

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: P1311195

Luminaire Tested: P3SQAS09R459050DE010 E3SQCA451MW

Issue Date: 1/29/2026

Test Information

Test Method: LM-79-2019
Report Number: P1311195
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2510-583-84)
Test Lab: INNOVATION CENTER
Issue Date: 1/29/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: IRiS
Catalog Number: P3SQAS09R459050DE010 E3SQCA451MW
Description: 3in Adjustable LED luminaire with, R45 optic, 5000K CCT AND, 90CRI , E3SQCA451MW TRIM
Light Source: -
Ballast/Driver: -

Summary

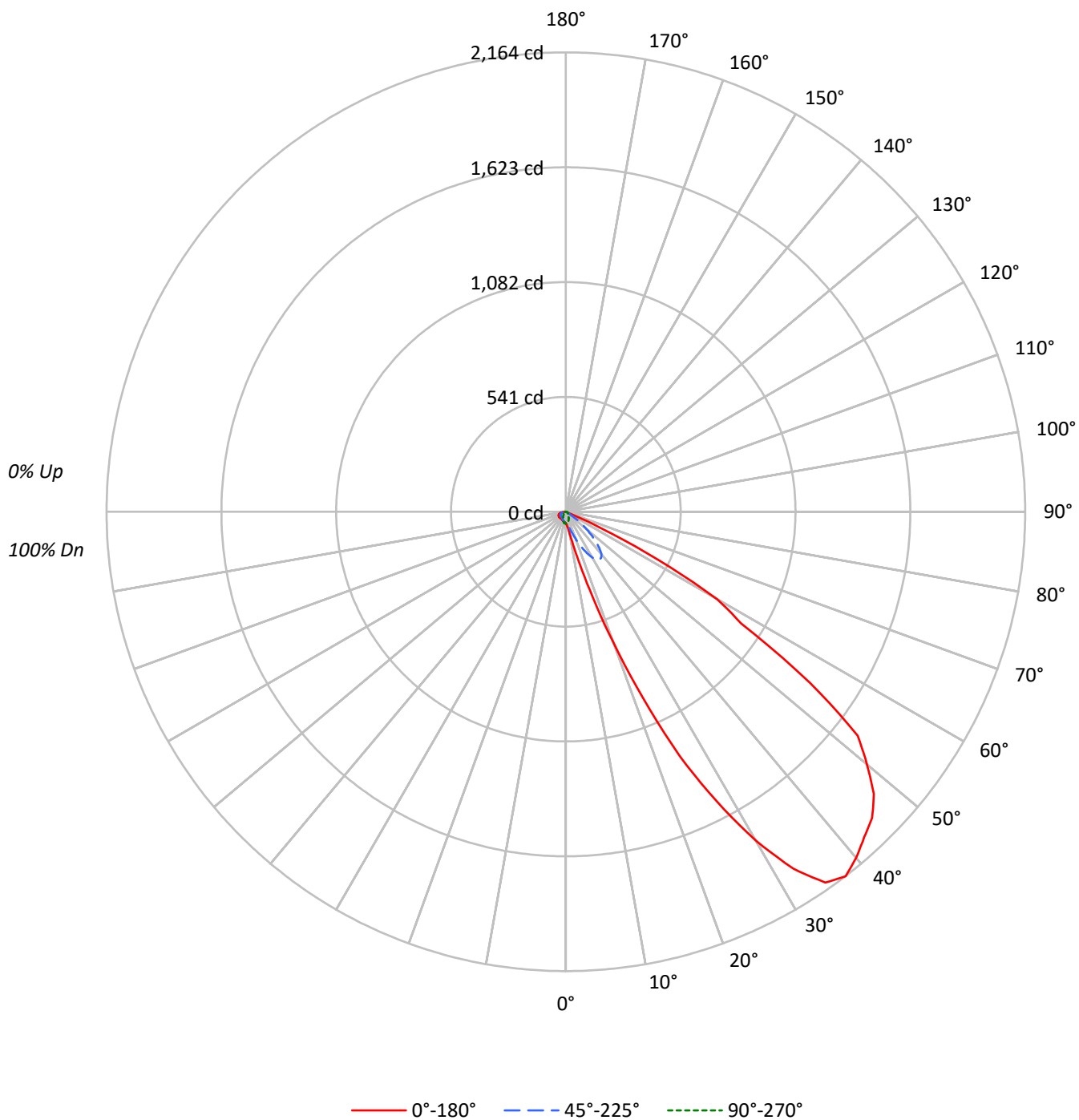
Lumens per Lamp: N/A
Luminaire Lumens: 967.1 lumens
Efficiency: N/A
Efficacy: 87.1 lumens/watt
Spacing Criteria (0/90/45): 3.81 / 0.82 / 1.83
Luminous Opening: Rectangular (W 0.25' x L: 0.25' x H: 0')
CIE Type: Direct

