

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:

Luminaire Tested: SQ4-PP3-050U-050D-927-1D-UNV-STD-W-4

Issue Date: 8/1/2024

Test Information

Test Method: LM-79-2019
Report Number:
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-21)
Test Lab: INNOVATION CENTER
Issue Date: 8/1/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-PP3-050U-050D-927-1D-UNV-STD-W-4
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE
DOWNLIGHT 500 LUMENS PER FOOT
UPLIGHT 500 LUMENS PER FOOT
Light Source: 2700K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

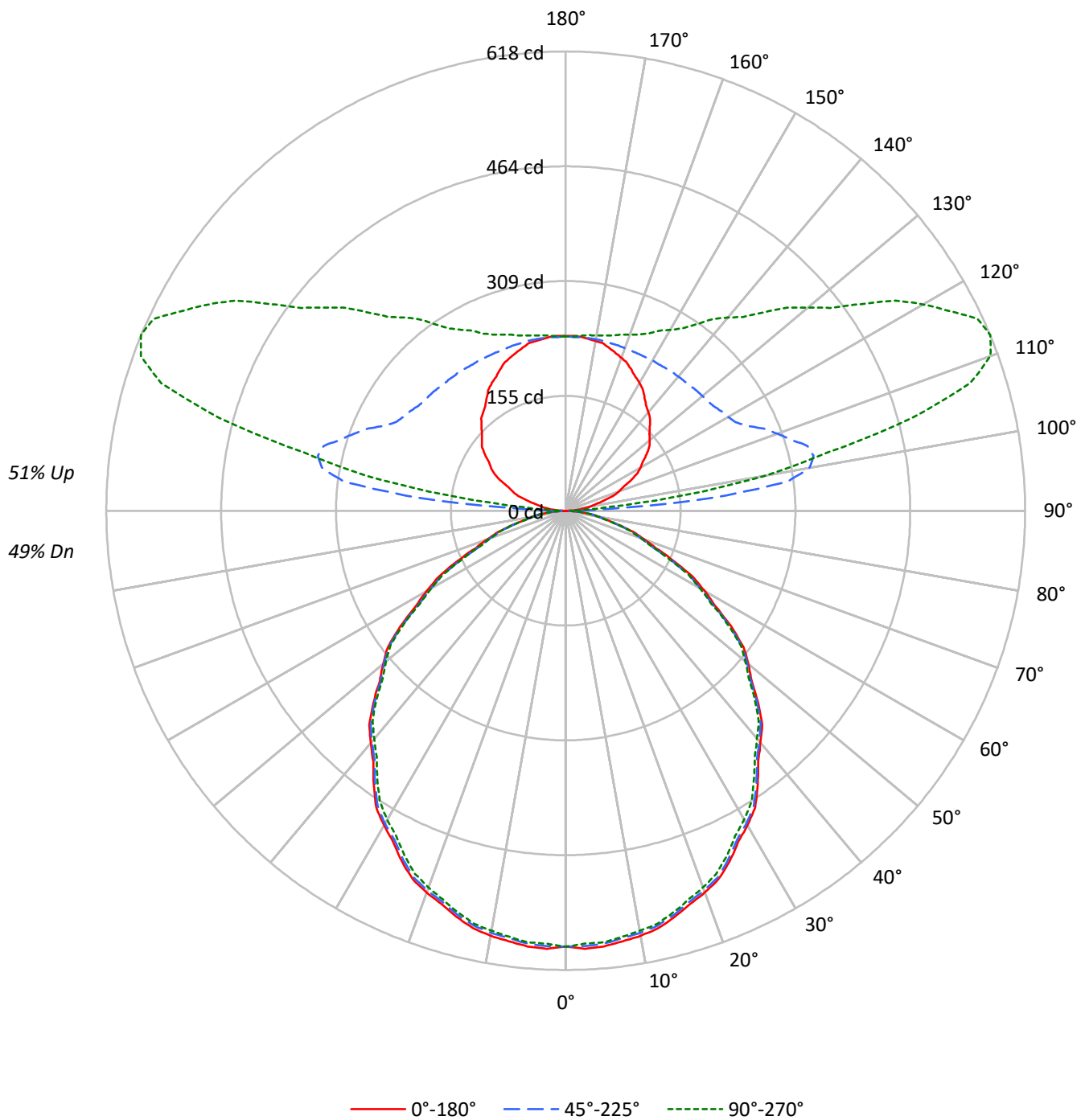
Lumens per Lamp: N/A
Luminaire Lumens: 3035.8 lumens
Efficiency: N/A
Efficacy: 106.5 lumens/watt
Spacing Criteria (0/90/45): 1.24 / 1.22 / 1.33
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 28.5
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				20
RC	80				70				50				30				0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10
RCR																	
0	107	107	107	107	99	99	99	99	83	83	83	69	69	69	56	56	56
1	98	94	90	86	90	86	83	80	73	71	69	61	59	58	49	48	47
2	89	82	76	71	82	76	71	66	64	60	57	54	51	48	44	42	40
3	82	72	65	59	75	67	61	55	57	52	48	48	44	41	39	36	34
4	75	64	56	50	69	59	52	47	51	45	41	42	38	35	35	32	30
5	68	57	49	43	63	53	46	40	45	40	35	38	34	31	31	28	26
6	63	51	43	37	58	48	40	35	41	35	31	34	30	27	28	25	23
7	58	46	38	33	54	43	36	31	37	31	27	31	27	24	26	23	20
8	54	42	34	29	50	39	32	27	34	28	24	29	24	21	24	21	18
9	50	38	31	26	46	36	29	24	31	25	22	26	22	19	22	19	16
10	47	35	28	23	43	33	26	22	28	23	20	24	20	17	20	17	15

