

Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

Brand: FAIL-SAFE

Report Number: P974438

Luminaire Tested: FLR2-24-55-L850-CA080

Issue Date: 3/13/2025

Test Information

Test Method: LM-79-2019
Report Number: P974438
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-281-3)
Test Lab: INNOVATION CENTER
Issue Date: 3/13/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: FAIL-SAFE
Catalog Number: FLR2-24-55-L850-CA080
Description: SHAPER SENSE CIRCLE

Light Source: FLR2-24-55-L850-CA080
Ballast/Driver: -

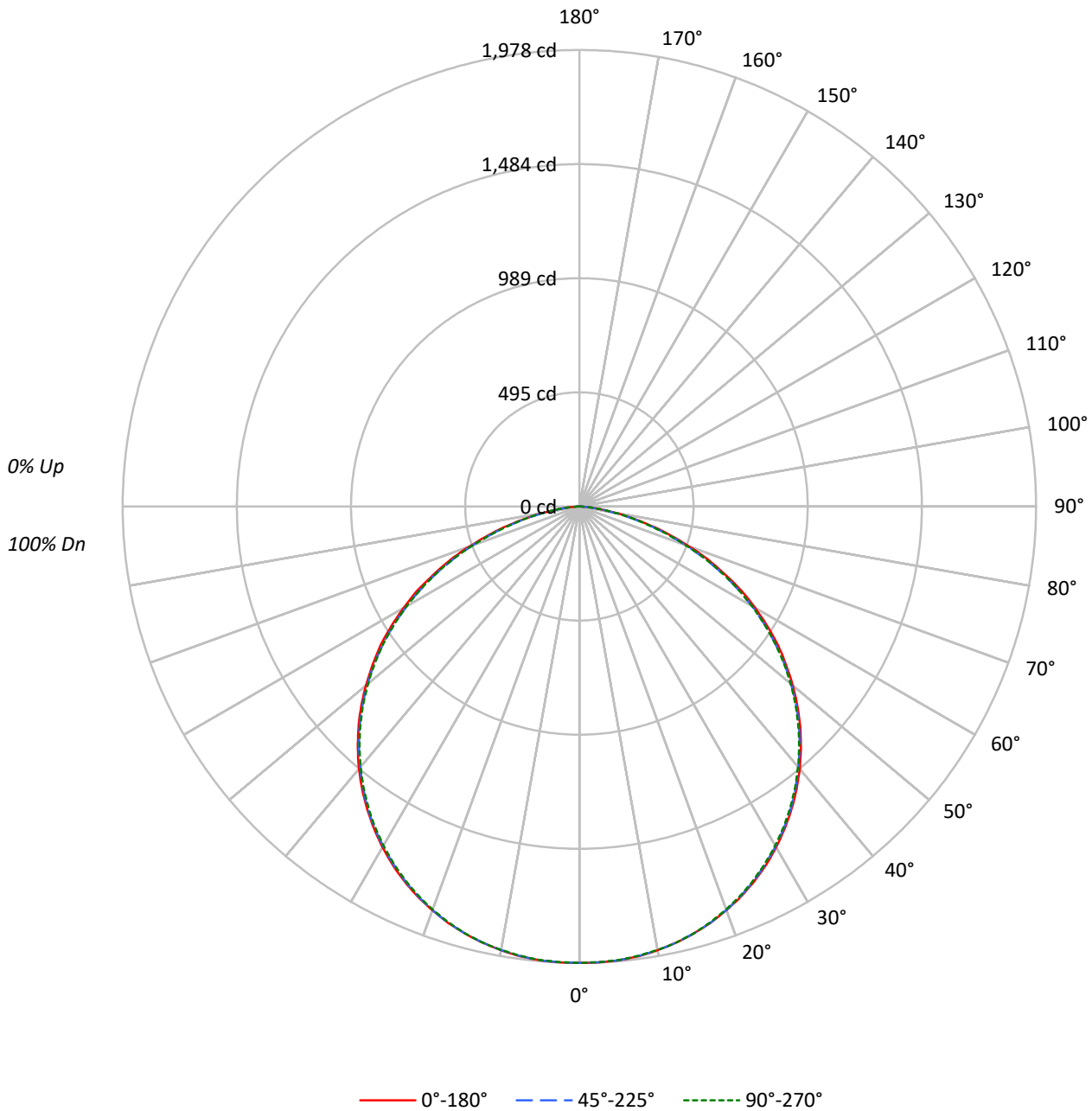
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5589.2 lumens
Efficiency: N/A
Efficacy: 126.7 lumens/watt
Spacing Criteria (0/90/45): 1.28 / 1.27 / 1.39
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 44.1
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor:
Total Harmonic Distortion (THDi):
Frequency (hertz): 60
Stabilization Time: HR
Operation Time: HR
Ambient Temperature (°C): NR
Test Distance: 24 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	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	109	105	100	97	106	102	99	95	98	95	92	94	92	89	91	89	87	85
2	99	91	85	79	97	89	83	78	86	81	76	83	78	75	80	76	73	71
3	91	80	72	66	88	79	71	65	76	69	64	73	68	63	70	66	62	60
4	83	71	62	56	81	70	62	55	67	60	55	65	59	54	63	57	53	51
5	76	64	55	48	74	62	54	48	60	53	47	58	52	47	56	51	46	44
6	70	57	48	42	69	56	48	42	54	47	41	53	46	41	51	45	41	38
7	65	52	43	37	64	51	43	37	49	42	37	48	41	36	47	41	36	34
8	61	47	39	33	59	47	38	33	45	38	33	44	37	32	43	37	32	30
9	57	43	35	30	55	43	35	30	42	34	29	41	34	29	39	33	29	27
10	53	40	32	27	52	39	32	27	38	31	27	38	31	26	37	31	26	25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2661	2661	2661
5°	2666	2666	2664
10°	2668	2667	2666
15°	2669	2668	2668
20°	2666	2665	2661
25°	2661	2656	2651
30°	2649	2641	2636
35°	2632	2625	2615
40°	2608	2592	2589
45°	2575	2560	2552
50°	2527	2507	2500
55°	2467	2432	2429
60°	2364	2322	2322
65°	2212	2160	2167
70°	1990	1929	1923
75°	1671	1605	1597
80°	1220	1160	1210
85°	690	636	647

