

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: P282771

Luminaire Tested: **LDA2B209035D010 EU2B20NFL259035 2LBALPINSQ1MB**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P282771
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1809-951-26)
Test Lab: INNOVATION CENTER(G2)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LDA2B209035D010 EU2B20NFL259035 2LBALPINSQ1MB
Description: PORTFOLIO 2IN ADJ 2000 LUMEN LED LUMINAIRE WITH NARROW FLOOD OPTIC AND 2in Adj SQ Pinhole w-lens, MB
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1398.4 lumens
Efficiency: N/A
Efficacy: 67.9 lumens/watt
Spacing Criteria (0/90/45): 0.33 / 0.3 / 0.32
Luminous Opening: Circular (Dia: 0.17' x H: 0')
CIE Type: Direct

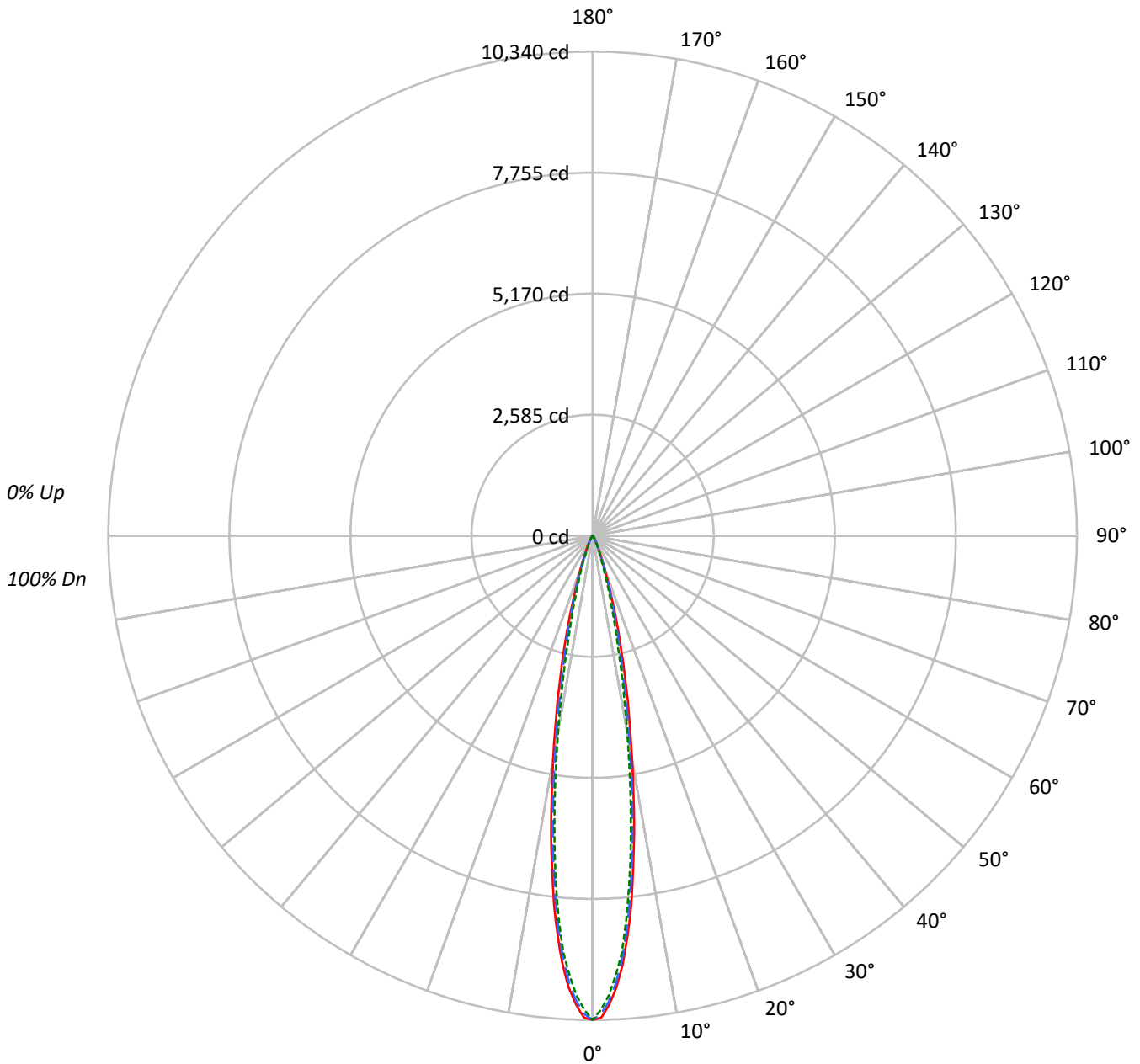
Input Watts (W): 20.6
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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				100															
1	115	113	112	110	113	111	110	108	107	106	105	104	103	102	100	100	99	97				97															
2	112	109	106	104	110	107	105	103	104	102	100	101	100	98	99	97	96	95				95															
3	109	105	101	99	107	103	100	98	101	99	97	99	97	95	97	95	94	92				92															
4	106	101	98	95	105	100	97	94	98	96	93	96	94	92	95	93	91	90				90															
5	103	98	94	92	102	97	94	91	96	93	91	94	92	90	93	91	89	88				88															
6	101	95	92	89	100	95	91	89	93	90	88	92	90	88	91	89	87	86				86															
7	99	93	89	87	98	92	89	86	91	88	86	90	88	86	89	87	85	84				84															
8	96	91	87	85	96	90	87	84	89	86	84	88	86	84	88	85	83	83				83															
9	94	89	85	83	94	88	85	82	87	84	82	87	84	82	86	84	82	81				81															
10	93	87	83	81	92	86	83	81	86	83	81	85	82	80	85	82	80	79				79															

