

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: P1306026

Luminaire Tested: P3SQASS17R159024DE010 E3SQCA451MW

Issue Date: 1/29/2026

Test Information

Test Method: LM-79-2019
Report Number: P1306026
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2510-583-73)
Test Lab: INNOVATION CENTER
Issue Date: 1/29/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: IRiS
Catalog Number: P3SQASS17R159024DE010 E3SQCA451MW
Description: 3in Adjustable LED luminaire with, R15 optic, 2400K CCT AND, 90CRI , E3SQCA451MW TRIM
Light Source: -
Ballast/Driver: -

Summary

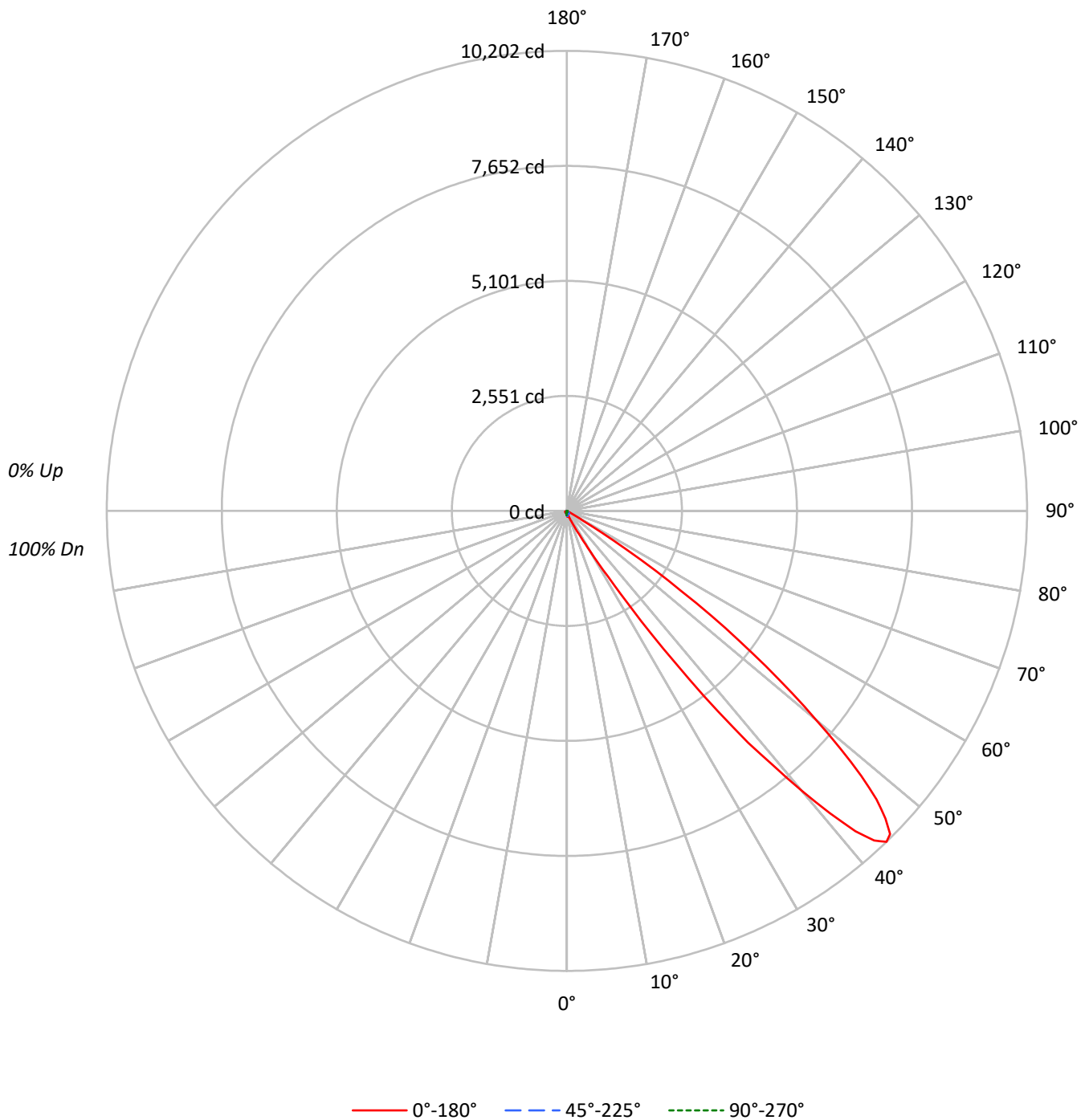
Lumens per Lamp: N/A
Luminaire Lumens: 1139.0 lumens
Efficiency: N/A
Efficacy: 53.7 lumens/watt
Spacing Criteria (0/90/45): 3.26 / 0.47 / 1.08
Luminous Opening: Rectangular (W 0.25' x L: 0.25' x H: 0')
CIE Type: Direct

