

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: P974406

Luminaire Tested: FLR2-24-55-L850-CP125

Issue Date: 3/13/2025

**Test Information**

Test Method: LM-79-2019  
Report Number: P974406  
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-CP125  
Description: SHAPER SENSE CIRCLE  
  
Light Source: FLR2-24-55-L850-CP125  
Ballast/Driver: -

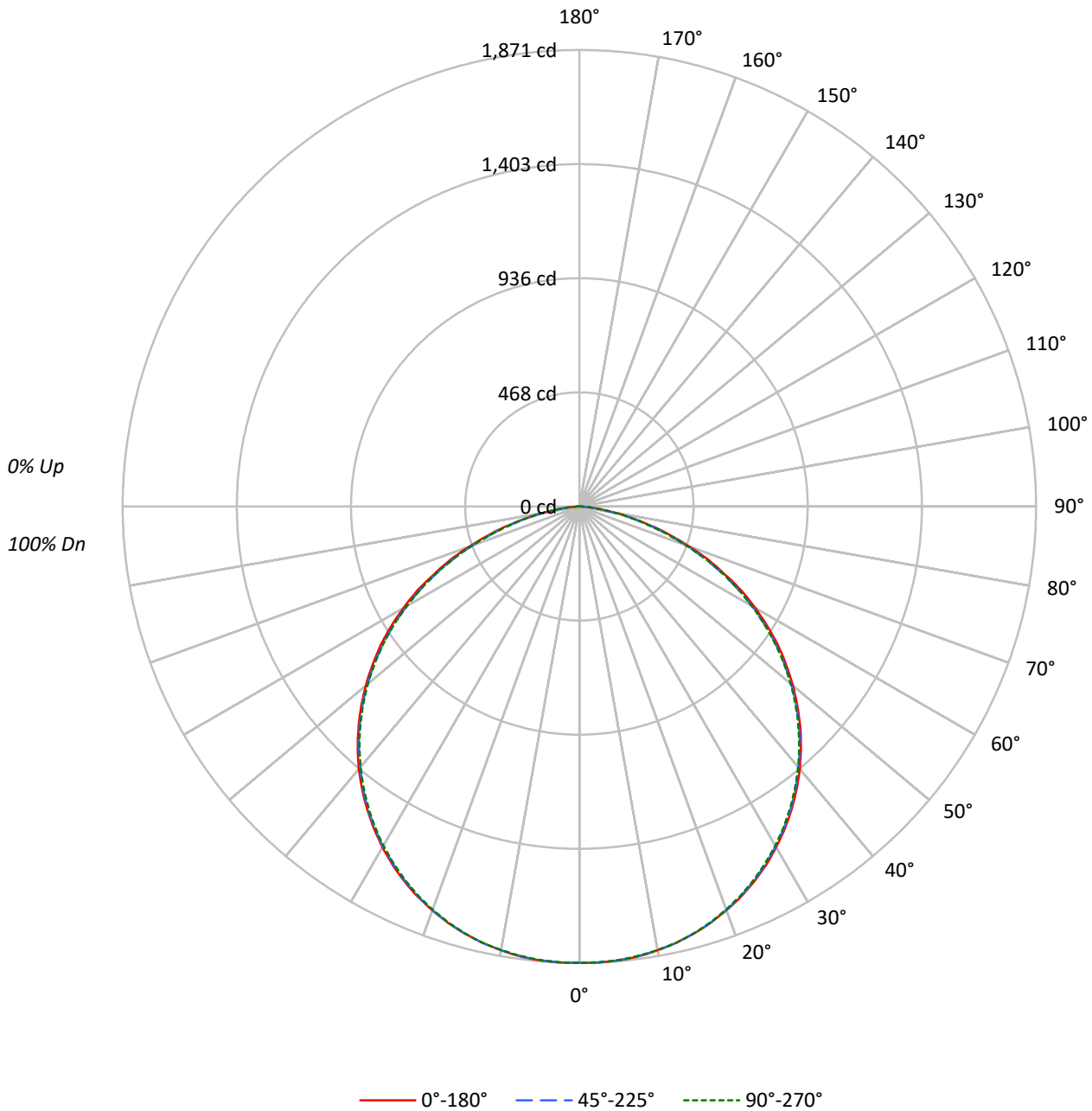
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 5287.9 lumens  
Efficiency: N/A  
Efficacy: 119.9 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°	2517	2517	2517
5°	2522	2522	2521
10°	2524	2523	2522
15°	2525	2524	2524
20°	2522	2521	2517
25°	2517	2513	2509
30°	2506	2499	2494
35°	2490	2483	2474
40°	2468	2452	2449
45°	2436	2422	2414
50°	2390	2372	2365
55°	2334	2301	2297
60°	2236	2197	2197
65°	2092	2043	2050
70°	1883	1825	1819
75°	1581	1518	1511
80°	1155	1097	1144
85°	653	601	611

