

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: CORELITE

Report Number: P521369

Luminaire Tested: SQ4-F-025U-100D-92765-1D-UNV-STD-W-4\_4000K

Issue Date: 5-5-2021

**Test Information**

Test Method: LM-79-2019  
Report Number: P521369  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2101-105-51, G2-2101-105-38)  
Test Lab: INNOVATION CENTER  
Issue Date: 5-5-2021  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: CORELITE  
Catalog Number: SQ4-F-025U-100D-92765-1D-UNV-STD-W-4\_4000K  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE  
DOWNLIGHT 1000 LUMENS PER FOOT  
UPLIGHT 250 LUMENS PER FOOT  
Light Source: 2700K-6500K CCT, 90 CRI LEDS, TUNED TO 4000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 6152.6 lumens  
Efficiency: N/A  
Efficacy: 109.1 lumens/watt  
Spacing Criteria (0/90/45): 1.27 / 1.25 / 1.38  
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')  
CIE Type: Semi-Direct

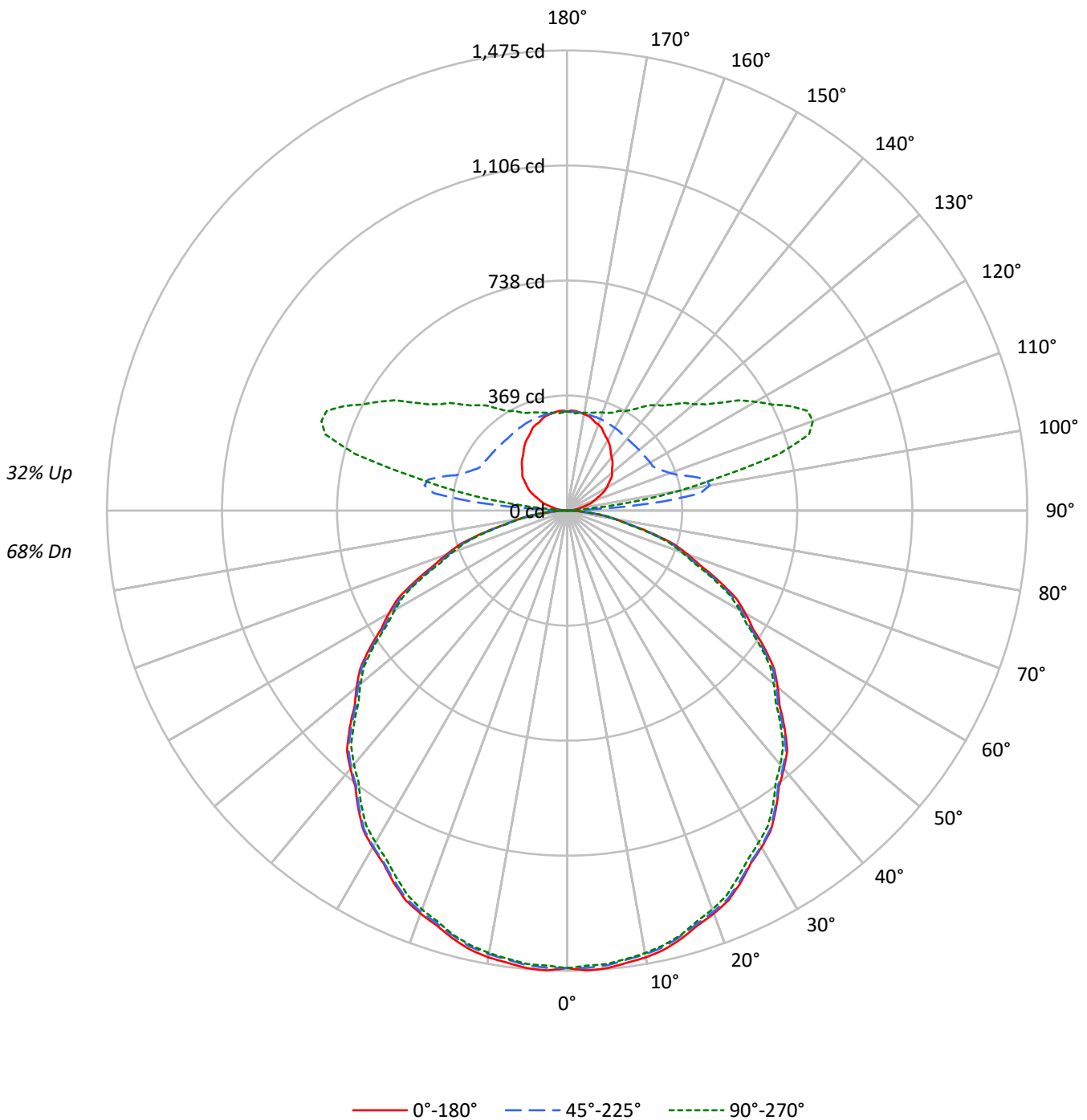
Input Watts (W): 56.4  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



