

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: FAIL-SAFE

Report Number: P835114

Luminaire Tested: **ORLG-24-4-INS-OPL-LD4-6LO-35-120-EDD-90**

Issue Date: 5/16/2024



Test Information

Test Method: LM-79-08
Report Number: P835114
Test Lab: INNOVATION CENTER(G2)
Issue Date: 5/16/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: ORLG-24-4-INS-OPL-LD4-6LO-35-120-EDD-90
Description: 2FT x 4FT ORL LED LUMINAIRE WITH opal acrylic lens
Light Source: 3500K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

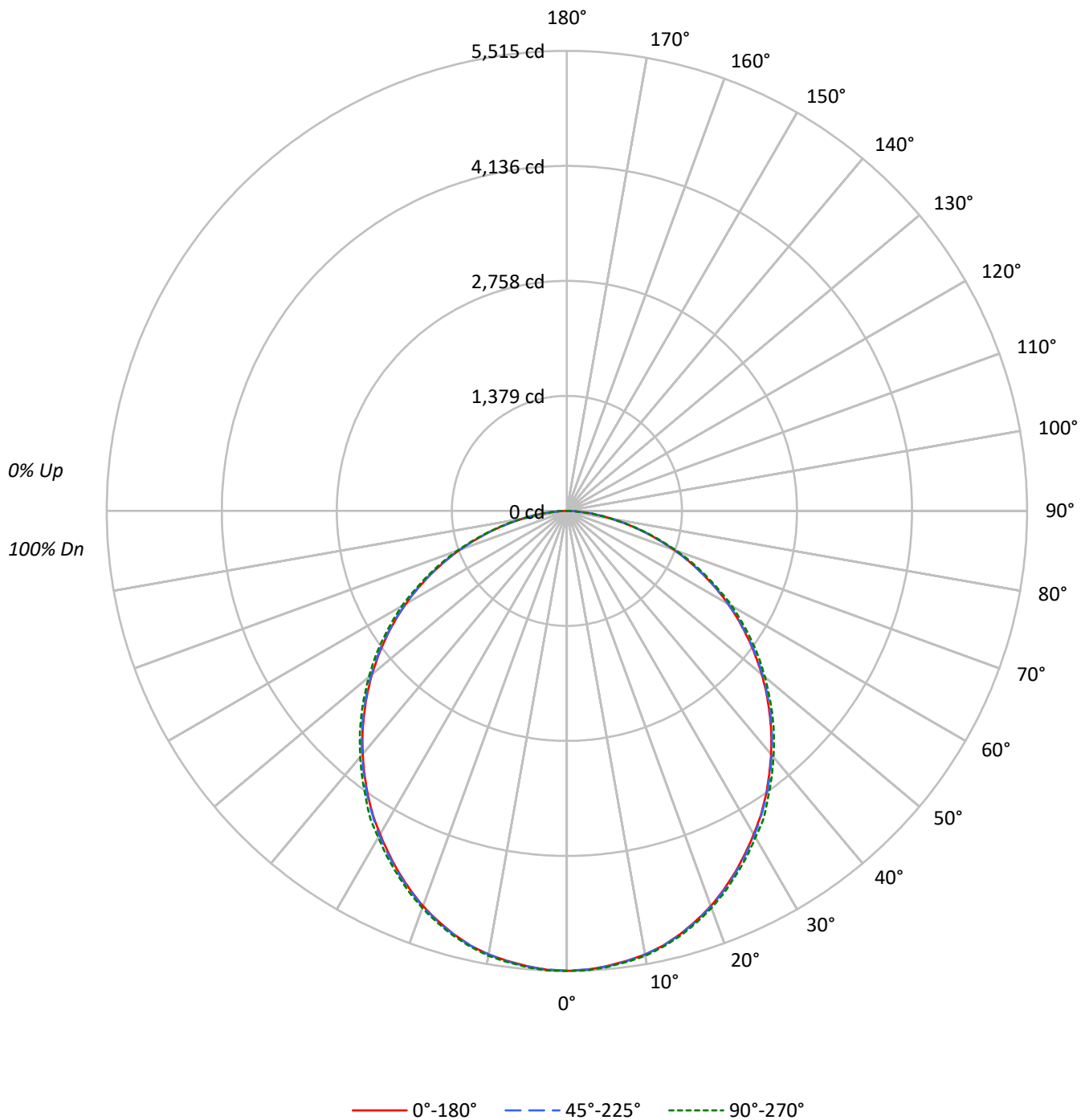
Lumens per Lamp: N/A
Luminaire Lumens: 14898.1 lumens
Efficiency: N/A
Efficacy: 106.1 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.22 / 1.33
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 140.4
Input Voltage (V): 120
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: 28.75 FT

