

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: P520704

Luminaire Tested: **8WSLA-175-L835-UPL8-UNV-U**

Issue Date: 5/3/2021

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: P520704
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2103-174-3)
Test Lab: INNOVATION CENTER
Issue Date: 5/3/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: 8WSLA-175-L835-UPL8-UNV-U
Description: 8 FOOT, 3500 LUMEN PER FOOT, WSLA LED LUMINAIRE WITH 3500K, 80 CRI
LEDS WITH 8% UPLIGHT
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

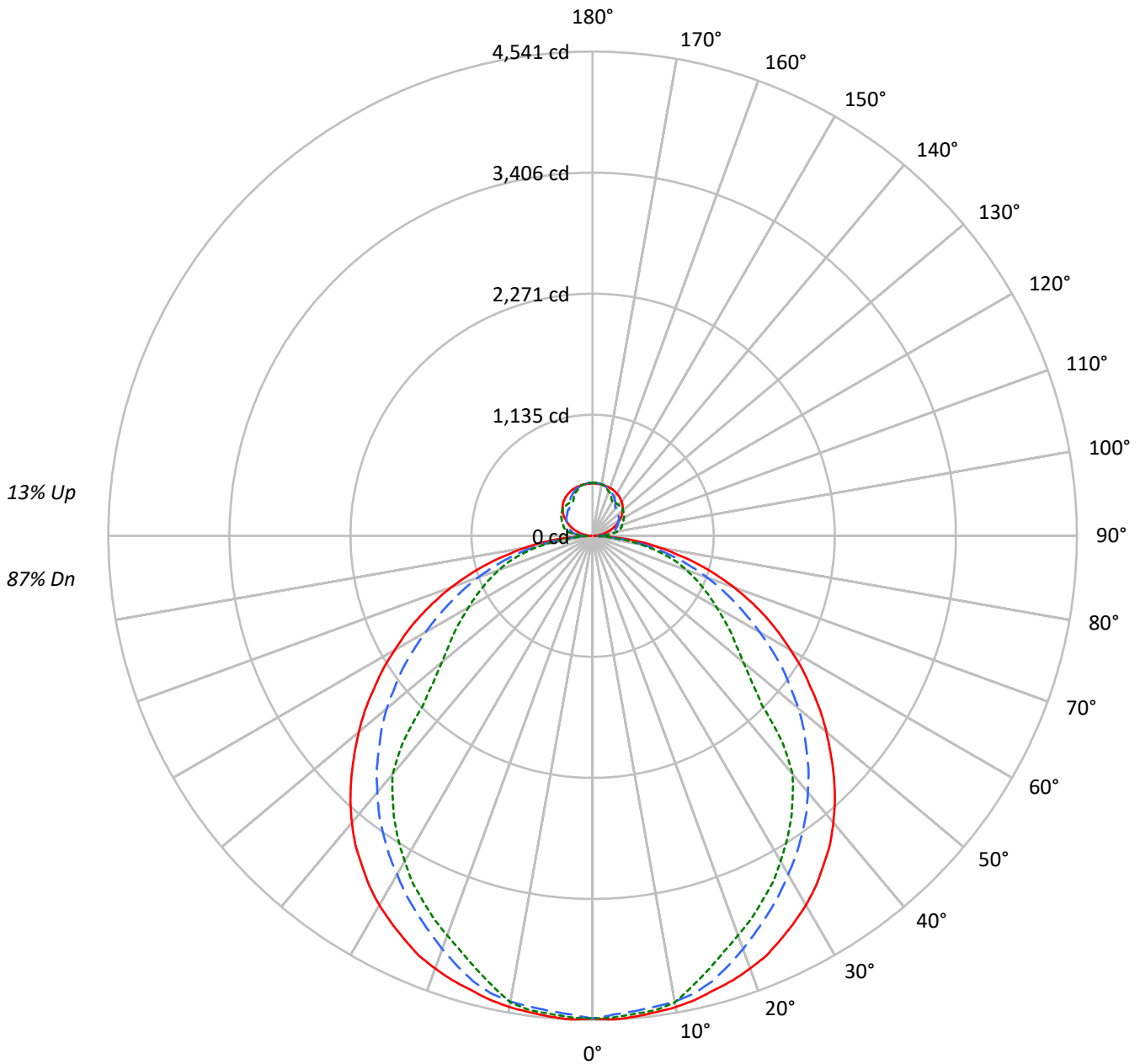
Lumens per Lamp: N/A
Luminaire Lumens: 14091.0 lumens
Efficiency: N/A
Efficacy: 118.4 lumens/watt
Spacing Criteria (0/90/45): 1.31 / 1.17 / 1.33
Luminous Opening: Rectangular (W 0.5' x L: 8' x H: 0')
CIE Type: Semi-Direct

