

Scaled data based on original data using  
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State  
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: CORELITE

Report Number: P845158

Luminaire Tested: **SQ4P-PR1-050U-050D-B50-1D-UNV**

Issue Date: 8/14/2023

**Test Information**

Test Method: LM-79-08  
Report Number: P845158  
REPORT IS A COMBINATION OF REPORTS P700203 AND P700244  
Test Lab: INNOVATION CENTER  
Issue Date: 8/14/2023  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: SQ4P-PR1-050U-050D-B50-1D-UNV  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH, 500 LUMENS PER FOOT  
UPLIGHT, 500 LUMENS PER FOOT DOWNLIGHT  
  
Light Source: -  
Ballast/Driver: -

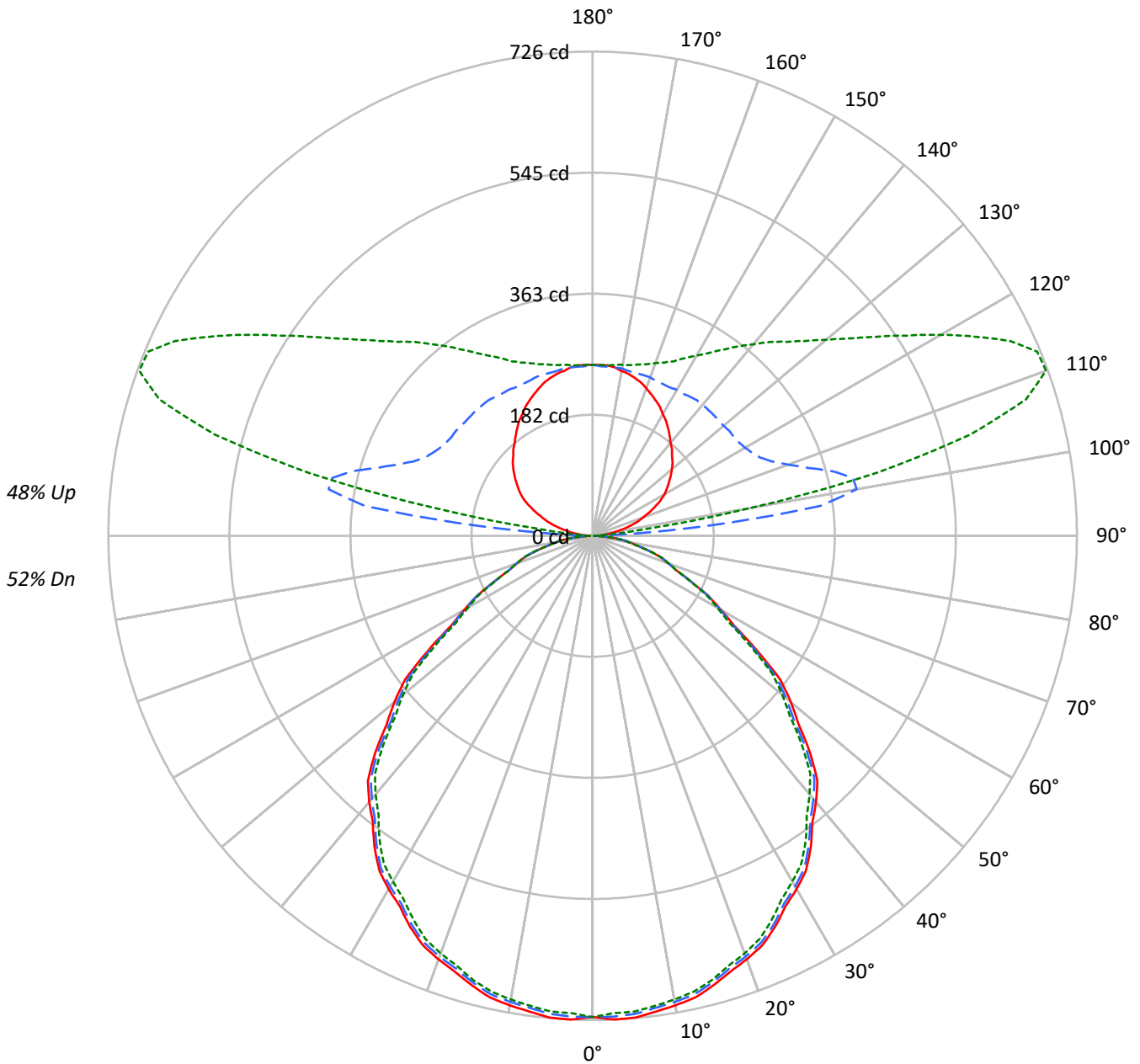
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3468.5 lumens  
Efficiency: N/A  
Efficacy: 116.4 lumens/watt  
Spacing Criteria (0/90/45): 1.26 / 1.24 / 1.35  
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')  
CIE Type: General Diffuse

