

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: P557489

Luminaire Tested: **FUSL-12-4-LD4-2STD-35-UNV-80-84-EDD**

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: P557489
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-12-4-LD4-2STD-35-UNV-80-84-EDD
Description: 4FT FUSL SURFACE MOUNT WITH .125 PRISMATIC ACRYLIC FIXTURE SIDE AND
.125 CLEAR PC ENVIRONMENTAL SIDE LENSES WITH, 80 CRI AND 3500K CCT LEDS
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

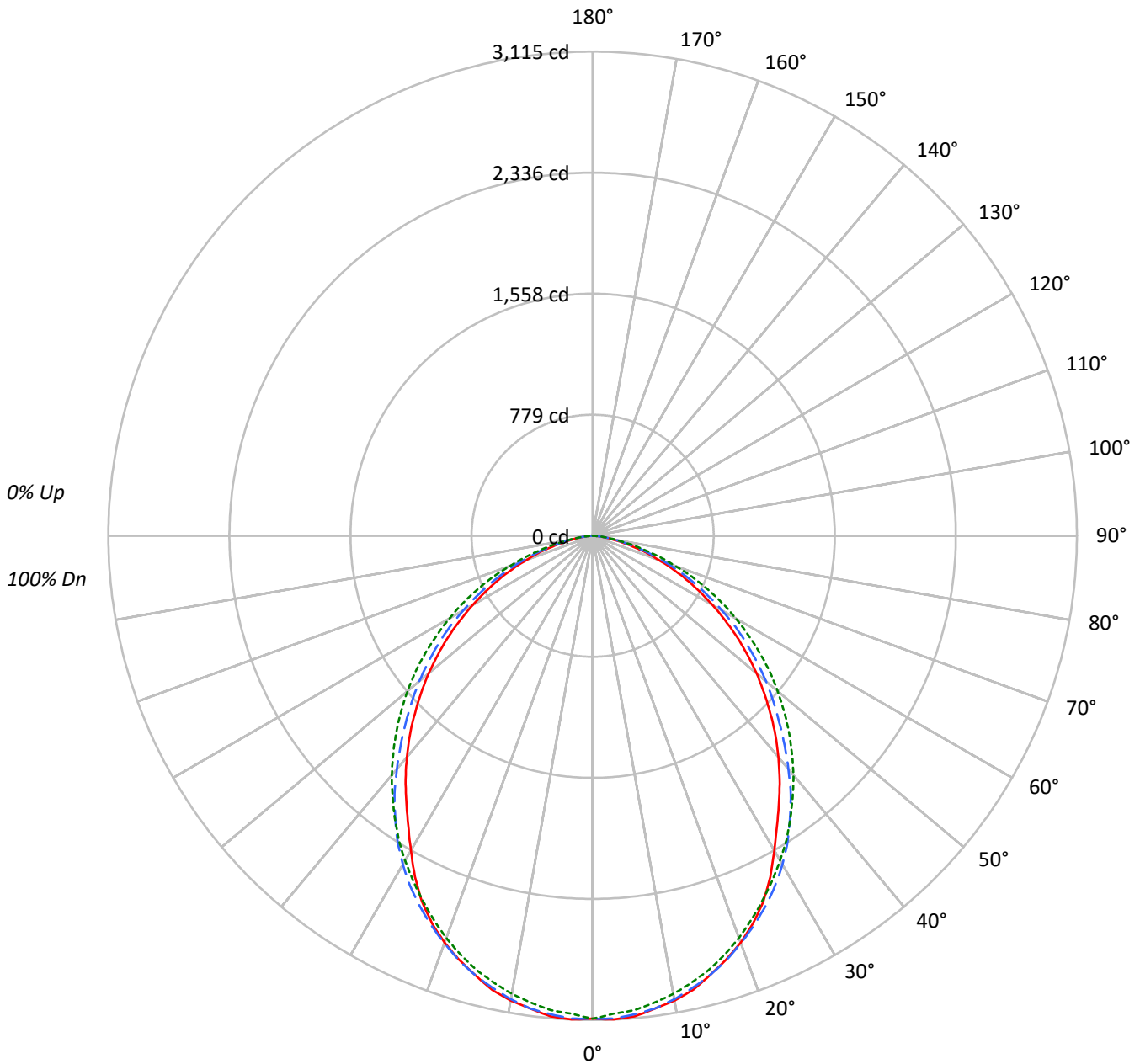
Lumens per Lamp: N/A
Luminaire Lumens: 7184.0 lumens
Efficiency: N/A
Efficacy: 107.9 lumens/watt
Spacing Criteria (0/90/45): 1.13 / 1.16 / 1.26
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 66.6
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

