

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: P281603

Luminaire Tested: **LDA2B209727D010 EU2B20SP159727 2LBASQC1MMS**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P281603
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1808-908-6)
Test Lab: INNOVATION CENTER(G2)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LDA2B209727D010 EU2B20SP159727 2LBASQC1MMS
Description: PORTFOLIO 2IN ADJ 2000 LUMEN LED LUMINAIRE WITH SPOT OPTIC AND 2in Adj SQ Cast Trim, MMS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1393.2 lumens
Efficiency: N/A
Efficacy: 67.6 lumens/watt
Spacing Criteria (0/90/45): 0.31 / 0.31 / 0.29
Luminous Opening: Circular (Dia: 0.17' x H: 0')
CIE Type: Direct

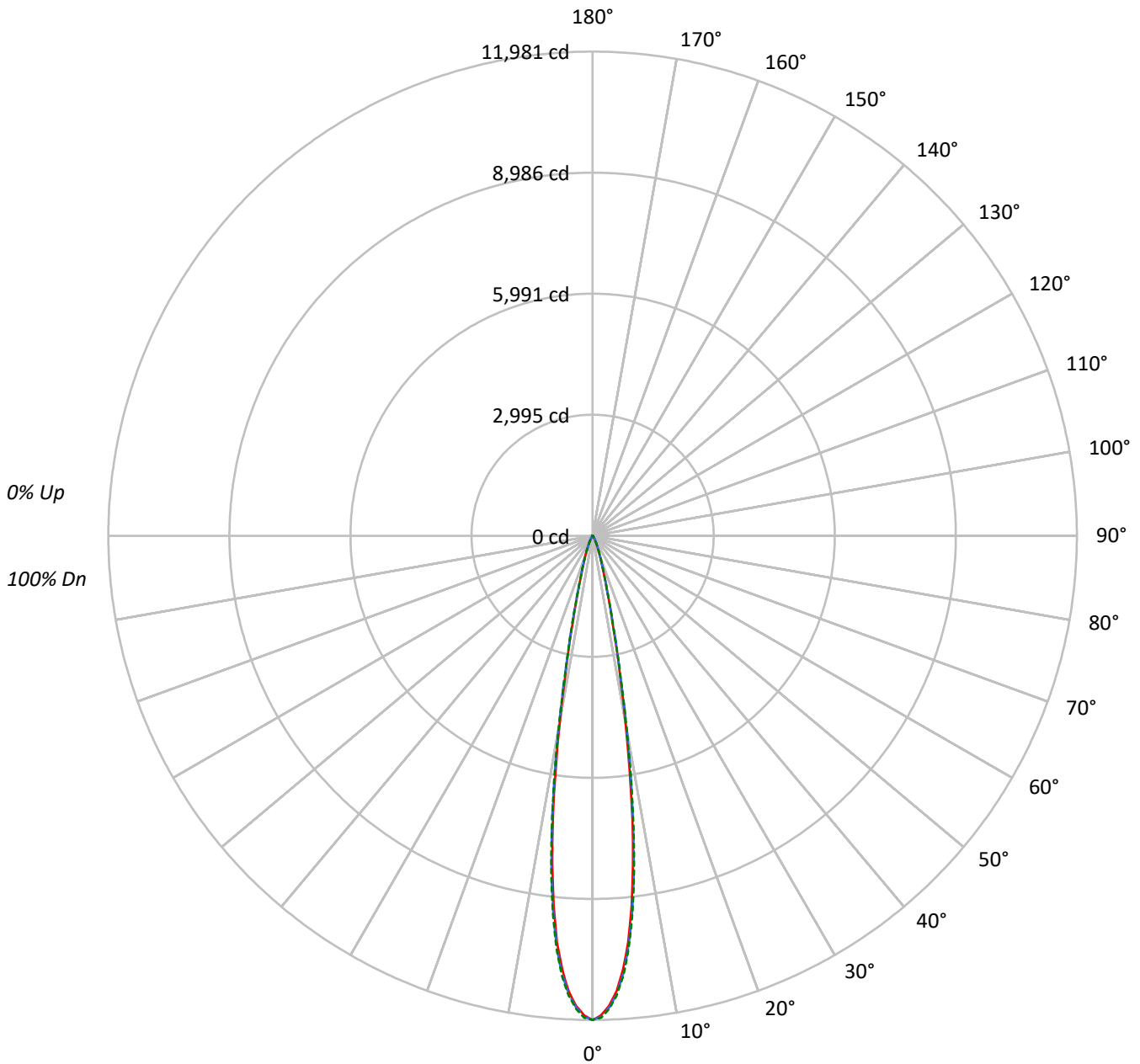
Input Watts (W): 20.6
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	116	114	112	111	113	112	110	109	108	107	106	104	103	102	101	100	99	98	98	98	98																
2	113	109	107	105	111	108	105	103	105	103	101	102	100	99	99	98	97	96	96	96	96																
3	110	106	103	100	108	104	102	99	102	100	98	100	98	96	98	96	95	94	94	94	94																
4	107	103	99	97	106	102	99	96	100	97	95	98	96	94	96	95	93	92	92	92	92																
5	105	100	96	94	103	99	96	93	98	95	93	96	94	92	95	93	91	90	90	90	90																
6	103	97	94	91	101	97	94	91	96	93	91	94	92	90	93	91	90	89	89	89	89																
7	100	95	92	89	100	95	91	89	94	91	89	93	90	88	92	90	88	87	87	87	87																
8	99	93	90	88	98	93	90	87	92	89	87	91	89	87	90	88	86	86	86	86	86																
9	97	91	88	86	96	91	88	86	90	88	86	90	87	85	89	87	85	84	84	84	84																
10	95	90	87	84	94	89	86	84	89	86	84	88	86	84	88	85	84	83	83	83	83																