Input Watts (W): 11.1
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

TEST NUMBER: P1311195

CATALOG NUMBER: P3SQAS09R459050DE010 E3SQCA451MW

Luminous Intensity Polar Plot



TEST NUMBER: P1311195

CATALOG NUMBER: P3SQAS09R459050DE010 E3SQCA451MW

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
RCR																	
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102
1	110	106	102	99	107	104	100	97	99	97	94	96	93	91	92	90	88
2	100	93	86	81	98	91	85	80	87	83	78	84	80	77	81	78	75
3	91	81	73	67	89	80	72	66	77	70	65	74	69	64	71	67	63
4	83	71	62	56	81	70	62	55	67	60	55	65	59	54	63	58	53
5	76	63	53	47	73	61	53	46	59	52	46	57	51	45	55	50	45
6	69	55	46	39	67	54	46	39	52	45	39	51	44	39	49	43	38
7	63	49	40	34	61	48	40	33	47	39	33	45	38	33	44	37	33
8	58	44	35	29	56	43	35	29	42	34	29	40	33	28	39	33	28
9	53	39	31	25	52	39	30	25	38	30	25	36	29	25	35	29	24
10	49	35	27	22	48	35	27	22	34	27	21	33	26	21	32	26	21

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°	135°	180°
0°	9627	9627	9627	9627	9627
5°	11462	10632	9526	8834	8834
10°	18310	12434	8936	8377	8377
15°	45591	16671	8113	7827	8113
20°	120082	24889	7038	7459	7899
25°	241106	36903	6081	6993	7734
30°	355452	49418	4932	6841	7955
35°	448369	57965	4205	6728	8242
40°	478373	58566	3777	7014	8813
45°	497032	48858	3507	7599	9548
50°	496235	34027	3430	8145	10717
55°	421777	15103	3603	9128	11770
60°	283478	3031	3582	10196	13502
65°	75227	1304	3586	11084	15323
70°	2014	1611	3626	12085	17322
75°	1597	1597	3726	12776	19696
80°	1587	2380	3967	13488	22216
85°	1581	3162	6323	14227	22132

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 10°

Vertical Angle: 47.5°

Luminance: 509818 cd/sqm

TEST NUMBER: P1311195

CATALOG NUMBER: P3SQAS09R459050DE010 E3SQCA451MW

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	5.6	0.6
10°-20°	27.3	2.8
20°-30°	112.5	11.6
30°-40°	237.1	24.5
40°-50°	292.5	30.2
50°-60°	219.3	22.7
60°-70°	56.4	5.8
70°-80°	11.7	1.2
80°-90°	4.8	0.5
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°	145.3	15.0
0°-40°	382.4	39.5
0°-60°	894.2	92.5
0°-90°	967.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	967.1	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	56	56	56	56	56	
5°	66	62	55	51	51	7
15°	256	94	46	44	46	94
25°	1269	194	32	37	41	591
35°	2133	276	20	32	39	1300
45°	2041	201	14	31	39	1562
55°	1405	50	12	30	39	1213
65°	185	3	9	27	38	266
75°	2	2	6	19	30	3
85°	1	2	3	7	11	1
90°	0	0	0	0	0	