Input Watts (W): 21.2
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: P1306026

CATALOG NUMBER: P3SQASS17R159024DE010 E3SQCA451MW

Luminous Intensity Polar Plot



TEST NUMBER: P1306026

CATALOG NUMBER: P3SQASS17R159024DE010 E3SQCA451MW

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	110	106	102	99	107	104	100	97	100	97	94		96	93	91		92	90	89	87
2	101	93	87	81	98	91	85	80	87	83	78		84	80	77		81	78	75	73
3	91	81	73	67	89	79	72	66	76	70	65		74	68	64		71	67	63	61
4	83	71	62	55	80	69	61	55	67	60	54		64	58	53		62	57	53	50
5	75	62	52	46	73	61	52	45	58	51	45		56	50	44		55	49	44	42
6	68	54	45	38	66	53	44	38	51	43	37		49	42	37		48	42	37	35
7	62	47	38	32	60	47	38	32	45	37	31		44	36	31		42	36	31	29
8	56	42	33	27	55	41	33	27	40	32	26		39	31	26		37	31	26	24
9	52	37	28	22	50	37	28	22	35	28	22		34	27	22		33	27	22	20
10	48	33	25	19	46	33	25	19	32	24	19		31	24	19		30	23	19	17

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°	135°	180°
0°	17412	17412	17412	17412	17412
5°	21593	19242	15715	13744	13554
10°	21248	16491	12119	10720	10930
15°	17616	11750	8701	8915	9521
20°	30589	9365	6653	7698	8742
25°	68201	11231	5397	7126	8209
30°	203937	13781	4733	7000	8591
35°	785076	15516	4289	7169	9083
40°	1822262	13534	4092	7397	9712
45°	2468184	10230	3605	8013	10522
50°	1935265	6082	3644	8520	11575
55°	928887	2732	3423	9218	12611
60°	84871	379	3134	9782	14088
65°	9251	0	2771	10188	15282
70°	2266	0	3424	10877	16567
75°	2262	732	4525	12111	18898
80°	2281	2281	5653	12397	20233
85°	2174	2174	8892	11263	22527

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 2468184 cd/sqm

TEST NUMBER: P1306026

CATALOG NUMBER: P3SQASS17R159024DE010 E3SQCA451MW

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	8.6	0.8
10°-20°	18.0	1.6
20°-30°	43.0	3.8
30°-40°	235.6	20.7
40°-50°	570.5	50.1
50°-60°	227.6	20.0
60°-70°	19.7	1.7
70°-80°	11.1	1.0
80°-90°	4.9	0.4
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°	69.6	6.1
0°-40°	305.2	26.8
0°-60°	1103.3	96.9
0°-90°	1139.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1139.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	101	101	101	101	101	
5°	125	111	91	80	78	12
15°	99	66	49	50	53	34
25°	359	59	28	38	43	216
35°	3734	74	20	34	43	2639
45°	10134	42	15	33	43	7149
55°	3094	9	11	31	42	2882
65°	23	0	7	25	38	58
75°	3	1	7	18	28	3
85°	1	1	4	6	11	1
90°	0	0	0	0	0	

TEST NUMBER: P1306026

CATALOG NUMBER: P3SQASS17R159024DE010 E3SQCA451MW

CANDELA DISTRIBUTION (FULL):