TEST NUMBER: P557489

CATALOG NUMBER: FUSL-12-4-LD4-2STD-35-UNV-80-84-EDD

Luminous Intensity Polar Plot





TEST NUMBER: P557489

CATALOG NUMBER: FUSL-12-4-LD4-2STD-35-UNV-80-84-EDD

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°	8361	8361	8361
5°	8383	8347	8276
10°	8294	8271	8176
15°	8147	8147	8054
20°	7974	7985	7882
25°	7712	7807	7683
30°	7262	7588	7495
35°	6862	7273	7285
40°	6528	6881	7061
45°	6155	6464	6795
50°	5761	6091	6506
55°	5314	5667	6154
60°	4786	5171	5724
65°	4225	4598	5206
70°	3522	3916	4423
75°	2768	3127	3462
80°	1979	2201	2442
85°	1291	1291	1216



TEST NUMBER: P557489

CATALOG NUMBER: FUSL-12-4-LD4-2STD-35-UNV-80-84-EDD

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	292.5	4.1
10°-20°	821.8	11.4
20°-30°	1200.9	16.7
30°-40°	1363.1	19.0
40°-50°	1315.9	18.3
50°-60°	1085.5	15.1
60°-70°	722.9	10.1
70°-80°	323.5	4.5
80°-90°	57.9	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°	2315.2	32.2
0°-40°	3678.3	51.2
0°-60°	6079.8	84.6
0°-90°	7184.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	7184.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3107	3107	3107	3107	3107	
5°	3103	3102	3090	3074	3064	294
15°	2924	2931	2924	2911	2891	824
25°	2597	2618	2630	2610	2588	1189
35°	2089	2117	2214	2226	2218	1309
45°	1617	1645	1698	1776	1786	1248
55°	1133	1152	1208	1275	1312	1011
65°	664	682	722	773	818	658
75°	266	280	301	315	333	291
85°	42	42	42	39	39	56
90°	0	0	0	0	0	



TEST NUMBER: P557489

CATALOG NUMBER: FUSL-12-4-LD4-2STD-35-UNV-80-84-EDD

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3106.9	3106.9	3106.9	3106.9	3106.9
2.5°	3115.2	3116.4	3109.3	3090.2	3078.2
5°	3103.3	3102.1	3090.2	3073.5	3063.9
7.5°	3068.7	3071.1	3067.5	3043.6	3030.5
10°	3035.3	3036.5	3026.9	3007.8	2992.3
12.5°	2992.3	2991.1	2978.0	2968.4	2943.4
15°	2924.3	2931.4	2924.3	2911.1	2890.9
17.5°	2858.6	2858.6	2863.4	2840.7	2825.2
20°	2784.6	2788.2	2788.2	2770.3	2752.4
22.5°	2698.7	2709.4	2713.0	2693.9	2672.4
25°	2597.2	2617.5	2629.5	2610.4	2587.7
27.5°	2474.3	2505.3	2541.1	2526.8	2501.7
30°	2337.0	2382.4	2442.1	2430.1	2412.2
32.5°	2206.9	2252.3	2334.6	2329.9	2320.3
35°	2088.8	2117.4	2214.1	2226.0	2217.7
37.5°	1976.6	2002.8	2093.5	2121.0	2113.8
40°	1858.4	1887.1	1958.7	2007.6	2010.0
42.5°	1741.4	1768.9	1827.4	1897.8	1897.8
45°	1617.3	1644.8	1698.5	1776.1	1785.6
47.5°	1495.6	1524.2	1576.7	1654.3	1669.8
50°	1376.2	1402.5	1455.0	1530.2	1554.0
52.5°	1252.1	1280.7	1332.0	1401.3	1435.9
55°	1132.7	1151.8	1207.9	1274.7	1311.7
57.5°	1008.6	1026.5	1089.7	1147.0	1185.2
60°	889.2	911.9	960.8	1019.3	1063.5
62.5°	774.6	798.5	840.3	891.6	941.7
65°	663.6	681.5	722.1	773.4	817.6
67.5°	556.2	571.7	612.3	648.1	694.7
70°	447.6	467.9	497.7	532.3	562.2
72.5°	360.5	368.8	393.9	418.9	450.0
75°	266.2	280.5	300.8	315.1	333.0
77.5°	191.0	199.3	211.3	223.2	239.9
80°	127.7	131.3	142.0	144.4	157.6
82.5°	77.6	80.0	82.4	83.6	88.3
85°	41.8	41.8	41.8	39.4	39.4
87.5°	23.9	23.9	20.3	16.7	11.9
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)