

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: IRiS

Report Number: P1334728

Luminaire Tested: P3A02R259727DE010 E3A451WMH

Issue Date: 2/13/2026

Test Information

Test Method: LM-79-2019
Report Number: P1334728
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2510-583-75)
Test Lab: INNOVATION CENTER
Issue Date: 2/13/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: IRiS
Catalog Number: P3A02R259727DE010 E3A451WMH
Description: 3in Adjustable LED luminaire with, R25 optic, 2700K CCT AND, 97CRI , E3A451WMH TRIM
Light Source: -
Ballast/Driver: -

Summary

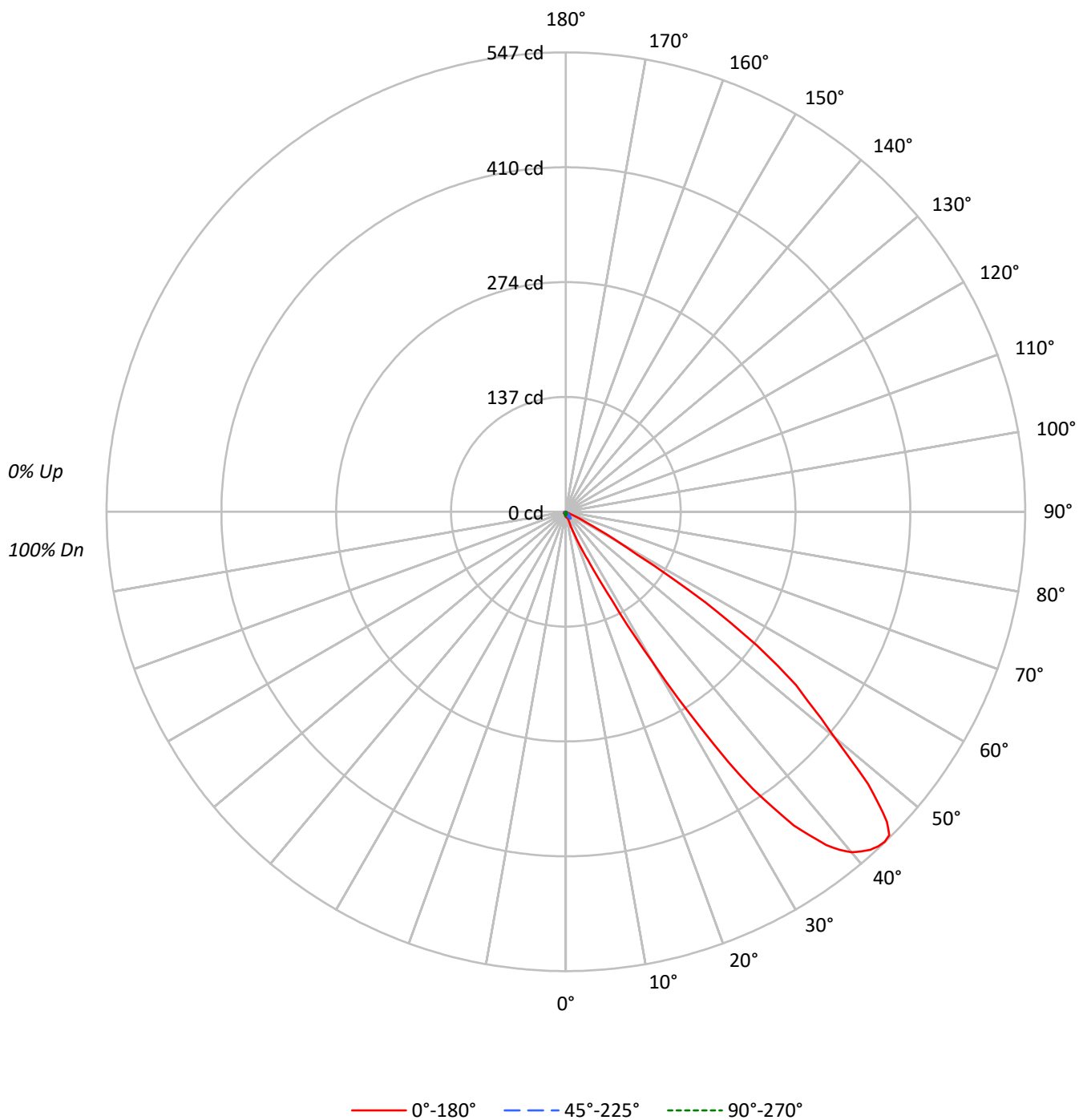
Lumens per Lamp: N/A
Luminaire Lumens: 114.0 lumens
Efficiency: N/A
Efficacy: 31.7 lumens/watt
Spacing Criteria (0/90/45): 3.65 / 0.6 / 1.37
Luminous Opening: Circular (Dia: 0.25' x H: 0')
CIE Type: Direct

