

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: P835131

Luminaire Tested: **ORLG-24-4-INS-OPL-LD4-5HI-40-120-EDD-90**

Issue Date: 5/16/2024



Test Information

Test Method: LM-79-08
Report Number: P835131
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-LD4-5HI-40-120-EDD-90
Description: 2FT x 4FT ORL LED LUMINAIRE WITH opal acrylic lens
Light Source: 4000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

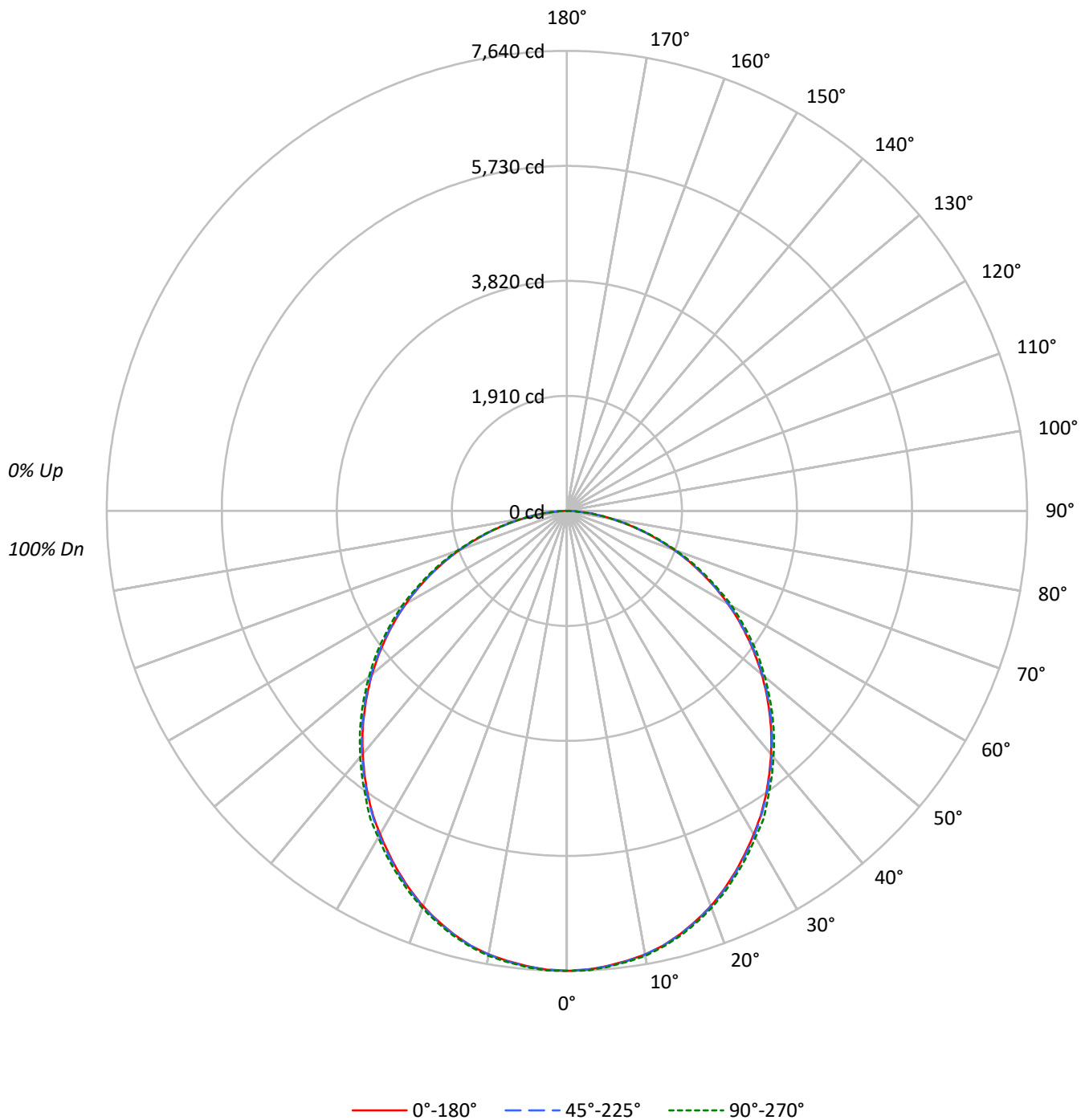
Lumens per Lamp: N/A
Luminaire Lumens: 20638.5 lumens
Efficiency: N/A
Efficacy: 93.8 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.22 / 1.33
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 220
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