TEST NUMBER: P1311195

CATALOG NUMBER: P3SQAS09R459050DE010 E3SQCA451MW

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	45°	67.5°	90°	112.5°
0°	55.9	55.9	55.9	55.9	55.9	55.9	55.9	55.9	55.9	55.9	55.9
2.5°	59.1	59.1	59.1	59.1	59.1	59.1	59.1	58.3	57.5	55.9	54.3
5°	66.3	65.5	65.5	65.5	64.7	63.9	63.9	61.5	58.3	55.1	52.7
7.5°	78.3	78.3	77.5	75.9	75.1	73.5	71.9	65.5	58.3	53.5	50.3
10°	104.7	103.1	100.7	99.1	95.1	89.5	85.5	71.1	57.5	51.1	48.7
12.5°	156.6	159.8	151.8	143.8	132.6	122.2	109.5	80.7	57.5	48.7	46.3
15°	255.7	261.3	246.1	230.1	202.9	177.4	153.4	93.5	55.9	45.5	43.1
17.5°	417.9	425.1	399.5	362.0	319.6	268.5	224.5	111.1	54.3	42.3	40.7
20°	655.2	654.4	604.8	557.7	476.2	401.1	318.8	135.8	51.9	38.4	38.4
22.5°	946.8	950.0	889.3	804.6	688.7	568.1	437.1	164.6	48.7	35.2	36.0
25°	1268.8	1241.7	1169.7	1066.7	918.9	751.9	579.3	194.2	45.5	32.0	33.6
27.5°	1537.3	1510.9	1428.6	1306.4	1147.4	949.2	723.9	223.7	41.5	28.8	31.2
30°	1787.4	1753.8	1654.7	1516.5	1327.2	1113.0	859.7	248.5	36.8	24.8	28.8
32.5°	1993.5	1963.2	1850.5	1689.9	1483.8	1253.6	974.8	267.7	32.0	22.4	27.2
35°	2132.6	2101.4	1997.5	1820.9	1596.4	1355.9	1068.3	275.7	28.0	20.0	26.4
37.5°	2164.5	2147.7	2073.4	1908.0	1673.9	1421.4	1128.2	273.3	23.2	18.4	24.8
40°	2127.8	2131.8	2096.6	1959.2	1715.5	1449.4	1153.0	260.5	19.2	16.8	24.0
42.5°	2080.6	2091.0	2088.6	1979.9	1733.0	1451.0	1142.6	234.9	15.2	15.2	23.2
45°	2040.7	2051.1	2065.4	1971.2	1721.1	1430.2	1109.8	200.6	11.2	14.4	23.2
47.5°	1968.0	1979.1	1999.9	1900.8	1660.3	1376.7	1050.7	163.0	8.0	13.6	22.4
50°	1852.1	1857.7	1852.1	1741.0	1543.7	1290.4	954.8	127.0	5.6	12.8	22.4
52.5°	1733.0	1721.9	1675.5	1534.9	1358.3	1153.8	834.2	90.3	4.0	12.0	21.6
55°	1404.7	1387.1	1352.7	1266.4	1165.8	986.0	674.4	50.3	4.0	12.0	20.8
57.5°	978.8	988.4	1000.4	982.8	936.4	776.6	512.2	22.4	4.0	11.2	20.8
60°	823.0	815.0	815.8	804.6	727.9	566.5	352.4	8.8	4.0	10.4	20.0
62.5°	491.4	497.0	507.4	509.8	433.9	316.4	184.6	4.0	4.0	9.6	19.2
65°	184.6	193.4	169.4	147.0	116.7	85.5	43.1	3.2	4.8	8.8	17.6
67.5°	5.6	6.4	8.0	7.2	7.2	6.4	4.8	3.2	4.8	8.0	16.8
70°	4.0	4.0	4.0	4.0	4.0	3.2	3.2	3.2	4.0	7.2	15.2
72.5°	3.2	3.2	3.2	3.2	3.2	3.2	3.2	3.2	4.0	6.4	13.6
75°	2.4	3.2	2.4	2.4	2.4	2.4	2.4	2.4	4.0	5.6	11.2
77.5°	2.4	2.4	2.4	2.4	2.4	2.4	2.4	2.4	3.2	4.8	9.6
80°	1.6	1.6	1.6	1.6	1.6	1.6	1.6	2.4	3.2	4.0	8.0
82.5°	1.6	1.6	1.6	0.8	1.6	1.6	1.6	1.6	3.2	3.2	6.4
85°	0.8	0.8	0.8	0.8	0.8	0.8	0.8	1.6	2.4	3.2	4.0
87.5°	0.0	0.0	0.0	0.0	0.8	0.8	0.8	1.6	2.4	2.4	2.4
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1311195

CATALOG NUMBER: P3SQAS09R459050DE010 E3SQCA451MW

CANDELA DISTRIBUTION (continued):

	135°	157.5°	180°
0°	55.9	55.9	55.9
2.5°	52.7	52.7	52.7
5°	51.1	51.1	51.1
7.5°	49.5	49.5	49.5
10°	47.9	47.9	47.9
12.5°	46.3	46.3	47.1
15°	43.9	45.5	45.5
17.5°	42.3	43.9	44.7
20°	40.7	42.3	43.1
22.5°	38.4	40.7	42.3
25°	36.8	40.0	40.7
27.5°	35.2	39.2	40.7
30°	34.4	38.4	40.0
32.5°	32.8	37.6	39.2
35°	32.0	37.6	39.2
37.5°	32.0	36.8	39.2
40°	31.2	36.8	39.2
42.5°	31.2	36.8	39.2
45°	31.2	36.8	39.2
47.5°	30.4	36.8	40.0
50°	30.4	37.6	40.0
52.5°	30.4	37.6	40.0
55°	30.4	37.6	39.2
57.5°	29.6	36.8	39.2
60°	29.6	36.8	39.2
62.5°	28.0	36.0	38.4
65°	27.2	35.2	37.6
67.5°	25.6	34.4	36.0
70°	24.0	32.0	34.4
72.5°	21.6	30.4	32.8
75°	19.2	28.0	29.6
77.5°	16.8	24.8	26.4
80°	13.6	20.8	22.4
82.5°	10.4	16.0	16.8
85°	7.2	10.4	11.2
87.5°	3.2	4.8	5.6
90°	0.0	0.0	0.0

(END OF REPORT)