

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: P835060

Luminaire Tested: **ORLG-24-4-INS-OPL-LD4-6LO-20-120-EDD-90**

Issue Date: 5/16/2024



Test Information

Test Method: LM-79-08
Report Number: P835060
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-20-120-EDD-90
Description: 2FT x 4FT ORL LED LUMINAIRE WITH opal acrylic lens
Light Source: 2000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

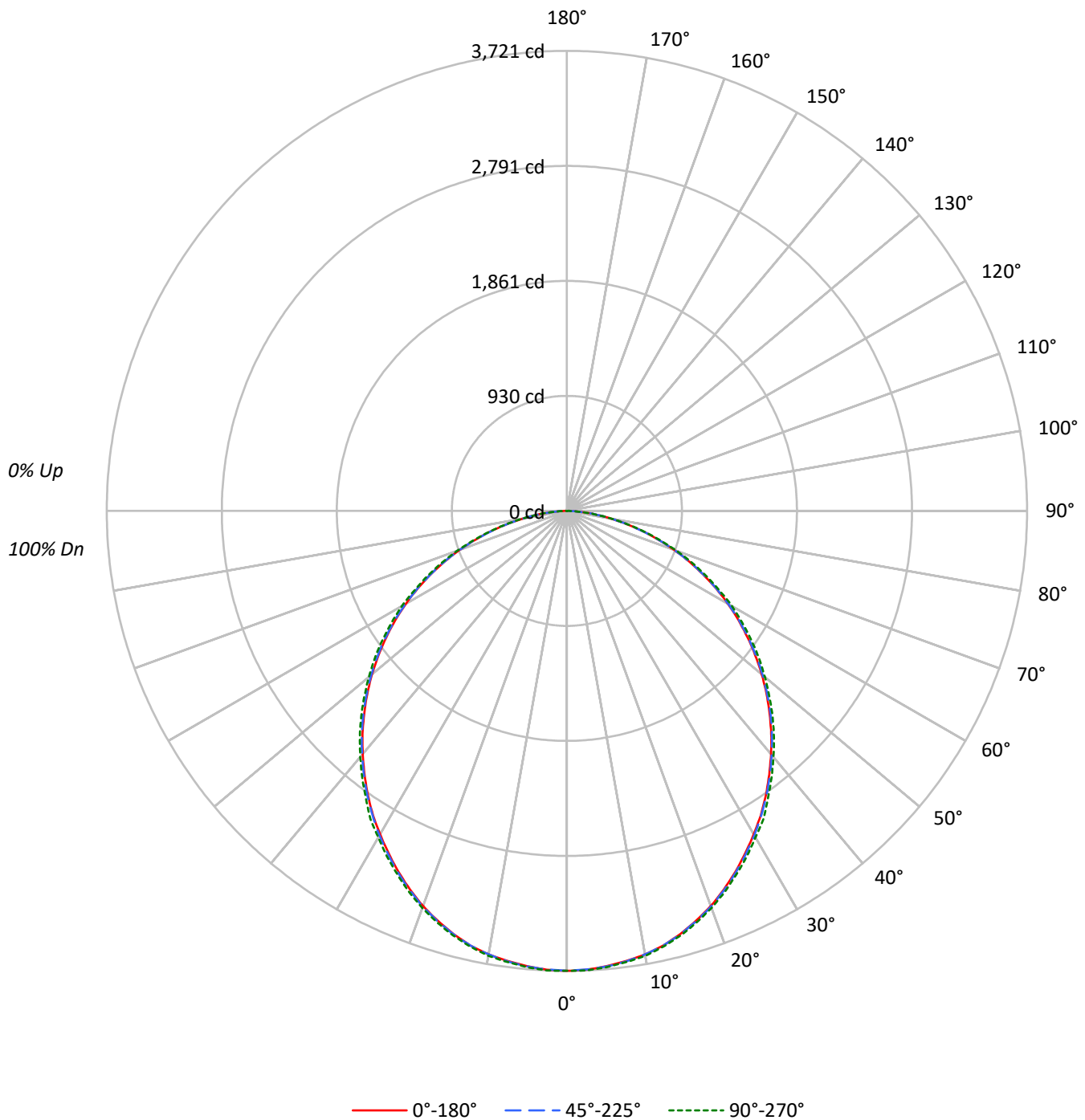
Lumens per Lamp: N/A
Luminaire Lumens: 10051.7 lumens
Efficiency: N/A
Efficacy: 71.6 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.22 / 1.33
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