Input Watts (W): 3.6
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
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
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10
RCR																				
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100		
1	110	106	102	99	108	104	101	97	100	97	94	96	94	92	92	91	89	87		
2	101	93	87	82	98	91	86	81	88	83	79	85	81	77	82	78	75	73		
3	92	81	74	67	89	80	73	67	77	71	66	74	69	64	72	67	63	61		
4	83	71	62	56	81	70	62	55	67	60	55	65	59	54	63	58	53	51		
5	75	62	53	46	73	61	53	46	59	51	46	57	50	45	55	49	45	42		
6	68	55	45	39	66	54	45	39	52	44	38	50	43	38	48	42	37	35		
7	62	48	39	32	60	47	39	32	46	38	32	44	37	32	43	36	32	29		
8	57	43	34	27	55	42	33	27	40	33	27	39	32	27	38	32	27	25		
9	52	38	29	23	51	37	29	23	36	28	23	35	28	23	34	27	23	21		
10	48	34	25	20	47	33	25	20	32	25	20	31	24	19	30	24	19	17		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°	135°	180°
0°	1272	1272	1272	1272	1272
5°	1453	1387	1233	1101	1079
10°	1447	1314	1047	913	913
15°	1612	1135	817	772	817
20°	5717	1120	630	653	723
25°	16428	1428	508	605	702
30°	52438	2203	405	582	709
35°	114840	2597	348	562	723
40°	151484	2347	286	573	773
45°	168917	1644	279	620	837
50°	142187	853	273	648	921
55°	106319	344	268	726	1032
60°	32892	88	263	789	1140
65°	2802	0	311	830	1245
70°	192	64	321	962	1410
75°	169	85	424	1017	1610
80°	126	126	631	1137	1894
85°	252	252	1006	1258	2013

