

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: P845243

Luminaire Tested: **SQ4P-PW1-050U-075D-B35-1D-UNV**

Issue Date: 8/14/2023

**Test Information**

Test Method: LM-79-08  
Report Number: P845243  
REPORT IS A COMBINATION OF REPORTS P700208 AND P700244  
Test Lab: INNOVATION CENTER  
Issue Date: 8/14/2023  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: SQ4P-PW1-050U-075D-B35-1D-UNV  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH, 500 LUMENS PER FOOT UPLIGHT, 750 LUMENS PER FOOT DOWNLIGHT  
  
Light Source: -  
Ballast/Driver: -

**Summary**

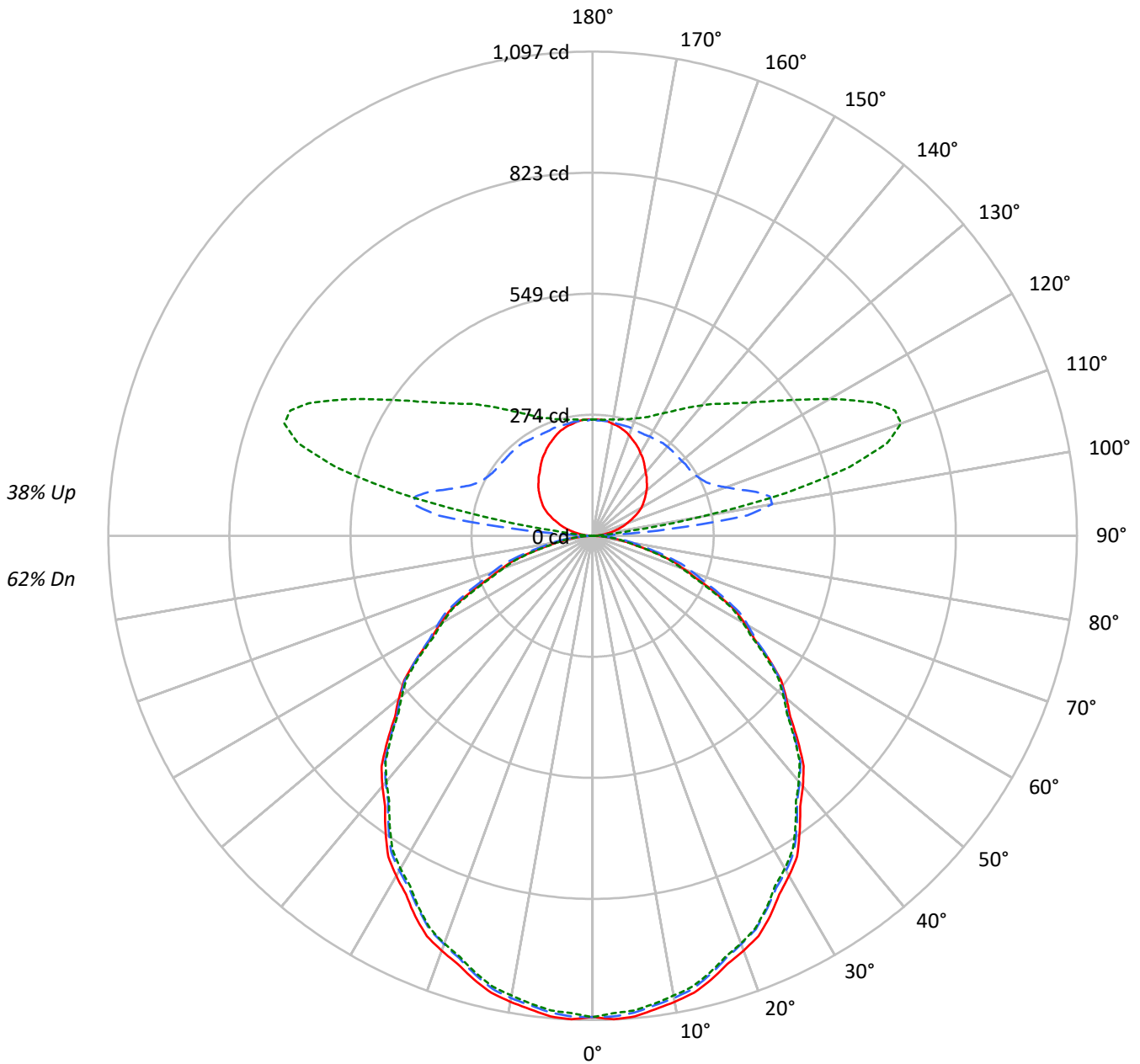
Lumens per Lamp: N/A  
Luminaire Lumens: 4485.1 lumens  
Efficiency: N/A  
Efficacy: 116.2 lumens/watt  
Spacing Criteria (0/90/45): 1.22 / 1.19 / 1.31  
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')  
CIE Type: Semi-Direct

