

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: P520728

Luminaire Tested: **8WSLA-200-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: P520728
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-200-L835-UPL8-UNV-U
Description: 8 FOOT, 4000 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

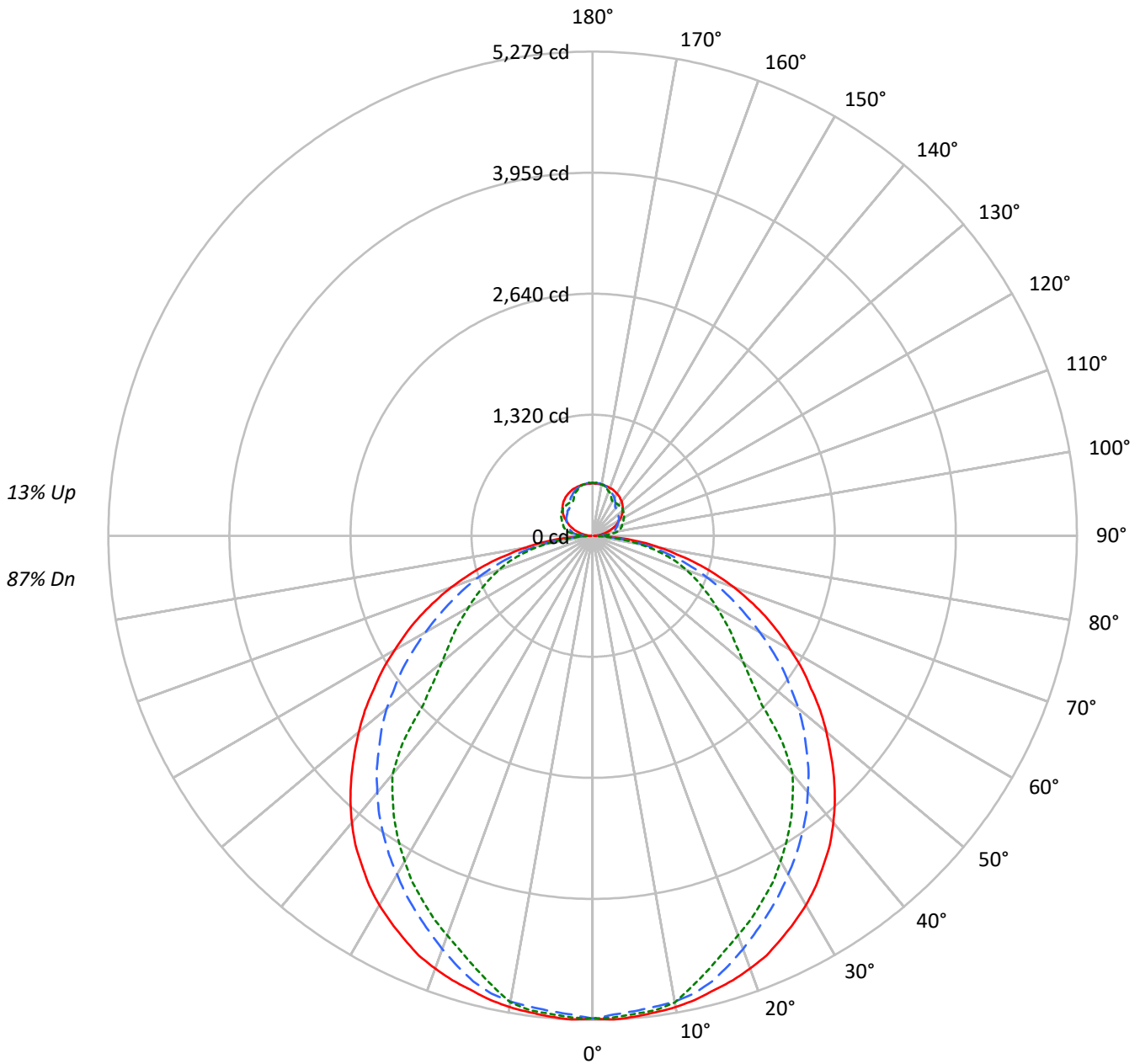
Lumens per Lamp: N/A
Luminaire Lumens: 16381.0 lumens
Efficiency: N/A
Efficacy: 107.6 lumens/watt
Spacing Criteria (0/90/45): 1.31 / 1.17 / 1.33
Luminous Opening: Rectangular (W 0.5' x L: 8' x H: 0')
CIE Type: Semi-Direct