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5411	5411	5411
5°	5450	5417	5398
10°	5441	5403	5378
15°	5405	5376	5346
20°	5370	5339	5299
25°	5306	5269	5217
30°	5207	5180	5115
35°	5072	5037	4973
40°	4909	4878	4822
45°	4776	4742	4695
50°	4603	4574	4530
55°	4366	4308	4274
60°	3975	3860	3842
65°	3502	3355	3345
70°	3024	2897	2897
75°	2602	2567	2527
80°	2295	2322	2269
85°	1800	1958	1958

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 4776 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	55.5	1.8
10°-20°	158.3	5.2
20°-30°	237.2	7.8
30°-40°	278.2	9.2
40°-50°	279.1	9.2
50°-60°	238.1	7.8
60°-70°	155.3	5.1
70°-80°	77.9	2.6
80°-90°	22.5	0.7
90°-100°	112.8	3.7
100°-110°	306.3	10.1
110°-120°	315.0	10.4
120°-130°	251.8	8.3
130°-140°	197.9	6.5
140°-150°	151.7	5.0
150°-160°	109.1	3.6
160°-170°	66.7	2.2
170°-180°	22.5	0.7
0°-30°	451.0	14.9
0°-40°	729.2	24.0
0°-60°	1246.3	41.1
0°-90°	1502.0	49.5
90°-120°	734.1	24.2
90°-150°	1335.5	44.0
90°-180°	1534.0	50.5
0°-180°	3035.8	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	586	586	586	586	586	
5°	588	583	585	583	583	56
15°	566	560	563	561	560	160
25°	521	515	518	513	512	240
35°	450	446	447	442	442	281
45°	366	364	363	360	360	282
55°	271	270	268	266	266	241
65°	160	157	154	153	153	160
75°	73	73	72	71	71	79
85°	17	18	18	18	18	20
90°	1	3	5	7	7	2
95°	17	62	196	86	57	18
105°	54	85	337	513	483	58
115°	97	117	270	536	611	95
125°	133	151	244	411	485	118
135°	160	178	237	335	378	124
145°	185	198	234	284	306	116
155°	209	217	233	256	263	96
165°	227	230	233	243	244	64
175°	235	236	234	237	236	22
180°	235	235	235	235	235	

TEST NUMBER:

