

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: P974417

Luminaire Tested: FLR2-24-20-L850-CP250

Issue Date: 3/13/2025

Test Information

Test Method: LM-79-2019
Report Number: P974417
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: FLR2-24-20-L850-CP250
Description: SHAPER SENSE CIRCLE

Light Source: FLR2-24-20-L850-CP250
Ballast/Driver: -

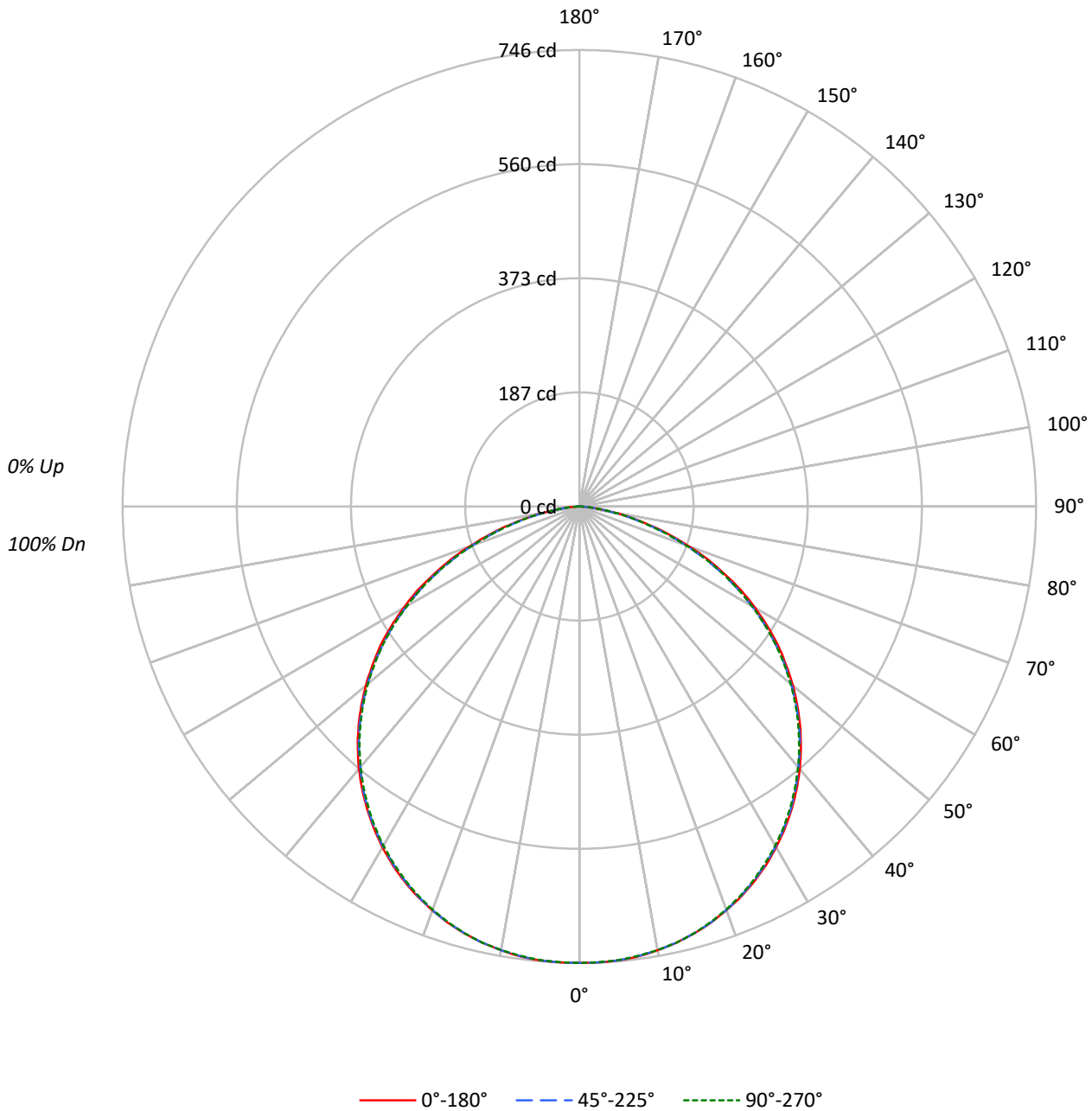
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2108.2 lumens
Efficiency: N/A
Efficacy: 126.2 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): 16.7
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°	1004	1004	1004
5°	1006	1006	1005
10°	1006	1006	1006
15°	1007	1006	1006
20°	1006	1005	1004
25°	1004	1002	1000
30°	999	996	994
35°	993	990	987
40°	984	978	976
45°	971	966	963
50°	953	946	943
55°	931	917	916
60°	892	876	876
65°	834	815	817
70°	751	727	725
75°	630	605	603
80°	460	438	456
85°	261	239	244

