

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: P182418

Luminaire Tested: **LDSQA4A18927D010TE LAR15SP 4LSQA1H**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P182418
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P26794)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LDSQA4A18927D010TE LAR15SP 4LSQA1H
Description: PORTFOLIO 4" SQUARE ADJUSTABLE REFLECTOR, ANGLE-CUT TRIM,
SELF-FLANGED, 15° SPOT
Light Source: (1) HIGH LUMEN LED 90CRI / 2700K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1616.1 lumens
Efficiency: N/A
Efficacy: 55.5 lumens/watt
Spacing Criteria (0/90/45): 0.32 / 0.32 / 0.36
Luminous Opening: Rectangular (W 0.33' x L: 0.33' x H: 0')
CIE Type: Direct

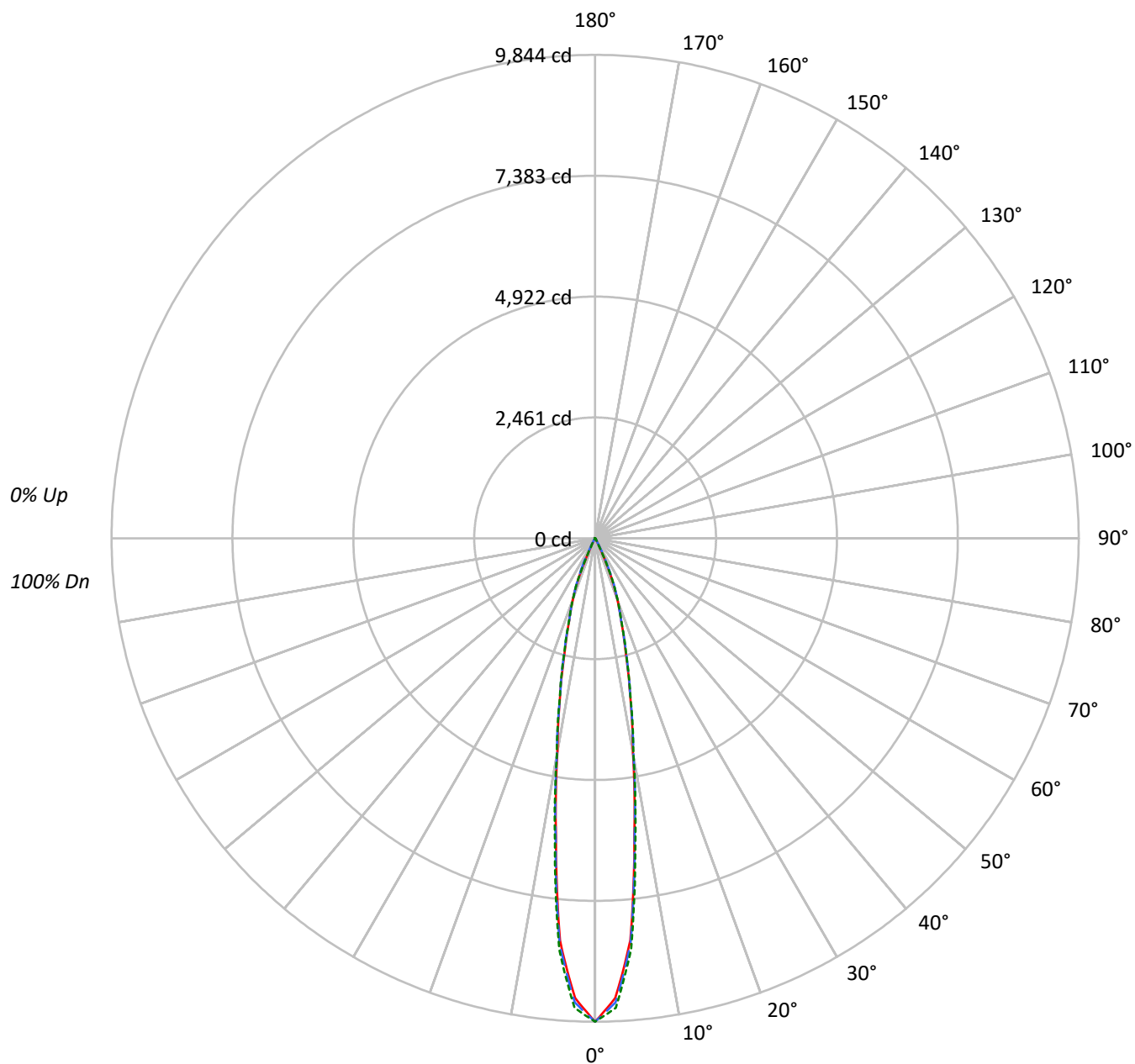
Input Watts (W): 29.12
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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					0
RW	70	50	30	10	70	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			100
1	115	113	111	110	113	111	110	108		107	106	105			104	103	102			97
2	112	108	105	103	110	107	104	102		104	102	100			101	99	98			94
3	108	104	101	98	107	103	100	97		100	98	96			98	96	94			92
4	105	100	97	94	104	99	96	93		97	95	92			96	93	91			89
5	103	97	93	90	101	96	93	90		95	92	89			93	91	89			87
6	100	94	90	87	99	93	90	87		92	89	87			91	88	86			85
7	97	91	88	85	96	91	87	85		90	87	84			89	86	84			82
8	95	89	85	82	94	88	85	82		88	84	82			87	84	82			80
9	93	87	83	80	92	86	83	80		85	82	80			85	82	80			79
10	91	84	81	78	90	84	81	78		83	80	78			83	80	78			77

