

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: P1212111

Luminaire Tested: **LDSQA4A10940D010TE LAR25NF 4LSQA1H**

Issue Date: 3/3/2020

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

**Test Information**

Test Method: LM-41-14
Report Number: P1212111
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P26785)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LDSQA4A10940D010TE LAR25NF 4LSQA1H
Description: PORTFOLIO 4" SQUARE ADJUSTABLE REFLECTOR, ANGLE-CUT TRIM,
SELF-FLANGED, 25° NARROW FLOOD
Light Source: (1) HIGH LUMEN LED 90CRI / 4000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

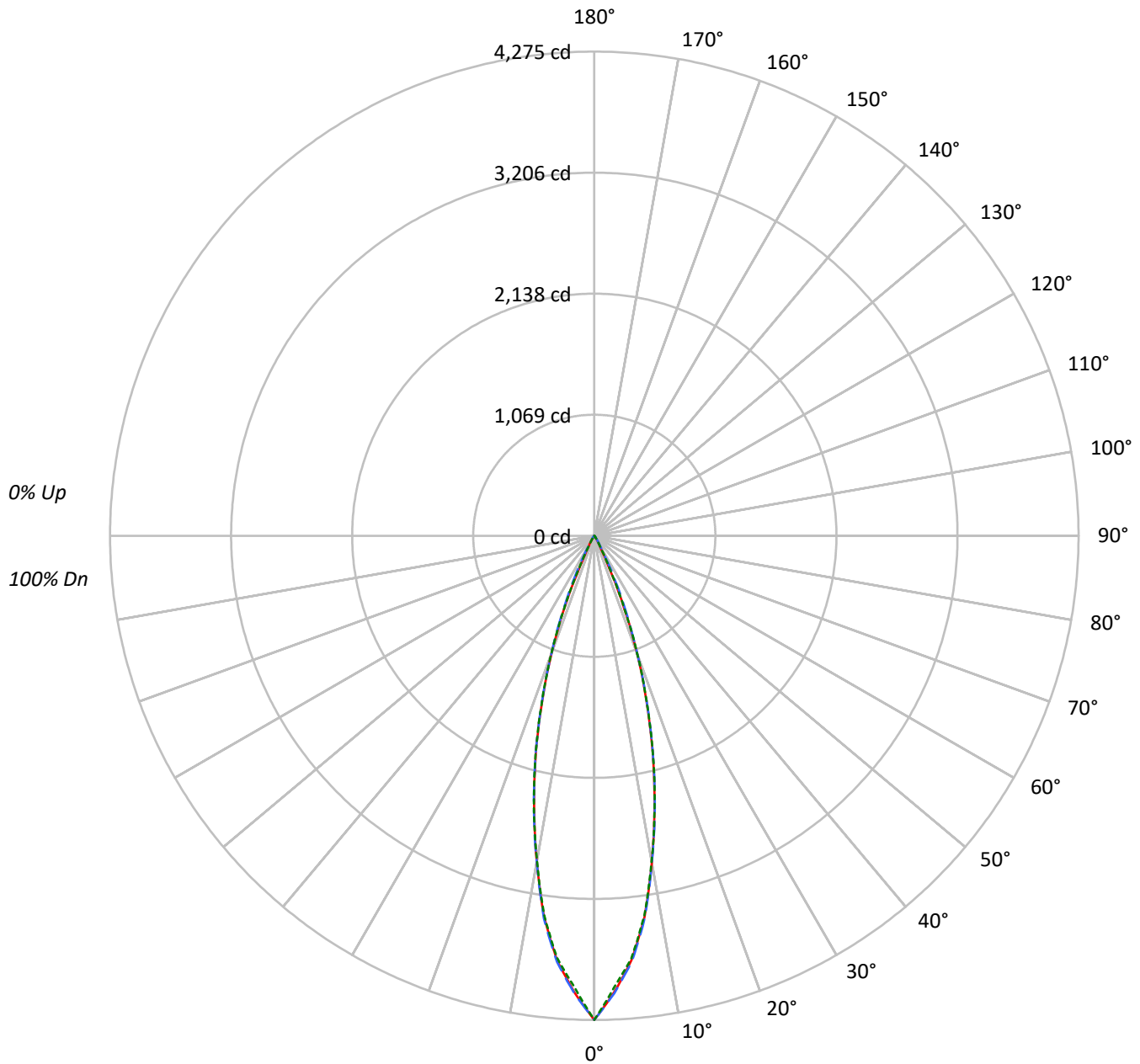
Lumens per Lamp: N/A
Luminaire Lumens: 1108.4 lumens
Efficiency: N/A
Efficacy: 89.4 lumens/watt
Spacing Criteria (0/90/45): 0.47 / 0.47 / 0.49
Luminous Opening: Rectangular (W 0.33' x L: 0.33' x H: 0')
CIE Type: Direct

