

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: P554250

Luminaire Tested: **FUSL-12-2-LD4-1LO-40-UNV-81-94-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: P554250  
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-LD4-1LO-40-UNV-81-94-EDD-90  
Description: 2FT FUSL SURFACE MOUNT WITH .156 CLEAR PC FIXTURE SIDE AND .187  
CLEAR TEMPERED GLASS ENVIRONMENTAL SIDE LENSES WITH, 90 CRI AND 4000K CCT  
LEDS  
Light Source: -  
Ballast/Driver: -

Luminaire Equipment: Sample No.    Condition    Description

**Summary**

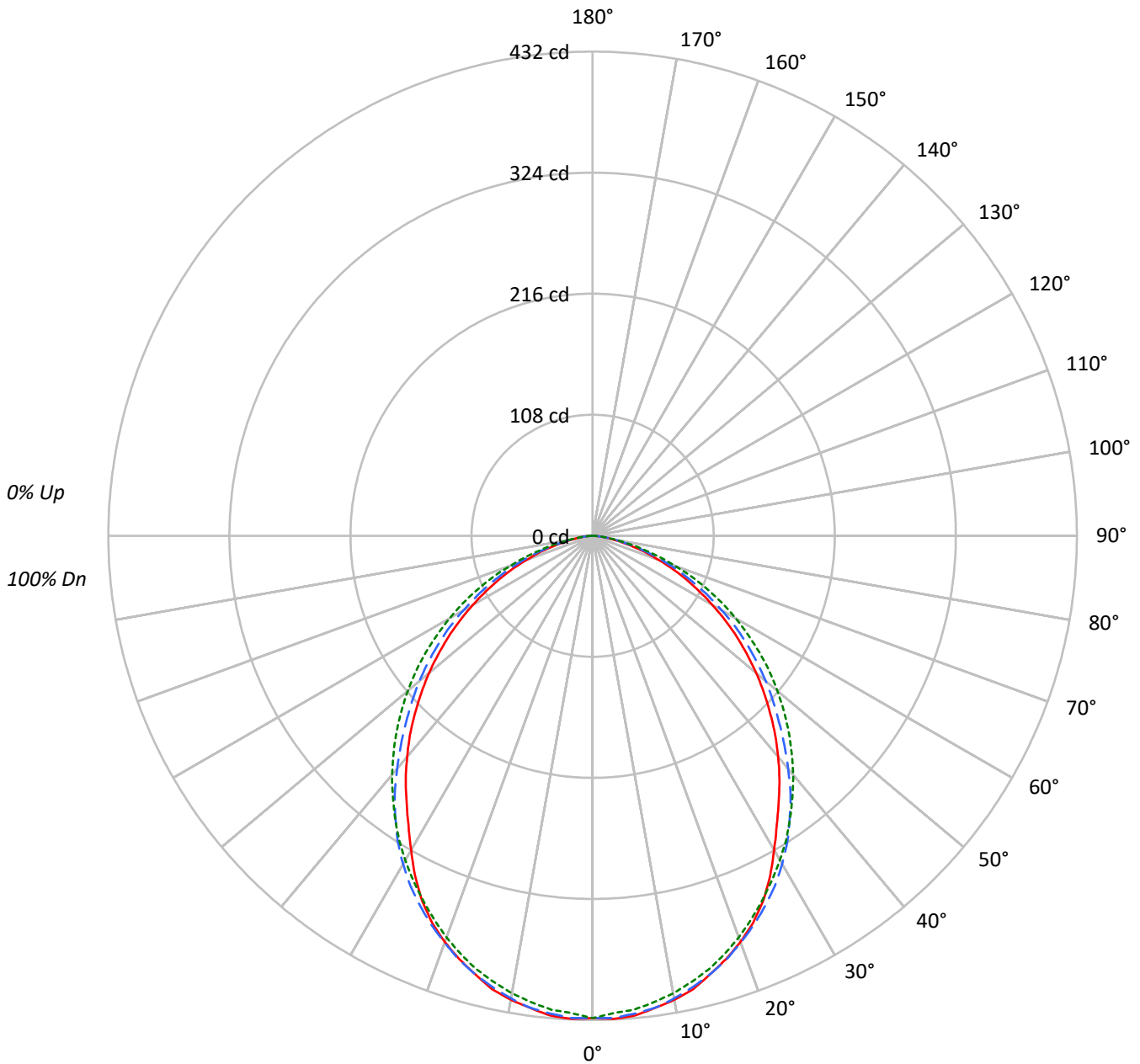
Lumens per Lamp: N/A  
Luminaire Lumens: 995.0 lumens  
Efficiency: N/A  
Efficacy: 85.0 lumens/watt  
Spacing Criteria (0/90/45): 1.13 / 1.16 / 1.26  
Luminous Opening: Rectangular (W 1' x L: 2' x H: 0')  
CIE Type: Direct