	0°	2.5°	5°	7.5°	10°	12.5°	15°	17.5°	20°	22.5°	45°
0°	101.1	101.1	101.1	101.1	101.1	101.1	101.1	101.1	101.1	101.1	101.1
2.5°	113.6	113.6	114.7	113.6	113.6	113.6	113.6	112.4	112.4	112.4	109.0
5°	124.9	124.9	124.9	124.9	123.8	123.8	123.8	122.7	122.7	121.5	111.3
7.5°	129.5	129.5	128.3	128.3	127.2	127.2	126.1	124.9	123.8	122.7	106.8
10°	121.5	121.5	121.5	120.4	120.4	119.2	118.1	117.0	115.8	113.6	94.3
12.5°	107.9	107.9	109.0	107.9	106.8	105.6	103.3	102.2	101.1	98.8	78.4
15°	98.8	98.8	98.8	97.7	96.5	94.3	93.1	90.9	89.7	86.3	65.9
17.5°	126.1	126.1	124.9	122.7	118.1	114.7	109.0	104.5	98.8	92.0	56.8
20°	166.9	166.9	164.7	162.4	156.7	151.0	142.0	134.0	124.9	117.0	51.1
22.5°	241.9	245.3	238.5	230.5	222.6	209.0	196.5	184.0	168.1	154.5	52.2
25°	358.9	362.3	358.9	340.7	325.9	307.8	283.9	258.9	231.7	206.7	59.1
27.5°	581.5	583.7	578.1	533.8	509.9	462.2	420.2	379.3	333.9	288.5	64.7
30°	1025.5	1026.7	990.3	901.7	823.4	718.9	630.3	545.1	473.6	400.9	69.3
31°	1350.3	1318.5	1241.3	1134.6	1009.6	868.8	747.3	637.1	530.4	452.0	70.4
32°	1714.9	1710.3	1582.0	1396.9	1230.0	1053.9	871.1	730.2	607.6	500.8	71.5
33°	2197.6	2199.8	1997.7	1779.6	1505.9	1269.7	1030.1	837.0	689.4	558.8	73.8
34°	2951.7	2774.5	2537.1	2241.9	1869.3	1513.9	1202.7	960.8	763.2	614.4	73.8
35°	3734.1	3555.8	3294.6	2847.2	2336.1	1838.7	1408.3	1093.7	851.8	674.6	73.8
36°	4610.9	4459.9	4064.6	3493.4	2841.5	2145.3	1626.3	1247.0	939.2	729.1	72.7
37°	5558.1	5336.6	4898.2	4274.7	3402.5	2576.9	1892.1	1399.2	1026.7	788.2	70.4
38°	6520.0	6320.1	5767.0	5011.8	4072.6	3032.3	2157.8	1545.7	1107.3	832.5	67.0
39°	7249.1	7140.1	6591.5	5747.7	4607.5	3463.9	2431.5	1702.4	1192.5	876.8	63.6
40°	8105.4	7929.4	7409.2	6365.5	5240.1	3903.4	2699.5	1841.0	1262.9	912.0	60.2
41°	8886.8	8664.2	8007.8	6999.3	5746.6	4298.6	2953.9	1984.1	1319.7	932.4	57.9
42°	9556.8	9297.9	8611.9	7542.1	6170.2	4614.3	3157.2	2086.3	1373.0	949.4	54.5
43°	9990.7	9766.9	9092.3	7949.8	6532.5	4903.9	3346.9	2193.0	1406.0	960.8	50.0
44°	10201.9	9975.9	9322.9	8205.4	6755.1	5077.7	3469.5	2266.8	1442.3	975.6	46.6
45°	10133.8	9904.4	9272.9	8209.9	6824.4	5140.1	3521.8	2299.8	1461.6	989.2	42.0
46°	9821.4	9660.2	9024.2	7996.4	6692.6	5073.1	3492.2	2274.8	1454.8	989.2	37.5
47°	9383.1	9199.1	8593.8	7629.6	6373.5	4900.5	3373.0	2198.7	1412.8	966.5	32.9
48°	8785.7	8629.0	7993.0	7047.0	5884.0	4524.6	3103.8	2074.9	1346.9	922.2	28.4
49°	8036.1	7818.1	7226.4	6301.9	5245.8	3990.8	2750.6	1865.9	1241.3	859.7	25.0
50°	7223.0	6953.8	6497.3	5555.8	4585.9	3421.8	2286.1	1577.5	1092.5	777.9	22.7
51°	6426.9	6153.2	5718.2	4917.5	3881.8	2839.2	1844.4	1259.5	899.5	665.5	19.3
52°	5601.2	5371.8	4884.6	4255.4	3323.0	2300.9	1536.6	1065.3	747.3	558.8	15.9
53°	4779.0	4622.3	4158.9	3521.8	2670.0	1879.6	1254.9	912.0	651.9	478.1	12.5
54°	3955.6	3784.1	3432.1	2864.2	2152.1	1483.2	1064.1	763.2	565.6	416.8	11.4
55°	3093.6	3005.0	2680.2	2183.9	1630.9	1183.4	863.1	656.4	473.6	348.7	9.1
56°	2382.7	2282.7	1986.3	1584.3	1211.8	926.7	698.4	536.0	400.9	291.9	6.8
57°	1560.4	1458.2	1261.8	1106.2	882.4	675.7	533.8	422.5	325.9	241.9	5.7
58°	922.2	829.1	798.4	681.4	588.3	458.8	394.1	314.6	240.8	190.8	3.4
59°	423.6	430.4	382.7	358.9	325.9	291.9	239.6	210.1	164.7	137.4	2.3
60°	246.4	232.8	227.1	203.3	180.6	160.1	144.2	127.2	103.3	88.6	1.1
62.5°	84.0	80.6	82.9	75.0	70.4	68.1	62.5	53.4	44.3	36.3	0.0
65°	22.7	22.7	21.6	20.4	19.3	18.2	17.0	14.8	13.6	11.4	0.0



TEST NUMBER: P1306026

CATALOG NUMBER: P3SQASS17R159024DE010 E3SQCA451MW

CANDELA DISTRIBUTION (continued):