Input Watts (W): 152.3
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	116	116	116	116	112	112	112	112	104	104	104	97	97	97	90	90	90	87																			
1	106	101	97	93	102	98	94	90	91	88	85	85	83	80	79	78	76	73																			
2	96	88	82	76	92	85	79	74	80	75	70	74	70	67	70	66	64	61																			
3	88	78	70	63	84	75	68	62	70	64	59	66	61	56	62	58	54	51																			
4	80	69	60	54	77	67	59	53	62	56	50	59	53	48	55	50	46	44																			
5	74	61	53	46	71	60	51	45	56	49	44	53	47	42	50	45	40	38																			
6	68	55	47	40	66	54	46	40	51	44	38	48	42	37	45	40	36	33																			
7	63	50	42	36	61	49	41	35	46	39	34	43	37	33	41	36	32	30																			
8	59	46	37	32	57	44	37	31	42	35	30	40	34	29	38	32	28	26																			
9	55	42	34	28	53	41	33	28	39	32	27	37	31	26	35	30	26	24																			
10	52	39	31	26	50	38	30	25	36	29	25	34	28	24	32	27	23	22																			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	14164	14164	14164
5°	14218	14055	14136
10°	14259	14093	14114
15°	14284	14010	13630
20°	14379	13728	13273
25°	14414	13470	13020
30°	14449	13249	12731
35°	14405	13062	12390
40°	14340	12823	11919
45°	14152	12538	9944
50°	13919	12270	8973
55°	13644	11868	8634
60°	13410	11331	8396
65°	13213	10850	8391
70°	12871	10428	8521
75°	12284	9922	8583
80°	11502	8920	7981
85°	10522	6314	5379



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	498.3	3.0
10°-20°	1416.7	8.6
20°-30°	2116.8	12.9
30°-40°	2526.8	15.4
40°-50°	2527.1	15.4
50°-60°	2187.1	13.4
60°-70°	1678.7	10.2
70°-80°	1028.6	6.3
80°-90°	289.6	1.8
90°-100°	163.7	1.0
100°-110°	259.8	1.6
110°-120°	303.7	1.9
120°-130°	327.9	2.0
130°-140°	323.1	2.0
140°-150°	285.8	1.7
150°-160°	235.2	1.4
160°-170°	157.4	1.0
170°-180°	54.8	0.3
0°-30°	4031.8	24.6
0°-40°	6558.6	40.0
0°-60°	11272.7	68.8
0°-90°	14269.6	87.1
90°-120°	727.2	4.4
90°-150°	1663.9	10.2
90°-180°	2111.0	12.9
0°-180°	16381.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	5264	5264	5264	5264	5264	
5°	5264	5248	5203	5241	5233	501
15°	5127	5120	5029	4938	4892	1451
25°	4855	4794	4536	4415	4385	2240
35°	4385	4272	3976	3832	3772	2746
45°	3719	3613	3294	2999	2613	2867
55°	2908	2840	2530	2022	1840	2607
65°	2075	1999	1704	1371	1318	2050
75°	1182	1121	954	826	826	1246
85°	341	280	204	174	174	356
90°	15	53	83	106	114	24
95°	61	129	174	182	182	60
105°	174	182	258	303	318	183
115°	288	242	303	348	371	281
125°	386	310	348	401	416	344
135°	462	416	386	424	447	356
145°	515	492	432	424	439	321
155°	545	538	507	485	477	252
165°	560	568	553	553	553	159
175°	568	576	576	583	583	54
180°	576	576	576	576	576	



