

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: P553912

Luminaire Tested: **FUSL-12-2-LD4-1HI-35-UNV-80-88-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: P553912  
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-35-UNV-80-88-EDD-90  
Description: 2FT FUSL SURFACE MOUNT WITH .125 PRISMATIC ACRYLIC 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**

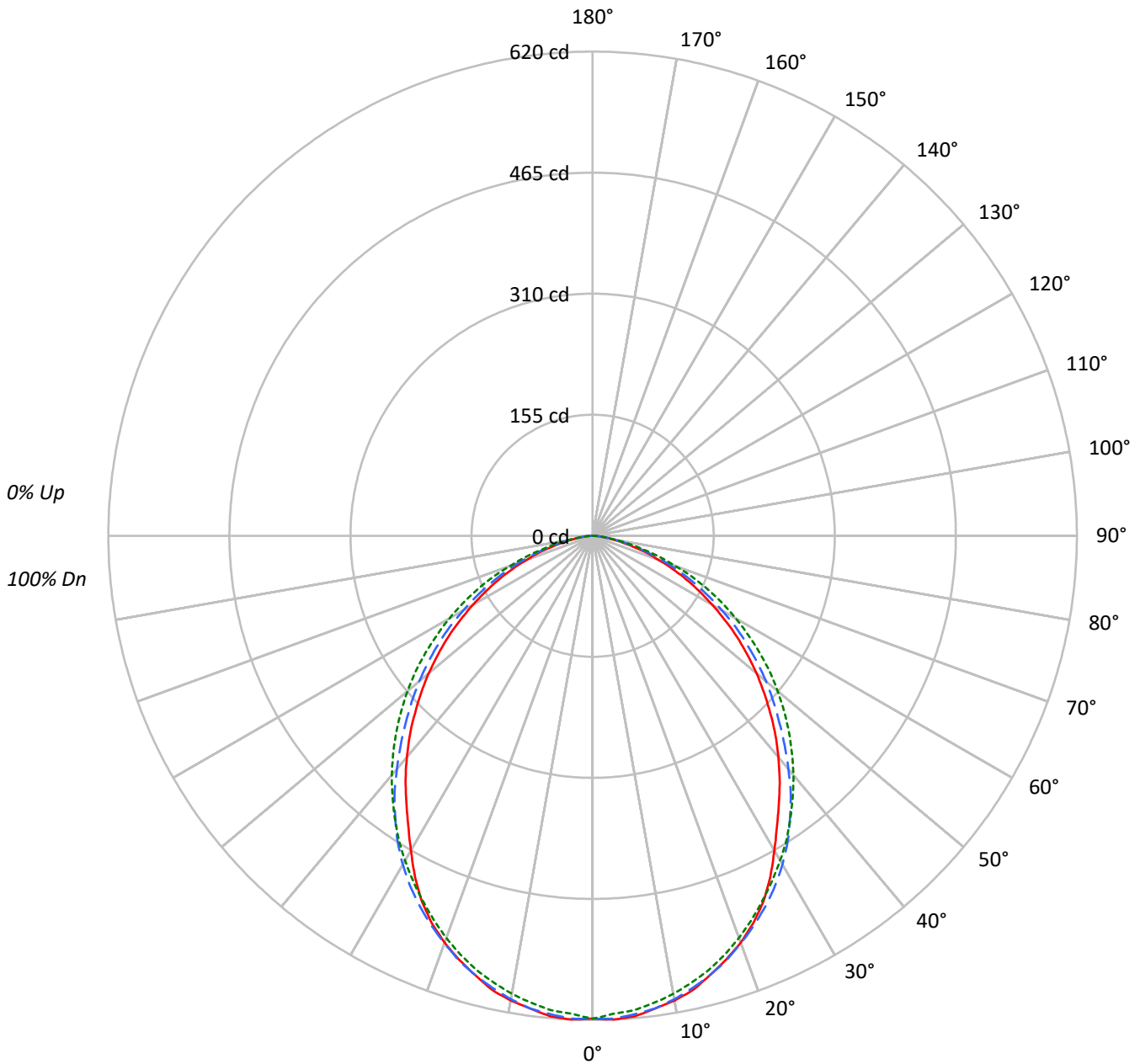
Lumens per Lamp: N/A  
Luminaire Lumens: 1430.0 lumens  
Efficiency: N/A  
Efficacy: 66.2 lumens/watt  
Spacing Criteria (0/90/45): 1.13 / 1.16 / 1.26  
Luminous Opening: Rectangular (W 1' x L: 2' x H: 0')  
CIE Type: Direct

