

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: P211587

Luminaire Tested: **LE_4B20D010 EC4B10209030 4LBCS1MW**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P211587
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P35319)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LE_4B20D010 EC4B10209030 4LBCS1MW
Description: PORTFOLIO 4 INCH CYLINDER
SHALLOW DISTRIBUTION WITH CAST MATTE WHITE TRIM
WATTAGE D010TR-21.86W DE010-20.46W D5LT-21.24W DMX-20.89W DL2-22.5W
DL3-21.8 6W DLE-22.46W
Light Source: HIGH LUMEN LED
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2093.8 lumens
Efficiency: N/A
Efficacy: 100.7 lumens/watt
Spacing Criteria (0/90/45): 1.23 / 1.23 / 1.33
Luminous Opening: Point Source (0' x 0' x 0')
CIE Type: Direct

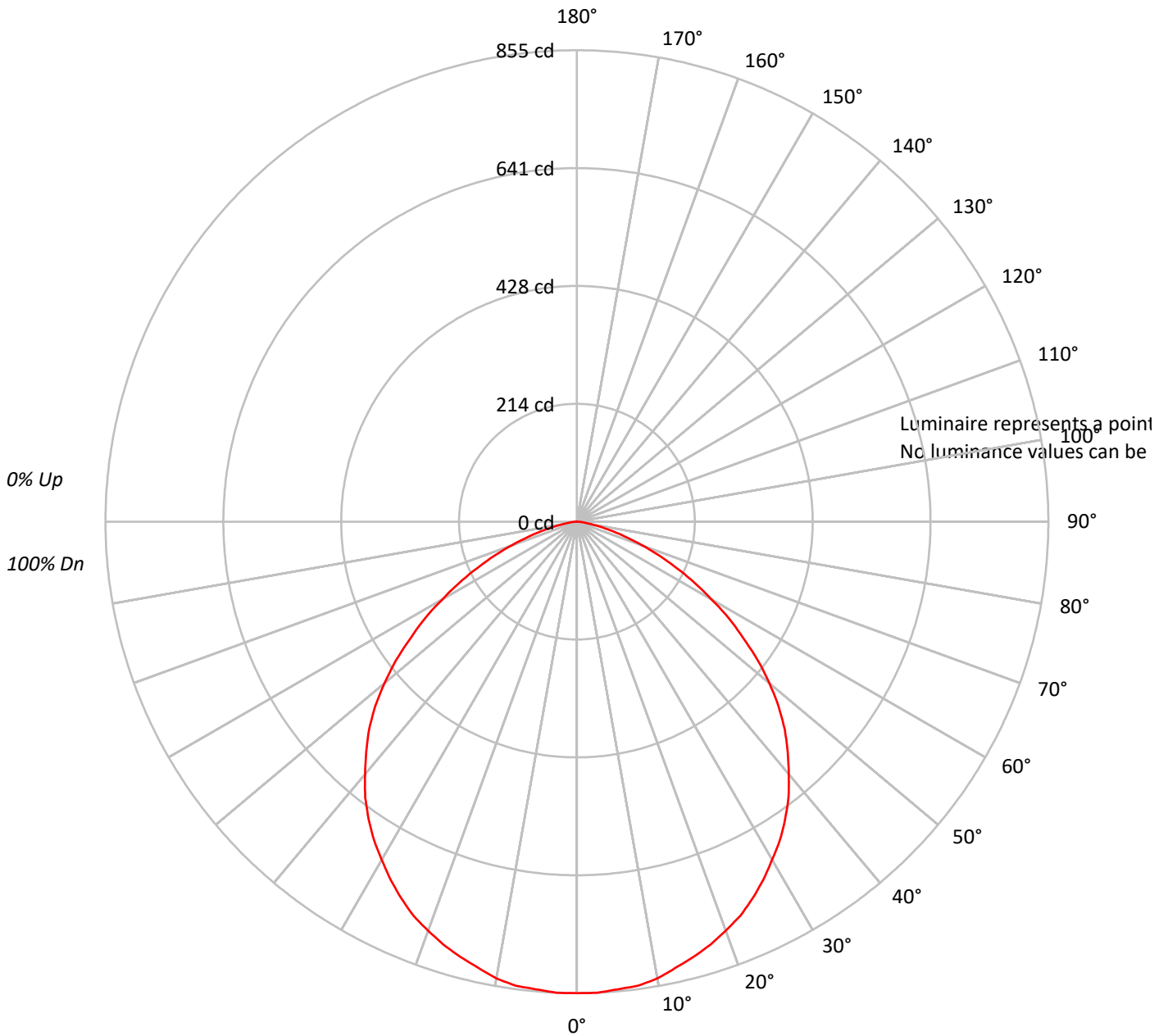
Input Watts (W): 20.8
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20				
RC	80				70				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	110	106	102	99	108	104	100	97	100	97	94	96	93	91	92	90	89	87			87
2	101	94	87	82	99	92	86	81	88	84	79	85	81	78	82	79	76	74			74
3	93	83	75	70	90	81	74	69	79	73	68	76	71	67	73	69	65	63			63
4	85	74	66	60	83	73	65	59	70	64	58	68	62	58	66	61	57	55			55
5	79	66	58	52	77	65	57	51	63	56	51	61	55	50	60	54	50	48			48
6	73	60	52	45	71	59	51	45	57	50	45	56	49	44	54	49	44	42			42
7	68	55	46	40	66	54	46	40	52	45	40	51	44	40	50	44	39	37			37
8	63	50	42	36	61	49	41	36	48	41	36	47	40	36	46	40	35	33			33
9	59	46	38	33	57	45	38	32	44	37	32	43	37	32	42	36	32	30			30
10	55	42	35	30	54	42	34	30	41	34	29	40	34	29	39	33	29	27			27

AVERAGE LUMINANCE (cd/sqm):





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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	81.0	3.9
10°-20°	230.7	11.0
20°-30°	347.0	16.6
30°-40°	411.2	19.6
40°-50°	409.2	19.5
50°-60°	329.9	15.8
60°-70°	199.5	9.5
70°-80°	74.1	3.5
80°-90°	11.0	0.5
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°	658.7	31.5
0°-40°	1069.9	51.1
0°-60°	1809.1	86.4
0°-90°	2093.8	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2093.8	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	855	
5°	851	81
15°	817	231
25°	754	347
35°	658	411
45°	533	409
55°	368	330
65°	200	200
75°	67	74
85°	9	11
90°	0	



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CANDELA DISTRIBUTION (FULL):

	0°
0°	855.2
2.5°	855.2
5°	851.3
7.5°	848.8
10°	841.2
12.5°	828.5
15°	817.1
17.5°	804.5
20°	789.1
22.5°	774.0
25°	753.7
27.5°	732.1
30°	707.9
32.5°	685.1
35°	658.5
37.5°	630.6
40°	597.6
42.5°	565.8
45°	532.9
47.5°	496.1
50°	455.5
52.5°	413.7
55°	368.0
57.5°	327.4
60°	281.6
62.5°	241.0
65°	200.4
67.5°	162.4
70°	126.9
72.5°	95.1
75°	67.3
77.5°	43.2
80°	25.4
82.5°	15.2
85°	8.9
87.5°	3.8
90°	0.0



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— 0°-180°







(END OF REPORT)