

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: P553984

Luminaire Tested: **FUSL-12-2-LD4-1HI-40-UNV-81-84-EDD-90**

Issue Date: 7/16/2021

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.



Test Information

Test Method: LM-79-08
Report Number: P553984
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2105-257-2)
Test Lab: INNOVATION CENTER
Issue Date: 7/16/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: FUSL-12-2-LD4-1HI-40-UNV-81-84-EDD-90
Description: 2FT FUSL SURFACE MOUNT WITH .156 CLEAR PC FIXTURE SIDE AND .125 CLEAR PC ENVIRONMENTAL SIDE LENSES WITH, 90 CRI AND 4000K CCT LEDS
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

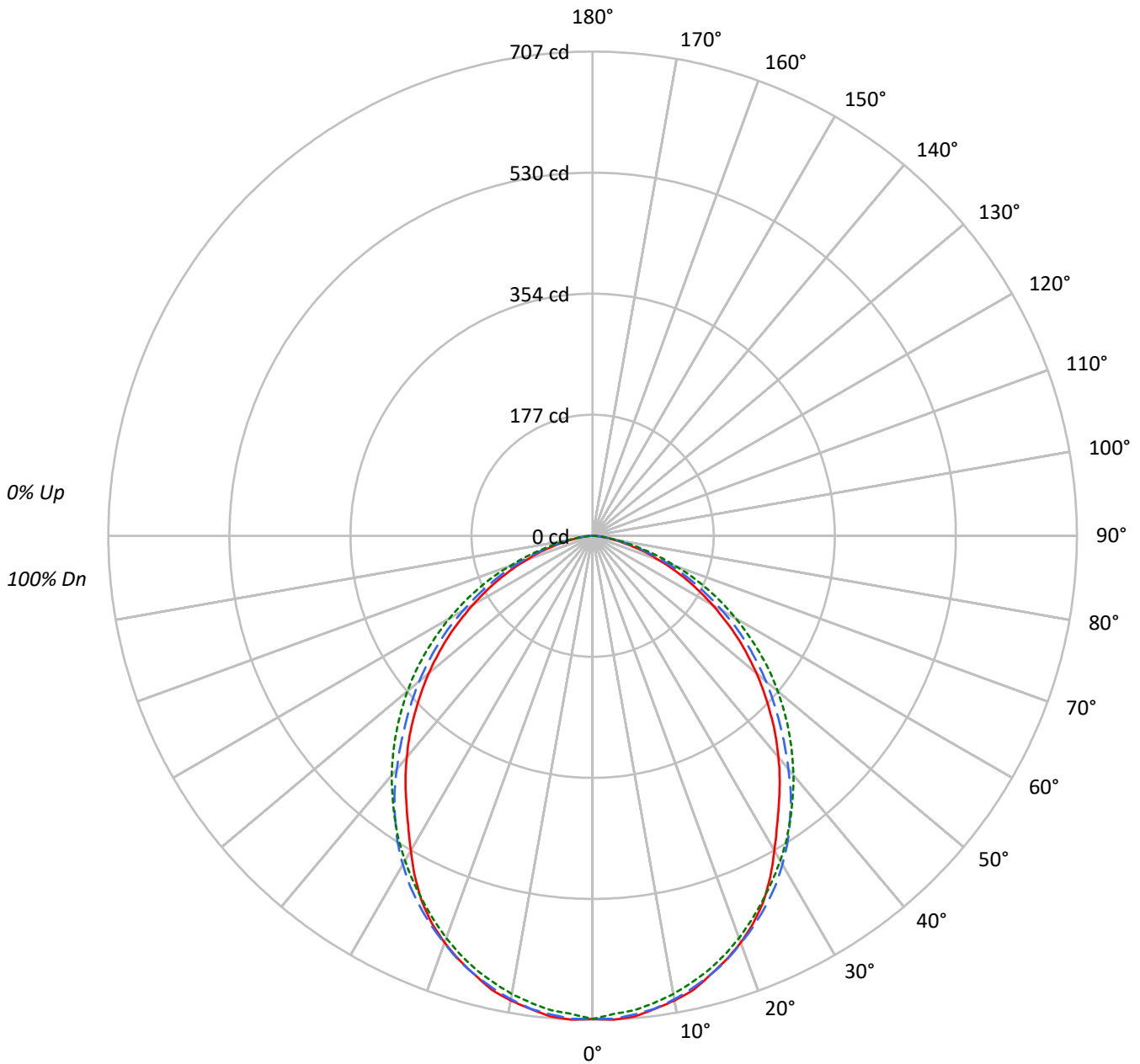
Lumens per Lamp: N/A
Luminaire Lumens: 1631.0 lumens
Efficiency: N/A
Efficacy: 75.5 lumens/watt
Spacing Criteria (0/90/45): 1.13 / 1.16 / 1.26
Luminous Opening: Rectangular (W 1' x L: 2' x H: 0')
CIE Type: Direct

