

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: P554440

Luminaire Tested: **FUSL-12-2-LD4-1STD-35-UNV-81-88-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: P554440
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-LD4-1STD-35-UNV-81-88-EDD-90
Description: 2FT FUSL SURFACE MOUNT WITH .156 CLEAR PC FIXTURE SIDE AND .500 CLEAR PC ENVIRONMENTAL SIDE LENSES WITH, 90 CRI AND 3500K CCT LEDS
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

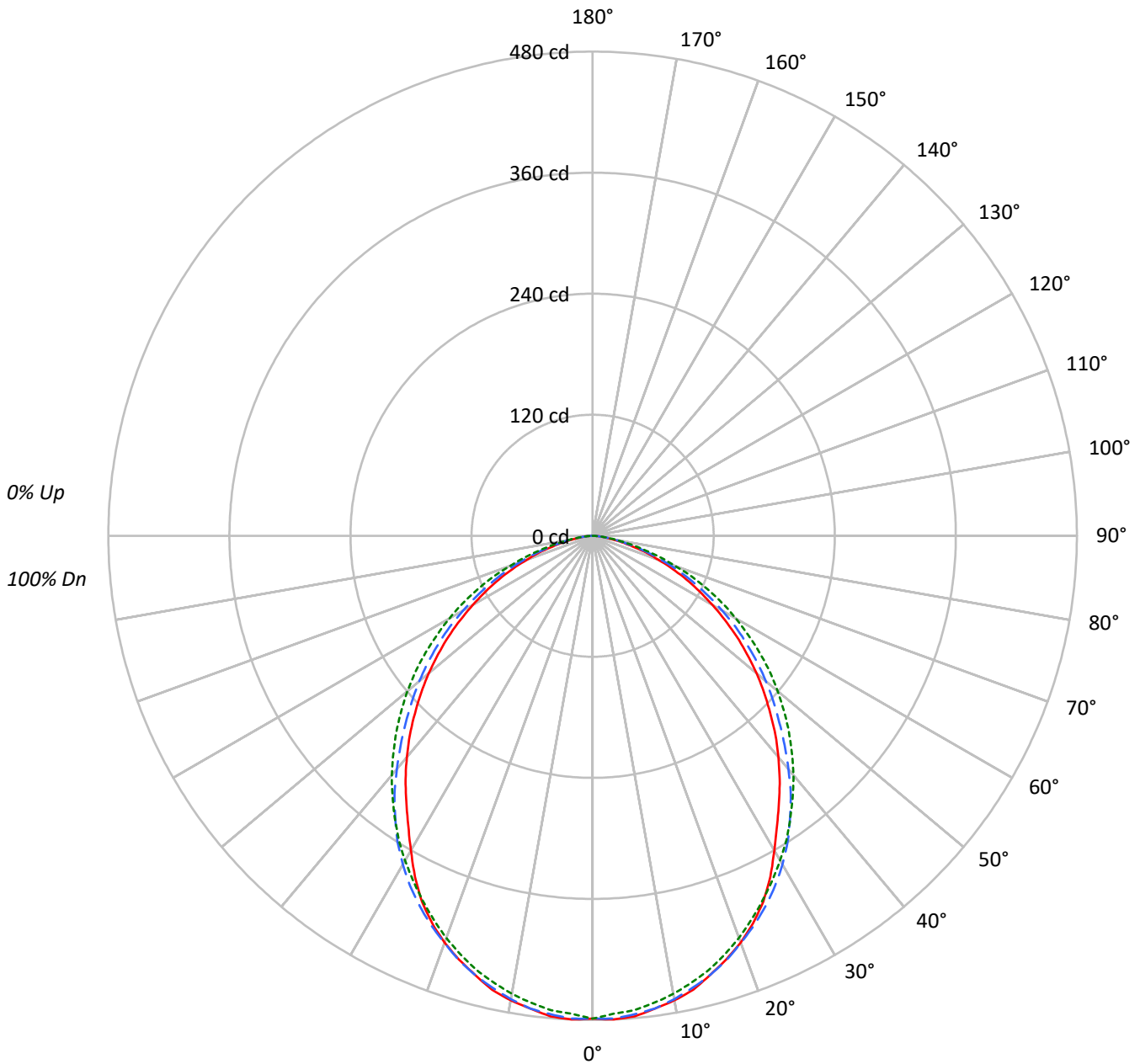
Lumens per Lamp: N/A
Luminaire Lumens: 1107.0 lumens
Efficiency: N/A
Efficacy: 66.7 lumens/watt
Spacing Criteria (0/90/45): 1.13 / 1.16 / 1.26
Luminous Opening: Rectangular (W 1' x L: 2' x H: 0')
CIE Type: Direct