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	953613	953613	953613
5°	799290	806048	817766
10°	434844	441307	442979
15°	240462	244333	245266
20°	136165	136567	137361
25°	37155	58212	36492
30°	5962	9072	5794
35°	2010	3382	1916
40°	885	1366	885
45°	534	630	425
50°	347	347	226
55°	253	253	135
60°	155	155	155
65°	183	183	183
70°	227	227	227
75°	0	0	0
80°	0	0	0
85°	0	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	656.1	40.6
10°-20°	693.8	42.9
20°-30°	244.1	15.1
30°-40°	16.4	1.0
40°-50°	3.4	0.2
50°-60°	1.1	0.1
60°-70°	0.8	0.0
70°-80°	0.3	0.0
80°-90°	0.0	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°	1594.1	98.6
0°-40°	1610.5	99.7
0°-60°	1615.1	99.9
0°-90°	1616.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1616.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	9844	9844	9844	9844	9844	
5°	8219	8343	8289	8304	8409	649
15°	2398	2438	2436	2431	2446	687
25°	348	528	545	519	341	215
35°	17	21	29	21	16	13
45°	4	4	5	4	3	3
55°	2	2	2	1	1	1
65°	1	1	1	1	1	1
75°	0	1	0	0	0	0
85°	0	0	0	0	0	0
90°	0	0	0	0	0	0



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	9843.7	9843.7	9843.7	9843.7	9843.7
2.5°	9370.9	9493.8	9462.9	9442.8	9571.8
5°	8219.3	8342.9	8288.8	8304.2	8409.3
7.5°	6110.6	6214.8	6159.2	6182.4	6262.7
10°	4420.5	4524.0	4486.2	4498.5	4503.2
12.5°	3295.9	3341.5	3311.3	3319.8	3335.3
15°	2397.6	2437.7	2436.2	2430.8	2445.5
17.5°	1759.6	1778.9	1759.6	1758.8	1768.8
20°	1320.8	1347.9	1324.7	1327.8	1332.4
22.5°	887.5	941.6	932.3	920.7	908.4
25°	347.6	527.6	544.6	519.1	341.4
27.5°	99.6	164.5	234.0	161.4	96.6
30°	53.3	63.3	81.1	61.8	51.8
32.5°	28.6	36.3	46.3	35.5	27.8
35°	17.0	20.9	28.6	20.9	16.2
37.5°	10.8	13.1	17.8	13.1	10.8
40°	7.0	8.5	10.8	8.5	7.0
42.5°	5.4	6.2	7.0	5.4	4.6
45°	3.9	3.9	4.6	3.9	3.1
47.5°	3.1	3.1	3.1	2.3	2.3
50°	2.3	2.3	2.3	1.5	1.5
52.5°	1.5	1.5	1.5	1.5	1.5
55°	1.5	1.5	1.5	0.8	0.8
57.5°	1.5	0.8	0.8	0.8	0.8
60°	0.8	0.8	0.8	0.8	0.8
62.5°	0.8	0.8	0.8	0.8	0.8
65°	0.8	0.8	0.8	0.8	0.8
67.5°	0.8	0.8	0.8	0.8	0.0
70°	0.8	0.8	0.8	0.8	0.8
72.5°	0.8	0.8	0.8	0.0	0.0
75°	0.0	0.8	0.0	0.0	0.0
77.5°	0.0	0.0	0.0	0.0	0.0
80°	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0



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— 0°-180° - - 45°-225° - - - 90°-270°







(END OF REPORT)