

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: P550628

Luminaire Tested: **FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D**

Issue Date: 7/9/2021

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: P550628
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2105-248-1)
Test Lab: INNOVATION CENTER
Issue Date: 7/9/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D
Description: FCC CORNER MOUNT LUMINAIRE WITH .125 PRISMATIC ACRYLIC FIXTURE SIDE AND .250 CLEAR TEMPERED GLASS ENVIRONMENTAL SIDE LENSES AND 5000K, AND 80 CRI LEDS
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

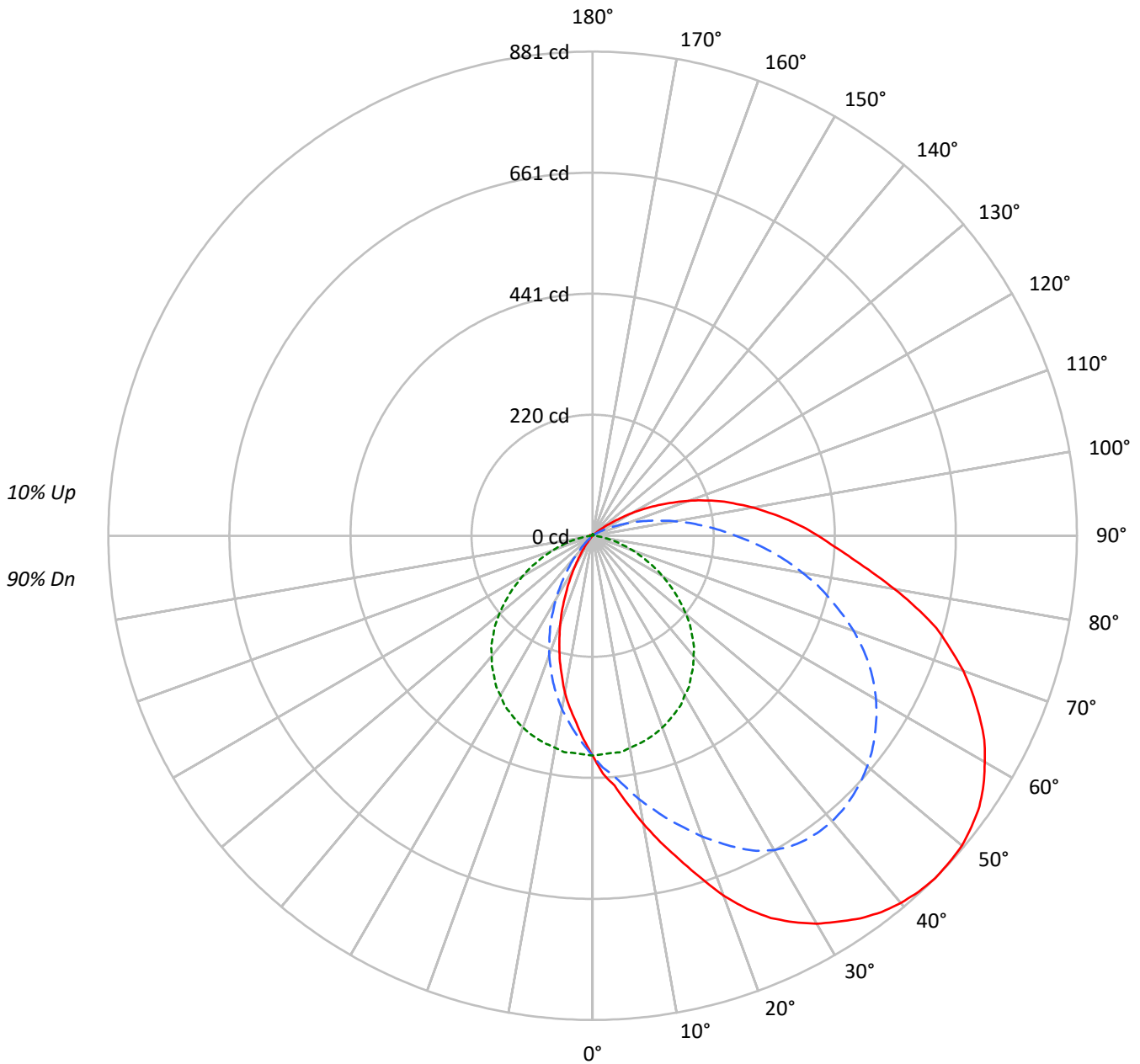
Lumens per Lamp: N/A
Luminaire Lumens: 1975.9 lumens
Efficiency: N/A
Efficacy: 91.1 lumens/watt
Spacing Criteria (0/90/45): 1.66 / 1.25 / 1.59
Luminous Opening: Rectangular w/ Sides (W: 2' x L: 0.5' x H: 0.25')
CIE Type: Semi-Direct

