

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: P282400

Luminaire Tested: **LDA2B209024D010 EU2B20NFL259024 2LBAPINSQ1MMS**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P282400
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: LDA2B209024D010 EU2B20NFL259024 2LBAPINSQ1MMS
Description: PORTFOLIO 2IN ADJ 2000 LUMEN LED LUMINAIRE WITH NARROW FLOOD OPTIC
AND 2in Adj SQ PinHole, MMS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1304.5 lumens
Efficiency: N/A
Efficacy: 63.3 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

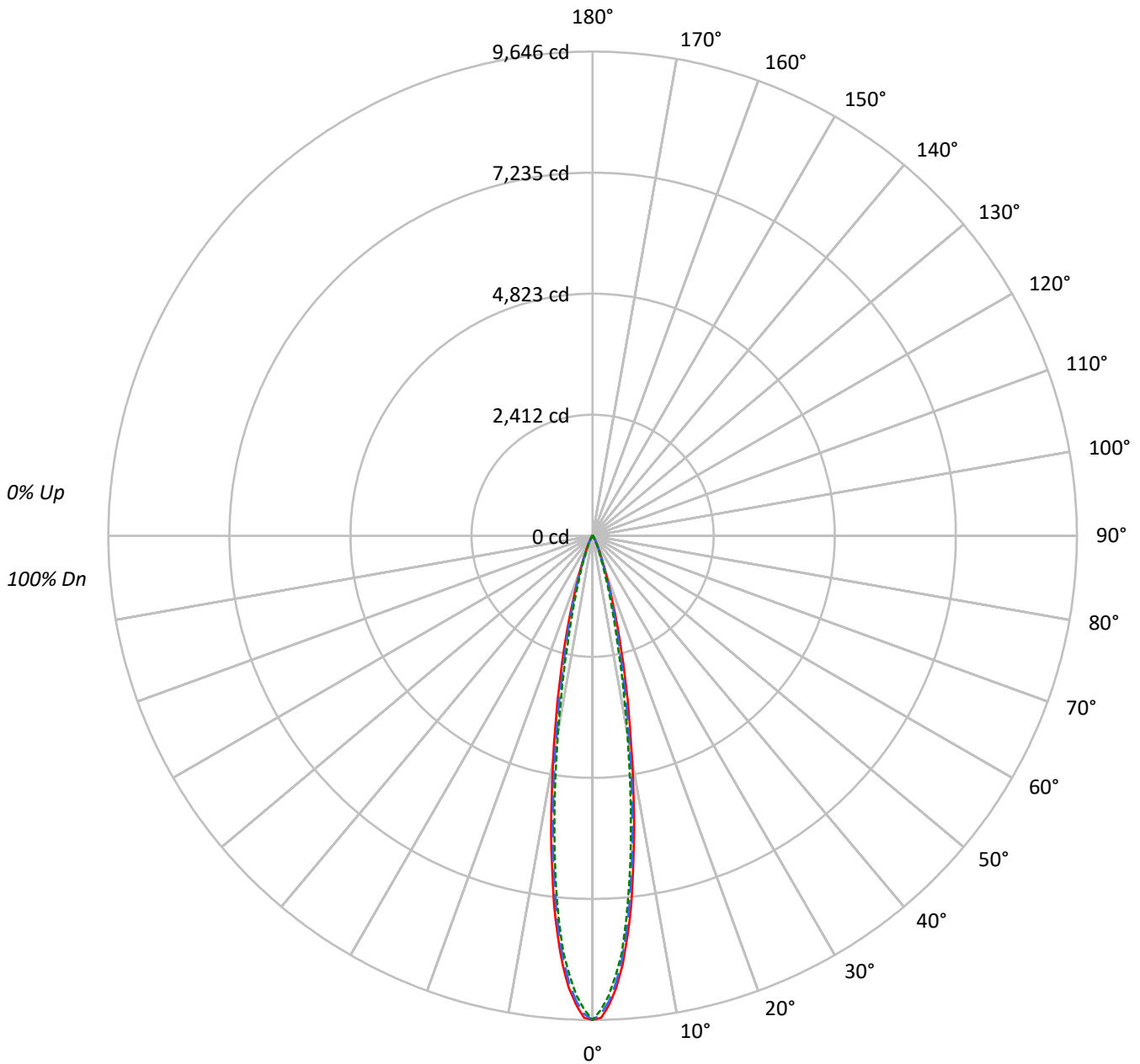
Input Watts (W): 20.6
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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°	4758820	4758820	4758820
5°	3959792	3887238	3808742
10°	2268154	2128382	1986407
15°	1008813	895985	750826
20°	365995	344101	272645
25°	140500	131192	113010
30°	60614	56342	50018
35°	28669	28669	23730
40°	14362	14877	11979
45°	8303	7814	7256
50°	5680	5142	5142
55°	4473	3183	3871
60°	3651	2171	2960
65°	2568	1751	2568
70°	2164	1010	2164
75°	1334	1334	1334
80°	0	0	0
85°	0	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	627.3	48.1
10°-20°	507.7	38.9
20°-30°	122.4	9.4
30°-40°	31.2	2.4
40°-50°	9.3	0.7
50°-60°	4.0	0.3
60°-70°	1.9	0.1
70°-80°	0.6	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°	1257.5	96.4
0°-40°	1288.7	98.8
0°-60°	1301.9	99.8
0°-90°	1304.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1304.5	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	9646	9646	9646	9646	9646	
5°	7996	7922	7849	7781	7691	647
15°	1975	1928	1754	1580	1470	563
25°	258	260	241	219	208	133
35°	48	48	48	43	39	33
45°	12	12	11	10	10	10
55°	5	4	4	4	4	5
65°	2	2	2	2	2	2
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°	9645.7	9645.7	9645.7	9645.7	9645.7