Input Watts (W): 21.6  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): 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

TEST NUMBER: P553912

CATALOG NUMBER: FUSL-12-2-LD4-1HI-35-UNV-80-88-EDD-90

### Luminous Intensity Polar Plot





TEST NUMBER: P553912

CATALOG NUMBER: FUSL-12-2-LD4-1HI-35-UNV-80-88-EDD-90

**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°	3328	3328	3328
5°	3337	3323	3295
10°	3302	3293	3255
15°	3243	3243	3206
20°	3175	3179	3138
25°	3070	3108	3059
30°	2891	3021	2984
35°	2732	2895	2900
40°	2599	2739	2811
45°	2450	2573	2705
50°	2293	2425	2590
55°	2116	2256	2450
60°	1905	2059	2279
65°	1682	1830	2072
70°	1402	1559	1761
75°	1102	1246	1379
80°	787	877	973
85°	513	513	482



TEST NUMBER: P553912

CATALOG NUMBER: FUSL-12-2-LD4-1HI-35-UNV-80-88-EDD-90

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	58.2	4.1
10°-20°	163.6	11.4
20°-30°	239.0	16.7
30°-40°	271.3	19.0
40°-50°	261.9	18.3
50°-60°	216.1	15.1
60°-70°	143.9	10.1
70°-80°	64.4	4.5
80°-90°	11.5	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°	460.8	32.2
0°-40°	732.2	51.2
0°-60°	1210.2	84.6
0°-90°	1430.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1430.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	618	618	618	618	618	
5°	618	618	615	612	610	58
15°	582	584	582	580	575	164
25°	517	521	523	520	515	237
35°	416	422	441	443	441	261
45°	322	327	338	354	355	248
55°	226	229	240	254	261	201
65°	132	136	144	154	163	131
75°	53	56	60	63	66	58
85°	8	8	8	8	8	11
90°	0	0	0	0	0	



TEST NUMBER: P553912

CATALOG NUMBER: FUSL-12-2-LD4-1HI-35-UNV-80-88-EDD-90

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	618.4	618.4	618.4	618.4	618.4
2.5°	620.1	620.3	618.9	615.1	612.7
5°	617.7	617.5	615.1	611.8	609.9
7.5°	610.8	611.3	610.6	605.8	603.2
10°	604.2	604.4	602.5	598.7	595.6
12.5°	595.6	595.4	592.8	590.9	585.9
15°	582.1	583.5	582.1	579.5	575.4
17.5°	569.0	569.0	570.0	565.5	562.4
20°	554.3	555.0	555.0	551.4	547.9
22.5°	537.2	539.3	540.0	536.2	532.0
25°	517.0	521.0	523.4	519.6	515.1
27.5°	492.5	498.7	505.8	503.0	498.0
30°	465.2	474.2	486.1	483.7	480.2
32.5°	439.3	448.3	464.7	463.8	461.9
35°	415.8	421.5	440.7	443.1	441.4
37.5°	393.4	398.7	416.7	422.2	420.8
40°	369.9	375.6	389.9	399.6	400.1
42.5°	346.6	352.1	363.7	377.8	377.8
45°	321.9	327.4	338.1	353.5	355.4
47.5°	297.7	303.4	313.9	329.3	332.4
50°	273.9	279.2	289.6	304.6	309.3
52.5°	249.2	254.9	265.1	278.9	285.8
55°	225.5	229.3	240.4	253.7	261.1
57.5°	200.8	204.3	216.9	228.3	235.9
60°	177.0	181.5	191.3	202.9	211.7
62.5°	154.2	158.9	167.3	177.5	187.5
65°	132.1	135.7	143.7	154.0	162.7
67.5°	110.7	113.8	121.9	129.0	138.3
70°	89.1	93.1	99.1	106.0	111.9
72.5°	71.8	73.4	78.4	83.4	89.6
75°	53.0	55.8	59.9	62.7	66.3
77.5°	38.0	39.7	42.1	44.4	47.8
80°	25.4	26.1	28.3	28.7	31.4
82.5°	15.4	15.9	16.4	16.6	17.6
85°	8.3	8.3	8.3	7.8	7.8
87.5°	4.8	4.8	4.0	3.3	2.4
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)