TEST NUMBER: P520728

CATALOG NUMBER: 8WSLA-200-L835-UPL8-UNV-U

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	5263.6	5263.6	5263.6	5263.6	5263.6
2.5°	5278.7	5263.6	5225.7	5263.6	5256.0
5°	5263.6	5248.5	5203.0	5240.9	5233.3
7.5°	5240.9	5225.7	5180.3	5225.7	5218.2
10°	5218.2	5203.0	5157.6	5187.9	5165.1
12.5°	5180.3	5165.1	5112.1	5074.3	5028.8
15°	5127.3	5119.7	5028.8	4937.9	4892.5
17.5°	5081.8	5059.1	4915.2	4809.2	4756.2
20°	5021.2	4983.4	4794.0	4672.9	4635.0
22.5°	4953.1	4892.5	4665.3	4551.7	4521.4
25°	4854.6	4794.0	4536.5	4415.4	4385.1
27.5°	4756.2	4680.4	4407.8	4286.6	4256.3
30°	4650.1	4544.1	4263.9	4150.3	4097.3
32.5°	4529.0	4422.9	4127.6	3998.8	3938.2
35°	4385.1	4271.5	3976.1	3832.2	3771.6
37.5°	4248.7	4127.6	3824.6	3665.6	3582.3
40°	4082.1	3961.0	3650.4	3476.2	3392.9
42.5°	3907.9	3794.3	3483.8	3271.8	3067.3
45°	3718.6	3612.6	3294.5	2999.1	2612.9
47.5°	3521.7	3430.8	3120.3	2718.9	2347.8
50°	3324.8	3233.9	2931.0	2453.8	2143.3
52.5°	3127.9	3052.1	2718.9	2234.2	1976.7
55°	2908.2	2840.1	2529.6	2022.1	1840.4
57.5°	2711.3	2643.2	2309.9	1847.9	1696.5
60°	2491.7	2431.1	2105.4	1673.7	1560.1
62.5°	2287.2	2219.0	1901.0	1522.3	1439.0
65°	2075.1	1999.4	1704.0	1370.8	1317.8
67.5°	1855.5	1779.8	1514.7	1234.5	1204.2
70°	1635.9	1575.3	1325.4	1098.2	1083.0
72.5°	1408.7	1340.5	1136.0	969.4	969.4
75°	1181.5	1120.9	954.3	825.5	825.5
77.5°	946.7	916.4	764.9	674.0	681.6
80°	742.2	704.3	575.6	515.0	515.0
82.5°	545.3	499.9	386.2	340.8	356.0
85°	340.8	280.2	204.5	174.2	174.2
87.5°	106.0	83.3	60.6	68.2	68.2
90°	15.1	53.0	83.3	106.0	113.6
92.5°	37.9	98.5	121.2	143.9	151.5
95°	60.6	128.7	174.2	181.8	181.8
97.5°	83.3	143.9	212.1	242.4	242.4
100°	113.6	151.5	227.2	272.6	280.2
102.5°	143.9	166.6	242.4	287.8	302.9
105°	174.2	181.8	257.5	302.9	318.1



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CATALOG NUMBER: 8WSLA-200-L835-UPL8-UNV-U

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	257.5	227.2	287.8	340.8	356.0
115°	287.8	242.4	302.9	348.4	371.1
117.5°	310.5	265.1	318.1	363.5	378.7
120°	333.2	280.2	325.7	378.7	393.8
122.5°	363.5	295.4	340.8	386.2	409.0
125°	386.2	310.5	348.4	401.4	416.5
127.5°	409.0	340.8	356.0	409.0	424.1
130°	424.1	371.1	363.5	416.5	431.7
132.5°	446.8	393.8	371.1	424.1	439.3
135°	462.0	416.5	386.2	424.1	446.8
137.5°	477.1	439.3	386.2	424.1	439.3
140°	492.3	462.0	393.8	424.1	439.3
142.5°	499.9	477.1	401.4	424.1	439.3
145°	515.0	492.3	431.7	424.1	439.3
147.5°	522.6	507.4	454.4	424.1	439.3
150°	530.1	522.6	477.1	431.7	431.7
152.5°	537.7	530.1	492.3	462.0	446.8
155°	545.3	537.7	507.4	484.7	477.1
157.5°	552.9	552.9	522.6	507.4	499.9
160°	552.9	560.4	537.7	522.6	515.0
162.5°	560.4	568.0	545.3	537.7	530.1
165°	560.4	568.0	552.9	552.9	552.9
167.5°	568.0	575.6	568.0	560.4	560.4
170°	568.0	575.6	568.0	568.0	568.0
172.5°	568.0	575.6	575.6	575.6	575.6
175°	568.0	575.6	575.6	583.2	583.2
177.5°	568.0	575.6	575.6	575.6	575.6
180°	575.6	575.6	575.6	575.6	575.6



Report Generated By 670246072 / DESKTOP-MV3F9LC





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







107.5°	204.5	196.9	265.1	318.1	333.2
110°	227.2	212.1	280.2	325.7	340.8



(END OF REPORT)