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 971 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	70.8	3.4
10°-20°	204.0	9.7
20°-30°	311.0	14.8
30°-40°	376.8	17.9
40°-50°	391.4	18.6
50°-60°	350.1	16.6
60°-70°	255.2	12.1
70°-80°	126.4	6.0
80°-90°	22.6	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°	585.8	27.8
0°-40°	962.6	45.7
0°-60°	1704.1	80.8
0°-90°	2108.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2108.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	746	746	746	746	746	
5°	745	745	745	745	744	71
15°	723	722	722	723	722	204
25°	676	675	675	674	674	312
35°	604	604	603	602	601	378
45°	510	509	508	506	506	393
55°	397	394	391	391	390	353
65°	262	260	256	257	257	260
75°	121	119	116	119	116	129
85°	17	16	16	16	16	23
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	745.9	745.9	745.9	745.9	745.9
2.5°	745.9	745.7	745.7	745.9	745.4
5°	744.6	744.9	744.6	744.6	744.1
7.5°	741.7	741.4	741.1	741.4	740.6
10°	736.6	736.6	736.3	736.6	736.0
12.5°	730.4	730.4	730.4	730.7	730.4
15°	722.7	722.4	722.4	722.9	722.4
17.5°	713.6	713.3	713.3	713.0	712.5
20°	702.3	702.3	702.0	701.8	701.0
22.5°	690.3	690.0	689.2	689.2	688.1
25°	676.1	675.3	674.7	674.5	673.7
27.5°	660.6	659.5	658.7	658.1	657.3
30°	643.2	642.1	641.3	640.5	639.9
32.5°	624.4	623.9	622.6	622.3	621.2
35°	604.4	603.5	602.7	601.7	600.6
37.5°	582.9	582.1	580.3	579.7	578.9
40°	560.2	559.1	556.7	556.7	555.9
42.5°	535.8	534.8	533.2	532.1	531.6
45°	510.4	509.3	507.5	506.4	505.9
47.5°	483.4	482.6	480.4	479.6	478.8
50°	455.3	454.2	451.8	451.3	450.5
52.5°	425.8	425.3	422.1	421.8	421.0
55°	396.7	393.7	391.0	391.0	390.5
57.5°	364.5	362.4	358.9	358.9	358.4
60°	331.3	329.5	325.5	326.0	325.5
62.5°	299.0	294.9	291.2	292.8	291.5
65°	262.0	259.9	255.9	256.9	256.7
67.5°	228.3	224.3	220.5	222.7	221.6
70°	190.8	188.7	184.9	187.1	184.4
72.5°	155.5	153.6	149.9	152.3	149.6
75°	121.2	119.4	116.4	118.6	115.9
77.5°	88.9	87.5	84.8	87.0	87.5
80°	59.4	57.8	56.5	58.3	58.9
82.5°	34.8	33.7	33.2	33.5	34.8
85°	16.9	15.5	15.5	15.8	15.8
87.5°	4.6	4.0	4.6	4.8	5.1
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)