

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: P973743

Luminaire Tested: FLR2-22-50HE-L830-CP250

Issue Date: 3/13/2025

**Test Information**

Test Method: LM-79-2019  
Report Number: P973743  
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-L830-CP250  
Description: SHAPER SENSE CIRCLE  
  
Light Source:  
Ballast/Driver: -

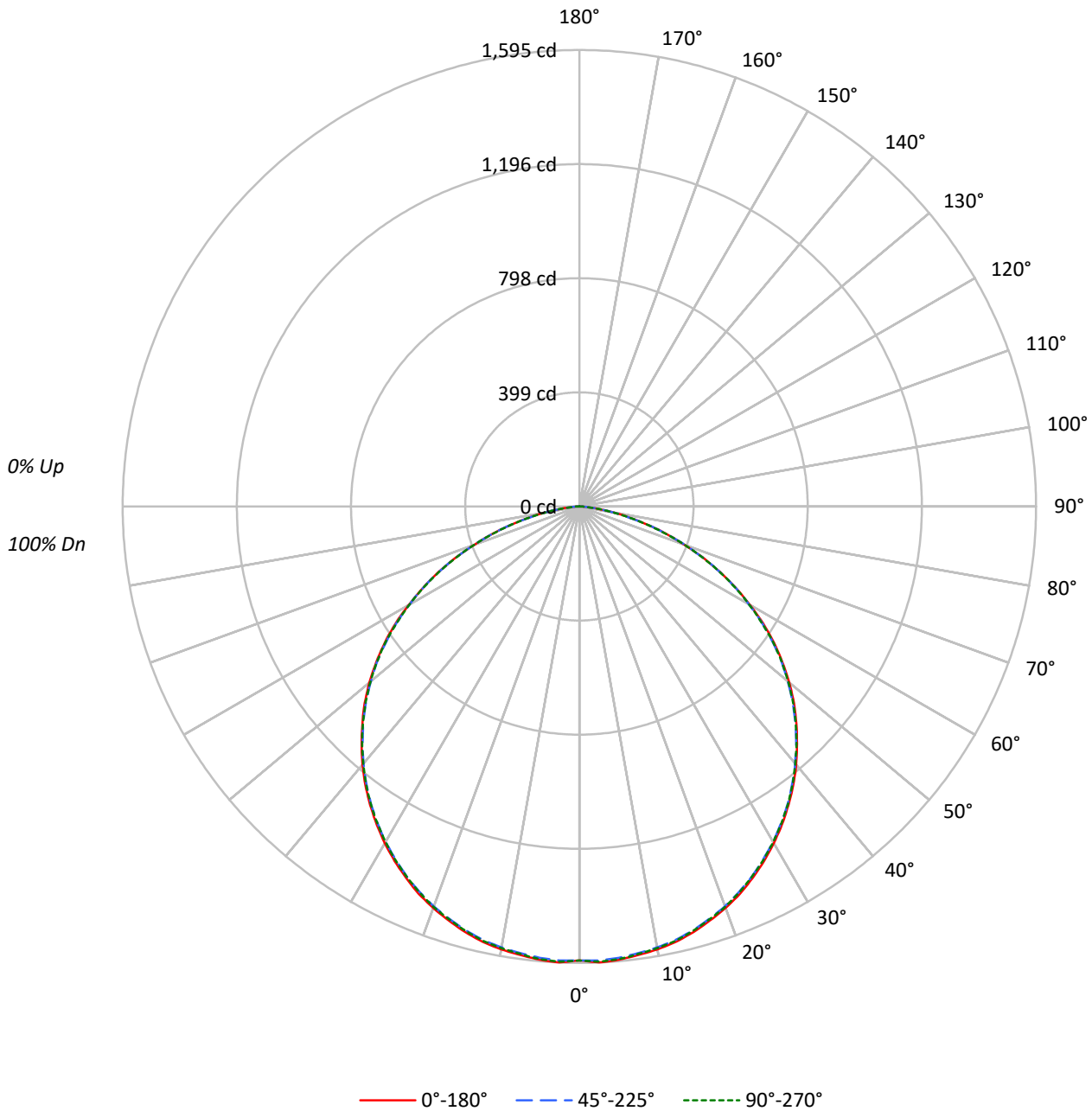
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4435.5 lumens  
Efficiency: N/A  
Efficacy: 110.9 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°	4268	4268	4268
5°	4295	4276	4290
10°	4294	4275	4283
15°	4290	4271	4277
20°	4275	4259	4264
25°	4253	4235	4238
30°	4222	4204	4207
35°	4184	4168	4171
40°	4140	4119	4123
45°	4079	4060	4067
50°	4007	3978	3986
55°	3893	3861	3875
60°	3701	3686	3686
65°	3456	3450	3437
70°	3060	3076	3068
75°	2577	2557	2536
80°	1852	1822	1807
85°	966	966	939

