

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: P1307273

Luminaire Tested: P3SQAS20R709027D010 E3SQCA451MB

Issue Date: 1/29/2026

Test Information

Test Method: LM-79-2019
Report Number: P1307273
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2510-583-83)
Test Lab: INNOVATION CENTER
Issue Date: 1/29/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: IRiS
Catalog Number: P3SQAS20R709027D010 E3SQCA451MB
Description: 3in Adjustable LED luminaire with, R70 optic, 2700K CCT AND, 90CRI , E3SQCA451MB TRIM
Light Source: -
Ballast/Driver: -

Summary

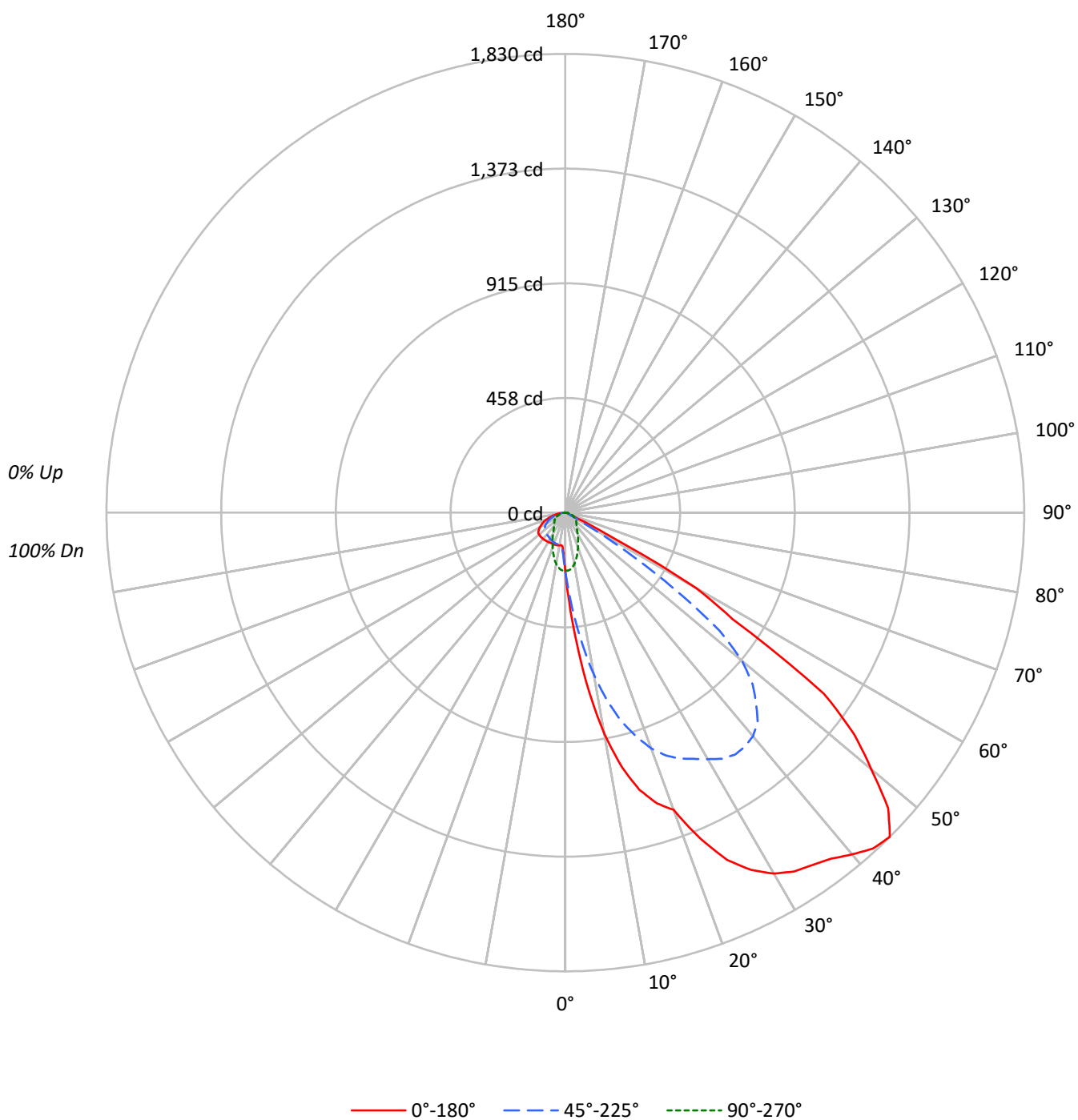
Lumens per Lamp: N/A
Luminaire Lumens: 1581.0 lumens
Efficiency: N/A
Efficacy: 54.9 lumens/watt
Spacing Criteria (0/90/45): 2.92 / 0.77 / 2.03
Luminous Opening: Rectangular (W 0.25' x L: 0.25' x H: 0')
CIE Type: Direct

