

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: P844880

Luminaire Tested: **SQ4P-BB-150U-050D-B35-1D-UNV**

Issue Date: 8/14/2023



**Test Information**

Test Method: LM-79-08  
Report Number: P844880  
REPORT IS A COMBINATION OF REPORTS P700131 AND P700248  
Test Lab: INNOVATION CENTER  
Issue Date: 8/14/2023  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: SQ4P-BB-150U-050D-B35-1D-UNV  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH, 1500 LUMENS PER FOOT  
UPLIGHT, 500 LUMENS PER FOOT DOWNLIGHT  
  
Light Source: -  
Ballast/Driver: -

**Summary**

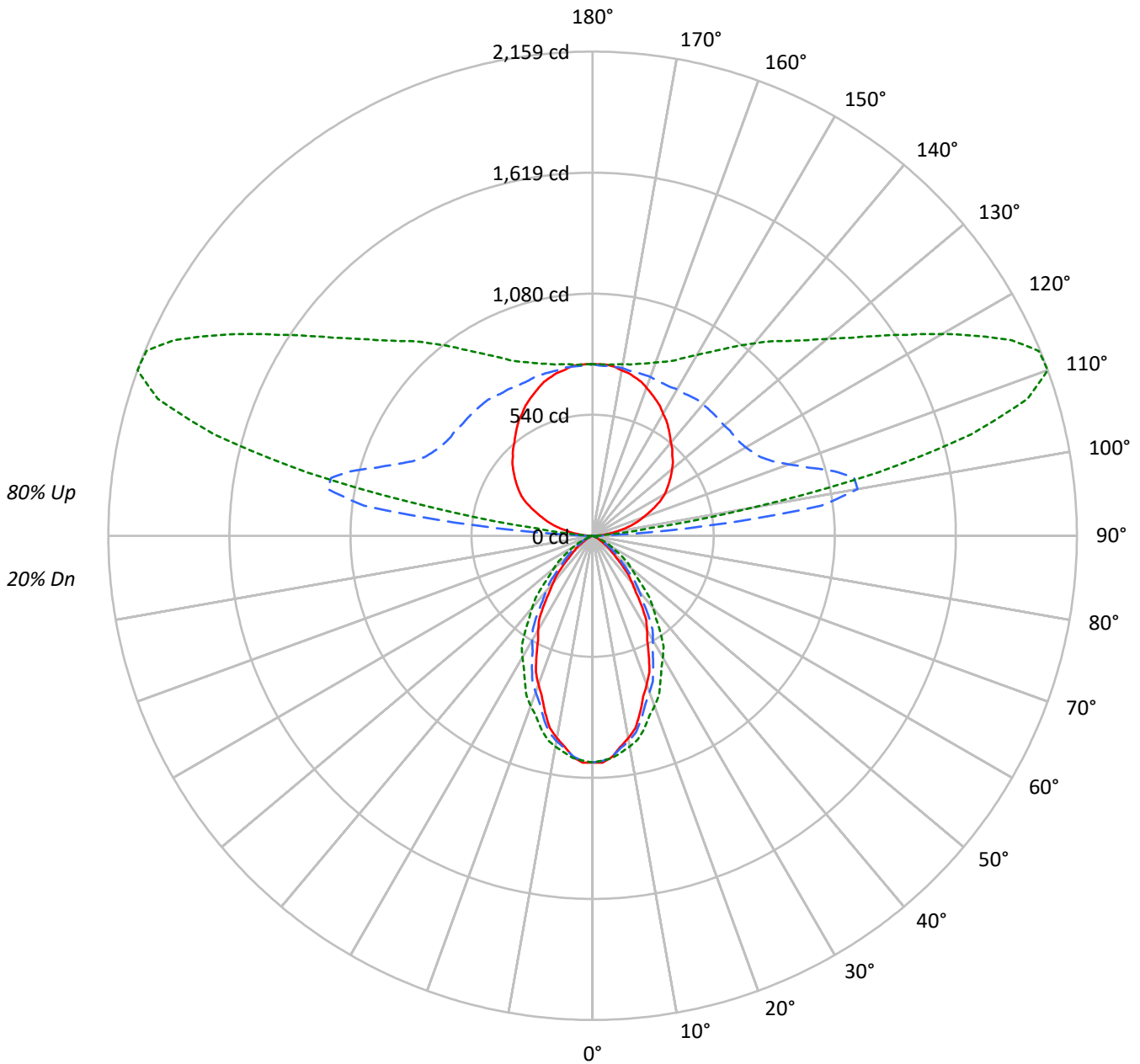
Lumens per Lamp: N/A  
Luminaire Lumens: 6174.3 lumens  
Efficiency: N/A  
Efficacy: 103.2 lumens/watt  
Spacing Criteria (0/90/45): 0.85 / 0.97 / 0.97  
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')  
CIE Type: Semi-Indirect