Input Watts (W): 38.6  
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

TEST NUMBER: P845243

CATALOG NUMBER: SQ4P-PW1-050U-075D-B35-1D-UNV

### 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	110	110	110	110	103	103	103	103	90	90	90	78	78	78	67	67	67	62																			
1	101	96	92	89	94	90	87	84	79	77	74	69	67	65	59	58	57	52																			
2	92	84	78	73	86	79	74	69	69	65	62	61	57	55	52	50	48	44																			
3	84	74	67	61	78	70	63	58	61	56	52	54	50	46	47	44	41	37																			
4	77	66	58	51	71	62	55	49	55	49	44	48	43	40	42	38	35	32																			
5	70	59	50	44	66	55	48	42	49	43	38	43	38	35	38	34	31	28																			
6	65	53	44	38	61	50	42	37	44	38	34	39	34	30	34	30	27	25																			
7	60	48	39	34	56	45	38	32	40	34	30	35	31	27	31	27	24	22																			
8	56	43	35	30	52	41	34	29	37	31	26	32	28	24	29	25	22	19																			
9	52	40	32	27	49	38	31	26	34	28	24	30	25	22	26	23	20	18																			
10	49	36	29	24	46	35	28	23	31	25	21	28	23	20	25	21	18	16																			

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

	0°	45°	90°
0°	10059	10059	10059
5°	10126	10045	10001
10°	10044	9963	9909
15°	9939	9828	9790
20°	9819	9667	9650
25°	9682	9506	9476
30°	9477	9335	9273
35°	9209	9077	9024
40°	8922	8781	8748
45°	8574	8462	8422
50°	8220	8151	8092
55°	7834	7834	7711
60°	7359	7499	7233
65°	6731	7067	6565
70°	5932	6504	5781
75°	5073	5821	4930
80°	3932	4904	3990
85°	2541	3769	3345



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	102.7	2.3
10°-20°	289.9	6.5
20°-30°	430.0	9.6
30°-40°	503.1	11.2
40°-50°	500.9	11.2
50°-60°	432.6	9.6
60°-70°	311.3	6.9
70°-80°	163.3	3.6
80°-90°	41.1	0.9
90°-100°	104.9	2.3
100°-110°	364.9	8.1
110°-120°	353.5	7.9
120°-130°	277.3	6.2
130°-140°	219.5	4.9
140°-150°	169.4	3.8
150°-160°	121.4	2.7
160°-170°	74.3	1.7
170°-180°	25.1	0.6
0°-30°	822.6	18.3
0°-40°	1325.7	29.6
0°-60°	2259.1	50.4
0°-90°	2774.9	61.9
90°-120°	823.3	18.4
90°-150°	1489.4	33.2
90°-180°	1710.0	38.1
0°-180°	4485.1	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1090	1090	1090	1090	1090	
5°	1093	1081	1085	1082	1080	104
15°	1040	1027	1029	1027	1025	293
25°	951	935	934	928	931	437
35°	818	806	806	798	801	511
45°	657	651	648	646	646	507
55°	487	486	487	480	479	435
65°	308	318	324	311	301	306
75°	142	155	163	152	138	152
85°	24	32	36	34	32	32
90°	4	6	6	4	2	3
95°	18	61	177	45	28	19
105°	61	86	384	647	602	64
115°	106	128	285	602	710	105
125°	144	177	266	448	535	129
135°	173	195	264	374	423	134
145°	203	216	262	322	350	127
155°	230	238	258	287	297	106
165°	252	254	260	271	273	71
175°	264	264	262	266	264	25
180°	264	264	264	264	264	