Input Watts (W): 16.6
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°	2576	2576	2576
5°	2583	2573	2551
10°	2556	2549	2520
15°	2511	2511	2482
20°	2458	2460	2429
25°	2377	2406	2368
30°	2238	2339	2310
35°	2115	2242	2245
40°	2012	2120	2176
45°	1897	1992	2094
50°	1776	1877	2005
55°	1637	1746	1896
60°	1475	1594	1764
65°	1303	1417	1605
70°	1086	1207	1363
75°	853	963	1067
80°	611	679	753
85°	395	395	377



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	45.1	4.1
10°-20°	126.6	11.4
20°-30°	185.0	16.7
30°-40°	210.1	19.0
40°-50°	202.8	18.3
50°-60°	167.3	15.1
60°-70°	111.4	10.1
70°-80°	49.8	4.5
80°-90°	8.9	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°	356.8	32.2
0°-40°	566.8	51.2
0°-60°	936.8	84.6
0°-90°	1107.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1107.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	479	479	479	479	479	
5°	478	478	476	474	472	45
15°	451	452	451	449	446	127
25°	400	403	405	402	399	183
35°	322	326	341	343	342	202
45°	249	253	262	274	275	192
55°	174	178	186	196	202	156
65°	102	105	111	119	126	101
75°	41	43	46	49	51	45
85°	6	6	6	6	6	9
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	478.7	478.7	478.7	478.7	478.7
2.5°	480.0	480.2	479.1	476.2	474.3
5°	478.2	478.0	476.2	473.6	472.1
7.5°	472.9	473.2	472.7	469.0	467.0
10°	467.7	467.9	466.4	463.5	461.1
12.5°	461.1	460.9	458.9	457.4	453.6
15°	450.6	451.7	450.6	448.6	445.5
17.5°	440.5	440.5	441.2	437.7	435.3
20°	429.1	429.6	429.6	426.9	424.1
22.5°	415.8	417.5	418.1	415.1	411.8
25°	400.2	403.3	405.2	402.2	398.7
27.5°	381.3	386.1	391.6	389.4	385.5
30°	360.1	367.1	376.3	374.5	371.7
32.5°	340.1	347.1	359.8	359.0	357.5
35°	321.9	326.3	341.2	343.0	341.7
37.5°	304.6	308.6	322.6	326.8	325.7
40°	286.4	290.8	301.8	309.4	309.7
42.5°	268.3	272.6	281.6	292.4	292.4
45°	249.2	253.4	261.7	273.7	275.1
47.5°	230.5	234.9	243.0	254.9	257.3
50°	212.1	216.1	224.2	235.8	239.5
52.5°	192.9	197.3	205.3	215.9	221.3
55°	174.5	177.5	186.1	196.4	202.1
57.5°	155.4	158.2	167.9	176.7	182.6
60°	137.0	140.5	148.1	157.1	163.9
62.5°	119.4	123.0	129.5	137.4	145.1
65°	102.3	105.0	111.3	119.2	126.0
67.5°	85.7	88.1	94.4	99.9	107.0
70°	69.0	72.1	76.7	82.0	86.6
72.5°	55.5	56.8	60.7	64.6	69.3
75°	41.0	43.2	46.3	48.6	51.3
77.5°	29.4	30.7	32.6	34.4	37.0
80°	19.7	20.2	21.9	22.3	24.3
82.5°	12.0	12.3	12.7	12.9	13.6
85°	6.4	6.4	6.4	6.1	6.1
87.5°	3.7	3.7	3.1	2.6	1.8
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)