Input Watts (W): 29.8  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): 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: 25 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	0
RCR																					
0	108	108	108	108	100	100	100	100	84	84	84	71	71	71	58	58	58	52	52	52	52
1	99	94	91	87	91	87	84	81	74	72	70	63	61	59	52	51	50	44	44	44	44
2	90	83	77	72	83	77	72	67	66	62	58	55	53	50	46	44	42	38	38	38	38
3	82	73	66	60	76	68	62	56	58	53	49	49	46	43	41	38	36	32	32	32	32
4	75	65	57	51	70	60	53	48	52	47	42	44	40	37	37	34	31	28	28	28	28
5	69	58	50	44	64	54	47	41	46	41	37	40	35	32	33	30	28	24	24	24	24
6	64	52	44	38	59	48	41	36	42	36	32	36	31	28	30	27	24	21	21	21	21
7	59	47	39	33	55	44	37	32	38	32	28	33	28	25	28	24	22	19	19	19	19
8	55	43	35	30	51	40	33	28	35	29	25	30	26	22	25	22	19	17	17	17	17
9	51	39	31	26	47	37	30	25	32	26	23	28	23	20	23	20	18	15	15	15	15
10	48	36	29	24	44	34	27	23	29	24	20	25	21	18	22	18	16	14	14	14	14

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

	0°	45°	90°
0°	6658	6658	6658
5°	6718	6666	6632
10°	6697	6650	6615
15°	6668	6625	6590
20°	6634	6591	6542
25°	6587	6544	6467
30°	6516	6470	6377
35°	6421	6364	6272
40°	6274	6205	6094
45°	6019	5913	5791
50°	5568	5433	5327
55°	4859	4750	4650
60°	4095	4061	3980
65°	3541	3556	3528
70°	3251	3269	3269
75°	3126	3126	3148
80°	2938	2975	2938
85°	2371	2625	2625