Input Watts (W): 28.8
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			0
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	103	99	108	104	101	98	100	97	95	96	94	92	93	91	89	87		
2	101	94	88	83	99	92	87	82	89	84	80	86	82	78	83	79	77	75		
3	93	83	76	70	90	82	75	69	79	73	68	76	71	67	74	69	66	64		
4	85	74	66	59	83	72	65	59	70	63	58	68	62	57	66	61	57	54		
5	78	66	57	51	76	65	57	51	63	55	50	61	54	49	59	53	49	47		
6	72	59	50	44	70	58	50	44	56	49	43	54	48	43	53	47	43	41		
7	66	53	44	38	65	52	44	38	51	43	38	49	43	38	48	42	37	35		
8	61	48	40	34	60	47	39	34	46	39	33	45	38	33	44	38	33	31		
9	57	44	35	30	56	43	35	30	42	35	30	41	34	30	40	34	29	28		
10	53	40	32	27	52	39	32	27	38	31	27	37	31	26	37	31	26	25		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°	135°	180°
0°	39663	39663	39663	39663	39663
5°	90261	72264	39261	24808	23183
10°	156412	114756	36410	22612	23172
15°	204187	153283	31773	23054	23910
20°	231275	183294	27180	23423	24870
25°	290456	205628	22784	23677	25483
30°	330614	225852	19449	24162	26986
35°	360823	247732	16904	24536	28530
40°	400023	261714	15603	25540	30845
45°	445641	262021	15369	26889	33416
50°	426841	246389	15218	28320	36358
55°	377939	159619	15644	29846	39304
60°	207012	34238	15741	30415	40748
65°	14793	8354	15445	30197	41159
70°	7150	7956	14301	28601	39730
75°	6321	8384	13641	27282	36731
80°	6248	7835	12497	24993	34415
85°	6323	9287	12449	21736	31221