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### Luminous Intensity Polar Plot



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**COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:**

RF	20									20									20									20										
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	111	111	111	111	105	105	105	105	93	93	93	83	83	83	73	73	73	68																				
1	102	97	93	89	96	92	88	85	82	79	76	72	70	68	64	62	61	57																				
2	92	85	78	73	87	80	74	69	71	67	63	63	60	57	56	53	51	47																				
3	84	74	66	60	79	70	63	58	63	57	53	56	51	48	49	46	43	40																				
4	77	66	57	51	72	62	55	49	56	50	45	50	45	41	44	40	37	34																				
5	71	58	50	44	66	55	48	42	50	43	39	44	39	35	40	35	32	29																				
6	65	52	44	38	61	50	42	36	45	38	34	40	35	31	36	32	28	26																				
7	60	47	39	33	57	45	37	32	41	34	30	37	31	27	33	28	25	23																				
8	56	43	35	29	53	41	34	28	37	31	26	33	28	24	30	26	22	20																				
9	52	39	32	26	49	37	30	25	34	28	24	31	26	22	28	23	20	18																				
10	49	36	29	24	46	34	28	23	31	25	21	28	23	20	26	21	18	16																				

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	13528	13528	13528
5°	13637	13552	13514
10°	13623	13527	13490
15°	13559	13481	13452
20°	13497	13437	13357
25°	13393	13341	13196
30°	13279	13245	13084
35°	13144	13098	12960
40°	13012	12963	12804
45°	12861	12756	12609
50°	12642	12555	12409
55°	12465	12284	12138
60°	12177	11931	11763
65°	11782	11448	11271
70°	11098	10742	10547
75°	10017	9764	9618
80°	8278	8278	8172
85°	5822	6680	6902

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°  
 Vertical Angle: 45°  
 Luminance: 12861 cd/sqm

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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	138.8	2.3
10°-20°	397.7	6.5
20°-30°	601.4	9.8
30°-40°	724.2	11.8
40°-50°	752.1	12.2
50°-60°	681.7	11.1
60°-70°	519.2	8.4
70°-80°	290.1	4.7
80°-90°	75.3	1.2
90°-100°	144.7	2.4
100°-110°	411.6	6.7
110°-120°	394.4	6.4
120°-130°	312.1	5.1
130°-140°	250.5	4.1
140°-150°	196.1	3.2
150°-160°	143.5	2.3
160°-170°	88.9	1.4
170°-180°	30.2	0.5
0°-30°	1137.9	18.5
0°-40°	1862.0	30.3
0°-60°	3295.8	53.6
0°-90°	4180.4	67.9
90°-120°	950.7	15.5
90°-150°	1709.6	27.8
90°-180°	1972.0	32.1
0°-180°	6152.6	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1466	1466	1466	1466	1466	
5°	1472	1458	1463	1459	1459	140
15°	1420	1407	1411	1408	1408	400
25°	1316	1305	1310	1300	1296	606
35°	1167	1160	1163	1152	1151	730
45°	986	980	978	967	966	759
55°	775	772	764	755	755	691
65°	540	534	524	517	516	532
75°	281	277	274	270	270	297
85°	55	59	63	64	65	69
90°	0	0	0	0	0	3
95°	16	62	280	97	60	18
105°	64	97	420	741	704	68
115°	119	144	318	674	791	117
125°	168	186	304	504	602	150
135°	205	222	300	426	481	158
145°	242	254	302	368	401	151
155°	276	283	310	333	346	128
165°	305	307	313	320	325	86
175°	320	318	317	315	313	30
180°	318	318	318	318	318	