Input Watts (W): 21.7
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

TEST NUMBER: P550628

CATALOG NUMBER: FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D

Luminous Intensity Polar Plot





TEST NUMBER: P550628

CATALOG NUMBER: FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D

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	117	117	117	117	113	113	113	113	105	105	105	99	99	99	93	93	93	90																			
1	103	96	91	86	99	93	88	83	87	83	79	81	78	74	76	73	70	67																			
2	92	82	74	67	88	79	72	65	74	67	62	69	64	59	64	60	56	53																			
3	83	71	61	54	79	68	60	53	64	56	50	59	53	48	55	50	46	43																			
4	75	62	52	44	72	60	51	44	56	48	42	52	45	40	49	43	38	36																			
5	69	55	45	38	66	53	44	37	50	42	35	46	39	34	43	38	33	30																			
6	63	49	39	32	61	47	38	32	44	36	31	42	35	29	39	33	28	26																			
7	58	44	35	28	56	43	34	28	40	32	27	38	31	26	36	29	25	23																			
8	54	40	31	25	52	39	30	24	37	29	24	34	28	23	32	26	22	20																			
9	51	36	28	22	49	35	27	22	33	26	21	32	25	20	30	24	20	18																			
10	47	33	25	20	45	33	25	19	31	24	19	29	23	18	28	22	18	16																			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	4302	4302	4302
5°	4723	4239	3537
10°	5345	4188	2915
15°	5990	4134	2272
20°	6756	4067	1673
25°	7390	3988	1099
30°	7862	3883	619
35°	8271	3771	273
40°	8633	3632	65
45°	8945	3459	0
50°	9206	3228	0
55°	9405	2935	0
60°	9504	2594	0
65°	9544	2209	0
70°	9511	1801	0
75°	9391	1327	7
80°	9010	813	40
85°	8709	386	57



TEST NUMBER: P550628

CATALOG NUMBER: FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	38.3	1.9
10°-20°	114.6	5.8
20°-30°	185.6	9.4
30°-40°	238.5	12.1
40°-50°	269.9	13.7
50°-60°	279.7	14.2
60°-70°	263.8	13.3
70°-80°	221.0	11.2
80°-90°	160.2	8.1
90°-100°	105.3	5.3
100°-110°	60.8	3.1
110°-120°	26.8	1.4
120°-130°	7.2	0.4
130°-140°	1.6	0.1
140°-150°	1.1	0.1
150°-160°	0.8	0.0
160°-170°	0.4	0.0
170°-180°	0.2	0.0
0°-30°	338.6	17.1
0°-40°	577.0	29.2
0°-60°	1126.7	57.0
0°-90°	1771.6	89.7
90°-120°	192.9	9.8
90°-150°	202.9	10.3
90°-180°	204.0	10.3
0°-180°	1975.9	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	400	400	400	400	400	
5°	456	438	397	360	342	46
15°	610	534	383	277	231	176
25°	767	627	355	182	114	355
35°	850	676	312	89	28	533
45°	881	669	256	20	0	680
55°	859	627	184	0	0	767
65°	776	555	110	0	0	768
75°	647	448	47	0	0	679
85°	474	325	8	2	3	404
90°	410	260	2	3	4	225
95°	352	203	1	4	5	276
105°	242	105	1	2	4	256
115°	132	35	2	2	2	132
125°	39	5	2	2	2	39
135°	2	2	2	2	2	4
145°	0	2	2	2	2	0
155°	1	2	2	2	0	0
165°	1	2	2	2	0	0
175°	1	2	2	2	0	0
180°	2	2	2	2	2	



