

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: P974489

Luminaire Tested: FLR2-24-20-L950-CA080

Issue Date: 3/13/2025

Test Information

Test Method: LM-79-2019
Report Number: P974489
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-L950-CA080
Description: SHAPER SENSE CIRCLE

Light Source: FLR2-24-20-L950-CA080
Ballast/Driver: -

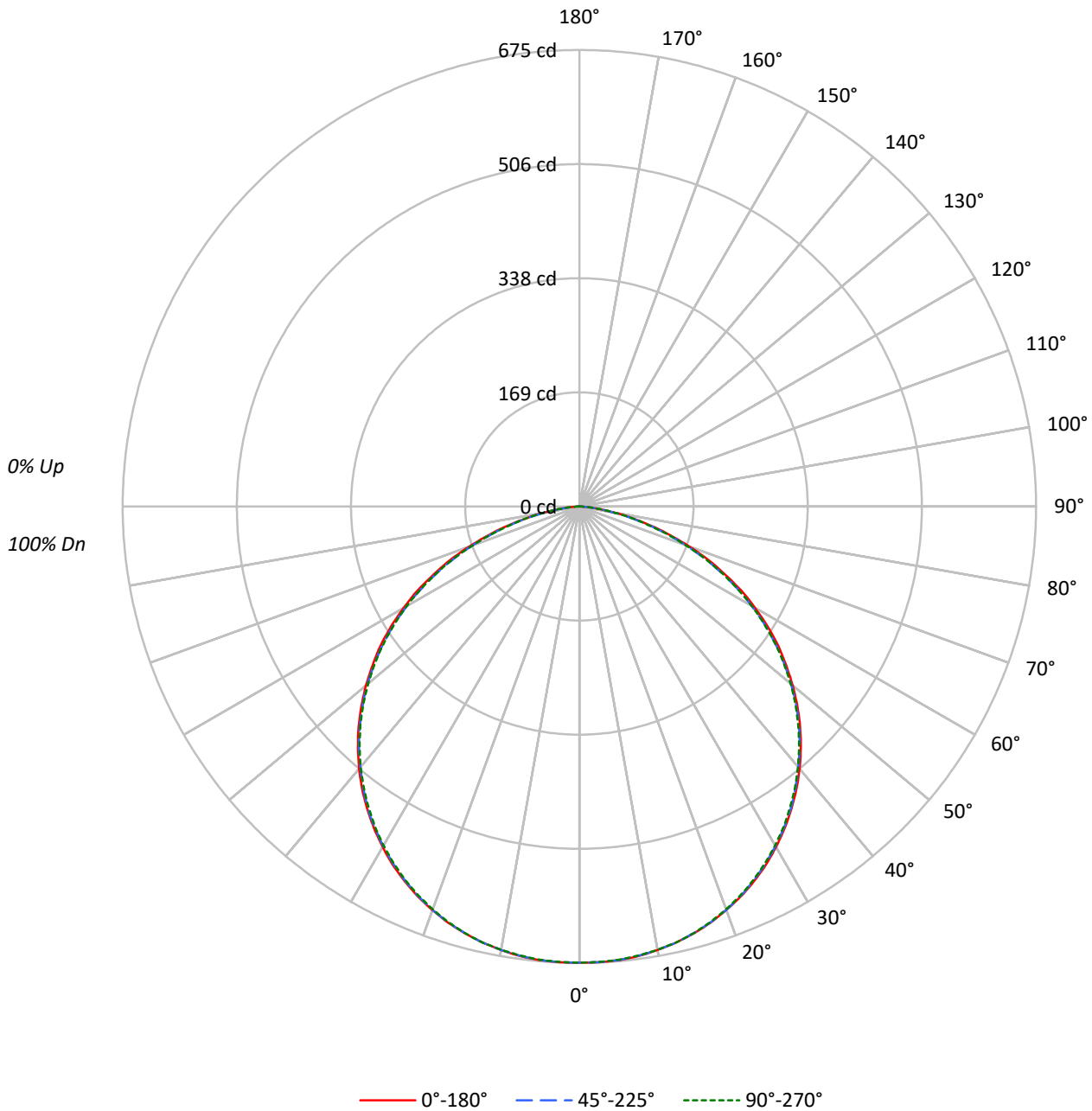
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1906.6 lumens
Efficiency: N/A
Efficacy: 114.2 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										
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	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°	908	908	908
5°	910	910	909
10°	910	910	909
15°	910	910	910
20°	909	909	908
25°	908	906	904
30°	904	901	899
35°	898	895	892
40°	890	884	883
45°	878	873	871
50°	862	855	853
55°	841	829	828
60°	806	792	792
65°	755	737	739
70°	679	658	656
75°	570	547	545
80°	416	396	412
85°	235	216	221

