

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: P520657

Luminaire Tested: **8WSLA-125-L840-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: P520657
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2002-689-5)
Test Lab: INNOVATION CENTER
Issue Date: 5/3/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: 8WSLA-125-L840-UNV-U
Description: 8 FOOT, 2500 LUMEN PER FOOT, WSLA LED LUMINAIRE WITH 4000K, 80 CRI
LEDS WITH NO UPLIGHT
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

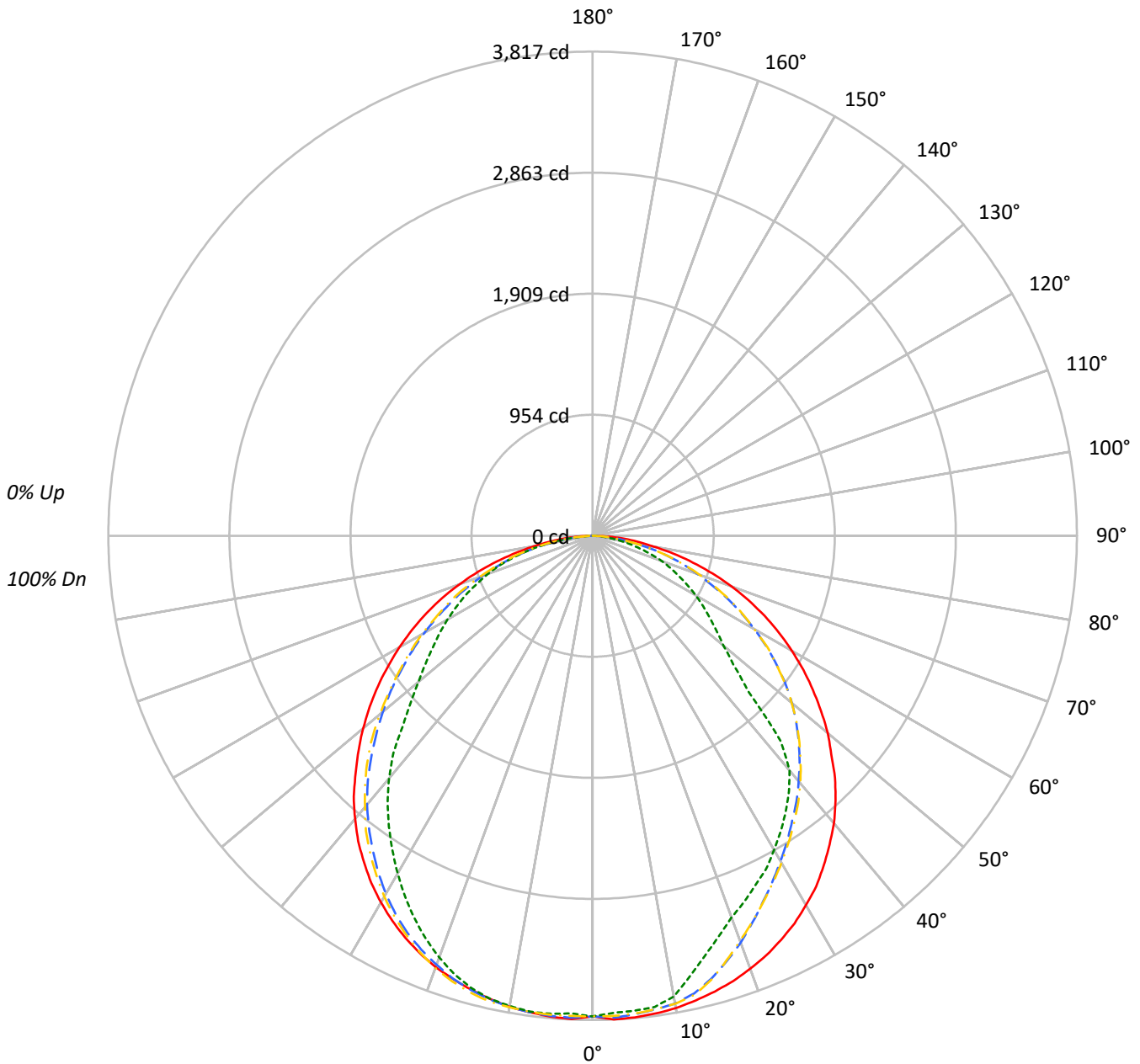
Lumens per Lamp: N/A
Luminaire Lumens: 10164.0 lumens
Efficiency: N/A
Efficacy: 130.0 lumens/watt
Spacing Criteria (0/90/45): 1.31 / 1.17 / 1.33
Luminous Opening: Rectangular (W 0.5' x L: 8' x H: 0')
CIE Type: Direct