Input Watts (W): 11.7  
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°	2316	2316	2316
5°	2322	2312	2293
10°	2297	2291	2265
15°	2257	2257	2231
20°	2209	2212	2183
25°	2136	2163	2128
30°	2012	2102	2076
35°	1901	2015	2018
40°	1808	1906	1956
45°	1705	1790	1882
50°	1596	1687	1802
55°	1472	1570	1705
60°	1326	1433	1586
65°	1170	1273	1442
70°	976	1084	1226
75°	767	867	959
80°	549	611	676
85°	358	358	340



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	40.5	4.1
10°-20°	113.8	11.4
20°-30°	166.3	16.7
30°-40°	188.8	19.0
40°-50°	182.2	18.3
50°-60°	150.4	15.1
60°-70°	100.1	10.1
70°-80°	44.8	4.5
80°-90°	8.0	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°	320.7	32.2
0°-40°	509.5	51.2
0°-60°	842.1	84.6
0°-90°	995.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	995.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	430	430	430	430	430	
5°	430	430	428	426	424	41
15°	405	406	405	403	400	114
25°	360	362	364	362	358	165
35°	289	293	307	308	307	181
45°	224	228	235	246	247	173
55°	157	160	167	177	182	140
65°	92	94	100	107	113	91
75°	37	39	42	44	46	40
85°	6	6	6	6	6	8
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	430.3	430.3	430.3	430.3	430.3
2.5°	431.5	431.6	430.6	428.0	426.3
5°	429.8	429.7	428.0	425.7	424.4
7.5°	425.0	425.4	424.9	421.6	419.7
10°	420.4	420.6	419.2	416.6	414.4
12.5°	414.4	414.3	412.5	411.1	407.7
15°	405.0	406.0	405.0	403.2	400.4
17.5°	395.9	395.9	396.6	393.4	391.3
20°	385.7	386.2	386.2	383.7	381.2
22.5°	373.8	375.3	375.8	373.1	370.1
25°	359.7	362.5	364.2	361.5	358.4
27.5°	342.7	347.0	352.0	350.0	346.5
30°	323.7	330.0	338.2	336.6	334.1
32.5°	305.7	311.9	323.4	322.7	321.4
35°	289.3	293.3	306.7	308.3	307.2
37.5°	273.8	277.4	290.0	293.8	292.8
40°	257.4	261.4	271.3	278.1	278.4
42.5°	241.2	245.0	253.1	262.8	262.8
45°	224.0	227.8	235.2	246.0	247.3
47.5°	207.1	211.1	218.4	229.1	231.3
50°	190.6	194.2	201.5	211.9	215.2
52.5°	173.4	177.4	184.5	194.1	198.9
55°	156.9	159.5	167.3	176.6	181.7
57.5°	139.7	142.2	150.9	158.9	164.2
60°	123.2	126.3	133.1	141.2	147.3
62.5°	107.3	110.6	116.4	123.5	130.4
65°	91.9	94.4	100.0	107.1	113.2
67.5°	77.0	79.2	84.8	89.8	96.2
70°	62.0	64.8	68.9	73.7	77.9
72.5°	49.9	51.1	54.6	58.0	62.3
75°	36.9	38.8	41.7	43.6	46.1
77.5°	26.5	27.6	29.3	30.9	33.2
80°	17.7	18.2	19.7	20.0	21.8
82.5°	10.7	11.1	11.4	11.6	12.2
85°	5.8	5.8	5.8	5.5	5.5
87.5°	3.3	3.3	2.8	2.3	1.7
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)