TEST NUMBER: P550628

CATALOG NUMBER: FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D

CANDELA DISTRIBUTION (FULL):

	0°	10°	20°	30°	40°	50°	60°	70°	80°	90°	112.5°
0°	399.7	399.7	399.7	399.7	399.7	399.7	399.7	399.7	399.7	399.7	399.7
2.5°	433.3	432.8	431.3	428.7	425.2	419.0	414.0	409.4	403.3	398.2	388.5
5°	456.2	453.7	451.6	449.1	440.9	435.3	426.2	416.0	406.3	396.6	377.3
7.5°	492.9	488.8	485.7	478.6	467.4	454.7	440.4	430.8	424.1	397.2	364.1
10°	532.1	528.5	522.4	509.7	495.9	477.6	457.2	434.3	414.0	391.6	352.3
12.5°	570.8	565.7	557.0	540.7	521.4	498.5	470.5	443.5	414.5	388.0	338.6
15°	609.5	603.9	594.7	574.9	549.4	519.4	485.2	451.1	417.0	383.4	324.3
17.5°	651.7	644.1	630.4	607.9	575.9	538.7	498.5	457.2	416.0	377.8	309.1
20°	697.1	686.4	671.6	641.6	603.9	560.1	511.7	463.3	415.5	371.2	291.8
22.5°	734.7	724.0	707.7	676.7	631.4	577.9	522.9	467.4	413.4	363.5	275.5
25°	767.3	758.7	740.8	705.2	657.3	596.7	533.6	470.5	410.4	355.4	258.1
27.5°	792.8	784.6	764.8	728.1	679.2	613.5	541.8	472.0	406.3	347.3	240.3
30°	815.2	807.0	783.1	745.4	694.0	626.8	549.9	472.5	401.2	335.0	221.0
32.5°	832.5	824.9	800.4	760.2	704.2	636.0	554.5	472.0	394.6	326.4	200.1
35°	849.8	842.2	813.7	770.9	711.8	640.0	558.0	469.5	386.5	312.1	180.2
37.5°	863.0	854.4	825.4	778.0	715.4	641.0	557.5	465.9	377.8	300.4	160.4
40°	872.2	863.0	832.0	782.1	716.4	639.5	553.5	459.8	367.6	285.6	139.5
42.5°	878.3	868.1	835.0	788.2	714.4	635.4	547.4	452.1	356.4	272.9	119.7
45°	881.4	870.7	835.5	783.1	710.8	627.8	538.2	442.5	344.2	255.6	99.8
47.5°	879.8	868.1	833.0	777.5	704.2	619.7	528.0	430.8	329.4	240.3	81.0
50°	877.3	865.1	827.4	770.4	695.0	609.5	516.8	416.5	314.2	221.5	64.2
52.5°	869.2	856.9	821.3	760.2	684.3	597.8	501.5	401.7	297.9	203.2	48.9
55°	859.0	847.8	810.6	751.0	670.6	583.5	487.3	385.9	282.1	184.3	35.1
57.5°	843.2	833.0	797.4	736.3	656.8	567.7	471.5	368.6	262.2	165.5	24.4
60°	823.8	813.7	779.0	719.5	641.0	549.9	454.2	350.8	244.4	146.6	15.3
62.5°	803.5	793.8	757.6	698.6	621.2	531.1	435.3	333.0	225.6	129.3	9.2
65°	776.5	767.3	734.7	673.6	599.3	510.7	414.5	311.6	206.2	110.0	5.1
67.5°	748.0	739.8	706.7	650.7	573.8	488.3	393.1	290.7	185.8	93.2	2.5
70°	717.4	707.2	676.7	619.7	547.9	462.8	369.7	269.4	166.5	76.9	0.0
72.5°	681.8	674.1	644.6	590.6	517.8	435.8	345.7	245.9	145.1	61.1	0.5
75°	647.2	637.5	610.5	559.6	488.3	407.3	319.2	224.0	124.2	46.8	0.5
77.5°	602.3	599.3	573.8	524.4	460.3	379.8	290.2	197.6	104.4	33.6	0.5
80°	557.5	554.5	534.6	489.3	427.7	347.3	263.2	172.6	85.0	22.4	0.5
82.5°	513.2	509.2	490.3	452.7	394.6	319.8	235.2	147.7	67.2	13.7	0.5
85°	473.5	468.4	448.1	413.4	360.5	288.7	206.2	123.2	49.9	7.6	1.0
87.5°	439.4	435.8	413.4	377.8	325.9	259.7	180.8	99.8	35.1	3.6	1.5
90°	410.4	402.8	382.9	345.2	293.3	227.6	153.8	79.9	23.4	2.0	2.0
92.5°	381.9	375.3	353.4	314.7	264.3	200.1	127.8	61.1	14.8	1.0	2.5
95°	352.3	345.2	323.8	288.2	234.7	172.1	104.9	44.8	8.1	1.0	2.5
97.5°	323.3	316.7	294.3	258.7	208.2	147.7	83.0	31.6	4.1	1.0	2.0
100°	296.3	288.7	268.3	232.7	181.8	123.2	64.2	20.4	2.5	1.0	2.0
102.5°	267.8	261.7	240.8	206.2	154.3	100.3	47.9	12.7	1.0	1.0	1.5
105°	242.4	234.7	214.4	178.7	131.4	78.9	33.6	7.6	1.0	1.0	1.5