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 445641 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	30.0	1.9
10°-20°	128.5	8.1
20°-30°	246.5	15.6
30°-40°	348.6	22.0
40°-50°	394.3	24.9
50°-60°	312.3	19.8
60°-70°	84.2	5.3
70°-80°	28.0	1.8
80°-90°	8.6	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°	405.0	25.6
0°-40°	753.6	47.7
0°-60°	1460.3	92.4
0°-90°	1581.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1581.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	230	230	230	230	230	
5°	522	418	227	144	134	62
15°	1145	860	178	129	134	323
25°	1528	1082	120	125	134	700
35°	1716	1178	80	117	136	1081
45°	1830	1076	63	110	137	1369
55°	1259	532	52	99	131	1022
65°	36	20	38	74	101	131
75°	10	13	20	41	55	10
85°	3	5	6	11	16	3
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	45°	67.5°	90°	112.5°
0°	230.3	230.3	230.3	230.3	230.3	230.3	230.3	230.3	230.3	230.3	230.3
2.5°	358.1	358.1	356.5	350.2	347.0	339.1	332.8	315.5	272.9	231.9	198.7
5°	522.1	530.0	519.0	517.4	507.9	493.7	484.3	418.0	315.5	227.1	170.4
7.5°	716.1	719.3	716.1	700.4	686.2	662.5	640.4	536.3	358.1	219.3	149.8
10°	894.4	889.6	880.2	869.1	848.6	823.4	785.5	656.2	399.1	208.2	137.2
12.5°	1039.5	1037.9	1026.9	1015.8	990.6	957.5	919.6	765.0	433.8	194.0	130.9
15°	1145.2	1145.2	1134.1	1121.5	1097.8	1071.0	1028.4	859.7	462.2	178.2	124.6
17.5°	1216.1	1213.0	1205.1	1195.6	1176.7	1149.9	1116.8	935.4	481.1	162.5	123.0
20°	1261.9	1260.3	1254.0	1239.8	1224.0	1203.5	1173.6	1000.1	489.0	148.3	121.5
22.5°	1408.6	1396.0	1372.3	1342.3	1304.5	1255.6	1214.6	1048.9	485.8	132.5	118.3
25°	1528.5	1523.7	1498.5	1462.2	1411.7	1348.6	1280.8	1082.1	470.1	119.9	115.1
27.5°	1607.3	1599.4	1575.8	1536.4	1482.7	1421.2	1358.1	1107.3	448.0	108.8	110.4
30°	1662.5	1657.8	1634.2	1590.0	1534.8	1467.0	1402.3	1135.7	418.0	97.8	105.7
32.5°	1697.2	1692.5	1668.9	1629.4	1575.8	1504.8	1430.7	1164.1	381.7	88.3	101.0
35°	1716.2	1711.4	1684.6	1649.9	1599.4	1530.0	1451.2	1178.3	337.6	80.4	96.2
37.5°	1739.8	1730.4	1694.1	1651.5	1601.0	1536.4	1457.5	1176.7	293.4	74.1	93.1
40°	1779.3	1754.0	1702.0	1645.2	1593.1	1528.5	1452.8	1164.1	244.5	69.4	89.9
42.5°	1817.1	1780.8	1703.6	1635.7	1577.4	1514.3	1435.4	1135.7	190.9	66.2	88.3
45°	1829.7	1776.1	1681.5	1613.6	1558.4	1493.8	1411.7	1075.8	129.3	63.1	85.2
47.5°	1746.1	1706.7	1627.8	1577.4	1525.3	1462.2	1377.0	1012.7	74.1	59.9	82.0
50°	1593.1	1567.9	1523.7	1492.2	1463.8	1419.6	1336.0	919.6	44.2	56.8	78.9
52.5°	1451.2	1443.3	1411.7	1386.5	1370.7	1350.2	1274.5	776.1	36.3	55.2	75.7
55°	1258.7	1233.5	1225.6	1216.1	1249.3	1247.7	1145.2	531.6	34.7	52.1	72.6
57.5°	790.3	801.3	842.3	918.0	1007.9	1060.0	1056.8	283.9	33.1	48.9	67.8
60°	601.0	599.4	612.0	643.6	709.8	784.0	853.4	99.4	31.5	45.7	64.7
62.5°	179.8	184.6	222.4	326.5	391.2	482.7	440.1	23.7	30.0	41.0	58.4
65°	36.3	37.9	37.9	42.6	52.1	78.9	96.2	20.5	28.4	37.9	53.6
67.5°	15.8	15.8	15.8	17.4	17.4	20.5	17.4	18.9	25.2	33.1	47.3
70°	14.2	14.2	14.2	14.2	14.2	14.2	15.8	15.8	22.1	28.4	41.0
72.5°	11.0	11.0	11.0	12.6	12.6	12.6	12.6	14.2	18.9	23.7	34.7
75°	9.5	9.5	9.5	9.5	11.0	11.0	11.0	12.6	15.8	20.5	28.4
77.5°	7.9	7.9	7.9	7.9	7.9	9.5	9.5	9.5	12.6	15.8	23.7
80°	6.3	6.3	6.3	6.3	6.3	6.3	6.3	7.9	9.5	12.6	17.4
82.5°	4.7	4.7	4.7	4.7	4.7	4.7	4.7	6.3	7.9	9.5	12.6
85°	3.2	3.2	3.2	3.2	3.2	3.2	3.2	4.7	4.7	6.3	7.9
87.5°	1.6	1.6	1.6	1.6	1.6	1.6	1.6	3.2	3.2	3.2	4.7
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):

	135°	157.5°	180°
0°	230.3	230.3	230.3
2.5°	175.1	165.6	160.9
5°	143.5	135.7	134.1
7.5°	132.5	130.9	130.9
10°	129.3	130.9	132.5
12.5°	129.3	132.5	134.1
15°	129.3	132.5	134.1
17.5°	129.3	132.5	134.1
20°	127.8	132.5	135.7
22.5°	126.2	132.5	134.1
25°	124.6	132.5	134.1
27.5°	123.0	130.9	134.1
30°	121.5	130.9	135.7
32.5°	118.3	130.9	135.7
35°	116.7	130.9	135.7
37.5°	115.1	130.9	137.2
40°	113.6	130.9	137.2
42.5°	112.0	130.9	137.2
45°	110.4	129.3	137.2
47.5°	107.3	129.3	137.2
50°	105.7	127.8	135.7
52.5°	102.5	126.2	135.7
55°	99.4	123.0	130.9
57.5°	94.6	118.3	124.6
60°	88.3	112.0	118.3
62.5°	80.4	104.1	108.8
65°	74.1	94.6	101.0
67.5°	64.7	83.6	89.9
70°	56.8	72.6	78.9
72.5°	48.9	61.5	67.8
75°	41.0	50.5	55.2
77.5°	31.5	41.0	44.2
80°	25.2	31.5	34.7
82.5°	17.4	22.1	23.7
85°	11.0	14.2	15.8
87.5°	4.7	6.3	6.3
90°	0.0	0.0	0.0

(END OF REPORT)