

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: P845218

Luminaire Tested: **SQ4P-PR1-150U-050D-B50-1D-UNV**

Issue Date: 8/14/2023

Test Information

Test Method: LM-79-08
Report Number: P845218
REPORT IS A COMBINATION OF REPORTS P700147 AND P700248
Test Lab: INNOVATION CENTER
Issue Date: 8/14/2023
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4P-PR1-150U-050D-B50-1D-UNV
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH, 1500 LUMENS PER FOOT
UPLIGHT, 500 LUMENS PER FOOT DOWNLIGHT

Light Source: -
Ballast/Driver: -

Summary

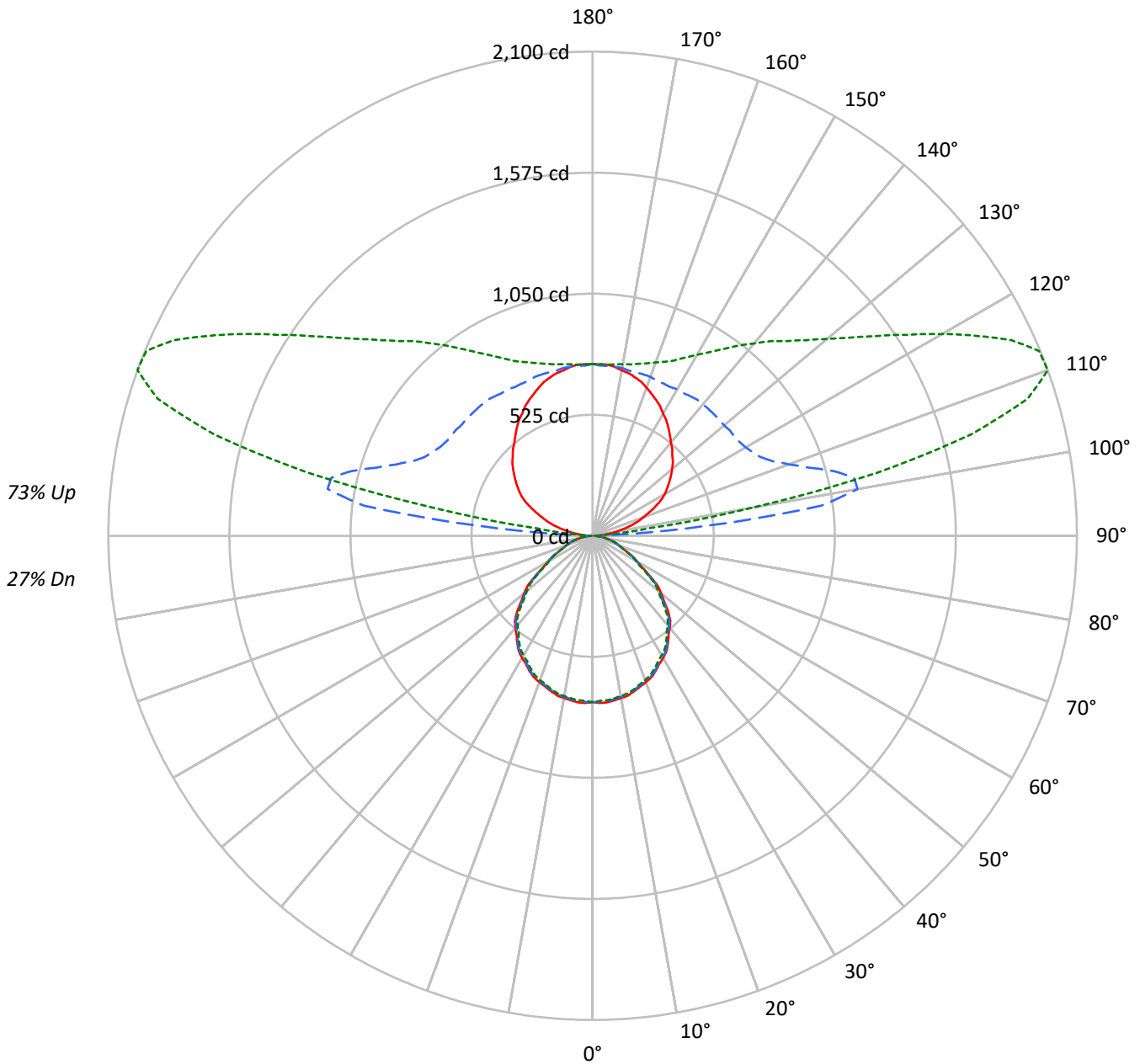
Lumens per Lamp: N/A
Luminaire Lumens: 6638.1 lumens
Efficiency: N/A
Efficacy: 111.0 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.24 / 1.35
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: Semi-Indirect