Input Watts (W): 59.8  
Input Voltage (V): NR  
Input Current (A<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									
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	100	100	100	100	88	88	88	88	66	66	66	46	46	46	28	28	28	20																			
1	92	88	84	81	81	78	75	72	59	57	56	42	41	40	26	25	25	18																			
2	84	77	72	67	74	69	64	61	53	50	47	38	36	34	24	23	22	16																			
3	77	69	62	57	68	61	56	51	47	43	40	34	32	30	22	21	20	15																			
4	71	61	54	49	62	55	49	44	42	38	35	31	28	26	20	19	18	13																			
5	65	55	47	42	57	49	43	38	38	34	30	28	25	23	18	17	16	12																			
6	60	49	42	37	53	44	38	33	34	30	27	25	23	20	17	15	14	11																			
7	56	44	37	32	49	40	34	29	31	27	24	23	20	18	15	14	13	10																			
8	52	40	33	28	46	36	30	26	29	24	21	21	18	16	14	13	12	9																			
9	48	37	30	25	43	33	27	23	26	22	19	20	17	15	13	12	11	9																			
10	45	34	27	23	40	30	25	21	24	20	17	18	15	14	13	11	10	8																			

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

	0°	45°	90°
0°	9325	9325	9325
5°	9174	9152	9220
10°	8583	8700	8941
15°	7804	8051	8500
20°	6927	7287	7925
25°	6032	6510	7282
30°	5168	5735	6672
35°	4284	4868	5937
40°	3292	3893	5058
45°	2380	2949	4071
50°	1621	2195	3230
55°	1055	1588	2509
60°	605	1120	1814
65°	159	683	919
70°	81	210	264
75°	36	18	0
80°	27	0	0
85°	0	0	0