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	68.2	2.0
10°-20°	195.3	5.6
20°-30°	294.5	8.5
30°-40°	350.9	10.1
40°-50°	346.0	10.0
50°-60°	264.4	7.6
60°-70°	163.6	4.7
70°-80°	93.0	2.7
80°-90°	28.9	0.8
90°-100°	102.0	2.9
100°-110°	355.0	10.2
110°-120°	343.9	9.9
120°-130°	269.8	7.8
130°-140°	213.5	6.2
140°-150°	164.8	4.8
150°-160°	118.1	3.4
160°-170°	72.3	2.1
170°-180°	24.4	0.7
0°-30°	558.0	16.1
0°-40°	908.9	26.2
0°-60°	1519.3	43.8
0°-90°	1804.7	52.0
90°-120°	800.9	23.1
90°-150°	1449.0	41.8
90°-180°	1664.0	48.0
0°-180°	3468.5	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	722	722	722	722	722	
5°	725	717	720	717	716	69
15°	698	691	694	691	690	197
25°	647	639	643	636	635	298
35°	570	563	565	558	557	356
45°	461	455	453	445	444	353
55°	302	297	295	290	289	271
65°	162	161	163	162	162	164
75°	88	88	88	88	88	93
85°	22	24	25	25	25	26
90°	4	6	6	4	2	3
95°	17	59	172	44	27	18
105°	59	84	373	629	585	62
115°	103	124	277	585	691	102
125°	140	172	258	436	520	125
135°	168	189	256	364	411	130
145°	197	210	254	314	340	123
155°	224	232	251	279	289	103
165°	245	247	253	264	266	69
175°	256	256	254	258	256	24
180°	256	256	256	256	256	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	721.6	721.6	721.6	721.6	721.6
2.5°	726.1	719.8	721.6	720.1	716.7
5°	725.4	717.4	719.8	717.3	716.1
7.5°	719.8	712.0	714.4	711.8	711.2
10°	714.8	707.5	709.8	707.4	706.1
12.5°	709.4	701.6	704.4	701.4	700.2
15°	698.1	690.8	693.6	691.2	689.9
17.5°	685.6	677.8	680.8	677.9	676.3
20°	675.7	668.4	671.3	667.0	666.3
22.5°	664.7	657.5	660.3	654.6	654.4
25°	647.1	639.1	642.8	636.0	635.3
27.5°	626.1	618.8	621.7	614.7	614.1
30°	611.6	604.3	607.3	599.8	598.6
32.5°	595.2	588.4	590.9	583.4	582.6
35°	570.1	563.3	565.0	557.6	556.9
37.5°	541.3	535.2	536.2	527.9	527.4
40°	520.9	514.9	515.2	506.6	506.0
42.5°	498.6	492.5	491.9	483.2	482.6
45°	461.3	455.2	453.2	445.0	443.8
47.5°	418.7	412.6	408.9	402.2	401.4
50°	387.9	381.8	378.5	372.9	371.1
52.5°	354.5	348.4	345.8	340.6	338.8
55°	302.1	297.2	295.3	290.3	289.1
57.5°	252.2	249.0	248.4	243.5	243.1
60°	221.9	220.1	220.1	215.7	215.7
62.5°	196.1	194.7	195.6	192.8	192.3
65°	162.2	161.1	162.9	161.6	161.6
67.5°	135.6	135.6	136.6	136.0	136.0
70°	120.5	120.5	121.2	121.2	121.2
72.5°	107.1	106.7	108.3	108.2	107.8
75°	87.7	87.7	87.7	88.3	88.3
77.5°	68.3	68.4	68.9	68.8	68.3
80°	55.3	56.0	56.0	55.3	55.3
82.5°	42.5	42.9	42.9	42.8	42.5
85°	22.4	23.6	24.8	24.8	24.8
87.5°	6.5	8.4	10.0	10.0	9.4
90°	3.8	5.7	5.7	3.8	1.9
92.5°	9.5	28.7	26.8	11.5	9.5
95°	17.2	59.3	172.2	44.0	26.8
97.5°	26.8	66.9	344.3	156.9	84.2
100°	36.4	70.8	401.8	376.9	243.0
102.5°	47.8	76.5	399.9	529.9	436.2
105°	59.3	84.2	373.1	629.4	585.4



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	91.9	112.9	290.8	633.3	721.3
115°	103.3	124.3	277.4	585.4	690.6
117.5°	114.8	137.8	269.7	541.4	646.6
120°	124.3	149.2	264.0	499.3	602.6
122.5°	132.0	160.7	260.2	464.9	558.6
125°	139.7	172.2	258.3	436.2	520.4
127.5°	147.3	179.8	258.3	415.2	485.9
130°	155.0	183.6	256.4	394.1	457.3
132.5°	162.6	185.5	256.4	378.8	432.4
135°	168.3	189.4	256.4	363.5	411.4
137.5°	176.0	193.3	256.4	350.1	394.1
140°	181.7	199.0	256.4	336.7	375.0
142.5°	189.4	204.7	256.4	323.3	357.8
145°	197.1	210.5	254.5	313.8	340.5
147.5°	204.7	216.2	252.6	304.2	325.2
150°	210.5	221.9	252.6	294.7	311.9
152.5°	218.1	227.6	250.7	285.0	300.4
155°	223.8	231.5	250.7	279.3	288.8
157.5°	229.5	237.2	250.7	273.6	281.2
160°	235.3	241.1	252.6	269.7	275.5
162.5°	241.1	244.9	252.6	265.9	269.7
165°	244.9	246.8	252.6	264.0	265.9
167.5°	248.7	250.7	252.6	262.1	262.1
170°	250.7	252.6	254.5	260.2	260.2
172.5°	254.5	254.5	254.5	258.3	258.3
175°	256.4	256.4	254.5	258.3	256.4
177.5°	256.4	256.4	254.5	258.3	256.4
180°	256.4	256.4	256.4	256.4	256.4



Report Generated By 670246072 / DESKTOP-50001EG







— 0°-180°    - - 45°-225°    - - - - 90°-270°







107.5°	70.8	93.8	338.6	673.5	681.1
110°	80.4	103.3	311.9	667.7	723.2



(END OF REPORT)