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°  
 Vertical Angle: 45°  
 Luminance: 4079 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	150.2	3.4
10°-20°	431.9	9.7
20°-30°	656.4	14.8
30°-40°	793.3	17.9
40°-50°	823.4	18.6
50°-60°	736.2	16.6
60°-70°	535.2	12.1
70°-80°	263.2	5.9
80°-90°	45.6	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°	1238.5	27.9
0°-40°	2031.8	45.8
0°-60°	3591.4	81.0
0°-90°	4435.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4435.5	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1586	1586	1586	1586	1586	
5°	1590	1571	1583	1577	1588	151
15°	1540	1522	1533	1529	1535	435
25°	1432	1417	1426	1424	1427	660
35°	1274	1265	1269	1270	1270	797
45°	1072	1067	1067	1069	1069	827
55°	830	825	823	825	826	740
65°	543	545	542	542	540	535
75°	248	250	246	247	244	263
85°	31	32	31	31	30	46
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1586.1	1586.1	1586.1	1586.1	1586.1
2.5°	1594.9	1576.3	1588.0	1581.2	1592.0
5°	1590.0	1571.4	1583.1	1577.3	1588.0
7.5°	1581.2	1562.6	1574.3	1568.5	1577.3
10°	1571.4	1551.8	1564.5	1558.7	1567.5
12.5°	1558.7	1540.0	1551.8	1546.9	1554.7
15°	1540.0	1522.4	1533.2	1529.3	1535.1
17.5°	1517.5	1499.9	1510.7	1507.7	1512.6
20°	1493.0	1476.4	1487.1	1484.2	1489.1
22.5°	1465.6	1448.0	1457.7	1455.8	1459.7
25°	1432.3	1416.6	1426.4	1423.5	1427.4
27.5°	1397.0	1382.3	1390.2	1390.2	1392.1
30°	1358.8	1345.1	1352.9	1352.9	1353.9
32.5°	1317.7	1306.9	1311.8	1312.8	1312.8
35°	1273.6	1264.8	1268.7	1269.7	1269.7
37.5°	1227.5	1218.7	1221.6	1223.6	1223.6
40°	1178.5	1170.7	1172.7	1174.6	1173.6
42.5°	1125.6	1119.8	1120.7	1122.7	1122.7
45°	1071.8	1066.9	1066.9	1068.8	1068.8
47.5°	1016.9	1012.0	1010.0	1012.0	1012.0
50°	957.1	952.2	950.3	952.2	952.2
52.5°	894.4	889.5	889.5	889.5	890.5
55°	829.8	824.9	822.9	824.9	825.9
57.5°	761.2	759.2	756.3	757.3	754.3
60°	687.7	687.7	684.8	686.7	684.8
62.5°	616.2	618.2	615.2	615.2	613.3
65°	542.7	544.7	541.8	541.8	539.8
67.5°	467.3	470.2	466.3	466.3	464.4
70°	388.9	394.8	390.9	391.9	389.9
72.5°	318.4	321.3	317.4	317.4	315.5
75°	247.9	249.8	245.9	246.9	243.9
77.5°	178.3	181.2	177.3	178.3	177.3
80°	119.5	120.5	117.6	118.5	116.6
82.5°	69.6	70.5	69.6	68.6	67.6
85°	31.3	32.3	31.3	31.3	30.4
87.5°	7.8	7.8	7.8	7.8	7.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)