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°  
 Vertical Angle: 45°  
 Luminance: 2436 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	177.6	3.4
10°-20°	511.6	9.7
20°-30°	780.0	14.8
30°-40°	945.1	17.9
40°-50°	981.7	18.6
50°-60°	878.2	16.6
60°-70°	640.0	12.1
70°-80°	317.0	6.0
80°-90°	56.7	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°	1469.3	27.8
0°-40°	2414.3	45.7
0°-60°	4274.2	80.8
0°-90°	5287.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5287.9	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1871	1871	1871	1871	1871	
5°	1868	1868	1868	1868	1866	178
15°	1813	1812	1812	1813	1812	512
25°	1696	1694	1692	1692	1690	782
35°	1516	1514	1512	1509	1506	948
45°	1280	1278	1273	1270	1269	987
55°	995	988	981	981	979	886
65°	657	652	642	644	644	652
75°	304	299	292	297	291	324
85°	42	39	39	40	40	59
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1871.0	1871.0	1871.0	1871.0	1871.0
2.5°	1871.0	1870.3	1870.3	1871.0	1869.6
5°	1867.6	1868.3	1867.6	1867.6	1866.3
7.5°	1860.2	1859.5	1858.9	1859.5	1857.5
10°	1847.5	1847.5	1846.8	1847.5	1846.1
12.5°	1832.0	1832.0	1832.0	1832.7	1832.0
15°	1812.6	1811.9	1811.9	1813.2	1811.9
17.5°	1789.7	1789.1	1789.1	1788.4	1787.0
20°	1761.5	1761.5	1760.9	1760.2	1758.2
22.5°	1731.3	1730.7	1728.6	1728.6	1726.0
25°	1695.7	1693.7	1692.4	1691.7	1689.7
27.5°	1656.8	1654.1	1652.1	1650.8	1648.8
30°	1613.2	1610.5	1608.5	1606.5	1605.1
32.5°	1566.2	1564.8	1561.5	1560.8	1558.1
35°	1515.8	1513.8	1511.8	1509.1	1506.4
37.5°	1462.1	1460.1	1455.4	1454.1	1452.1
40°	1405.1	1402.4	1396.3	1396.3	1394.3
42.5°	1344.0	1341.3	1337.3	1334.6	1333.2
45°	1280.2	1277.5	1272.8	1270.1	1268.8
47.5°	1212.4	1210.4	1205.0	1203.0	1201.0
50°	1141.9	1139.2	1133.2	1131.8	1129.8
52.5°	1068.1	1066.7	1058.7	1058.0	1056.0
55°	994.9	987.5	980.8	980.8	979.4
57.5°	914.3	909.0	900.2	900.2	898.9
60°	831.1	826.4	816.3	817.7	816.3
62.5°	749.9	739.8	730.4	734.4	731.1
65°	657.2	651.8	641.8	644.5	643.8
67.5°	572.6	562.6	553.2	558.5	555.8
70°	478.6	473.3	463.9	469.2	462.5
72.5°	390.0	385.3	375.9	382.0	375.3
75°	304.1	299.4	292.0	297.4	290.7
77.5°	222.9	219.5	212.8	218.2	219.5
80°	149.0	145.0	141.6	146.3	147.7
82.5°	87.3	84.6	83.2	83.9	87.3
85°	42.3	38.9	38.9	39.6	39.6
87.5°	11.4	10.1	11.4	12.1	12.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)