755.8	4789.5	4738.9
17.5°	4577.0	4573.6	4550.0	4533.1	4539.9	4536.5	4553.4	4529.8
20°	4290.3	4297.0	4283.6	4276.8	4266.7	4243.1	4263.3	4236.3
22.5°	3980.0	3986.7	4000.2	3973.2	3976.6	3942.9	3973.2	3942.9
25°	3666.3	3662.9	3646.1	3632.6	3595.5	3558.4	3551.6	3528.0
27.5°	3322.3	3298.7	3258.2	3214.4	3157.0	3106.4	3103.0	3086.2
30°	2944.5	2893.9	2819.7	2748.9	2661.2	2583.6	2583.6	2556.6
32.5°	2546.5	2431.8	2330.7	2243.0	2128.3	2084.4	2040.6	2017.0
35°	2070.9	1969.8	1848.3	1703.3	1649.3	1541.4	1548.1	1494.2
37.5°	1622.4	1497.6	1382.9	1264.8	1170.4	1119.8	1092.8	1065.8
40°	1204.1	1082.7	957.9	880.3	796.0	752.2	735.3	728.5
42.5°	823.0	721.8	640.8	576.8	532.9	485.7	472.2	465.5
45°	536.3	478.9	404.7	354.2	323.8	296.8	296.8	286.7
47.5°	320.4	283.3	246.2	212.5	192.3	175.4	168.6	165.3
50°	178.8	158.5	138.3	124.8	111.3	101.2	97.8	97.8
52.5°	97.8	87.7	80.9	70.8	64.1	64.1	64.1	60.7
55°	50.6	50.6	50.6	50.6	47.2	47.2	47.2	43.8
57.5°	33.7	33.7	37.1	37.1	37.1	33.7	33.7	33.7
60°	27.0	27.0	27.0	27.0	27.0	27.0	27.0	27.0
62.5°	20.2	20.2	20.2	20.2	20.2	20.2	20.2	20.2
65°	13.5	16.9	16.9	16.9	16.9	13.5	13.5	13.5
67.5°	10.1	13.5	13.5	13.5	10.1	10.1	10.1	10.1
70°	10.1	10.1	10.1	10.1	10.1	6.7	6.7	6.7
72.5°	6.7	6.7	6.7	6.7	6.7	6.7	6.7	6.7
75°	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4
77.5°	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4
80°	3.4	3.4	3.4	3.4	3.4	3.4	3.4	3.4
82.5°	3.4	3.4	3.4	3.4	3.4	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



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









(END OF REPORT)