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5910918	5910918	5910918
5°	5002880	5055178	5077167
10°	2339442	2428064	2432773
15°	685192	695152	694846
20°	275165	275533	275848
25°	122700	135166	125639
30°	52126	71666	47512
35°	23911	33246	22284
40°	7793	13010	6956
45°	0	4675	0
50°	0	0	0
55°	2322	1118	0
60°	0	0	0
65°	0	0	0
70°	0	0	0
75°	0	0	0
80°	3694	0	0
85°	7359	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	791.8	56.8
10°-20°	448.8	32.2
20°-30°	117.2	8.4
30°-40°	30.2	2.2
40°-50°	3.0	0.2
50°-60°	0.9	0.1
60°-70°	0.2	0.0
70°-80°	1.0	0.1
80°-90°	0.3	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°	1357.7	97.5
0°-40°	1387.9	99.6
0°-60°	1391.9	99.9
0°-90°	1393.3	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1393.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	11981	11981	11981	11981	11981	
5°	10102	10192	10207	10143	10252	782
15°	1342	1360	1361	1346	1360	440
25°	225	244	248	237	231	112
35°	40	42	55	38	37	27
45°	0	3	7	1	0	2
55°	3	3	1	1	0	2
65°	0	0	0	0	0	1
75°	0	1	0	0	0	3
85°	1	0	0	0	0	1
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	11980.9	11980.9	11980.9	11980.9	11980.9
1°	11868.5	11915.6	11901.5	11884.7	11931.8
2°	11639.8	11685.5	11681.5	11659.3	11714.5
3°	11287.3	11351.2	11351.2	11318.2	11386.8
4°	10761.8	10859.4	10868.8	10822.4	10907.8
5°	10101.8	10192.0	10207.4	10142.9	10251.8
6°	9207.7	9330.8	9365.8	9291.1	9402.8
7°	8180.4	8309.5	8362.7	8279.3	8404.4
8°	7072.3	7165.1	7229.0	7133.5	7260.7
9°	5832.3	5966.2	6024.8	5931.9	6055.7
10°	4669.8	4792.9	4846.7	4824.5	4856.1
11°	3627.0	3736.0	3772.3	3742.0	3756.8
12°	2839.8	2883.5	2907.1	2886.9	2897.0
13°	2156.3	2214.8	2225.6	2216.8	2221.5
14°	1684.0	1712.2	1724.3	1720.3	1722.3
15°	1341.5	1359.7	1361.0	1345.6	1360.4
16°	1080.5	1094.6	1100.7	1084.5	1104.0
17°	885.4	896.8	903.5	887.4	895.5
18°	728.6	737.4	746.8	732.7	744.8
19°	611.6	616.9	617.6	613.6	616.9
20°	524.1	521.4	524.8	517.4	525.4
22.5°	345.1	351.9	359.9	351.2	354.6
25°	225.4	244.2	248.3	236.8	230.8
26°	185.7	209.9	220.7	202.5	183.0
27°	154.1	171.6	185.7	161.5	146.0
28°	135.2	150.0	164.2	141.3	123.1
29°	113.0	127.8	152.0	125.8	114.4
30°	91.5	102.3	125.8	95.5	83.4
32.5°	51.8	60.6	81.4	56.5	46.4
35°	39.7	42.4	55.2	37.7	37.0
37.5°	34.3	30.9	43.1	30.9	24.9
40°	12.1	18.2	20.2	13.5	10.8
42.5°	5.4	5.4	8.7	2.7	2.7
45°	0.0	2.7	6.7	0.7	0.0
47.5°	0.0	0.0	1.3	0.0	0.0
50°	0.0	1.3	0.0	0.0	0.0
52.5°	1.3	0.0	0.0	0.0	0.0
55°	2.7	3.4	1.3	0.7	0.0
57.5°	4.0	3.4	1.3	1.3	1.3
60°	0.0	0.0	0.0	0.0	0.0
62.5°	0.0	0.0	0.0	0.0	0.0
65°	0.0	0.0	0.0	0.0	0.0
67.5°	1.3	0.7	0.0	0.0	0.0



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
75°	0.0	0.7	0.0	0.0	0.0
77.5°	6.7	1.3	2.0	1.3	2.7
80°	1.3	0.0	0.0	0.0	0.0
82.5°	2.7	0.0	0.0	0.0	0.0
85°	1.3	0.0	0.0	0.0	0.0
87.5°	0.0	0.7	0.0	0.7	0.0
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	0.0	0.0	0.0
72.5°	2.7	2.0	0.0	0.0	2.7



(END OF REPORT)