TEST NUMBER: P835114

CATALOG NUMBER: ORLG-24-4-INS-OPL-LD4-6LO-35-120-EDD-90

Luminous Intensity Polar Plot



Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269



TEST NUMBER: P835114

CATALOG NUMBER: ORLG-24-4-INS-OPL-LD4-6LO-35-120-EDD-90

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	30	10	50	30	10
RCR																				
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	102	102	100
1	109	104	100	96	106	102	98	95	98	94	92	94	91	89	90	88	86	86	86	84
2	99	91	84	78	96	89	83	77	85	80	76	82	78	74	79	76	72	72	72	70
3	90	80	72	65	88	78	71	65	75	69	64	73	67	62	70	65	61	61	61	59
4	83	71	62	55	80	69	61	55	67	60	54	65	58	53	62	57	53	53	53	51
5	76	63	54	48	74	62	54	47	60	53	47	58	52	46	56	51	46	46	46	44
6	70	57	48	42	68	56	48	42	54	47	41	53	46	41	51	45	40	40	40	38
7	65	52	43	37	64	51	43	37	49	42	36	48	41	36	47	41	36	36	36	34
8	61	47	39	33	59	47	38	33	45	38	33	44	37	32	43	37	32	32	32	30
9	57	43	35	30	55	43	35	30	42	34	29	41	34	29	40	34	29	29	29	27
10	53	40	32	27	52	40	32	27	39	32	27	38	31	27	37	31	26	26	26	25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7418	7418	7418
5°	7399	7405	7414
10°	7375	7377	7399
15°	7314	7319	7340
20°	7219	7228	7254
25°	7089	7106	7138
30°	6956	6979	7021
35°	6829	6846	6900
40°	6685	6707	6767
45°	6538	6566	6634
50°	6380	6408	6482
55°	6199	6229	6330
60°	5993	6018	6153
65°	5731	5749	5858
70°	5380	5384	5501
75°	4890	4872	4985
80°	4201	4183	4255
85°	3260	3208	3225

Classified

Scaled Data Report

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269



TEST NUMBER: P835114

CATALOG NUMBER: ORLG-24-4-INS-OPL-LD4-6LO-35-120-EDD-90

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	521.0	3.5
10°-20°	1482.0	9.9
20°-30°	2206.3	14.8
30°-40°	2609.1	17.5
40°-50°	2663.6	17.9
50°-60°	2377.1	16.0
60°-70°	1790.4	12.0
70°-80°	998.5	6.7
80°-90°	250.2	1.7
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°	4209.3	28.3
0°-40°	6818.4	45.8
0°-60°	11859.1	79.6
0°-90°	14898.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	14898.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	5514	5514	5514	5514	5514	
5°	5478	5488	5483	5484	5490	520
15°	5251	5257	5254	5259	5269	1480
25°	4775	4781	4786	4799	4808	2200
35°	4157	4153	4168	4184	4201	2600
45°	3436	3435	3451	3468	3486	2651
55°	2643	2639	2655	2673	2698	2362
65°	1800	1793	1806	1822	1840	1780
75°	941	933	937	942	959	997
85°	211	206	208	206	209	253
90°	0	0	0	0	0	

Cooper Lighting Solutions Photometric Lab

1121 Highway 74 South

Peachtree City, GA 30269



TEST NUMBER: P835114

CATALOG NUMBER: ORLG-24-4-INS-OPL-LD4-6LO-35-120-EDD-90

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	5513.5	5513.5	5513.5	5513.5	5513.5
2.5°	5504.4	5513.5	5502.1	5504.4	5514.6
5°	5478.1	5488.4	5482.7	5483.8	5489.5
7.5°	5441.6	5455.3	5447.3	5449.6	5455.3
10°	5398.2	5408.5	5399.3	5405.1	5415.3
12.5°	5336.6	5341.1	5336.6	5338.8	5350.3
15°	5250.9	5256.7	5254.4	5258.9	5269.2
17.5°	5150.5	5157.3	5156.2	5165.3	5173.3
20°	5042.1	5043.2	5047.8	5056.9	5066.0
22.5°	4914.2	4917.6	4922.2	4934.8	4943.9
25°	4774.9	4780.6	4786.4	4798.9	4808.0
27.5°	4627.7	4633.4	4641.4	4655.1	4669.9
30°	4477.0	4477.0	4491.8	4505.5	4519.2
32.5°	4325.2	4319.5	4333.2	4350.3	4383.4
35°	4157.4	4152.8	4167.7	4183.6	4200.8
37.5°	3982.7	3979.3	3996.4	4013.6	4029.5
40°	3805.8	3801.2	3818.4	3835.5	3852.6
42.5°	3624.3	3622.0	3638.0	3655.1	3673.4
45°	3435.9	3434.8	3450.8	3467.9	3486.2
47.5°	3244.2	3241.9	3257.9	3276.1	3292.1
50°	3047.8	3045.6	3061.5	3079.8	3096.9
52.5°	2845.8	2845.8	2860.6	2876.6	2902.9
55°	2642.6	2639.2	2655.2	2673.4	2698.5
57.5°	2437.1	2432.6	2447.4	2465.7	2488.5
60°	2227.1	2222.5	2236.2	2254.5	2286.4
62.5°	2014.8	2007.9	2021.6	2038.7	2058.1
65°	1800.2	1793.3	1805.9	1821.9	1840.1
67.5°	1584.4	1576.4	1589.0	1602.7	1619.8
70°	1367.5	1359.5	1368.7	1382.4	1398.4
72.5°	1151.8	1143.8	1151.8	1157.5	1176.9
75°	940.6	932.6	937.2	941.7	958.9
77.5°	735.1	727.1	736.3	738.6	748.8
80°	542.2	534.2	539.9	541.1	549.1
82.5°	366.4	359.6	367.6	361.9	368.7
85°	211.2	205.5	207.8	205.5	208.9
87.5°	83.3	78.8	79.9	75.3	75.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)