

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: P974078

Luminaire Tested: FLR2-24-55-L830-CP187

Issue Date: 3/13/2025

Test Information

Test Method: LM-79-2019
Report Number: P974078
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-L830-CP187
Description: SHAPER SENSE CIRCLE

Light Source: FLR2-24-55-L830-CP187
Ballast/Driver: -

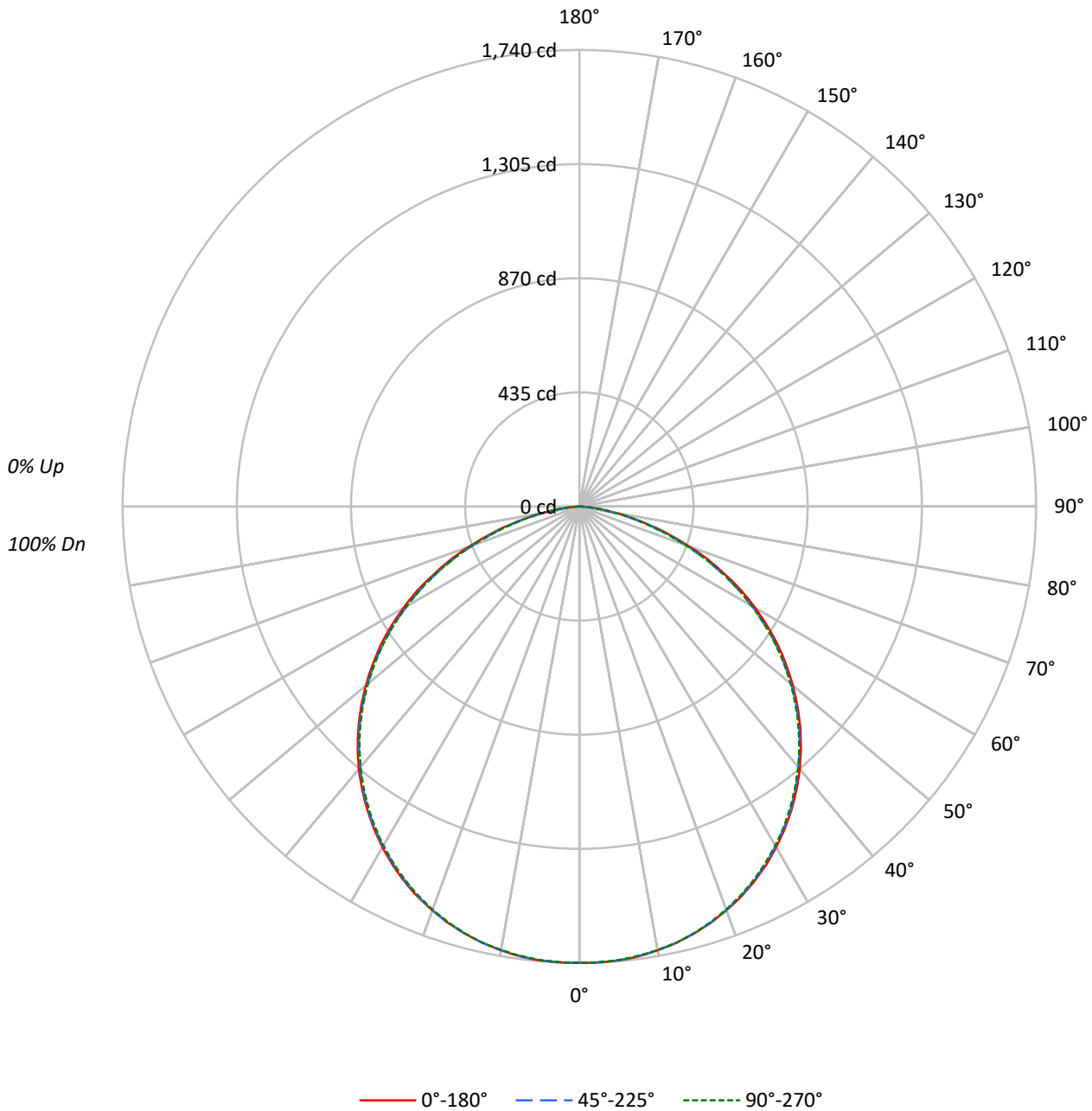
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4917.5 lumens
Efficiency: N/A
Efficacy: 111.5 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									
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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100			100																
1	109	105	100	97	106	102	99	95	98	95	92	94	92	89	91	89	87	85			85																
2	99	91	85	79	97	89	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	62	56	81	70	62	55	67	60	55	65	59	54	63	57	53	51			51																
5	76	64	55	48	74	62	54	48	60	53	47	58	52	47	56	51	46	44			44																
6	70	57	48	42	69	56	48	42	54	47	41	53	46	41	51	45	41	38			38																
7	65	52	43	37	64	51	43	37	49	42	37	48	41	36	47	41	36	34			34																
8	61	47	39	33	59	47	38	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	39	33	29	27			27																
10	53	40	32	27	52	39	32	27	38	31	27	38	31	26	37	31	26	25			25																

