

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: P314741

Luminaire Tested: **LDA2B05SP9730D010 PIN1MB**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-41-14  
Report Number: P314741  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1808-908-8)  
Test Lab: INNOVATION CENTER(G2)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: io LED  
Catalog Number: LDA2B05SP9730D010 PIN1MB  
Description: PORTFOLIO 2IN ADJ 500 LUMEN LED LUMINAIRE WITH SPOT OPTIC AND 2in  
Adj PinHole, Black oculus black finish  
Light Source: -  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 589.7 lumens  
Efficiency: N/A  
Efficacy: 84.2 lumens/watt  
Spacing Criteria (0/90/45): 0.32 / 0.3 / 0.32  
Luminous Opening: Circular (Dia: 0.17' x H: 0')  
CIE Type: Direct

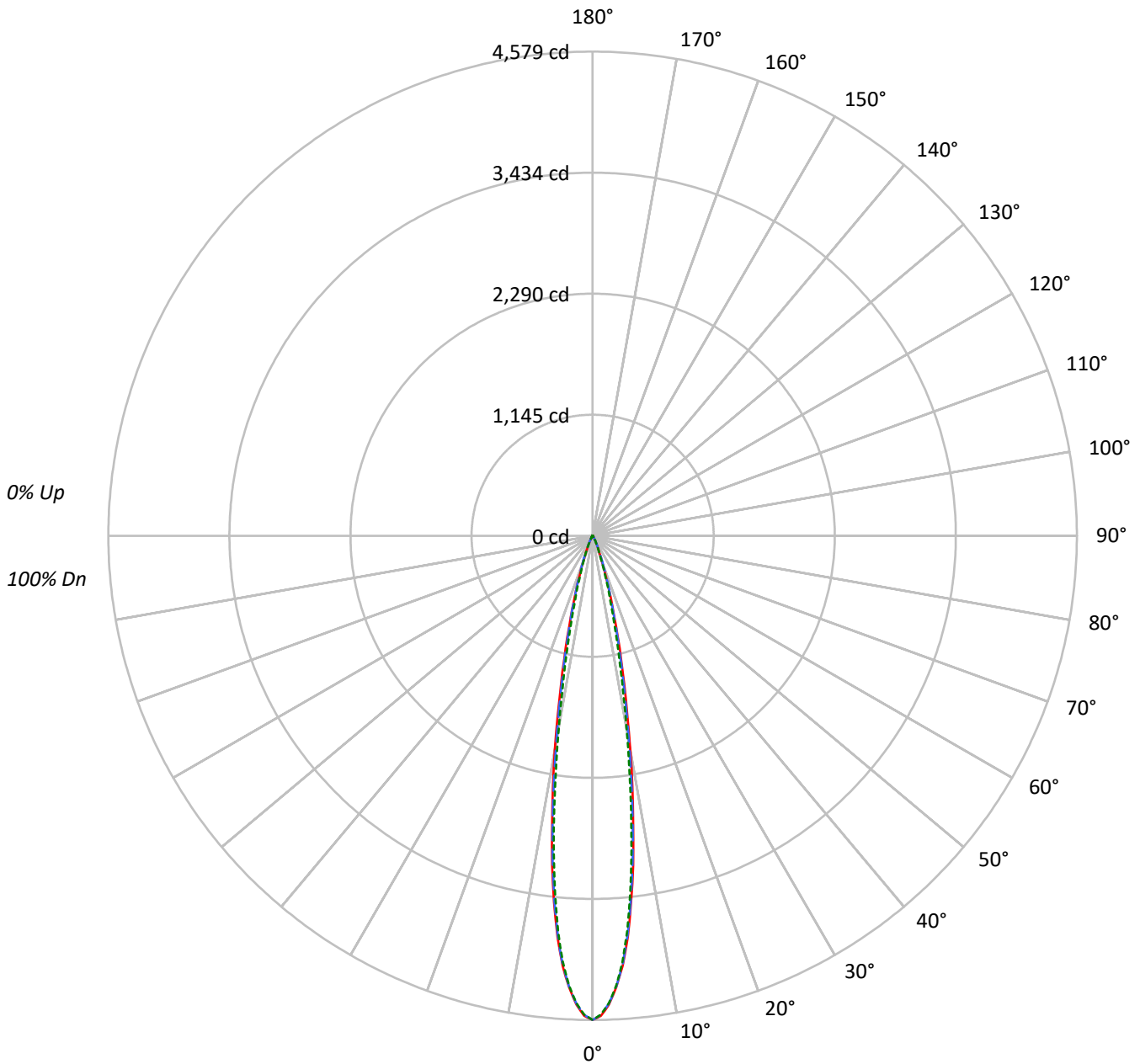
Input Watts (W): 7  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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				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	101	101	100	98	99	98	96	95				95															
3	109	105	102	99	107	104	101	98	101	99	97	99	97	95	97	95	94	93				93															
4	106	102	98	96	105	101	97	95	99	96	94	97	95	93	95	93	92	91				91															
5	104	99	95	92	103	98	95	92	96	93	91	95	92	91	94	92	90	89				89															
6	101	96	92	90	100	95	92	90	94	91	89	93	90	88	92	90	88	87				87															
7	99	94	90	88	98	93	90	87	92	89	87	91	89	87	90	88	86	85				85															
8	97	92	88	86	96	91	88	85	90	87	85	89	87	85	89	86	85	84				84															
9	95	90	86	84	95	89	86	84	88	86	83	88	85	83	87	85	83	82				82															
10	93	88	84	82	93	87	84	82	87	84	82	86	84	82	86	83	82	81				81															