TEST NUMBER: P550628

CATALOG NUMBER: FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D

CANDELA DISTRIBUTION (continued):

	0°	10°	20°	30°	40°	50°	60°	70°	80°	90°	112.5°
112.5°	157.8	151.7	133.9	103.9	66.7	31.1	9.2	1.5	1.5	1.5	1.5
115°	131.9	122.7	106.9	80.4	49.4	20.4	4.6	1.5	1.5	1.5	1.5
117.5°	105.4	97.8	86.6	61.1	32.6	13.2	2.5	1.5	1.5	1.5	1.5
120°	82.5	75.4	62.6	42.3	21.9	7.6	1.0	1.5	1.5	1.5	1.5
122.5°	59.1	53.5	42.3	27.5	13.2	3.6	1.5	1.5	2.0	2.0	1.5
125°	39.2	36.2	28.0	16.8	8.1	1.5	1.5	1.5	2.0	2.0	1.5
127.5°	25.5	22.9	16.3	9.7	3.6	1.5	1.5	2.0	2.0	2.0	1.5
130°	14.3	12.7	9.7	5.6	1.5	1.5	1.5	2.0	2.0	2.0	1.5
132.5°	8.1	7.6	5.1	1.0	1.5	1.5	1.5	2.0	2.0	2.0	2.0
135°	2.0	1.0	1.0	1.0	1.5	1.5	2.0	2.0	2.5	2.5	2.0
137.5°	0.5	0.5	1.0	1.0	1.5	1.5	2.0	2.5	2.5	2.5	2.0
140°	0.5	0.5	1.0	1.5	1.5	1.5	2.0	2.5	2.5	2.5	2.0
142.5°	0.5	1.0	1.0	1.5	1.5	2.0	2.0	2.5	2.5	2.0	2.0
145°	0.5	1.0	1.0	1.5	1.5	2.0	2.0	2.5	2.0	2.0	2.0
147.5°	1.0	1.0	1.0	1.5	1.5	2.0	2.0	2.5	2.5	2.0	2.0
150°	0.5	1.0	1.0	1.5	2.0	2.0	2.0	2.5	2.0	2.0	2.0
152.5°	0.5	1.0	1.0	1.5	2.0	2.0	2.0	2.5	2.0	2.0	2.0
155°	1.0	1.0	1.0	1.5	2.0	2.0	2.0	2.5	2.0	2.0	2.5
157.5°	1.0	1.0	1.0	1.5	2.0	2.0	2.0	2.5	2.0	2.0	2.5
160°	1.0	1.0	1.0	1.5	1.5	2.0	2.0	2.0	2.0	2.0	2.0
162.5°	1.0	1.0	1.0	1.5	1.5	2.0	2.0	2.0	2.0	2.0	2.0
165°	1.0	1.0	1.0	1.0	1.5	1.5	2.0	2.0	2.0	2.0	2.0
167.5°	1.0	1.0	1.0	1.5	1.5	1.5	2.0	2.0	2.0	2.0	2.0
170°	1.0	1.0	1.0	1.5	1.5	1.5	2.0	2.5	2.5	2.5	2.5
172.5°	1.0	1.0	1.0	1.5	1.5	2.0	2.0	2.5	2.5	2.5	2.5
175°	1.0	1.0	1.0	1.5	1.5	2.0	2.0	2.5	2.5	2.5	2.5
177.5°	0.5	1.0	1.0	1.5	1.5	2.0	2.0	2.5	2.5	2.5	2.0
180°	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5