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2341	2341	2341
5°	2346	2346	2344
10°	2347	2346	2346
15°	2348	2347	2347
20°	2346	2345	2341
25°	2341	2337	2333
30°	2331	2324	2319
35°	2315	2309	2301
40°	2295	2281	2278
45°	2265	2252	2245
50°	2223	2206	2199
55°	2170	2140	2137
60°	2080	2043	2043
65°	1946	1900	1906
70°	1751	1697	1692
75°	1470	1412	1405
80°	1074	1020	1064
85°	607	559	568

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 2265 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	165.2	3.4
10°-20°	475.8	9.7
20°-30°	725.4	14.8
30°-40°	878.9	17.9
40°-50°	912.9	18.6
50°-60°	816.7	16.6
60°-70°	595.2	12.1
70°-80°	294.8	6.0
80°-90°	52.7	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°	1366.4	27.8
0°-40°	2245.2	45.7
0°-60°	3974.9	80.8
0°-90°	4917.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4917.5	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1740	1740	1740	1740	1740	
5°	1737	1737	1737	1737	1736	165
15°	1686	1685	1685	1686	1685	476
25°	1577	1575	1574	1573	1571	727
35°	1410	1408	1406	1403	1401	882
45°	1190	1188	1184	1181	1180	917
55°	925	918	912	912	911	824
65°	611	606	597	599	599	606
75°	283	278	272	277	270	302
85°	39	36	36	37	37	54
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1739.9	1739.9	1739.9	1739.9	1739.9
2.5°	1739.9	1739.3	1739.3	1739.9	1738.7
5°	1736.8	1737.4	1736.8	1736.8	1735.6
7.5°	1729.9	1729.3	1728.7	1729.3	1727.4
10°	1718.1	1718.1	1717.4	1718.1	1716.8
12.5°	1703.7	1703.7	1703.7	1704.3	1703.7
15°	1685.6	1685.0	1685.0	1686.2	1685.0
17.5°	1664.4	1663.8	1663.8	1663.1	1661.9
20°	1638.2	1638.2	1637.5	1636.9	1635.0
22.5°	1610.1	1609.4	1607.6	1607.6	1605.1
25°	1577.0	1575.1	1573.9	1573.2	1571.4
27.5°	1540.8	1538.3	1536.4	1535.2	1533.3
30°	1500.2	1497.7	1495.8	1493.9	1492.7
32.5°	1456.5	1455.2	1452.1	1451.5	1449.0
35°	1409.7	1407.8	1405.9	1403.4	1400.9
37.5°	1359.7	1357.9	1353.5	1352.2	1350.4
40°	1306.7	1304.2	1298.5	1298.5	1296.7
42.5°	1249.8	1247.3	1243.6	1241.1	1239.9
45°	1190.5	1188.0	1183.7	1181.2	1179.9
47.5°	1127.5	1125.6	1120.6	1118.7	1116.9
50°	1061.9	1059.4	1053.8	1052.6	1050.7
52.5°	993.3	992.0	984.5	983.9	982.0
55°	925.2	918.3	912.1	912.1	910.9
57.5°	850.3	845.3	837.2	837.2	835.9
60°	772.9	768.5	759.1	760.4	759.1
62.5°	697.3	688.0	679.2	683.0	679.9
65°	611.2	606.2	596.8	599.3	598.7
67.5°	532.5	523.2	514.4	519.4	516.9
70°	445.1	440.1	431.4	436.4	430.1
72.5°	362.7	358.3	349.6	355.2	349.0
75°	282.8	278.4	271.6	276.6	270.3
77.5°	207.3	204.1	197.9	202.9	204.1
80°	138.6	134.8	131.7	136.1	137.3
82.5°	81.2	78.7	77.4	78.0	81.2
85°	39.3	36.2	36.2	36.8	36.8
87.5°	10.6	9.4	10.6	11.2	11.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)