Input Watts (W): 59.8
Input Voltage (V): NR
Input Current (A_{in}): 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									
RC	80									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	102	102	102	102	91	91	91	91	71	71	71	52	52	52	35	35	35	27																			
1	93	89	85	82	83	79	76	74	62	60	58	46	45	44	31	31	30	23																			
2	85	78	72	67	75	70	65	61	54	51	48	41	38	37	28	27	25	20																			
3	77	68	61	56	69	61	55	51	48	44	41	36	33	31	25	23	22	17																			
4	71	60	53	47	63	54	48	43	43	38	35	32	29	27	22	20	19	15																			
5	65	54	46	40	58	48	42	37	38	33	30	29	26	23	20	18	16	13																			
6	60	48	40	35	53	43	37	32	34	30	26	26	23	20	18	16	15	11																			
7	55	43	36	30	49	39	32	28	31	26	23	24	20	18	16	14	13	10																			
8	51	39	32	27	45	35	29	24	28	23	20	21	18	16	15	13	12	9																			
9	47	36	28	24	42	32	26	22	26	21	18	20	16	14	14	12	10	8																			
10	44	32	26	21	39	29	23	19	24	19	16	18	15	13	13	11	9	7																			

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	1.0
10°-20°	195.3	2.9
20°-30°	294.5	4.4
30°-40°	350.9	5.3
40°-50°	346.0	5.2
50°-60°	264.4	4.0
60°-70°	163.6	2.5
70°-80°	93.0	1.4
80°-90°	30.1	0.5
90°-100°	296.3	4.5
100°-110°	1031.0	15.5
110°-120°	998.8	15.0
120°-130°	783.5	11.8
130°-140°	620.1	9.3
140°-150°	478.6	7.2
150°-160°	343.1	5.2
160°-170°	209.8	3.2
170°-180°	71.0	1.1
0°-30°	558.0	8.4
0°-40°	908.9	13.7
0°-60°	1519.3	22.9
0°-90°	1805.9	27.2
90°-120°	2326.1	35.0
90°-150°	4208.3	63.4
90°-180°	4832.0	72.8
0°-180°	6638.1	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°	11	17	17	11	6	8
95°	50	172	500	128	78	53
105°	172	244	1084	1828	1700	181
115°	300	361	806	1700	2006	296
125°	406	500	750	1267	1511	363
135°	489	550	745	1056	1195	379
145°	572	611	739	911	989	358
155°	650	672	728	811	839	300
165°	711	717	733	767	772	201
175°	745	745	739	750	745	71
180°	745	745	745	745	745	



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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°	11.1	16.7	16.7	11.1	5.5
92.5°	27.8	83.3	77.8	33.3	27.8
95°	50.0	172.2	500.1	127.8	77.8
97.5°	77.8	194.5	1000.2	455.6	244.5
100°	105.6	205.5	1166.9	1094.6	705.6
102.5°	138.9	222.3	1161.3	1539.1	1266.9
105°	172.2	244.5	1083.5	1828.1	1700.3



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	266.7	327.9	844.5	1839.2	2094.7
115°	300.1	361.2	805.7	1700.3	2005.9
117.5°	333.4	400.0	783.4	1572.5	1878.1
120°	361.2	433.4	766.8	1450.2	1750.3
122.5°	383.4	466.8	755.7	1350.3	1622.4
125°	405.7	500.1	750.1	1266.9	1511.3
127.5°	427.8	522.3	750.1	1205.7	1411.4
130°	450.1	533.4	744.6	1144.6	1328.0
132.5°	472.3	538.9	744.6	1100.2	1255.7
135°	489.0	550.1	744.6	1055.7	1194.6
137.5°	511.2	561.2	744.6	1016.9	1144.6
140°	527.9	577.9	744.6	977.9	1089.0
142.5°	550.1	594.5	744.6	939.1	1039.0
145°	572.4	611.2	739.0	911.3	989.1
147.5°	594.5	627.9	733.4	883.5	944.6
150°	611.2	644.5	733.4	855.7	905.7
152.5°	633.5	661.2	727.9	827.9	872.3
155°	650.1	672.3	727.9	811.2	839.0
157.5°	666.8	689.0	727.9	794.6	816.8
160°	683.5	700.1	733.4	783.4	800.1
162.5°	700.1	711.3	733.4	772.4	783.4
165°	711.3	716.8	733.4	766.8	772.4
167.5°	722.3	727.9	733.4	761.2	761.2
170°	727.9	733.4	739.0	755.7	755.7
172.5°	739.0	739.0	739.0	750.1	750.1
175°	744.6	744.6	739.0	750.1	744.6
177.5°	744.6	744.6	739.0	750.1	744.6
180°	744.6	744.6	744.6	744.6	744.6



Report Generated By 670246072 / DESKTOP-50001EG





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







107.5°	205.5	272.3	983.5	1955.8	1978.1
110°	233.3	300.1	905.7	1939.2	2100.4



(END OF REPORT)