

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: P211749

Luminaire Tested: **LSR4B20D010BZ EC4B10209040 4LBSLI1**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P211749
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: LSR4B20D010BZ EC4B10209040 4LBSLI1
Description: PORTFOLIO 4 INCH CYLINDER
SHALLOW DISTRIBUTION WITH SPECULAR CLEAR 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: 1799.5 lumens
Efficiency: N/A
Efficacy: 86.5 lumens/watt
Spacing Criteria (0/90/45): 0.91 / 0.91 / 1
Luminous Opening: Point Source (0' x 0' x 0')
CIE Type: Direct

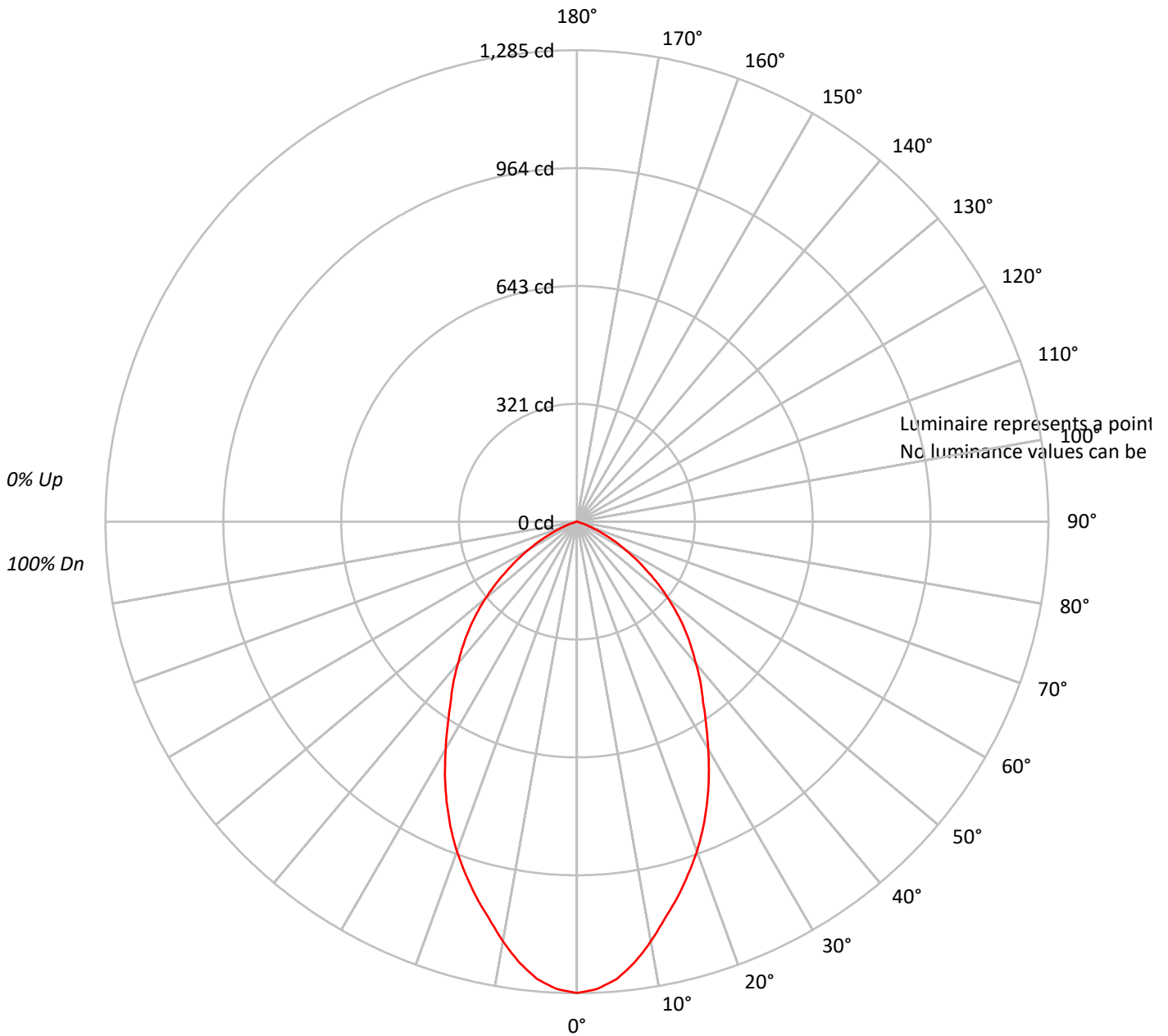
Input Watts (W): 20.8
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									20									
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	112	108	105	102	109	106	103	101	102	100	98	98	96	95	95	93	92	90																			
2	104	98	93	88	102	96	91	87	93	89	85	90	86	84	87	84	82	80																			
3	97	89	82	77	95	87	81	77	84	79	75	82	78	74	79	76	73	71																			
4	90	81	73	68	88	79	73	68	77	71	67	75	70	66	73	69	65	63																			
5	84	73	66	61	82	72	65	60	70	64	60	69	63	59	67	62	59	57																			
6	79	67	60	54	77	66	59	54	65	58	54	63	58	53	62	57	53	51																			
7	74	62	54	49	72	61	54	49	60	53	49	58	53	48	57	52	48	46																			
8	69	57	50	45	68	57	50	45	55	49	45	54	49	44	53	48	44	42																			
9	65	53	46	41	64	53	46	41	52	45	41	51	45	41	50	44	41	39																			
10	61	50	43	38	60	49	42	38	48	42	38	47	42	38	46	41	37	36																			

AVERAGE LUMINANCE (cd/sqm):





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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	116.5	6.5
10°-20°	297.1	16.5
20°-30°	385.0	21.4
30°-40°	377.3	21.0
40°-50°	319.8	17.8
50°-60°	209.6	11.6
60°-70°	84.3	4.7
70°-80°	9.6	0.5
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°	798.6	44.4
0°-40°	1175.9	65.3
0°-60°	1705.3	94.8
0°-90°	1799.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1799.5	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	1285	
5°	1251	117
15°	1060	297
25°	841	385
35°	600	377
45°	416	320
55°	233	210
65°	82	84
75°	4	10
85°	0	0
90°	0	



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CANDELA DISTRIBUTION (FULL):

	0°
0°	1284.8
2.5°	1274.9
5°	1251.0
7.5°	1211.1
10°	1161.3
12.5°	1107.6
15°	1059.7
17.5°	1008.0
20°	956.2
22.5°	900.4
25°	840.6
27.5°	778.9
30°	715.1
32.5°	655.4
35°	599.6
37.5°	553.8
40°	504.0
42.5°	460.2
45°	416.3
47.5°	370.5
50°	324.7
52.5°	278.9
55°	233.1
57.5°	191.2
60°	151.4
62.5°	115.5
65°	81.7
67.5°	53.8
70°	31.9
72.5°	13.9
75°	4.0
77.5°	2.0
80°	2.0
82.5°	0.0
85°	0.0
87.5°	0.0
90°	0.0



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— 0°-180°







(END OF REPORT)