	0°	2.5°	5°	7.5°	10°	12.5°	15°	17.5°	20°	22.5°	45°
67.5°	7.9	7.9	6.8	6.8	5.7	5.7	4.5	4.5	3.4	3.4	0.0
70°	4.5	4.5	4.5	3.4	3.4	3.4	2.3	2.3	2.3	1.1	0.0
72.5°	3.4	3.4	3.4	3.4	3.4	3.4	2.3	2.3	2.3	1.1	1.1
75°	3.4	3.4	3.4	2.3	2.3	2.3	2.3	2.3	2.3	2.3	1.1
77.5°	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3
80°	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	1.1	2.3
82.5°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	2.3
85°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1.1
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: P1306026

CATALOG NUMBER: P3SQASS17R159024DE010 E3SQCA451MW

CANDELA DISTRIBUTION (continued):

	67.5°	90°	112.5°	135°	157.5°	180°
0°	101.1	101.1	101.1	101.1	101.1	101.1
2.5°	104.5	99.9	94.3	90.9	89.7	88.6
5°	99.9	90.9	84.0	79.5	78.4	78.4
7.5°	89.7	79.5	72.7	70.4	69.3	69.3
10°	78.4	69.3	63.6	61.3	62.5	62.5
12.5°	65.9	57.9	55.6	55.6	56.8	57.9
15°	53.4	48.8	48.8	50.0	52.2	53.4
17.5°	44.3	42.0	43.2	45.4	47.7	50.0
20°	36.3	36.3	38.6	42.0	45.4	47.7
22.5°	30.7	31.8	35.2	38.6	43.2	45.4
25°	26.1	28.4	31.8	37.5	42.0	43.2
27.5°	22.7	26.1	30.7	36.3	40.9	43.2
30°	19.3	23.8	29.5	35.2	40.9	43.2
31°	18.2	22.7	28.4	35.2	40.9	43.2
32°	17.0	22.7	28.4	35.2	40.9	43.2
33°	15.9	21.6	28.4	34.1	40.9	43.2
34°	14.8	21.6	28.4	35.2	40.9	43.2
35°	13.6	20.4	27.3	34.1	39.7	43.2
36°	12.5	20.4	27.3	34.1	40.9	43.2
37°	11.4	20.4	27.3	34.1	39.7	43.2
38°	11.4	19.3	26.1	34.1	39.7	43.2
39°	10.2	18.2	26.1	34.1	39.7	43.2
40°	9.1	18.2	25.0	32.9	39.7	43.2
41°	7.9	17.0	25.0	32.9	39.7	43.2
42°	6.8	17.0	25.0	32.9	39.7	43.2
43°	5.7	15.9	23.8	32.9	39.7	43.2
44°	5.7	15.9	23.8	32.9	39.7	43.2
45°	4.5	14.8	22.7	32.9	39.7	43.2
46°	4.5	14.8	22.7	31.8	39.7	43.2
47°	3.4	14.8	22.7	31.8	39.7	43.2
48°	3.4	13.6	22.7	31.8	39.7	43.2
49°	2.3	13.6	22.7	31.8	39.7	43.2
50°	2.3	13.6	21.6	31.8	39.7	43.2
51°	2.3	13.6	21.6	31.8	39.7	43.2
52°	2.3	12.5	21.6	31.8	39.7	43.2
53°	2.3	12.5	21.6	31.8	39.7	43.2
54°	2.3	12.5	20.4	31.8	39.7	43.2
55°	2.3	11.4	20.4	30.7	39.7	42.0
56°	2.3	11.4	20.4	30.7	39.7	42.0
57°	2.3	11.4	19.3	30.7	39.7	42.0
58°	2.3	10.2	19.3	29.5	38.6	42.0
59°	2.3	10.2	18.2	29.5	38.6	40.9
60°	2.3	9.1	18.2	28.4	37.5	40.9
62.5°	2.3	7.9	15.9	27.3	36.3	38.6
65°	2.3	6.8	14.8	25.0	35.2	37.5



TEST NUMBER: P1306026

CATALOG NUMBER: P3SQASS17R159024DE010 E3SQCA451MW

CANDELA DISTRIBUTION (continued):

	67.5°	90°	112.5°	135°	157.5°	180°
67.5°	2.3	6.8	13.6	23.8	32.9	36.3
70°	2.3	6.8	12.5	21.6	31.8	32.9
72.5°	3.4	6.8	11.4	20.4	29.5	30.7
75°	4.5	6.8	10.2	18.2	27.3	28.4
77.5°	4.5	6.8	9.1	15.9	23.8	25.0
80°	4.5	5.7	7.9	12.5	19.3	20.4
82.5°	4.5	5.7	5.7	10.2	14.8	15.9
85°	3.4	4.5	4.5	5.7	10.2	11.4
87.5°	3.4	4.5	2.3	3.4	4.5	4.5
90°	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)