Input Watts (W): 78.2
Input Voltage (V): NR
Input Current (A_{in}): 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	109	104	100	96	106	102	98	95	98	95	92	94	91	89	90	88	86	84																			
2	99	91	84	79	97	89	83	78	86	80	76	82	78	74	79	76	73	70																			
3	91	80	72	66	88	79	71	65	76	69	64	73	67	63	70	66	62	60																			
4	83	71	62	56	81	70	62	55	67	60	55	65	59	54	63	58	53	51																			
5	76	64	55	48	74	63	54	48	60	53	47	58	52	47	57	51	46	44																			
6	71	57	49	42	69	56	48	42	55	47	42	53	46	41	51	46	41	39																			
7	66	52	43	37	64	51	43	37	50	42	37	48	42	37	47	41	36	34																			
8	61	48	39	33	60	47	39	33	46	38	33	44	38	33	43	37	33	31																			
9	57	44	36	30	56	43	35	30	42	35	30	41	34	30	40	34	30	28																			
10	54	40	33	27	52	40	32	27	39	32	27	38	32	27	37	31	27	25																			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	10196	10196	10196	10196
5°	10295	10152	10279	10218
10°	10331	10075	10303	10286
15°	10363	9542	10317	10283
20°	10402	9168	10361	10128
25°	10435	9016	10381	9874
30°	10447	8886	10371	9550
35°	10430	8714	10323	9195
40°	10396	8483	10232	8768
45°	10280	6591	10048	8045
50°	10126	5642	9880	7505
55°	9946	5283	9689	7219
60°	9758	5043	9463	7100
65°	9526	4776	9202	7015
70°	9148	4542	8764	6909
75°	8516	3995	8115	6572
80°	7559	3340	7087	5576
85°	7154	2384	6277	3202