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	92.2	1.5
10°-20°	235.9	3.8
20°-30°	295.3	4.8
30°-40°	272.7	4.4
40°-50°	183.3	3.0
50°-60°	94.7	1.5
60°-70°	29.6	0.5
70°-80°	1.9	0.0
80°-90°	1.9	0.0
90°-100°	304.6	4.9
100°-110°	1059.8	17.2
110°-120°	1026.6	16.6
120°-130°	805.3	13.0
130°-140°	637.4	10.3
140°-150°	491.9	8.0
150°-160°	352.6	5.7
160°-170°	215.7	3.5
170°-180°	73.0	1.2
0°-30°	623.4	10.1
0°-40°	896.1	14.5
0°-60°	1174.1	19.0
0°-90°	1207.5	19.6
90°-120°	2391.0	38.7
90°-150°	4325.6	70.1
90°-180°	4967.0	80.4
0°-180°	6174.3	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1011	1011	1011	1011	1011	
5°	991	980	988	992	996	92
15°	817	814	843	871	890	228
25°	592	597	640	683	715	272
35°	380	390	432	483	527	236
45°	182	193	226	270	312	143
55°	66	76	99	127	156	61
65°	7	14	31	38	42	12
75°	1	1	0	0	0	1
85°	0	0	0	0	0	0
90°	11	17	17	11	6	7
95°	51	177	514	131	80	54
105°	177	251	1114	1879	1748	186
115°	308	371	828	1748	2062	305
125°	417	514	771	1302	1554	373
135°	503	565	765	1085	1228	390
145°	588	628	760	937	1017	368
155°	668	691	748	834	862	308
165°	731	737	754	788	794	206
175°	765	765	760	771	765	72
180°	765	765	765	765	765	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1010.7	1010.7	1010.7	1010.7	1010.7
2.5°	1013.0	1003.4	1005.9	1005.9	1003.2
5°	990.6	980.5	988.2	991.6	995.5
7.5°	948.8	940.9	955.6	966.3	974.4
10°	916.2	909.6	928.6	943.3	954.4
12.5°	878.7	873.5	896.4	916.9	930.9
15°	817.0	814.2	842.9	871.2	889.9
17.5°	751.0	750.9	783.6	818.9	841.3
20°	705.5	707.0	742.2	781.0	807.2
22.5°	660.1	663.5	701.1	741.6	771.7
25°	592.5	597.3	639.5	683.3	715.3
27.5°	527.6	534.7	579.0	624.4	663.5
30°	485.1	493.2	538.3	586.2	626.3
32.5°	443.1	452.9	496.8	547.5	588.3
35°	380.4	390.0	432.2	483.1	527.1
37.5°	315.6	324.9	366.2	416.3	463.8
40°	273.3	283.8	323.2	371.8	420.0
42.5°	235.1	245.5	282.5	330.2	375.8
45°	182.4	193.4	226.0	269.9	312.0
47.5°	138.9	150.7	179.2	219.1	257.4
50°	112.9	124.9	152.9	188.1	225.0
52.5°	92.2	103.8	129.2	162.1	195.9
55°	65.6	76.5	98.7	126.8	156.0
57.5°	45.3	54.8	74.8	98.1	121.0
60°	32.8	41.9	60.7	79.6	98.3
62.5°	21.8	30.1	48.4	63.1	75.6
65°	7.3	14.1	31.3	37.8	42.1
67.5°	3.7	4.4	16.3	17.4	18.8
70°	3.0	3.0	7.8	8.3	9.8
72.5°	2.1	2.1	3.1	4.0	4.3
75°	1.0	1.0	0.5	0.0	0.0
77.5°	0.5	0.5	0.5	0.0	0.0
80°	0.5	0.5	0.0	0.0	0.0
82.5°	0.1	0.1	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	0.0
90°	11.4	17.1	17.1	11.4	5.7
92.5°	28.6	85.6	79.9	34.2	28.6
95°	51.4	177.0	514.0	131.3	79.9
97.5°	79.9	199.9	1028.1	468.3	251.3
100°	108.5	211.3	1199.4	1125.2	725.3
102.5°	142.8	228.5	1193.7	1582.0	1302.2
105°	177.0	251.3	1113.7	1879.0	1747.7



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	274.1	337.0	868.1	1890.5	2153.1
115°	308.4	371.3	828.2	1747.7	2061.8
117.5°	342.7	411.2	805.3	1616.3	1930.4
120°	371.3	445.4	788.1	1490.6	1799.1
122.5°	394.1	479.8	776.8	1387.9	1667.7
125°	417.0	514.0	771.0	1302.2	1553.5
127.5°	439.8	536.8	771.0	1239.4	1450.7
130°	462.7	548.3	765.3	1176.5	1365.0
132.5°	485.5	554.0	765.3	1130.8	1290.7
135°	502.6	565.4	765.3	1085.1	1227.9
137.5°	525.5	576.9	765.3	1045.2	1176.5
140°	542.6	594.0	765.3	1005.2	1119.4
142.5°	565.4	611.1	765.3	965.3	1068.0
145°	588.3	628.2	759.6	936.7	1016.6
147.5°	611.1	645.4	753.9	908.1	970.9
150°	628.2	662.5	753.9	879.5	930.9
152.5°	651.1	679.6	748.2	851.0	896.7
155°	668.3	691.1	748.2	833.8	862.4
157.5°	685.4	708.2	748.2	816.7	839.6
160°	702.5	719.6	753.9	805.3	822.4
162.5°	719.6	731.1	753.9	793.9	805.3
165°	731.1	736.8	753.9	788.1	793.9
167.5°	742.4	748.2	753.9	782.5	782.5
170°	748.2	753.9	759.6	776.8	776.8
172.5°	759.6	759.6	759.6	771.0	771.0
175°	765.3	765.3	759.6	771.0	765.3
177.5°	765.3	765.3	759.6	771.0	765.3
180°	765.3	765.3	765.3	765.3	765.3



Report Generated By 670246072 / DESKTOP-50001EG







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







107.5°	211.3	279.9	1011.0	2010.4	2033.3
110°	239.8	308.4	930.9	1993.2	2158.9



(END OF REPORT)