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

	0°	45°	90°
0°	2258956	2258956	2258956
5°	1887285	1878222	1855985
10°	1028246	988169	924946
15°	407642	397274	341038
20°	136979	146377	120966
25°	47523	51334	45618
30°	17375	18971	18572
35°	11202	13070	9938
40°	5861	7020	7213
45°	5372	4186	3907
50°	3224	2149	1612
55°	0	0	0
60°	2072	2072	691
65°	1634	467	0
70°	0	1587	2019
75°	0	3431	0
80°	0	0	0
85°	0	2264	0



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	299.4	50.8
10°-20°	222.8	37.8
20°-30°	49.3	8.4
30°-40°	11.0	1.9
40°-50°	4.5	0.8
50°-60°	0.8	0.1
60°-70°	0.8	0.1
70°-80°	0.6	0.1
80°-90°	0.6	0.1
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°	571.5	96.9
0°-40°	582.4	98.8
0°-60°	587.7	99.7
0°-90°	589.7	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	589.7	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	4579	4579	4579	4579	4579	
5°	3811	3795	3792	3778	3748	304
15°	798	796	778	705	668	235
25°	87	98	94	87	84	48
35°	19	19	22	18	16	11
45°	8	6	6	6	6	5
55°	0	0	0	0	0	1
65°	1	1	0	0	0	1
75°	0	0	2	0	0	0
85°	0	0	0	1	0	0
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	4578.7	4578.7	4578.7	4578.7	4578.7
1°	4541.2	4522.6	4531.7	4537.0	4529.3
2°	4435.3	4412.9	4427.2	4428.6	4420.9
3°	4277.5	4267.3	4271.9	4273.6	4258.2
4°	4075.5	4060.8	4063.9	4060.1	4041.1
5°	3810.8	3795.0	3792.5	3778.1	3747.6
6°	3487.1	3478.0	3461.5	3436.9	3396.3
7°	3140.3	3132.9	3104.5	3060.3	3013.3
8°	2760.1	2760.1	2719.1	2658.1	2604.4
9°	2400.3	2387.0	2334.8	2261.1	2209.2
10°	2052.5	2034.6	1972.5	1897.8	1846.3
11°	1723.2	1704.3	1644.7	1568.2	1520.5
12°	1438.8	1428.6	1382.3	1298.2	1250.5
13°	1198.6	1185.3	1144.6	1065.0	1024.3
14°	989.2	972.4	939.8	866.9	827.2
15°	798.1	795.7	777.8	705.2	667.7
16°	652.2	650.8	634.0	563.2	547.7
17°	523.6	530.9	526.0	460.8	443.2
18°	407.5	422.2	425.7	366.8	349.3
19°	327.9	341.9	347.9	296.3	281.6
20°	260.9	274.2	278.8	240.2	230.4
22.5°	148.0	165.9	166.6	146.6	136.4
25°	87.3	97.5	94.3	87.3	83.8
26°	73.3	83.1	78.2	76.1	73.3
27°	61.7	68.4	64.5	61.0	63.5
28°	51.2	55.8	51.9	53.0	49.1
29°	40.7	48.4	42.8	43.8	40.7
30°	30.5	37.5	33.3	35.1	32.6
32.5°	22.8	24.9	22.1	24.9	24.9
35°	18.6	18.6	21.7	17.5	16.5
37.5°	8.4	6.7	7.4	6.0	7.0
40°	9.1	10.2	10.9	9.1	11.2
42.5°	6.3	8.4	8.4	5.6	9.8
45°	7.7	6.3	6.0	6.0	5.6
47.5°	3.5	2.5	2.8	3.2	4.9
50°	4.2	1.8	2.8	4.2	2.1
52.5°	1.4	0.0	1.8	0.0	0.7
55°	0.0	0.0	0.0	0.0	0.0
57.5°	0.0	0.0	0.4	0.7	0.0
60°	2.1	2.5	2.1	1.4	0.7
62.5°	3.5	0.7	1.1	1.4	0.0
65°	1.4	0.7	0.4	0.0	0.0
67.5°	0.0	0.0	1.1	0.0	0.0



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
75°	0.0	0.0	1.8	0.0	0.0
77.5°	0.7	0.0	1.4	0.0	0.0
80°	0.0	0.7	0.0	0.0	0.0
82.5°	0.0	0.0	1.8	1.4	0.0
85°	0.0	0.4	0.4	1.1	0.0
87.5°	0.0	1.1	1.4	0.4	0.7
90°	0.0	0.0	0.0	0.0	0.0



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







70°	0.0	0.0	1.1	0.7	1.4
72.5°	0.0	0.4	1.4	2.1	0.7



(END OF REPORT)