

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: P211761

Luminaire Tested: **LSR4B20D010BZ EC4B10208050 4LBCSMW1**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P211761
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 EC4B10208050 4LBCSMW1
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: 2187.9 lumens
Efficiency: N/A
Efficacy: 105.2 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

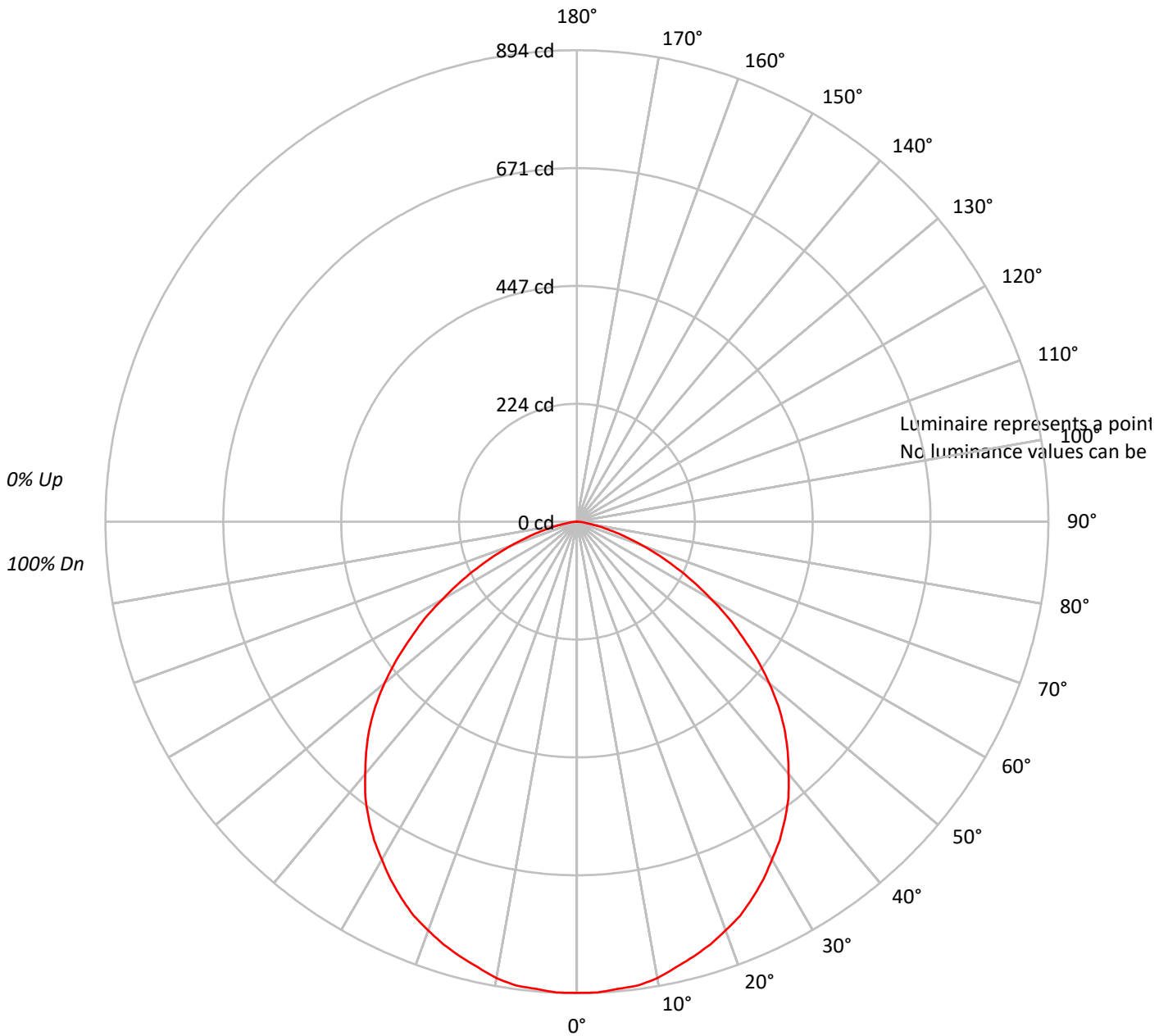
Input Watts (W): 20.8
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P211761

CATALOG NUMBER: LSR4B20D010BZ EC4B10208050 4LBCSMW1

Luminous Intensity Polar Plot





TEST NUMBER: P211761

CATALOG NUMBER: LSR4B20D010BZ EC4B10208050 4LBCSMW1

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

AVERAGE LUMINANCE (cd/sqm):





TEST NUMBER: P211761

CATALOG NUMBER: LSR4B20D010BZ EC4B10208050 4LBCSMW1

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	84.7	3.9
10°-20°	241.0	11.0
20°-30°	362.6	16.6
30°-40°	429.7	19.6
40°-50°	427.6	19.5
50°-60°	344.7	15.8
60°-70°	208.5	9.5
70°-80°	77.4	3.5
80°-90°	11.5	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°	688.3	31.5
0°-40°	1118.0	51.1
0°-60°	1890.4	86.4
0°-90°	2187.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2187.9	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	894	
5°	890	85
15°	854	241
25°	788	363
35°	688	430
45°	557	428
55°	384	345
65°	210	209
75°	70	77
85°	9	12
90°	0	



TEST NUMBER: P211761

CATALOG NUMBER: LSR4B20D010BZ EC4B10208050 4LBCSMW1

CANDELA DISTRIBUTION (FULL):

	0°
0°	893.6
2.5°	893.6
5°	889.6
7.5°	887.0
10°	879.0
12.5°	865.8
15°	853.8
17.5°	840.6
20°	824.7
22.5°	808.8
25°	787.5
27.5°	765.0
30°	739.8
32.5°	715.9
35°	688.1
37.5°	658.9
40°	624.5
42.5°	591.3
45°	556.8
47.5°	518.4
50°	476.0
52.5°	432.2
55°	384.5
57.5°	342.1
60°	294.3
62.5°	251.9
65°	209.5
67.5°	169.7
70°	132.6
72.5°	99.4
75°	70.3
77.5°	45.1
80°	26.5
82.5°	15.9
85°	9.3
87.5°	4.0
90°	0.0



Report Generated By E9808895 / USPTCWHP6082093





— 0°-180°







(END OF REPORT)