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	360.0	3.5
10°-20°	1026.8	10.1
20°-30°	1534.3	15.1
30°-40°	1826.4	18.0
40°-50°	1825.6	18.0
50°-60°	1570.9	15.5
60°-70°	1182.3	11.6
70°-80°	673.7	6.6
80°-90°	164.0	1.6
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°	2921.1	28.7
0°-40°	4747.5	46.7
0°-60°	8143.9	80.1
0°-90°	10164.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	10164.0	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	3789	3789	3789	3789	3789	
5°	3811	3758	3805	3783	3811	363
15°	3720	3425	3703	3691	3720	1051
25°	3514	3037	3496	3325	3514	1621
35°	3175	2653	3142	2799	3175	1987
45°	2701	1732	2640	2114	2701	2080
55°	2120	1126	2065	1539	2120	1895
65°	1496	750	1445	1102	1496	1477
75°	819	384	780	632	819	867
85°	232	77	203	104	232	252
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
0°	3788.8	3788.8	3788.8	3788.8	3788.8	3788.8	3788.8	3788.8	3788.8	3788.8	3788.8
2.5°	3817.3	3782.7	3803.0	3796.9	3764.4	3776.6	3788.8	3776.6	3813.2	3780.7	3803.0
5°	3811.2	3774.6	3786.8	3774.6	3758.3	3762.4	3780.7	3768.5	3805.1	3770.5	3799.0
7.5°	3799.0	3754.2	3766.4	3760.3	3746.1	3748.2	3766.4	3756.3	3788.8	3756.3	3788.8
10°	3780.7	3733.9	3744.1	3717.7	3687.2	3709.5	3746.1	3736.0	3770.5	3733.9	3770.5
12.5°	3752.2	3705.5	3695.3	3607.9	3553.0	3595.7	3707.5	3707.5	3740.0	3705.5	3744.1
15°	3719.7	3668.9	3614.0	3481.9	3425.0	3467.6	3622.1	3675.0	3703.4	3668.9	3707.5
17.5°	3681.1	3622.1	3516.4	3362.0	3309.1	3351.8	3510.3	3626.2	3662.8	3626.2	3660.7
20°	3632.3	3563.2	3412.8	3235.9	3201.4	3240.0	3398.5	3567.2	3618.1	3573.3	3597.7
22.5°	3579.4	3496.1	3296.9	3138.4	3122.1	3146.5	3290.8	3494.1	3561.1	3514.4	3530.7
25°	3514.4	3416.8	3181.1	3048.9	3036.7	3051.0	3185.1	3408.7	3496.1	3447.3	3453.4
27.5°	3445.3	3339.6	3071.3	2973.7	2961.5	2967.6	3079.4	3313.2	3420.9	3372.1	3362.0
30°	3362.0	3248.1	2961.5	2872.1	2859.9	2882.3	2977.8	3215.6	3337.6	3288.8	3258.3
32.5°	3278.6	3148.5	2853.8	2784.7	2760.3	2780.6	2872.1	3114.0	3246.1	3195.3	3144.5
35°	3175.0	3042.8	2742.0	2672.9	2652.6	2674.9	2766.4	3008.3	3142.4	3091.6	3022.5
37.5°	3067.2	2931.0	2640.4	2577.4	2540.8	2567.2	2658.7	2898.5	3034.7	2981.9	2896.5
40°	2959.5	2813.1	2526.5	2461.5	2414.8	2453.4	2546.9	2782.7	2912.7	2864.0	2766.4
42.5°	2833.5	2695.3	2414.8	2323.3	2191.2	2315.2	2426.9	2666.8	2786.7	2740.0	2622.1
45°	2701.4	2569.2	2296.9	2075.3	1731.8	2095.6	2305.0	2544.8	2640.4	2595.7	2467.6
47.5°	2550.9	2439.1	2176.9	1839.5	1506.2	1859.8	2181.0	2429.0	2502.2	2453.4	2311.1
50°	2418.8	2309.1	2050.9	1640.3	1347.6	1662.7	2048.9	2298.9	2359.9	2315.2	2156.6
52.5°	2268.4	2172.9	1914.7	1463.5	1229.7	1485.8	1910.7	2164.7	2213.5	2160.7	2002.1
55°	2120.0	2034.7	1770.4	1307.0	1126.1	1327.3	1766.3	2026.5	2065.1	2004.2	1839.5
57.5°	1969.6	1892.4	1622.0	1166.7	1030.5	1189.1	1632.2	1884.2	1910.7	1833.4	1683.0