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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1466.3	1466.3	1466.3	1466.3	1466.3
2.5°	1475.3	1463.4	1467.2	1464.6	1459.8
5°	1472.5	1458.5	1463.3	1459.2	1459.2
7.5°	1462.3	1448.9	1452.1	1449.6	1449.6
10°	1454.1	1439.2	1443.9	1439.9	1439.9
12.5°	1441.1	1427.7	1432.5	1428.4	1427.6
15°	1419.5	1406.6	1411.4	1408.3	1408.3
17.5°	1393.4	1381.1	1387.3	1382.4	1380.8
20°	1374.7	1360.8	1368.6	1360.4	1360.4
22.5°	1351.9	1339.5	1346.6	1336.8	1335.2
25°	1315.6	1304.7	1310.5	1300.3	1296.3
27.5°	1274.9	1263.2	1271.8	1260.4	1258.2
30°	1246.4	1235.4	1243.3	1231.0	1228.1
32.5°	1215.4	1206.1	1211.6	1200.1	1197.9
35°	1167.0	1160.0	1162.9	1151.7	1150.7
37.5°	1115.4	1108.7	1111.4	1098.9	1098.1
40°	1080.4	1074.4	1076.3	1063.1	1063.1
42.5°	1044.6	1037.8	1038.0	1025.6	1024.8
45°	985.7	979.7	977.6	967.4	966.4
47.5°	923.2	920.4	917.1	906.9	906.9
50°	880.8	878.8	874.7	864.5	864.5
52.5°	837.6	836.5	830.7	822.1	820.5
55°	774.9	771.9	763.7	754.6	754.6
57.5°	706.3	703.9	694.7	687.3	685.5
60°	659.9	655.9	646.6	638.4	637.5
62.5°	611.8	608.6	598.6	591.2	589.4
65°	539.7	533.7	524.4	517.3	516.3
67.5°	463.5	456.8	448.7	442.7	440.7
70°	411.4	405.4	398.2	393.0	391.0
72.5°	360.1	354.1	347.6	344.2	343.8
75°	281.0	277.1	273.9	269.8	269.8
77.5°	203.9	201.5	199.8	197.8	197.8
80°	155.8	155.8	155.8	153.8	153.8
82.5°	111.8	114.2	115.9	114.7	114.7
85°	55.0	59.0	63.1	64.2	65.2
87.5°	15.5	20.3	25.3	26.1	26.9
90°	0.0	0.0	0.0	0.0	0.0
92.5°	4.8	25.6	59.4	17.3	13.0
95°	15.7	62.3	280.1	96.9	59.8
97.5°	28.9	73.0	431.3	308.6	211.5
100°	38.0	79.3	464.2	470.2	362.2
102.5°	48.2	86.2	456.9	601.8	507.5
105°	64.0	97.0	419.5	741.0	704.4
107.5°	80.0	109.7	375.8	780.2	812.8
110°	91.1	118.9	350.7	765.2	838.4

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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	101.8	128.1	333.8	729.7	834.1
115°	118.9	143.7	318.1	673.9	791.3
117.5°	134.0	157.3	308.8	612.8	737.2
120°	146.1	165.5	307.8	577.9	697.2
122.5°	155.7	175.2	305.4	547.3	658.0
125°	167.8	186.1	303.6	503.8	602.4
127.5°	181.0	198.1	302.6	477.8	559.1
130°	187.7	204.8	301.2	459.7	530.6
132.5°	195.0	211.6	301.2	445.6	510.8
135°	205.2	222.3	300.0	425.6	481.1
137.5°	214.9	231.5	299.9	408.6	456.6
140°	222.1	239.2	299.4	394.6	440.6
142.5°	230.3	244.6	300.8	383.4	424.7
145°	242.0	254.4	302.4	368.3	401.4
147.5°	252.1	264.1	305.1	353.2	381.7
150°	260.8	269.0	306.0	348.1	368.2
152.5°	267.5	276.2	307.0	341.3	360.0
155°	276.4	282.9	309.6	332.9	346.5
157.5°	287.6	291.4	310.2	329.1	338.7
160°	293.3	296.3	312.7	326.1	334.4
162.5°	296.7	300.2	313.1	323.7	330.0
165°	305.4	306.6	313.3	320.0	324.7
167.5°	311.3	310.3	316.0	319.1	321.0
170°	313.3	312.7	315.1	315.7	318.1
172.5°	317.6	315.6	316.5	314.8	316.6
175°	319.9	318.1	316.9	315.0	312.7
177.5°	320.9	318.0	316.5	314.6	315.1
180°	317.5	317.5	317.5	317.5	317.5

(END OF REPORT)