

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: P973929

Luminaire Tested: FLR2-22-50HE-L840-CA125

Issue Date: 3/13/2025

**Test Information**

Test Method: LM-79-2019  
Report Number: P973929  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-281-2)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/13/2025  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: FAIL-SAFE  
Catalog Number: FLR2-22-50HE-L840-CA125  
Description: SHAPER SENSE CIRCLE  
  
Light Source:  
Ballast/Driver: -

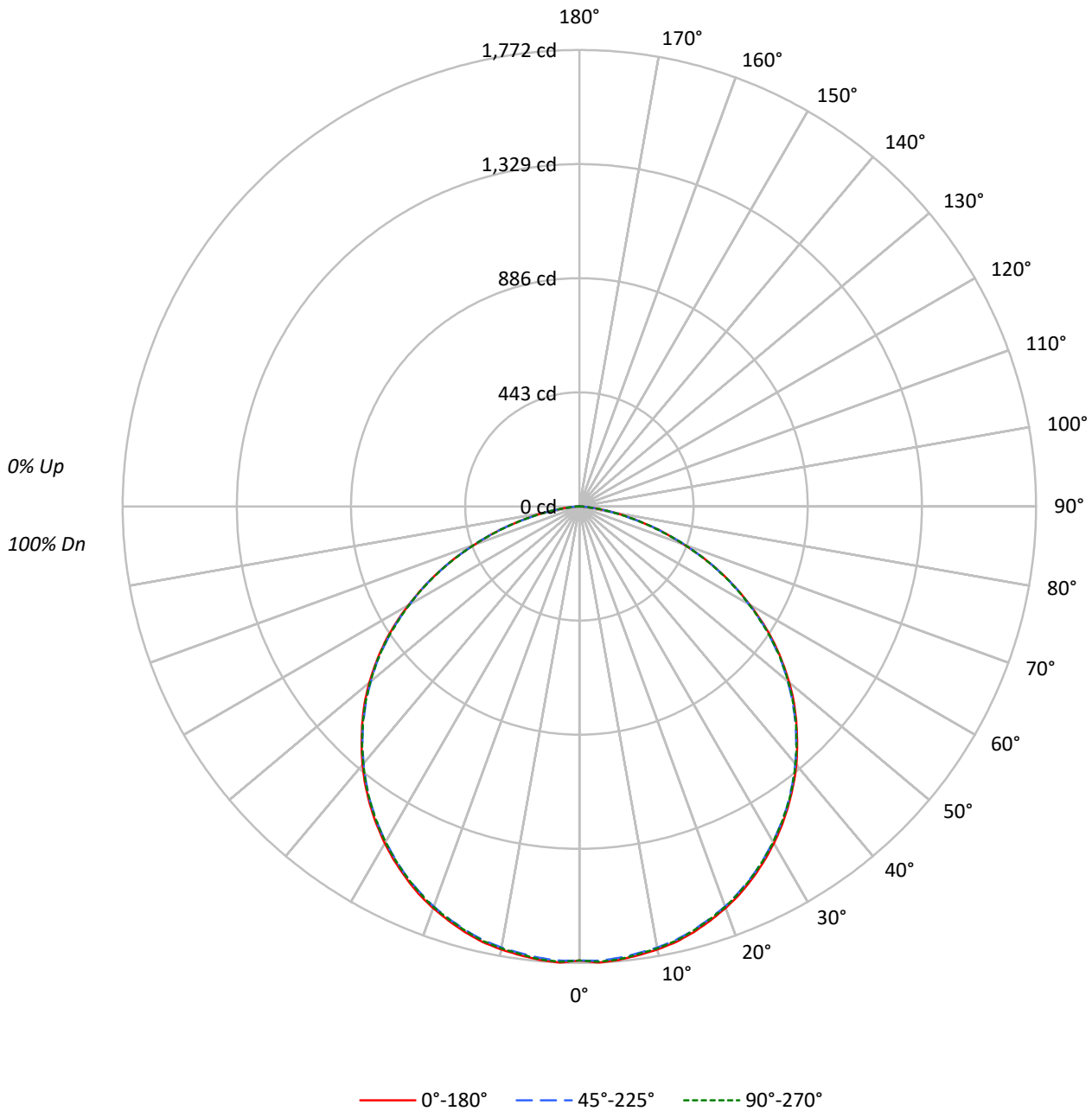
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4928.8 lumens  
Efficiency: N/A  
Efficacy: 123.2 lumens/watt  
Spacing Criteria (0/90/45): 1.27 / 1.27 / 1.38  
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')  
CIE Type: Direct