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 168917 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	0.5	0.5
10°-20°	1.3	1.2
20°-30°	6.3	5.5
30°-40°	30.4	26.6
40°-50°	47.6	41.8
50°-60°	24.4	21.4
60°-70°	2.3	2.0
70°-80°	0.8	0.7
80°-90°	0.4	0.3
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°	8.2	7.2
0°-40°	38.5	33.8
0°-60°	110.5	97.0
0°-90°	114.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	114.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	6	6	6	6	6	
5°	7	6	6	5	5	1
15°	7	5	4	3	4	3
25°	68	6	2	2	3	42
35°	429	10	1	2	3	260
45°	545	5	1	2	3	399
55°	278	1	1	2	3	232
65°	5	0	1	2	2	17
75°	0	0	0	1	2	0
85°	0	0	0	0	1	0
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	2.5°	5°	7.5°	10°	12.5°	15°	17.5°	20°	22.5°	45°
0°	5.8	5.8	5.8	5.8	5.8	5.8	5.8	5.8	5.8	5.8	5.8
2.5°	6.3	6.3	6.3	6.3	6.3	6.3	6.2	6.2	6.3	6.2	6.2
5°	6.6	6.6	6.6	6.6	6.6	6.6	6.6	6.5	6.5	6.5	6.3
7.5°	6.7	6.6	6.6	6.6	6.6	6.6	6.6	6.6	6.5	6.5	6.2
10°	6.5	6.5	6.5	6.5	6.4	6.4	6.4	6.3	6.3	6.3	5.9
12.5°	6.5	6.5	6.5	6.5	6.4	6.4	6.3	6.3	6.2	6.1	5.4
15°	7.1	7.1	7.1	7.0	6.9	6.8	6.7	6.6	6.5	6.3	5.0
17.5°	10.4	10.1	10.0	9.6	9.1	8.6	8.2	7.8	7.4	7.1	4.8
20°	24.5	24.4	23.9	22.7	21.4	19.9	18.4	16.7	14.2	12.6	4.8
22.5°	42.4	41.8	40.9	40.0	37.7	35.0	32.2	29.0	25.9	22.6	5.1
25°	67.9	69.3	66.3	63.9	59.9	55.0	49.7	45.2	39.6	34.4	5.9
27.5°	118.1	119.0	113.1	105.2	95.9	85.6	75.5	68.0	58.6	50.0	7.4
30°	207.1	208.0	198.0	181.4	162.1	145.2	122.2	102.0	83.5	69.1	8.7
31°	258.4	251.4	239.9	223.7	199.3	173.7	146.2	121.8	98.3	79.5	9.1
32°	303.1	302.5	289.0	264.5	240.1	208.5	174.3	142.5	113.7	89.9	9.4
33°	355.7	351.7	332.8	309.7	277.3	245.5	201.3	165.0	129.4	101.5	9.6
34°	398.0	387.1	379.3	352.9	318.7	278.2	230.9	188.9	149.1	112.8	9.7
35°	429.0	426.6	411.4	386.8	352.0	310.6	262.8	213.7	165.5	125.8	9.7
36°	461.8	454.6	439.8	417.5	383.6	340.8	287.2	235.1	184.7	137.5	9.6
37°	482.3	478.1	463.4	440.4	407.2	366.3	314.5	257.8	199.9	149.3	9.4
38°	503.5	495.0	480.4	458.5	425.8	387.4	334.3	275.3	214.0	159.6	9.1
39°	518.1	509.3	494.5	472.6	440.7	402.6	349.9	290.1	226.2	167.3	8.7
40°	529.2	520.6	505.6	483.1	451.6	414.5	362.9	303.3	236.4	174.1	8.2
41°	536.0	528.1	513.1	490.8	459.2	421.3	371.5	311.8	243.4	178.6	7.7
42°	541.7	533.6	518.3	495.5	463.8	427.2	376.7	317.2	248.1	180.9	7.3
43°	544.9	536.8	522.0	498.6	466.6	429.9	379.5	319.7	249.7	180.6	6.6
44°	546.7	538.3	523.4	500.0	467.8	430.6	379.7	319.2	248.6	178.2	6.0
45°	544.7	536.4	522.0	498.6	465.7	428.4	377.7	316.5	244.4	173.4	5.3
46°	531.7	525.3	512.0	490.6	459.1	422.7	372.6	311.3	237.9	167.6	4.5
47°	508.7	503.6	490.8	474.8	446.3	412.4	363.1	301.4	228.7	158.9	3.6
48°	484.7	477.2	465.3	448.9	424.8	393.8	347.6	286.8	214.9	147.5	3.2
49°	449.3	444.9	434.4	416.1	396.2	368.9	325.6	268.1	197.9	135.0	2.8
50°	416.8	413.8	399.1	385.6	364.5	339.0	295.8	243.6	176.9	119.6	2.5
51°	391.4	387.8	377.2	360.4	337.9	308.3	267.6	211.7	152.7	101.2	2.0
52°	365.0	362.9	353.5	336.3	314.1	284.6	240.3	184.6	129.2	85.6	1.6
53°	343.3	340.4	328.8	313.5	289.5	259.0	210.6	159.4	109.4	71.9	1.4
54°	311.7	310.5	303.1	287.0	261.0	227.8	183.7	134.2	91.3	61.0	1.2
55°	278.1	274.1	266.5	253.8	229.9	198.9	152.6	111.3	73.8	51.4	0.9
56°	237.2	236.9	223.5	212.9	191.7	158.8	121.9	86.9	60.0	42.8	0.8
57°	198.0	191.7	178.8	168.2	145.5	120.5	90.5	65.1	46.9	34.7	0.6
58°	146.5	143.2	139.7	124.3	103.2	85.4	64.6	45.7	34.7	26.5	0.4
59°	99.4	99.3	95.3	83.6	71.4	53.2	40.3	31.1	23.9	19.5	0.3
60°	75.0	73.2	65.2	57.5	44.9	33.6	23.9	18.4	14.8	12.5	0.2
62.5°	26.3	27.3	24.0	19.9	15.1	12.4	9.5	7.7	6.3	5.1	0.0
65°	5.4	5.9	5.1	4.8	3.8	3.3	2.9	2.5	2.1	1.8	0.0



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CANDELA DISTRIBUTION (continued):