Input Watts (W): 119
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				20				
RC	80				70				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	116	116	116	116	112	112	112	112	104	104	104	97	97	97	90	90	90	87			87
1	106	101	97	93	102	98	94	90	91	88	85	85	83	80	79	78	76	73			73
2	96	88	82	76	92	85	79	74	80	75	70	74	70	67	70	66	64	61			61
3	88	78	70	63	84	75	68	62	70	64	59	66	61	56	62	58	54	51			51
4	80	69	60	54	77	67	59	53	62	56	50	59	53	48	55	50	46	44			44
5	74	61	53	46	71	60	51	45	56	49	44	53	47	42	50	45	40	38			38
6	68	55	47	40	66	54	46	40	51	44	38	48	42	37	45	40	36	33			33
7	63	50	42	36	61	49	41	35	46	39	34	43	37	33	41	36	32	30			30
8	59	46	37	32	57	44	37	31	42	35	30	40	34	29	38	32	28	26			26
9	55	42	34	28	53	41	33	28	39	32	27	37	31	26	35	30	26	24			24
10	52	39	31	26	50	38	30	25	36	29	25	34	28	24	32	27	23	22			22

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	12184	12184	12184
5°	12231	12090	12160
10°	12265	12123	12141
15°	12287	12051	11724
20°	12369	11810	11417
25°	12399	11587	11200
30°	12429	11397	10952
35°	12392	11236	10658
40°	12335	11031	10253
45°	12173	10785	8554
50°	11973	10555	7719
55°	11737	10208	7427
60°	11536	9747	7223
65°	11366	9333	7218
70°	11072	8970	7330
75°	10567	8535	7383
80°	9893	7672	6865
85°	9053	5431	4625



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	428.6	3.0
10°-20°	1218.6	8.6
20°-30°	1820.9	12.9
30°-40°	2173.6	15.4
40°-50°	2173.8	15.4
50°-60°	1881.3	13.4
60°-70°	1444.0	10.2
70°-80°	884.8	6.3
80°-90°	249.1	1.8
90°-100°	140.8	1.0
100°-110°	223.5	1.6
110°-120°	261.3	1.9
120°-130°	282.1	2.0
130°-140°	277.9	2.0
140°-150°	245.9	1.7
150°-160°	202.3	1.4
160°-170°	135.4	1.0
170°-180°	47.2	0.3
0°-30°	3468.1	24.6
0°-40°	5641.8	40.0
0°-60°	9696.9	68.8
0°-90°	12274.8	87.1
90°-120°	625.5	4.4
90°-150°	1431.3	10.2
90°-180°	1816.0	12.9
0°-180°	14091.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	4528	4528	4528	4528	4528	
5°	4528	4515	4476	4508	4502	431
15°	4410	4404	4326	4248	4208	1248
25°	4176	4124	3902	3798	3772	1927
35°	3772	3674	3420	3296	3244	2362
45°	3199	3108	2834	2580	2248	2467
55°	2502	2443	2176	1739	1583	2243
65°	1785	1720	1466	1179	1134	1763
75°	1016	964	821	710	710	1072
85°	293	241	176	150	150	306
90°	13	46	72	91	98	21
95°	52	111	150	156	156	51
105°	150	156	222	261	274	157
115°	248	208	261	300	319	242
125°	332	267	300	345	358	296
135°	397	358	332	365	384	307
145°	443	424	371	365	378	276
155°	469	462	436	417	410	216
165°	482	489	476	476	476	137
175°	489	495	495	502	502	47
180°	495	495	495	495	495	



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CATALOG NUMBER: 8WSLA-175-L835-UPL8-UNV-U