Input Watts (W): 21.6
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									
RC	80									50									30									10									0
RW	70	50	30	10	70	50	30	10	50	30	10	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	102	102	102	100																			
1	110	106	102	98	107	103	100	97	99	96	94	95	93	91	92	90	88	86																			
2	101	93	87	82	98	91	86	81	88	83	79	85	81	77	82	78	75	73																			
3	92	83	75	69	90	81	74	68	78	72	67	75	70	66	73	69	65	63																			
4	85	74	65	59	83	72	65	59	70	63	58	68	62	57	65	61	56	54																			
5	78	66	58	51	76	65	57	51	63	56	51	61	55	50	59	54	50	47																			
6	73	60	51	45	71	59	51	45	57	50	45	56	49	44	54	48	44	42																			
7	68	55	46	40	66	54	46	40	52	45	40	51	44	40	49	44	39	37																			
8	63	50	42	36	61	49	41	36	48	41	36	47	40	36	46	40	35	34																			
9	59	46	38	33	58	45	38	33	44	37	32	43	37	32	42	36	32	30																			
10	55	43	35	30	54	42	35	30	41	34	30	40	34	29	39	33	29	28																			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3796	3796	3796
5°	3807	3790	3758
10°	3766	3756	3713
15°	3699	3699	3657
20°	3621	3625	3579
25°	3502	3545	3489
30°	3297	3445	3404
35°	3116	3303	3308
40°	2964	3124	3206
45°	2795	2935	3086
50°	2616	2766	2954
55°	2413	2573	2794
60°	2173	2348	2598
65°	1919	2087	2364
70°	1599	1778	2008
75°	1256	1420	1572
80°	899	998	1110
85°	587	587	550



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	66.4	4.1
10°-20°	186.6	11.4
20°-30°	272.6	16.7
30°-40°	309.5	19.0
40°-50°	298.8	18.3
50°-60°	246.4	15.1
60°-70°	164.1	10.1
70°-80°	73.4	4.5
80°-90°	13.1	0.8
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°	525.6	32.2
0°-40°	835.1	51.2
0°-60°	1380.3	84.6
0°-90°	1631.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1631.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	705	705	705	705	705	
5°	705	704	702	698	696	67
15°	664	666	664	661	656	187
25°	590	594	597	593	588	270
35°	474	481	503	505	504	297
45°	367	373	386	403	405	283
55°	257	262	274	289	298	230
65°	151	155	164	176	186	149
75°	60	64	68	72	76	66
85°	10	10	10	9	9	13
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	705.4	705.4	705.4	705.4	705.4
2.5°	707.3	707.5	705.9	701.6	698.9
5°	704.6	704.3	701.6	697.8	695.6
7.5°	696.7	697.2	696.4	691.0	688.0
10°	689.1	689.4	687.2	682.9	679.4
12.5°	679.4	679.1	676.1	673.9	668.2
15°	663.9	665.5	663.9	660.9	656.3
17.5°	649.0	649.0	650.1	644.9	641.4
20°	632.2	633.0	633.0	628.9	624.9
22.5°	612.7	615.1	615.9	611.6	606.7
25°	589.7	594.3	597.0	592.6	587.5
27.5°	561.7	568.8	576.9	573.7	568.0
30°	530.6	540.9	554.4	551.7	547.7
32.5°	501.0	511.3	530.0	529.0	526.8
35°	474.2	480.7	502.7	505.4	503.5
37.5°	448.7	454.7	475.3	481.5	479.9
40°	421.9	428.4	444.7	455.8	456.3
42.5°	395.4	401.6	414.9	430.9	430.9
45°	367.2	373.4	385.6	403.2	405.4
47.5°	339.5	346.0	358.0	375.6	379.1
50°	312.4	318.4	330.3	347.4	352.8
52.5°	284.3	290.8	302.4	318.1	326.0
55°	257.2	261.5	274.2	289.4	297.8
57.5°	229.0	233.0	247.4	260.4	269.1
60°	201.9	207.0	218.1	231.4	241.4
62.5°	175.9	181.3	190.8	202.4	213.8
65°	150.7	154.7	163.9	175.6	185.6
67.5°	126.3	129.8	139.0	147.1	157.7
70°	101.6	106.2	113.0	120.9	127.6
72.5°	81.8	83.7	89.4	95.1	102.2
75°	60.4	63.7	68.3	71.5	75.6
77.5°	43.4	45.3	48.0	50.7	54.5
80°	29.0	29.8	32.2	32.8	35.8
82.5°	17.6	18.2	18.7	19.0	20.1
85°	9.5	9.5	9.5	8.9	8.9
87.5°	5.4	5.4	4.6	3.8	2.7
90°	0.0	0.0	0.0	0.0	0.0



Report Generated By 670246072 / DESKTOP-MV3F9LC





— 0°-180° - - 45°-225° - - - - 90°-270°







(END OF REPORT)