

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: P282416

Luminaire Tested: **LDA2B209035D010 EU2B20NFL259035 2LBAPINSQ1MW**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-41-14  
Report Number: P282416  
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 2LBAPINSQ1MW  
Description: PORTFOLIO 2IN ADJ 2000 LUMEN LED LUMINAIRE WITH NARROW FLOOD OPTIC AND 2in Adj SQ PinHole, MW  
Light Source: -  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1538.0 lumens  
Efficiency: N/A  
Efficacy: 74.7 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

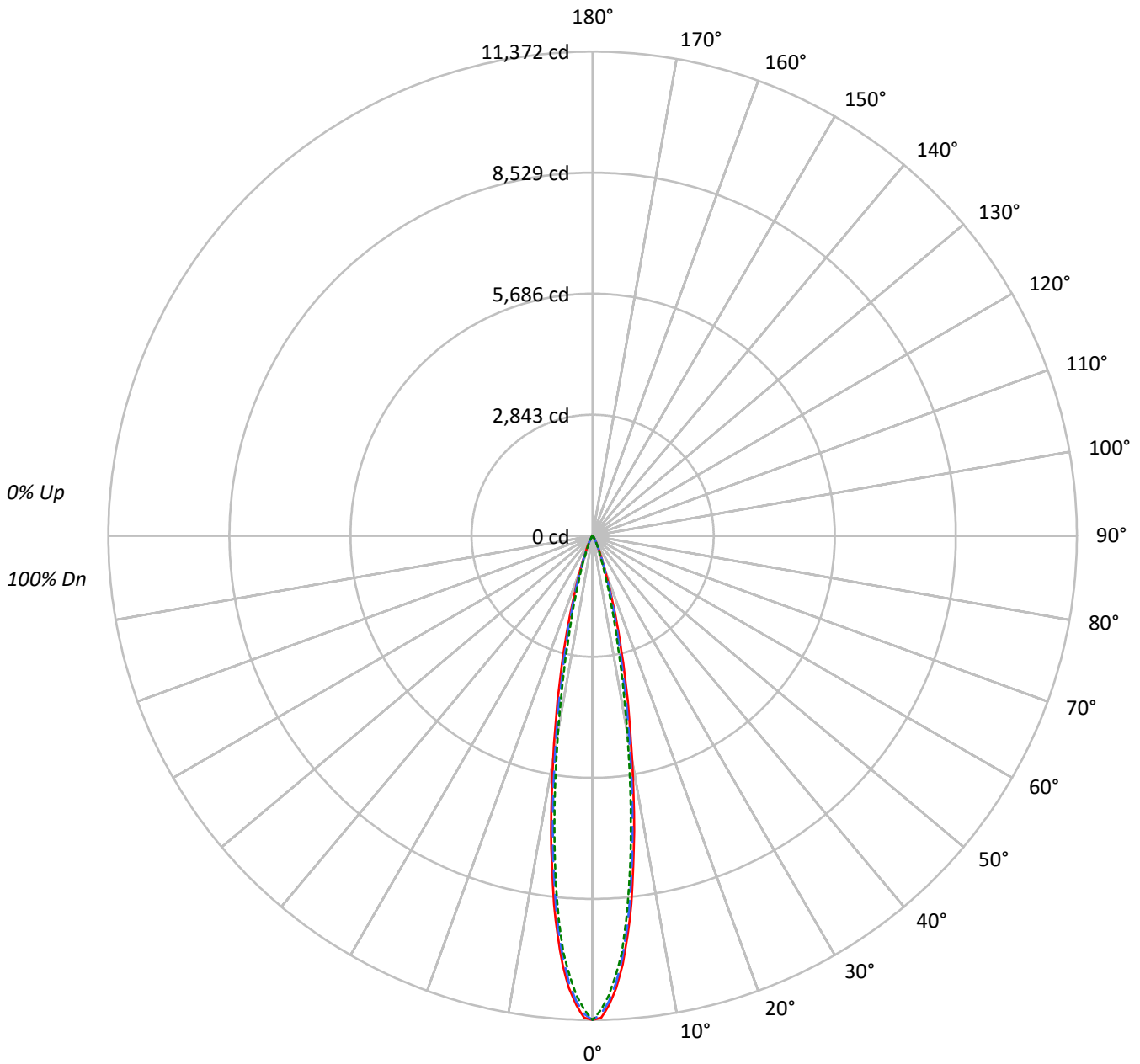
Input Watts (W): 20.6  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	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	100	99	97	97	100													
1	115	113	112	110	113	111	110	108	107	106	105	104	103	102	100	100	99	97	97	96	95	95	94	92													
2	112	109	106	104	110	107	105	103	104	102	100	101	100	98	99	97	96	95	94	93	92	91	90	88													
3	109	105	101	99	107	103	100	98	101	99	97	99	97	95	97	95	94	93	92	91	89	88	86	84													
4	106	101	98	95	105	100	97	94	98	96	93	96	94	92	95	93	91	89	88	86	84	83	81	79													
5	103	98	94	92	102	97	94	91	96	93	91	94	92	90	93	91	89	88	86	84	83	81	79	77													
6	101	95	92	89	100	95	91	89	93	90	88	92	90	88	91	89	87	86	85	84	83	82	81	80													
7	99	93	89	87	98	92	89	86	91	88	86	90	88	86	89	87	85	84	83	82	81	80	79	78													
8	96	91	87	85	96	90	87	84	89	86	84	88	86	84	88	85	83	82	81	80	79	78	77	76													
9	94	89	85	83	94	88	85	82	87	84	82	87	84	82	86	84	82	81	80	79	78	77	76	75													
10	93	87	83	81	92	86	83	81	86	83	81	85	82	80	85	82	80	79	78	77	76	75	74	73													