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Luminous Intensity Polar Plot



Cooper Lighting Solutions Photometric Lab

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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°	10277	10277	10277
5°	10250	10258	10271
10°	10217	10219	10249
15°	10133	10139	10168
20°	10001	10012	10049
25°	9820	9844	9888
30°	9636	9668	9727
35°	9460	9483	9559
40°	9260	9291	9374
45°	9057	9096	9189
50°	8838	8878	8980
55°	8587	8628	8769
60°	8302	8336	8523
65°	7940	7965	8116
70°	7453	7459	7621
75°	6774	6749	6905
80°	5820	5796	5893
85°	4516	4443	4468

Classified

Scaled Data Report

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	721.8	3.5
10°-20°	2053.1	9.9
20°-30°	3056.4	14.8
30°-40°	3614.5	17.5
40°-50°	3689.9	17.9
50°-60°	3293.0	16.0
60°-70°	2480.3	12.0
70°-80°	1383.2	6.7
80°-90°	346.5	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°	5831.2	28.3
0°-40°	9445.7	45.8
0°-60°	16428.5	79.6
0°-90°	20638.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	20638.5	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	7638	7638	7638	7638	7638	
5°	7589	7603	7595	7597	7605	721
15°	7274	7282	7279	7285	7300	2050
25°	6615	6623	6631	6648	6661	3047
35°	5759	5753	5774	5796	5819	3602
45°	4760	4758	4780	4804	4829	3672
55°	3661	3656	3678	3704	3738	3272
65°	2494	2484	2502	2524	2549	2466
75°	1303	1292	1298	1305	1328	1381
85°	292	285	288	285	289	351
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	7637.9	7637.9	7637.9	7637.9	7637.9
2.5°	7625.3	7637.9	7622.1	7625.3	7639.5
5°	7588.9	7603.1	7595.2	7596.8	7604.7
7.5°	7538.3	7557.3	7546.2	7549.4	7557.3
10°	7478.2	7492.4	7479.8	7487.7	7501.9
12.5°	7392.8	7399.1	7392.8	7396.0	7411.8
15°	7274.2	7282.1	7279.0	7285.3	7299.5
17.5°	7135.1	7144.5	7143.0	7155.6	7166.7
20°	6984.8	6986.4	6992.7	7005.4	7018.0
22.5°	6807.7	6812.5	6818.8	6836.2	6848.8
25°	6614.8	6622.7	6630.6	6648.0	6660.6
27.5°	6410.8	6418.7	6429.8	6448.7	6469.3
30°	6202.1	6202.1	6222.6	6241.6	6260.6
32.5°	5991.7	5983.8	6002.8	6026.5	6072.4
35°	5759.3	5753.0	5773.5	5795.6	5819.4
37.5°	5517.3	5512.6	5536.3	5560.0	5582.2
40°	5272.2	5265.9	5289.6	5313.3	5337.1
42.5°	5020.8	5017.6	5039.8	5063.5	5088.8
45°	4759.9	4758.3	4780.4	4804.1	4829.4
47.5°	4494.2	4491.0	4513.2	4538.5	4560.6
50°	4222.2	4219.0	4241.2	4266.5	4290.2
52.5°	3942.3	3942.3	3962.9	3985.0	4021.4
55°	3660.8	3656.1	3678.2	3703.5	3738.3
57.5°	3376.2	3369.9	3390.4	3415.7	3447.3
60°	3085.2	3078.9	3097.9	3123.2	3167.4
62.5°	2791.1	2781.6	2800.6	2824.3	2851.2
65°	2493.8	2484.3	2501.7	2523.8	2549.1
67.5°	2194.9	2183.8	2201.2	2220.2	2243.9
70°	1894.5	1883.4	1896.0	1915.0	1937.2
72.5°	1595.6	1584.5	1595.6	1603.5	1630.4
75°	1303.0	1292.0	1298.3	1304.6	1328.3
77.5°	1018.4	1007.3	1020.0	1023.1	1037.4
80°	751.1	740.1	748.0	749.6	760.6
82.5°	507.6	498.1	509.2	501.3	510.8
85°	292.5	284.6	287.8	284.6	289.4
87.5°	115.4	109.1	110.7	104.4	104.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)