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 878 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	64.0	3.4
10°-20°	184.5	9.7
20°-30°	281.3	14.8
30°-40°	340.8	17.9
40°-50°	354.0	18.6
50°-60°	316.6	16.6
60°-70°	230.8	12.1
70°-80°	114.3	6.0
80°-90°	20.4	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°	529.7	27.8
0°-40°	870.5	45.7
0°-60°	1541.1	80.8
0°-90°	1906.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1906.6	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	675	675	675	675	675	
5°	673	674	673	673	673	64
15°	654	653	653	654	653	185
25°	611	611	610	610	609	282
35°	546	546	545	544	543	342
45°	462	461	459	458	458	356
55°	359	356	354	354	353	320
65°	237	235	231	232	232	235
75°	110	108	105	107	105	117
85°	15	14	14	14	14	21
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	674.6	674.6	674.6	674.6	674.6
2.5°	674.6	674.3	674.3	674.6	674.1
5°	673.4	673.6	673.4	673.4	672.9
7.5°	670.7	670.5	670.2	670.5	669.7
10°	666.1	666.1	665.9	666.1	665.6
12.5°	660.5	660.5	660.5	660.8	660.5
15°	653.5	653.3	653.3	653.8	653.3
17.5°	645.3	645.0	645.0	644.8	644.3
20°	635.1	635.1	634.9	634.6	633.9
22.5°	624.2	624.0	623.3	623.3	622.3
25°	611.4	610.7	610.2	610.0	609.2
27.5°	597.4	596.4	595.7	595.2	594.5
30°	581.6	580.7	579.9	579.2	578.7
32.5°	564.7	564.2	563.0	562.8	561.8
35°	546.5	545.8	545.1	544.1	543.1
37.5°	527.2	526.4	524.8	524.3	523.5
40°	506.6	505.6	503.5	503.5	502.7
42.5°	484.6	483.6	482.2	481.2	480.7
45°	461.6	460.6	458.9	457.9	457.5
47.5°	437.1	436.4	434.5	433.7	433.0
50°	411.7	410.7	408.6	408.1	407.4
52.5°	385.1	384.6	381.7	381.5	380.7
55°	358.7	356.0	353.6	353.6	353.1
57.5°	329.7	327.7	324.6	324.6	324.1
60°	299.7	298.0	294.3	294.8	294.3
62.5°	270.4	266.7	263.3	264.8	263.6
65°	237.0	235.0	231.4	232.4	232.1
67.5°	206.5	202.8	199.4	201.4	200.4
70°	172.6	170.6	167.3	169.2	166.8
72.5°	140.6	138.9	135.5	137.7	135.3
75°	109.6	108.0	105.3	107.2	104.8
77.5°	80.4	79.1	76.7	78.7	79.1
80°	53.7	52.3	51.1	52.8	53.2
82.5°	31.5	30.5	30.0	30.3	31.5
85°	15.2	14.0	14.0	14.3	14.3
87.5°	4.1	3.6	4.1	4.4	4.6
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)