TEST NUMBER: P550628

CATALOG NUMBER: FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D

CANDELA DISTRIBUTION (continued):

	135°	157.5°	180°
0°	399.7	399.7	399.7
2.5°	380.3	373.2	371.2
5°	360.0	348.3	341.7
7.5°	339.6	323.8	316.2
10°	320.8	298.4	290.2
12.5°	298.4	272.4	259.7
15°	277.0	243.4	231.2
17.5°	253.1	215.4	201.1
20°	230.7	187.4	172.6
22.5°	205.2	159.9	143.6
25°	182.3	132.4	114.1
27.5°	156.8	104.4	88.6
30°	132.9	79.9	64.2
32.5°	110.0	58.6	44.3
35°	88.6	39.7	28.0
37.5°	68.2	24.4	14.3
40°	49.4	12.7	6.6
42.5°	33.1	6.1	3.6
45°	20.4	3.1	0.0
47.5°	11.7	0.0	0.0
50°	6.1	0.0	0.0
52.5°	2.5	0.0	0.0
55°	0.0	0.0	0.0
57.5°	0.0	0.0	0.0
60°	0.0	0.0	0.0
62.5°	0.0	0.0	0.0
65°	0.0	0.0	0.0
67.5°	0.0	0.0	0.0
70°	0.0	0.0	0.0
72.5°	0.0	0.0	0.0
75°	0.5	0.5	0.5
77.5°	0.5	1.0	1.5
80°	1.0	2.0	2.5
82.5°	2.0	2.5	2.5
85°	2.0	2.5	3.1
87.5°	2.5	3.1	3.6
90°	3.1	3.6	3.6
92.5°	3.1	4.1	4.1
95°	3.6	4.1	4.6
97.5°	4.1	4.6	4.6
100°	3.6	4.6	5.1
102.5°	3.1	4.6	4.6
105°	2.5	3.6	4.1



TEST NUMBER: P550628

CATALOG NUMBER: FCC-X-2-LD4-1HI-50-UNV-80-96-ED1D

CANDELA DISTRIBUTION (continued):

	135°	157.5°	180°
112.5°	2.0	2.5	2.5
115°	1.5	2.0	2.5
117.5°	1.5	2.0	2.0
120°	1.5	1.5	2.0
122.5°	1.5	1.5	2.0
125°	1.5	1.5	2.0
127.5°	2.0	1.5	1.5
130°	1.5	1.5	1.5
132.5°	2.0	1.5	1.5
135°	2.0	1.5	1.5
137.5°	2.0	1.5	1.5
140°	2.0	1.5	1.5
142.5°	2.0	1.5	1.5
145°	1.5	1.5	1.5
147.5°	1.5	1.5	1.5
150°	1.5	1.5	1.0
152.5°	1.5	1.0	1.0
155°	1.5	1.0	0.5
157.5°	2.0	1.0	0.5
160°	1.5	1.0	0.5
162.5°	1.5	1.0	0.5
165°	1.5	1.0	0.0
167.5°	1.5	1.0	0.5
170°	1.5	1.0	0.5
172.5°	1.5	1.0	0.5
175°	1.5	0.5	0.5
177.5°	1.5	0.5	0.5
180°	1.5	1.5	1.5



Report Generated By 670246072 / DESKTOP-MV3F9LC





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







107.5°	213.9	207.7	187.4	153.8	107.4	60.1	22.4	4.1	1.0	1.5	1.5
110°	186.4	181.3	160.4	127.8	86.6	44.8	14.8	2.5	1.5	1.5	1.5





107.5°	2.0	3.1	3.6
110°	2.0	2.5	3.1



(END OF REPORT)