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

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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	27	27	27	25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5005	5005	5005
5°	4992	4996	5002
10°	4976	4977	4992
15°	4935	4938	4952
20°	4871	4876	4894
25°	4783	4794	4816
30°	4693	4708	4737
35°	4607	4619	4655
40°	4510	4525	4565
45°	4411	4430	4476
50°	4304	4324	4374
55°	4183	4202	4271
60°	4043	4060	4151
65°	3867	3879	3953
70°	3630	3633	3712
75°	3299	3287	3363
80°	2834	2823	2871
85°	2200	2164	2175

Classified

Scaled Data Report

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	351.5	3.5
10°-20°	999.9	9.9
20°-30°	1488.6	14.8
30°-40°	1760.4	17.5
40°-50°	1797.1	17.9
50°-60°	1603.8	16.0
60°-70°	1208.0	12.0
70°-80°	673.7	6.7
80°-90°	168.8	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°	2840.0	28.3
0°-40°	4600.4	45.8
0°-60°	8001.3	79.6
0°-90°	10051.7	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	10051.7	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3720	3720	3720	3720	3720	
5°	3696	3703	3699	3700	3704	351
15°	3543	3547	3545	3548	3555	999
25°	3222	3226	3229	3238	3244	1484
35°	2805	2802	2812	2823	2834	1754
45°	2318	2318	2328	2340	2352	1788
55°	1783	1781	1791	1804	1821	1594
65°	1215	1210	1218	1229	1242	1201
75°	635	629	632	635	647	673
85°	142	139	140	139	141	171
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3719.9	3719.9	3719.9	3719.9	3719.9
2.5°	3713.8	3719.9	3712.2	3713.8	3720.7
5°	3696.1	3703.0	3699.2	3699.9	3703.8
7.5°	3671.4	3680.7	3675.3	3676.8	3680.7
10°	3642.2	3649.1	3642.9	3646.8	3653.7
12.5°	3600.6	3603.7	3600.6	3602.1	3609.8
15°	3542.8	3546.7	3545.1	3548.2	3555.1
17.5°	3475.0	3479.7	3478.9	3485.0	3490.4
20°	3401.9	3402.6	3405.7	3411.9	3418.0
22.5°	3315.6	3317.9	3321.0	3329.5	3335.6
25°	3221.6	3225.5	3229.3	3237.8	3244.0
27.5°	3122.3	3126.1	3131.5	3140.8	3150.8
30°	3020.6	3020.6	3030.6	3039.9	3049.1
32.5°	2918.2	2914.3	2923.6	2935.1	2957.5
35°	2805.0	2801.9	2811.9	2822.7	2834.2
37.5°	2687.1	2684.8	2696.4	2707.9	2718.7
40°	2567.8	2564.7	2576.2	2587.8	2599.3
42.5°	2445.3	2443.8	2454.6	2466.1	2478.4
45°	2318.2	2317.5	2328.2	2339.8	2352.1
47.5°	2188.8	2187.3	2198.1	2210.4	2221.2
50°	2056.4	2054.8	2065.6	2077.9	2089.5
52.5°	1920.0	1920.0	1930.1	1940.8	1958.6
55°	1783.0	1780.6	1791.4	1803.8	1820.7
57.5°	1644.3	1641.2	1651.3	1663.6	1679.0
60°	1502.6	1499.5	1508.8	1521.1	1542.7
62.5°	1359.4	1354.7	1364.0	1375.5	1388.6
65°	1214.6	1209.9	1218.4	1229.2	1241.5
67.5°	1069.0	1063.6	1072.1	1081.3	1092.9
70°	922.7	917.3	923.4	932.7	943.5
72.5°	777.1	771.7	777.1	781.0	794.1
75°	634.6	629.2	632.3	635.4	646.9
77.5°	496.0	490.6	496.8	498.3	505.2
80°	365.8	360.4	364.3	365.1	370.5
82.5°	247.2	242.6	248.0	244.1	248.8
85°	142.5	138.6	140.2	138.6	140.9
87.5°	56.2	53.1	53.9	50.8	50.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)