Input Watts (W): 40  
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										
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	50	30	10	0														
RCR																																						
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100					100															
1	109	105	101	97	107	102	99	95	98	95	92	94	92	89	91	89	87	85					85															
2	99	91	85	79	97	90	83	78	86	81	76	83	78	75	80	76	73	71					71															
3	91	80	72	66	88	79	71	65	76	69	64	73	68	63	70	66	62	60					60															
4	83	71	63	56	81	70	62	55	67	60	55	65	59	54	63	58	53	51					51															
5	76	64	55	48	74	62	54	48	60	53	47	58	52	47	57	51	46	44					44															
6	71	57	48	42	69	56	48	42	54	47	41	53	46	41	51	45	41	39					39															
7	65	52	43	37	64	51	43	37	50	42	37	48	41	36	47	41	36	34					34															
8	61	47	39	33	59	47	39	33	45	38	33	44	37	32	43	37	32	30					30															
9	57	43	35	30	55	43	35	30	42	34	29	41	34	29	40	34	29	27					27															
10	53	40	32	27	52	40	32	27	39	32	27	38	31	27	37	31	26	25					25															

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	4743	4743	4743
5°	4773	4752	4767
10°	4771	4750	4759
15°	4768	4746	4752
20°	4751	4732	4739
25°	4726	4706	4709
30°	4692	4671	4675
35°	4649	4631	4635
40°	4600	4578	4581
45°	4532	4512	4520
50°	4453	4421	4430
55°	4326	4290	4305
60°	4113	4095	4095
65°	3840	3833	3819
70°	3401	3418	3409
75°	2863	2840	2819
80°	2058	2024	2007
85°	1074	1074	1041

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°  
 Vertical Angle: 45°  
 Luminance: 4532 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	166.9	3.4
10°-20°	480.0	9.7
20°-30°	729.3	14.8
30°-40°	881.6	17.9
40°-50°	915.0	18.6
50°-60°	818.1	16.6
60°-70°	594.8	12.1
70°-80°	292.5	5.9
80°-90°	50.7	1.0
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°	1376.2	27.9
0°-40°	2257.8	45.8
0°-60°	3990.8	81.0
0°-90°	4928.8	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4928.8	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1762	1762	1762	1762	1762	
5°	1767	1746	1759	1753	1765	168
15°	1711	1692	1704	1699	1706	483
25°	1592	1574	1585	1582	1586	734
35°	1415	1405	1410	1411	1411	885
45°	1191	1186	1186	1188	1188	919
55°	922	917	914	917	918	822
65°	603	605	602	602	600	595
75°	275	278	273	274	271	292
85°	35	36	35	35	34	51
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1762.5	1762.5	1762.5	1762.5	1762.5
2.5°	1772.3	1751.6	1764.7	1757.0	1769.0
5°	1766.8	1746.2	1759.2	1752.7	1764.7
7.5°	1757.0	1736.4	1749.4	1742.9	1752.7
10°	1746.2	1724.4	1738.5	1732.0	1741.8
12.5°	1732.0	1711.3	1724.4	1718.9	1727.6
15°	1711.3	1691.7	1703.7	1699.3	1705.9
17.5°	1686.3	1666.7	1678.7	1675.4	1680.8
20°	1659.1	1640.6	1652.5	1649.3	1654.7
22.5°	1628.6	1609.0	1619.9	1617.7	1622.0
25°	1591.6	1574.1	1585.0	1581.8	1586.1
27.5°	1552.4	1536.0	1544.8	1544.8	1546.9
30°	1509.9	1494.7	1503.4	1503.4	1504.5
32.5°	1464.2	1452.2	1457.7	1458.8	1458.8
35°	1415.2	1405.4	1409.8	1410.9	1410.9
37.5°	1364.0	1354.2	1357.5	1359.7	1359.7
40°	1309.6	1300.9	1303.1	1305.3	1304.2
42.5°	1250.8	1244.3	1245.4	1247.6	1247.6
45°	1191.0	1185.5	1185.5	1187.7	1187.7
47.5°	1130.0	1124.5	1122.4	1124.5	1124.5
50°	1063.6	1058.1	1056.0	1058.1	1058.1
52.5°	993.9	988.5	988.5	988.5	989.6
55°	922.1	916.6	914.4	916.6	917.7
57.5°	845.9	843.7	840.4	841.5	838.2
60°	764.2	764.2	760.9	763.1	760.9
62.5°	684.7	686.9	683.7	683.7	681.5
65°	603.1	605.3	602.0	602.0	599.8
67.5°	519.3	522.5	518.2	518.2	516.0
70°	432.2	438.7	434.4	435.4	433.3
72.5°	353.8	357.1	352.7	352.7	350.5
75°	275.4	277.6	273.2	274.3	271.1
77.5°	198.1	201.4	197.0	198.1	197.0
80°	132.8	133.9	130.6	131.7	129.5
82.5°	77.3	78.4	77.3	76.2	75.1
85°	34.8	35.9	34.8	34.8	33.7
87.5°	8.7	8.7	8.7	8.7	8.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)