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	586.5	586.5	586.5	586.5	586.5
2.5°	590.2	585.4	586.5	585.6	583.2
5°	588.5	583.0	584.9	582.9	582.9
7.5°	584.5	578.5	580.4	578.4	578.3
10°	580.8	574.8	576.7	574.6	574.1
12.5°	575.5	569.4	571.8	569.3	569.2
15°	565.9	560.4	562.8	560.8	559.7
17.5°	555.1	549.1	552.0	549.2	548.7
20°	546.9	540.9	543.8	539.7	539.7
22.5°	537.0	531.0	534.4	529.0	529.0
25°	521.2	515.2	517.6	513.0	512.5
27.5°	502.4	496.5	499.0	493.7	493.6
30°	488.8	483.3	486.2	480.6	480.1
32.5°	474.0	468.9	471.0	465.4	464.9
35°	450.3	445.7	447.2	442.0	441.5
37.5°	425.3	420.7	422.3	417.9	417.7
40°	407.6	404.6	405.0	401.4	400.4
42.5°	391.2	387.7	388.2	384.6	384.4
45°	366.0	363.5	363.4	359.8	359.8
47.5°	339.2	337.3	336.8	333.8	333.7
50°	320.7	319.2	318.7	316.1	315.6
52.5°	301.4	300.7	298.9	296.8	296.7
55°	271.4	270.4	267.8	266.2	265.7
57.5°	238.8	236.8	233.9	231.6	232.0
60°	215.4	213.4	209.2	208.2	208.2
62.5°	192.8	190.3	186.2	184.8	185.6
65°	160.4	157.4	153.7	152.7	153.2
67.5°	131.0	128.3	124.3	124.3	123.9
70°	112.1	110.5	107.4	107.4	107.4
72.5°	95.2	94.5	92.2	92.2	91.8
75°	73.0	73.0	72.0	71.4	70.9
77.5°	54.7	54.9	54.4	53.8	52.9
80°	43.2	44.2	43.7	43.2	42.7
82.5°	32.5	33.5	33.4	32.5	32.4
85°	17.0	18.5	18.5	18.5	18.5
87.5°	4.7	6.7	7.6	7.9	8.4
90°	0.8	3.0	5.3	6.8	6.8
92.5°	6.8	30.9	53.6	23.0	19.5
95°	16.6	61.7	196.4	85.5	57.4
97.5°	27.5	68.1	301.1	234.2	164.5
100°	34.7	72.4	333.1	337.7	272.7
102.5°	42.0	76.7	341.6	417.6	360.3
105°	54.4	84.7	336.9	512.9	482.7
107.5°	67.2	94.0	317.4	562.2	570.6
110°	76.3	100.7	302.9	571.8	608.0

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	84.1	107.3	288.4	563.8	618.3
115°	96.7	117.4	269.7	536.5	611.1
117.5°	108.5	128.3	257.7	497.7	581.8
120°	116.3	135.5	252.3	471.7	555.2
122.5°	123.0	142.2	248.7	445.7	526.2
125°	132.9	151.4	244.0	411.1	484.9
127.5°	141.9	160.2	241.4	384.8	448.2
130°	147.3	165.0	240.2	368.4	425.2
132.5°	152.7	170.5	239.0	354.3	404.7
135°	160.1	177.9	237.2	334.8	377.7
137.5°	168.1	184.2	236.3	317.6	353.6
140°	173.0	188.5	235.7	306.6	339.1
142.5°	177.8	192.1	235.1	298.1	325.2
145°	185.1	198.3	234.2	284.5	305.9
147.5°	193.2	204.6	233.4	273.8	290.6
150°	198.7	208.3	233.4	267.7	281.0
152.5°	202.9	211.3	232.8	262.2	273.1
155°	209.2	216.6	232.6	255.5	262.9
157.5°	215.4	221.2	232.6	250.9	256.5
160°	219.0	224.2	232.6	247.8	252.3
162.5°	222.7	226.7	233.2	245.4	248.7
165°	226.6	229.6	233.4	243.2	244.0
167.5°	230.7	232.2	234.2	240.7	241.3
170°	231.9	233.4	234.2	239.4	239.4
172.5°	233.1	234.0	234.2	238.2	238.2
175°	234.9	235.6	234.2	237.2	236.4
177.5°	235.5	235.5	233.7	236.1	234.9
180°	234.9	234.9	234.9	234.9	234.9

(END OF REPORT)