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

	0°	45°	90°
0°	5610708	5610708	5610708
5°	4668687	4583109	4490597
10°	2674192	2509422	2341997
15°	1189420	1056366	885208
20°	431465	405687	321420
25°	165705	154708	133206
30°	71439	66482	58962
35°	33788	33788	28006
40°	16938	17518	14104
45°	9768	9210	8582
50°	6754	6064	6064
55°	5247	3785	4559
60°	4342	2565	3454
65°	3035	2101	3035
70°	2596	1298	2596
75°	1716	1716	1716
80°	0	0	0
85°	0	0	0



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	739.7	48.1
10°-20°	598.6	38.9
20°-30°	144.3	9.4
30°-40°	36.8	2.4
40°-50°	11.0	0.7
50°-60°	4.7	0.3
60°-70°	2.3	0.1
70°-80°	0.8	0.1
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°	1482.6	96.4
0°-40°	1519.4	98.8
0°-60°	1535.0	99.8
0°-90°	1538.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1538.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	11372	11372	11372	11372	11372	
5°	9427	9340	9254	9174	9067	762
15°	2329	2273	2068	1863	1733	664
25°	304	306	284	258	245	157
35°	56	57	56	51	46	39
45°	14	14	13	12	12	12
55°	6	5	4	4	5	5
65°	3	3	2	2	3	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°	11372.4	11372.4	11372.4	11372.4	11372.4
1°	11321.5	11242.6	11232.9	11282.1	11137.3
2°	11032.1	10976.0	10943.5	10972.4	10808.4
3°	10634.8	10580.4	10521.6	10522.5	10339.2
4°	10093.6	10050.6	9951.5	9921.7	9815.6
5°	9427.0	9340.2	9254.2	9173.5	9067.4
6°	8690.2	8578.0	8455.2	8335.0	8226.3
7°	7823.7	7749.1	7586.9	7422.8	7330.7
8°	7008.9	6888.7	6699.2	6494.0	6415.9
9°	6132.6	6046.7	5829.2	5590.6	5512.5
10°	5338.0	5248.5	5009.1	4743.3	4674.9
11°	4592.5	4508.3	4259.2	3980.3	3907.5
12°	3961.8	3842.5	3556.6	3314.5	3243.5
13°	3333.8	3252.3	2981.2	2741.8	2604.1
14°	2799.7	2732.1	2486.6	2276.1	2130.5
15°	2328.7	2273.4	2068.2	1862.9	1733.1
16°	1910.3	1876.1	1713.8	1515.6	1409.5
17°	1549.8	1518.2	1414.8	1232.3	1142.9
18°	1251.6	1247.2	1161.3	1003.4	923.6
19°	1029.7	1028.0	949.0	816.6	750.8
20°	821.8	833.2	772.7	656.9	612.2
21°	670.1	676.2	628.0	540.3	499.9
22°	545.6	549.9	518.4	446.4	424.5
23°	447.3	449.9	423.6	370.1	350.8
24°	368.4	370.1	346.5	308.7	292.1
25°	304.4	306.1	284.2	257.9	244.7
26°	252.6	254.4	235.1	216.6	203.5
27°	209.6	213.1	193.8	182.4	168.4
28°	178.9	179.8	162.3	155.2	142.1
29°	146.5	151.7	136.8	130.7	121.0
30°	125.4	128.1	116.7	112.3	103.5
32.5°	83.3	85.1	79.8	76.3	69.3
35°	56.1	57.0	56.1	50.9	46.5
37.5°	38.6	38.6	39.5	33.3	31.6
40°	26.3	26.3	27.2	22.8	21.9
42.5°	19.3	19.3	18.4	15.8	15.8
45°	14.0	14.0	13.2	12.3	12.3
47.5°	11.4	10.5	9.6	9.6	9.6
50°	8.8	8.8	7.9	7.0	7.9
52.5°	7.0	7.0	6.1	6.1	6.1
55°	6.1	5.3	4.4	4.4	5.3
57.5°	4.4	4.4	3.5	3.5	4.4
60°	4.4	3.5	2.6	3.5	3.5



TEST NUMBER: P282416

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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
67.5°	2.6	1.8	1.8	1.8	1.8
70°	1.8	1.8	0.9	0.9	1.8
72.5°	0.9	0.9	0.9	0.9	0.9
75°	0.9	0.9	0.9	0.9	0.9
77.5°	0.9	0.9	0.0	0.0	0.9
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°	3.5	2.6	2.6	2.6	2.6
65°	2.6	2.6	1.8	1.8	2.6



(END OF REPORT)