Input Watts (W): 12.4
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

TEST NUMBER: P1212111

CATALOG NUMBER: LDSQA4A10940D010TE LAR25NF 4LSQA1H

Luminous Intensity Polar Plot



Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269



TEST NUMBER: P1212111

CATALOG NUMBER: LDSQA4A10940D010TE LAR25NF 4LSQA1H

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20					20					20					20
RC	80				70					50					30					10
RW	70	50	30	10	70	50	30	10		50	30	10			50	30	10			50
RCR																				
0	119	119	119	119	116	116	116	116		111	111	111			106	106	106			102
1	115	113	111	109	113	111	109	107		107	105	104			103	102	101			100
2	111	108	105	102	109	106	103	101		103	101	99			100	98	97			97
3	108	103	99	96	106	102	98	96		99	96	94			97	95	93			95
4	104	99	95	92	103	98	94	91		96	93	90			94	91	89			92
5	101	95	91	88	100	94	90	88		93	89	87			91	88	86			90
6	98	92	88	84	97	91	87	84		90	86	84			88	85	83			87
7	95	89	84	81	94	88	84	81		87	83	81			86	83	80			85
8	92	86	82	79	91	85	81	79		84	81	78			84	80	78			83
9	90	83	79	76	89	83	79	76		82	78	76			81	78	76			80
10	87	81	77	74	87	80	76	74		80	76	74			79	76	73			78

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	414113	414113	414113
5°	366051	367306	364194
10°	287712	288037	286817
15°	200285	200856	200997
20°	113618	114361	114752
25°	30624	46348	34451
30°	7584	10358	7797
35°	2259	4742	2424
40°	911	1568	911
45°	452	658	397
50°	286	286	151
55°	236	169	84
60°	194	97	97
65°	115	115	115
70°	142	142	0
75°	0	0	0
80°	0	0	0
85°	0	0	0



TEST NUMBER: P1212111

CATALOG NUMBER: LDSQA4A10940D010TE LAR25NF 4LSQA1H

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	335.4	30.3
10°-20°	545.4	49.2
20°-30°	202.7	18.3
30°-40°	20.1	1.8
40°-50°	3.4	0.3
50°-60°	0.9	0.1
60°-70°	0.5	0.0
70°-80°	0.1	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°	1083.4	97.7
0°-40°	1103.5	99.6
0°-60°	1107.8	99.9
0°-90°	1108.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1108.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	4275	4275	4275	4275	4275	
5°	3764	3802	3777	3822	3745	333
15°	1997	2019	2003	2036	2004	540
25°	286	421	434	405	322	179
35°	19	24	40	25	20	15
45°	3	4	5	4	3	3
55°	1	1	1	1	0	1
65°	0	0	0	0	0	1
75°	0	0	0	0	0	0
85°	0	0	0	0	0	0
90°	0	0	0	0	0	

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269



TEST NUMBER: P1212111

CATALOG NUMBER: LDSQA4A10940D010TE LAR25NF 4LSQA1H

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	4274.7	4274.7	4274.7	4274.7	4274.7
2.5°	4034.0	4055.5	4042.2	4078.0	3991.5
5°	3764.2	3802.0	3777.1	3821.5	3745.1
7.5°	3393.7	3432.8	3407.5	3450.5	3382.2
10°	2924.8	2953.9	2928.1	2969.7	2915.7
12.5°	2455.9	2485.0	2465.9	2504.1	2461.1
15°	1997.0	2019.4	2002.7	2035.6	2004.1
17.5°	1530.9	1552.4	1537.1	1563.9	1540.0
20°	1102.1	1120.7	1109.3	1131.7	1113.1
22.5°	684.3	733.9	742.1	744.0	690.0
25°	286.5	420.7	433.6	404.9	322.3
27.5°	117.9	154.7	206.3	162.8	124.2
30°	67.8	78.8	92.6	81.2	69.7
32.5°	33.9	43.9	60.6	46.3	35.8
35°	19.1	23.9	40.1	24.8	20.5
37.5°	11.5	13.8	20.1	14.3	11.9
40°	7.2	8.6	12.4	9.1	7.2
42.5°	4.8	5.7	7.6	5.7	4.8
45°	3.3	3.8	4.8	3.8	2.9
47.5°	2.4	2.4	2.9	2.4	1.9
50°	1.9	1.9	1.9	1.4	1.0
52.5°	1.4	1.4	1.4	1.0	1.0
55°	1.4	1.0	1.0	1.0	0.5
57.5°	1.0	1.0	1.0	0.5	0.5
60°	1.0	1.0	0.5	0.5	0.5
62.5°	0.5	0.5	0.5	0.5	0.5
65°	0.5	0.5	0.5	0.5	0.5
67.5°	0.5	0.5	0.5	0.5	0.5
70°	0.5	0.5	0.5	0.5	0.0
72.5°	0.0	0.0	0.0	0.0	0.0
75°	0.0	0.5	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

Classified

Scaled Data Report

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269



Report Generated By 670245859 / DESKTOP-T8S5UU9

Classified

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269

Scaled Data Report



Classified

Scaled Data Report

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269



— 0°-180° - - 45°-225° - - - 90°-270°

Classified

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269

Scaled Data Report



Classified

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269

Scaled Data Report



Classified

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269

Scaled Data Report



(END OF REPORT)