60°	1813.1	1748.1	1471.6	1042.7	937.0	1061.0	1467.6	1742.0	1758.2	1674.9	1530.6
62.5°	1656.6	1597.6	1321.2	928.9	841.5	941.1	1331.4	1591.5	1601.7	1522.4	1374.1
65°	1496.0	1441.1	1174.9	809.0	750.0	829.3	1185.0	1435.0	1445.2	1355.8	1221.6
67.5°	1329.3	1284.6	1018.3	717.5	662.6	723.6	1038.7	1276.5	1282.6	1195.2	1073.2
70°	1162.7	1124.0	880.1	617.9	577.3	619.9	894.4	1101.7	1113.9	1020.4	922.8
72.5°	991.9	961.4	746.0	514.3	477.7	514.3	754.1	941.1	949.2	872.0	776.5
75°	819.1	796.8	609.8	412.6	384.2	410.6	613.9	780.5	780.5	707.4	632.1
77.5°	652.5	636.2	467.5	317.1	296.8	313.0	469.5	617.9	613.9	556.9	498.0
80°	487.8	475.6	335.4	229.7	215.5	223.6	335.4	457.3	457.3	416.7	345.5
82.5°	349.6	335.4	221.6	150.4	142.3	146.3	217.5	319.1	325.2	294.7	233.8
85°	231.7	199.2	119.9	83.3	77.2	79.3	113.8	185.0	203.3	170.7	122.0
87.5°	101.6	67.1	30.5	12.2	6.1	8.1	24.4	58.9	77.2	50.8	16.3
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
0°	3788.8	3788.8	3788.8	3788.8	3788.8	3788.8
2.5°	3801.0	3768.5	3780.7	3788.8	3780.7	3817.3
5°	3796.9	3782.7	3780.7	3790.8	3774.6	3811.2
7.5°	3790.8	3782.7	3780.7	3784.7	3764.4	3799.0
10°	3776.6	3764.4	3768.5	3774.6	3748.2	3780.7
12.5°	3750.2	3738.0	3740.0	3760.3	3723.8	3752.2
15°	3705.5	3691.2	3705.5	3727.8	3695.3	3719.7
17.5°	3646.5	3624.2	3648.6	3683.1	3658.7	3681.1
20°	3571.3	3536.8	3563.2	3626.2	3603.8	3632.3
22.5°	3479.8	3437.2	3463.6	3555.1	3549.0	3579.4
25°	3376.2	3325.4	3362.0	3473.7	3485.9	3514.4
27.5°	3260.3	3203.4	3252.2	3384.3	3412.8	3445.3
30°	3134.3	3073.3	3130.2	3284.7	3327.4	3362.0
32.5°	3004.2	2937.1	3002.2	3172.9	3233.9	3278.6
35°	2868.0	2798.9	2872.1	3057.1	3130.2	3175.0
37.5°	2721.7	2654.6	2733.9	2935.1	3022.5	3067.2
40°	2571.3	2496.1	2585.5	2790.8	2906.6	2959.5
42.5°	2416.8	2323.3	2433.0	2654.6	2780.6	2833.5
45°	2244.0	2113.9	2262.3	2510.3	2642.4	2701.4
47.5°	2071.2	1941.2	2091.6	2355.8	2498.1	2550.9
50°	1904.6	1792.8	1912.7	2187.1	2351.7	2418.8
52.5°	1752.1	1660.7	1762.3	2022.5	2201.3	2268.4
55°	1609.8	1538.7	1622.0	1859.8	2042.8	2120.0
57.5°	1475.7	1431.0	1487.9	1705.4	1896.4	1969.6
60°	1349.7	1319.2	1359.8	1552.9	1723.7	1813.1
62.5°	1225.7	1209.4	1239.9	1392.3	1563.1	1656.6
65°	1105.7	1101.7	1117.9	1252.1	1394.4	1496.0
67.5°	985.8	983.8	994.0	1103.7	1229.7	1329.3
70°	865.9	878.1	872.0	943.1	1065.1	1162.7
72.5°	743.9	762.2	752.1	796.8	914.7	991.9
75°	607.8	632.1	611.8	662.6	735.8	819.1
77.5°	467.5	493.9	469.5	514.3	593.5	652.5
80°	335.4	359.8	339.4	374.0	443.1	487.8
82.5°	211.4	229.7	213.4	248.0	317.1	349.6
85°	93.5	103.7	107.7	134.2	195.1	231.7
87.5°	4.1	2.0	4.1	26.4	69.1	101.6
90°	0.0	0.0	0.0	0.0	0.0	0.0



Report Generated By 670246072 / DESKTOP-MV3F9LC





— 0°-180° - - 45°-225° - - - - 90°-270° - · - · 135°-315°









(END OF REPORT)