TEST NUMBER: P845243

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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1090.3	1090.3	1090.3	1090.3	1090.3
2.5°	1096.6	1087.5	1090.3	1088.0	1082.7
5°	1093.3	1081.0	1084.6	1081.7	1079.8
7.5°	1082.2	1070.9	1073.4	1070.5	1069.3
10°	1072.1	1060.9	1063.5	1059.7	1057.7
12.5°	1060.7	1048.5	1051.3	1047.3	1046.3
15°	1040.5	1027.2	1028.9	1026.9	1025.0
17.5°	1016.9	1003.7	1003.9	1000.9	1000.4
20°	1000.1	986.0	984.6	980.8	982.9
22.5°	981.7	966.8	965.5	960.2	962.8
25°	951.1	935.1	933.8	928.1	930.8
27.5°	915.7	900.1	900.1	892.0	894.9
30°	889.6	874.5	876.2	866.6	870.4
32.5°	861.9	848.4	849.2	839.8	843.5
35°	817.6	806.3	805.9	798.3	801.2
37.5°	772.2	762.3	760.6	756.3	756.9
40°	740.8	732.3	729.1	726.3	726.3
42.5°	707.6	700.0	696.8	694.7	694.0
45°	657.1	651.4	648.5	646.5	645.5
47.5°	607.1	601.9	599.3	598.0	597.0
50°	572.7	568.8	567.9	564.8	563.8
52.5°	538.0	535.8	534.7	531.1	530.1
55°	487.0	486.2	487.0	480.4	479.4
57.5°	434.0	435.6	438.7	429.6	427.2
60°	398.8	402.4	406.4	395.8	392.0
62.5°	362.5	368.6	374.1	361.9	356.5
65°	308.3	317.7	323.7	311.0	300.7
67.5°	256.2	267.7	274.9	261.3	249.5
70°	219.9	233.2	241.1	227.3	214.3
72.5°	188.5	203.2	209.6	196.6	183.5
75°	142.3	155.3	163.3	152.4	138.3
77.5°	100.9	113.3	119.9	110.5	98.7
80°	74.0	87.1	92.3	84.3	75.1
82.5°	52.5	63.4	66.9	62.1	55.7
85°	24.0	31.5	35.6	33.7	31.6
87.5°	6.2	11.4	14.6	14.6	15.4
90°	3.9	5.9	5.9	3.9	2.0
92.5°	9.8	29.5	27.5	11.8	9.8
95°	17.7	61.0	177.0	45.2	27.5
97.5°	27.5	68.8	353.9	161.3	86.5
100°	37.4	72.8	413.0	387.4	249.7
102.5°	49.1	78.7	411.0	544.7	448.4
105°	61.0	86.5	383.5	646.9	601.7



TEST NUMBER: P845243

CATALOG NUMBER: SQ4P-PW1-050U-075D-B35-1D-UNV

**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	94.4	116.1	299.0	650.9	741.4
115°	106.2	127.8	285.2	601.7	709.9
117.5°	118.0	141.6	277.2	556.5	664.6
120°	127.8	153.3	271.4	513.3	619.4
122.5°	135.7	165.2	267.4	477.8	574.2
125°	143.6	177.0	265.5	448.4	534.9
127.5°	151.4	184.9	265.5	426.8	499.5
130°	159.3	188.8	263.5	405.1	470.0
132.5°	167.1	190.7	263.5	389.4	444.5
135°	173.0	194.6	263.5	373.6	422.8
137.5°	180.9	198.6	263.5	359.8	405.1
140°	186.8	204.5	263.5	346.1	385.5
142.5°	194.6	210.4	263.5	332.3	367.7
145°	202.6	216.4	261.6	322.5	350.0
147.5°	210.4	222.2	259.6	312.7	334.3
150°	216.4	228.1	259.6	302.9	320.6
152.5°	224.2	234.0	257.7	293.0	308.7
155°	230.1	238.0	257.7	287.1	296.9
157.5°	235.9	243.9	257.7	281.2	289.1
160°	241.9	247.8	259.6	277.2	283.2
162.5°	247.8	251.7	259.6	273.3	277.2
165°	251.7	253.6	259.6	271.4	273.3
167.5°	255.6	257.7	259.6	269.4	269.4
170°	257.7	259.6	261.6	267.4	267.4
172.5°	261.6	261.6	261.6	265.5	265.5
175°	263.5	263.5	261.6	265.5	263.5
177.5°	263.5	263.5	261.6	265.5	263.5
180°	263.5	263.5	263.5	263.5	263.5



Report Generated By 670246072 / DESKTOP-50001EG







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







107.5°	72.8	96.4	348.1	692.2	700.1
110°	82.6	106.2	320.6	686.3	743.3



(END OF REPORT)