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5101213	5101213	5101213
5°	4244756	4166953	4082811
10°	2431371	2281530	2129334
15°	1081393	960444	804865
20°	392298	368882	292229
25°	150626	140664	121121
30°	64944	60444	53607
35°	30716	30716	25477
40°	15393	15908	12816
45°	8931	8373	7814
50°	6140	5526	5526
55°	4817	3441	4129
60°	3947	2368	3158
65°	2802	1868	2802
70°	2308	1154	2308
75°	1525	1525	1525
80°	0	0	0
85°	0	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	672.5	48.1
10°-20°	544.2	38.9
20°-30°	131.2	9.4
30°-40°	33.5	2.4
40°-50°	10.0	0.7
50°-60°	4.3	0.3
60°-70°	2.1	0.1
70°-80°	0.7	0.0
80°-90°	0.0	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°	1347.9	96.4
0°-40°	1381.4	98.8
0°-60°	1395.6	99.8
0°-90°	1398.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1398.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	10340	10340	10340	10340	10340	
5°	8571	8492	8414	8340	8244	693
15°	2117	2067	1880	1694	1576	604
25°	277	278	258	234	222	143
35°	51	52	51	46	42	35
45°	13	13	12	11	11	11
55°	6	5	4	4	5	5
65°	2	2	2	2	2	3
75°	1	1	1	1	1	1
85°	0	0	0	0	0	0
90°	0	0	0	0	0	0



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	10339.7	10339.7	10339.7	10339.7	10339.7
1°	10293.5	10221.7	10212.9	10257.6	10126.0
2°	10030.3	9979.3	9949.8	9976.1	9827.0
3°	9669.1	9619.6	9566.2	9567.0	9400.3
4°	9177.0	9138.0	9047.8	9020.7	8924.2
5°	8571.0	8492.0	8413.9	8340.5	8244.0
6°	7901.1	7799.0	7687.4	7578.1	7479.3
7°	7113.2	7045.5	6897.9	6748.8	6665.1
8°	6372.4	6263.2	6090.9	5904.3	5833.3
9°	5575.8	5497.6	5299.8	5082.9	5012.0
10°	4853.3	4771.9	4554.2	4312.6	4250.4
11°	4175.4	4098.9	3872.4	3618.8	3552.6
12°	3602.1	3493.6	3233.7	3013.6	2949.0
13°	3031.1	2956.9	2710.5	2492.8	2367.6
14°	2545.5	2484.1	2260.8	2069.4	1937.0
15°	2117.2	2067.0	1880.4	1693.8	1575.8
16°	1736.8	1705.7	1558.2	1378.0	1281.5
17°	1409.1	1380.4	1286.3	1120.4	1039.1
18°	1138.0	1134.0	1055.8	912.3	839.7
19°	936.2	934.6	862.8	742.4	682.6
20°	747.2	757.6	702.6	597.3	556.6
21°	609.3	614.8	571.0	491.2	454.5
22°	496.0	500.0	471.3	405.9	386.0
23°	406.7	409.1	385.2	336.5	319.0
24°	334.9	336.5	315.0	280.7	265.6
25°	276.7	278.3	258.4	234.4	222.5
26°	229.7	231.3	213.7	197.0	185.0
27°	190.6	193.8	176.2	165.9	153.1
28°	162.7	163.5	147.5	141.1	129.2
29°	133.2	138.0	124.4	118.8	110.0
30°	114.0	116.4	106.1	102.1	94.1
32.5°	75.8	77.4	72.6	69.4	63.0
35°	51.0	51.8	51.0	46.3	42.3
37.5°	35.1	35.1	35.9	30.3	28.7
40°	23.9	23.9	24.7	20.7	19.9
42.5°	17.5	17.5	16.7	14.4	14.4
45°	12.8	12.8	12.0	11.2	11.2
47.5°	10.4	9.6	8.8	8.8	8.8
50°	8.0	8.0	7.2	6.4	7.2
52.5°	6.4	6.4	5.6	5.6	5.6
55°	5.6	4.8	4.0	4.0	4.8
57.5°	4.0	4.0	3.2	3.2	4.0
60°	4.0	3.2	2.4	3.2	3.2



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
67.5°	2.4	1.6	1.6	1.6	1.6
70°	1.6	1.6	0.8	0.8	1.6
72.5°	0.8	0.8	0.8	0.8	0.8
75°	0.8	0.8	0.8	0.8	0.8
77.5°	0.8	0.8	0.0	0.0	0.8
80°	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0



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







62.5°	3.2	2.4	2.4	2.4	2.4
65°	2.4	2.4	1.6	1.6	2.4



(END OF REPORT)