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 2575 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	187.7	3.4
10°-20°	540.8	9.7
20°-30°	824.5	14.8
30°-40°	998.9	17.9
40°-50°	1037.6	18.6
50°-60°	928.2	16.6
60°-70°	676.5	12.1
70°-80°	335.0	6.0
80°-90°	59.9	1.1
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°	1553.0	27.8
0°-40°	2551.9	45.7
0°-60°	4517.8	80.8
0°-90°	5589.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5589.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1978	1978	1978	1978	1978	
5°	1974	1975	1974	1974	1973	188
15°	1916	1915	1915	1916	1915	541
25°	1792	1790	1789	1788	1786	826
35°	1602	1600	1598	1595	1592	1002
45°	1353	1350	1345	1342	1341	1043
55°	1052	1044	1037	1037	1035	937
65°	695	689	678	681	680	689
75°	321	316	309	314	307	343
85°	45	41	41	42	42	62
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1977.6	1977.6	1977.6	1977.6	1977.6
2.5°	1977.6	1976.9	1976.9	1977.6	1976.1
5°	1974.0	1974.7	1974.0	1974.0	1972.6
7.5°	1966.2	1965.5	1964.8	1965.5	1963.4
10°	1952.7	1952.7	1952.0	1952.7	1951.3
12.5°	1936.4	1936.4	1936.4	1937.1	1936.4
15°	1915.8	1915.1	1915.1	1916.5	1915.1
17.5°	1891.7	1891.0	1891.0	1890.3	1888.9
20°	1861.9	1861.9	1861.2	1860.5	1858.4
22.5°	1830.0	1829.3	1827.1	1827.1	1824.3
25°	1792.4	1790.2	1788.8	1788.1	1786.0
27.5°	1751.2	1748.4	1746.2	1744.8	1742.7
30°	1705.1	1702.3	1700.1	1698.0	1696.6
32.5°	1655.4	1654.0	1650.5	1649.7	1646.9
35°	1602.2	1600.1	1597.9	1595.1	1592.3
37.5°	1545.4	1543.3	1538.3	1536.9	1534.8
40°	1485.1	1482.3	1475.9	1475.9	1473.8
42.5°	1420.6	1417.7	1413.5	1410.6	1409.2
45°	1353.1	1350.3	1345.3	1342.5	1341.1
47.5°	1281.5	1279.3	1273.7	1271.5	1269.4
50°	1207.0	1204.1	1197.7	1196.3	1194.2
52.5°	1128.9	1127.5	1119.0	1118.3	1116.1
55°	1051.6	1043.8	1036.7	1036.7	1035.3
57.5°	966.4	960.8	951.5	951.5	950.1
60°	878.4	873.5	862.8	864.3	862.8
62.5°	792.6	781.9	772.0	776.3	772.7
65°	694.7	689.0	678.3	681.2	680.5
67.5°	605.3	594.6	584.7	590.4	587.5
70°	505.9	500.2	490.3	496.0	488.9
72.5°	412.3	407.3	397.4	403.7	396.6
75°	321.4	316.5	308.7	314.3	307.2
77.5°	235.6	232.0	224.9	230.6	232.0
80°	157.5	153.3	149.7	154.7	156.1
82.5°	92.2	89.4	88.0	88.7	92.2
85°	44.7	41.2	41.2	41.9	41.9
87.5°	12.1	10.6	12.1	12.8	13.5
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)