1°	9602.5	9535.6	9527.4	9569.0	9446.3
2°	9357.0	9309.4	9281.9	9306.4	9167.3
3°	9020.0	8973.9	8924.1	8924.8	8769.3
4°	8561.0	8524.6	8440.5	8415.2	8325.2
5°	7995.6	7922.0	7849.1	7780.7	7690.6
6°	7370.8	7275.5	7171.4	7069.5	6977.2
7°	6635.8	6572.5	6434.9	6295.8	6217.7
8°	5944.7	5842.7	5682.1	5508.0	5441.8
9°	5201.5	5128.6	4944.1	4741.7	4675.5
10°	4527.5	4451.6	4248.5	4023.1	3965.1
11°	3895.2	3823.7	3612.5	3375.9	3314.2
12°	3360.3	3259.1	3016.6	2811.3	2751.0
13°	2827.6	2758.5	2528.6	2325.5	2208.7
14°	2374.6	2317.3	2109.0	1930.5	1807.0
15°	1975.1	1928.2	1754.2	1580.1	1470.0
16°	1620.3	1591.2	1453.6	1285.5	1195.5
17°	1314.5	1287.7	1199.9	1045.2	969.3
18°	1061.6	1057.9	984.9	851.0	783.3
19°	873.4	871.9	804.9	692.6	636.8
20°	697.1	706.7	655.4	557.2	519.3
21°	568.4	573.6	532.6	458.3	424.0
22°	462.7	466.4	439.7	378.7	360.1
23°	379.4	381.6	359.3	313.9	297.6
24°	312.4	313.9	293.8	261.9	247.7
25°	258.1	259.6	241.0	218.7	207.6
26°	214.2	215.7	199.4	183.7	172.6
27°	177.8	180.8	164.4	154.7	142.8
28°	151.8	152.5	137.6	131.7	120.5
29°	124.2	128.7	116.1	110.8	102.7
30°	106.4	108.6	98.9	95.2	87.8
32.5°	70.7	72.2	67.7	64.7	58.8
35°	47.6	48.4	47.6	43.1	39.4
37.5°	32.7	32.7	33.5	28.3	26.8
40°	22.3	22.3	23.1	19.3	18.6
42.5°	16.4	16.4	15.6	13.4	13.4
45°	11.9	11.9	11.2	10.4	10.4
47.5°	9.7	8.9	8.2	8.2	8.2
50°	7.4	7.4	6.7	6.0	6.7
52.5°	6.0	6.0	5.2	5.2	5.2
55°	5.2	4.5	3.7	3.7	4.5
57.5°	3.7	3.7	3.0	3.0	3.7
60°	3.7	3.0	2.2	3.0	3.0



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
67.5°	2.2	1.5	1.5	1.5	1.5
70°	1.5	1.5	0.7	0.7	1.5
72.5°	0.7	0.7	0.7	0.7	0.7
75°	0.7	0.7	0.7	0.7	0.7
77.5°	0.7	0.7	0.0	0.0	0.7
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°	3.0	2.2	2.2	2.2	2.2
65°	2.2	2.2	1.5	1.5	2.2



(END OF REPORT)