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	4527.8	4527.8	4527.8	4527.8	4527.8
2.5°	4540.8	4527.8	4495.2	4527.8	4521.3
5°	4527.8	4514.7	4475.7	4508.2	4501.7
7.5°	4508.2	4495.2	4456.1	4495.2	4488.7
10°	4488.7	4475.7	4436.6	4462.6	4443.1
12.5°	4456.1	4443.1	4397.5	4364.9	4325.8
15°	4410.5	4404.0	4325.8	4247.6	4208.5
17.5°	4371.4	4351.9	4228.1	4136.9	4091.3
20°	4319.3	4286.7	4123.9	4019.6	3987.0
22.5°	4260.7	4208.5	4013.1	3915.4	3889.3
25°	4176.0	4123.9	3902.4	3798.1	3772.1
27.5°	4091.3	4026.1	3791.6	3687.4	3661.3
30°	4000.1	3908.9	3667.8	3570.1	3524.5
32.5°	3895.8	3804.6	3550.6	3439.8	3387.7
35°	3772.1	3674.3	3420.3	3296.5	3244.4
37.5°	3654.8	3550.6	3290.0	3153.2	3081.5
40°	3511.5	3407.2	3140.1	2990.3	2918.6
42.5°	3361.6	3263.9	2996.8	2814.4	2638.5
45°	3198.8	3107.5	2833.9	2579.9	2247.6
47.5°	3029.4	2951.2	2684.1	2338.8	2019.6
50°	2860.0	2781.8	2521.2	2110.8	1843.7
52.5°	2690.6	2625.5	2338.8	1921.9	1700.4
55°	2501.7	2443.0	2175.9	1739.4	1583.1
57.5°	2332.3	2273.7	1987.0	1589.6	1459.3
60°	2143.4	2091.2	1811.1	1439.8	1342.0
62.5°	1967.5	1908.8	1635.2	1309.5	1237.8
65°	1785.0	1719.9	1465.8	1179.2	1133.6
67.5°	1596.1	1531.0	1303.0	1061.9	1035.8
70°	1407.2	1355.1	1140.1	944.6	931.6
72.5°	1211.7	1153.1	977.2	833.9	833.9
75°	1016.3	964.2	820.9	710.1	710.1
77.5°	814.3	788.3	658.0	579.8	586.3
80°	638.4	605.9	495.1	443.0	443.0
82.5°	469.1	430.0	332.3	293.2	306.2
85°	293.2	241.0	175.9	149.8	149.8
87.5°	91.2	71.7	52.1	58.6	58.6
90°	13.0	45.6	71.7	91.2	97.7
92.5°	32.6	84.7	104.2	123.8	130.3
95°	52.1	110.8	149.8	156.4	156.4
97.5°	71.7	123.8	182.4	208.5	208.5
100°	97.7	130.3	195.4	234.5	241.0
102.5°	123.8	143.3	208.5	247.6	260.6
105°	149.8	156.4	221.5	260.6	273.6



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	221.5	195.4	247.6	293.2	306.2
115°	247.6	208.5	260.6	299.7	319.2
117.5°	267.1	228.0	273.6	312.7	325.7
120°	286.7	241.0	280.1	325.7	338.8
122.5°	312.7	254.1	293.2	332.3	351.8
125°	332.3	267.1	299.7	345.3	358.3
127.5°	351.8	293.2	306.2	351.8	364.8
130°	364.8	319.2	312.7	358.3	371.3
132.5°	384.4	338.8	319.2	364.8	377.9
135°	397.4	358.3	332.3	364.8	384.4
137.5°	410.4	377.9	332.3	364.8	377.9
140°	423.5	397.4	338.8	364.8	377.9
142.5°	430.0	410.4	345.3	364.8	377.9
145°	443.0	423.5	371.3	364.8	377.9
147.5°	449.5	436.5	390.9	364.8	377.9
150°	456.0	449.5	410.4	371.3	371.3
152.5°	462.5	456.0	423.5	397.4	384.4
155°	469.1	462.5	436.5	416.9	410.4
157.5°	475.6	475.6	449.5	436.5	430.0
160°	475.6	482.1	462.5	449.5	443.0
162.5°	482.1	488.6	469.1	462.5	456.0
165°	482.1	488.6	475.6	475.6	475.6
167.5°	488.6	495.1	488.6	482.1	482.1
170°	488.6	495.1	488.6	488.6	488.6
172.5°	488.6	495.1	495.1	495.1	495.1
175°	488.6	495.1	495.1	501.6	501.6
177.5°	488.6	495.1	495.1	495.1	495.1
180°	495.1	495.1	495.1	495.1	495.1



Report Generated By 670246072 / DESKTOP-MV3F9LC





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







107.5°	175.9	169.4	228.0	273.6	286.7
110°	195.4	182.4	241.0	280.1	293.2



(END OF REPORT)