	0°	2.5°	5°	7.5°	10°	12.5°	15°	17.5°	20°	22.5°	45°
67.5°	0.7	0.6	0.6	0.6	0.5	0.5	0.5	0.5	0.4	0.4	0.1
70°	0.3	0.3	0.3	0.3	0.3	0.3	0.2	0.2	0.2	0.2	0.1
72.5°	0.3	0.3	0.3	0.2	0.2	0.2	0.2	0.2	0.2	0.1	0.1
75°	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.1	0.1	0.1	0.1
77.5°	0.2	0.2	0.2	0.2	0.2	0.2	0.1	0.1	0.1	0.1	0.1
80°	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1
82.5°	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.2
85°	0.1	0.1	0.1	0.0	0.0	0.1	0.1	0.1	0.1	0.1	0.1
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

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CANDELA DISTRIBUTION (continued):

	67.5°	90°	112.5°	135°	157.5°	180°
0°	5.8	5.8	5.8	5.8	5.8	5.8
2.5°	6.1	5.9	5.6	5.5	5.4	5.4
5°	6.0	5.6	5.3	5.0	4.9	4.9
7.5°	5.7	5.2	4.8	4.6	4.5	4.4
10°	5.4	4.7	4.3	4.1	4.1	4.1
12.5°	4.8	4.2	3.8	3.7	3.8	3.8
15°	4.3	3.6	3.4	3.4	3.5	3.6
17.5°	3.7	3.2	3.0	3.1	3.2	3.3
20°	3.3	2.7	2.7	2.8	3.1	3.1
22.5°	2.9	2.4	2.4	2.7	2.9	3.0
25°	2.6	2.1	2.2	2.5	2.8	2.9
27.5°	2.2	1.8	2.0	2.4	2.7	2.8
30°	1.9	1.6	1.9	2.3	2.6	2.8
31°	1.8	1.5	1.9	2.2	2.6	2.8
32°	1.6	1.5	1.8	2.2	2.6	2.7
33°	1.5	1.4	1.8	2.2	2.6	2.7
34°	1.4	1.3	1.7	2.2	2.6	2.7
35°	1.2	1.3	1.7	2.1	2.5	2.7
36°	1.1	1.2	1.7	2.1	2.5	2.7
37°	1.0	1.2	1.6	2.1	2.5	2.7
38°	0.9	1.1	1.6	2.1	2.5	2.7
39°	0.8	1.1	1.5	2.1	2.5	2.7
40°	0.7	1.0	1.5	2.0	2.5	2.7
41°	0.7	1.0	1.5	2.0	2.5	2.7
42°	0.6	1.0	1.5	2.0	2.5	2.7
43°	0.5	0.9	1.5	2.0	2.5	2.7
44°	0.4	0.9	1.4	2.0	2.5	2.7
45°	0.4	0.9	1.4	2.0	2.5	2.7
46°	0.3	0.8	1.4	2.0	2.5	2.7
47°	0.2	0.8	1.4	1.9	2.5	2.7
48°	0.2	0.8	1.4	1.9	2.5	2.7
49°	0.2	0.8	1.3	1.9	2.5	2.7
50°	0.2	0.8	1.3	1.9	2.5	2.7
51°	0.1	0.7	1.3	1.9	2.5	2.7
52°	0.1	0.7	1.3	1.9	2.5	2.8
53°	0.1	0.7	1.3	1.9	2.5	2.7
54°	0.1	0.7	1.2	1.9	2.5	2.7
55°	0.1	0.7	1.2	1.9	2.5	2.7
56°	0.1	0.6	1.2	1.8	2.5	2.7
57°	0.2	0.6	1.2	1.8	2.5	2.6
58°	0.2	0.6	1.2	1.8	2.4	2.6
59°	0.2	0.6	1.2	1.8	2.4	2.6
60°	0.2	0.6	1.1	1.8	2.4	2.6
62.5°	0.2	0.6	1.1	1.7	2.3	2.5
65°	0.2	0.6	1.0	1.6	2.3	2.4



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CANDELA DISTRIBUTION (continued):

	67.5°	90°	112.5°	135°	157.5°	180°
67.5°	0.2	0.5	1.0	1.5	2.2	2.3
70°	0.3	0.5	0.9	1.5	2.1	2.2
72.5°	0.3	0.5	0.9	1.3	1.9	2.1
75°	0.3	0.5	0.8	1.2	1.8	1.9
77.5°	0.3	0.5	0.7	1.1	1.6	1.7
80°	0.4	0.5	0.6	0.9	1.4	1.5
82.5°	0.4	0.5	0.5	0.7	1.1	1.2
85°	0.3	0.4	0.4	0.5	0.7	0.8
87.5°	0.3	0.4	0.3	0.2	0.4	0.4
90°	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)