

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

(formerly Eaton)

Brand: CORELITE

Report Number: P564915

Luminaire Tested: **SQ4-PW1-100U-050D-840-1D-UNV-STD-W-6**

Issue Date: 7/30/2021

**Test Information**

Test Method: LM-79-2019  
Report Number: P564915  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-23, G2-2106-289-3)  
Test Lab: INNOVATION CENTER  
Issue Date: 7/30/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: SQ4-PW1-100U-050D-840-1D-UNV-STD-W-6  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE WAVES CONTINUOUS LENS.  
DOWNLIGHT 500 LUMENS PER FOOT  
UPLIGHT 1000 LUMENS PER FOOT  
Light Source: 4000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

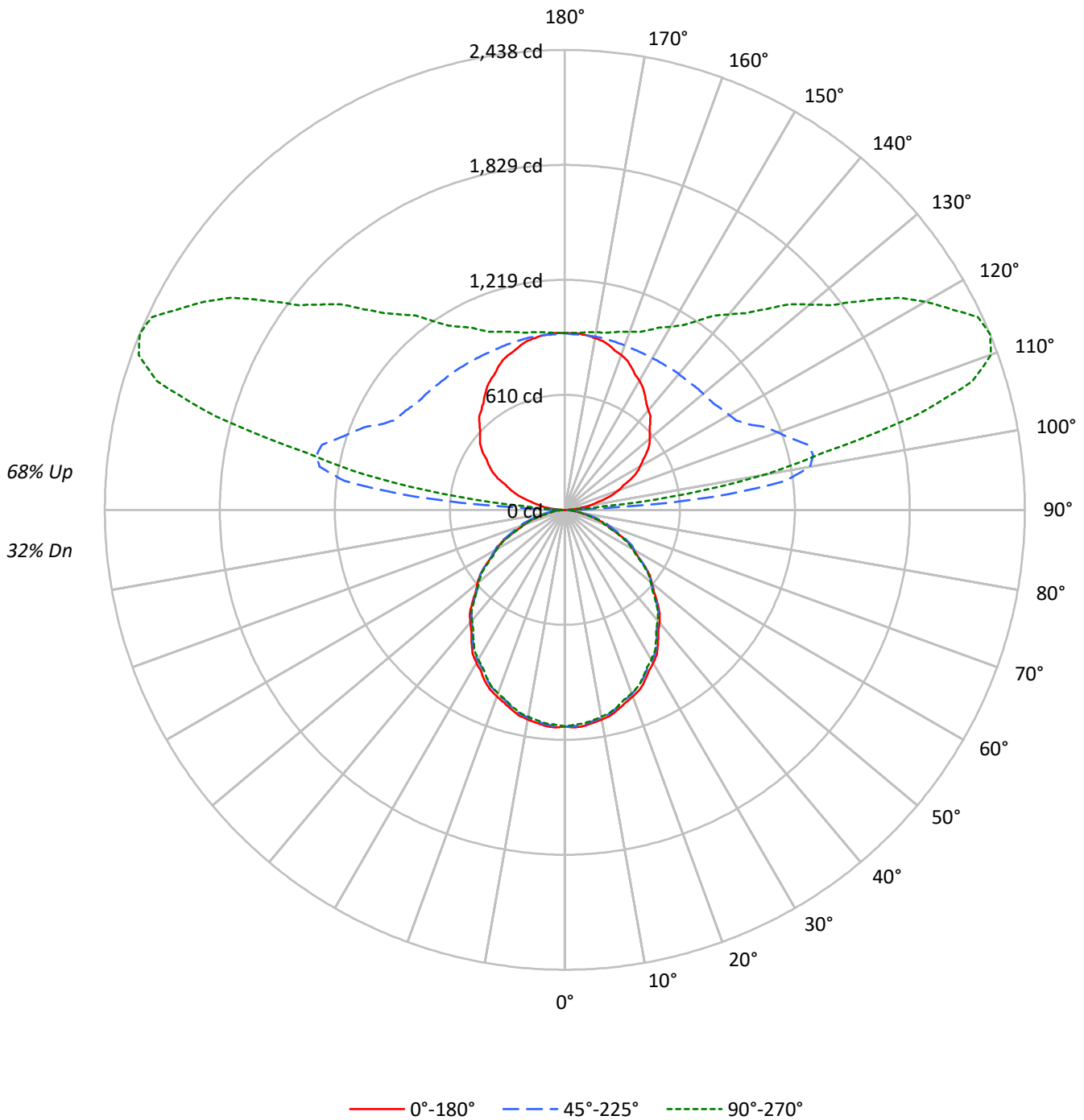
Lumens per Lamp: N/A  
Luminaire Lumens: 9008.2 lumens  
Efficiency: N/A  
Efficacy: 140.1 lumens/watt  
Spacing Criteria (0/90/45): 1.22 / 1.19 / 1.31  
Luminous Opening: Rectangular (W 0.29' x L: 6' x H: 0')  
CIE Type: Semi-Indirect

Input Watts (W): 64.3  
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				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	103	103	103	103	93	93	93	93	74	74	74	56	56	56	40	40	40	32
1	94	90	86	83	84	81	78	75	64	62	60	49	48	47	35	35	34	27
2	86	78	72	67	77	71	66	62	57	53	50	43	41	39	31	30	29	23
3	78	69	62	56	70	62	56	51	50	46	42	38	35	33	28	26	24	20
4	71	61	53	47	64	55	49	43	44	40	36	34	31	28	25	23	21	17
5	65	54	46	40	59	49	42	37	39	35	31	31	27	24	22	20	18	15
6	60	48	41	35	54	44	37	32	35	30	27	28	24	21	20	18	16	13
7	55	44	36	31	50	40	33	28	32	27	23	25	21	19	18	16	14	11
8	51	39	32	27	46	36	29	25	29	24	21	23	19	17	17	15	13	10
9	48	36	29	24	43	33	26	22	27	22	18	21	17	15	16	13	11	9
10	45	33	26	21	40	30	24	20	24	20	17	19	16	13	14	12	10	8

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

	0°	45°	90°
0°	7062	7062	7062
5°	7108	7052	7020
10°	7051	6994	6956
15°	6976	6899	6873
20°	6893	6787	6773
25°	6797	6673	6652
30°	6653	6553	6509
35°	6464	6373	6335
40°	6262	6165	6141
45°	6019	5939	5913
50°	5769	5720	5682
55°	5500	5500	5413
60°	5164	5264	5077
65°	4726	4961	4608
70°	4167	4566	4057
75°	3558	4088	3463
80°	2759	3439	2795
85°	1785	2639	2357



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	108.1	1.2
10°-20°	305.2	3.4
20°-30°	452.8	5.0
30°-40°	529.8	5.9
40°-50°	527.4	5.9
50°-60°	455.5	5.1
60°-70°	327.8	3.6
70°-80°	171.9	1.9
80°-90°	44.6	0.5
90°-100°	438.6	4.9
100°-110°	1210.8	13.4
110°-120°	1248.7	13.9
120°-130°	1003.5	11.1
130°-140°	788.6	8.8
140°-150°	604.8	6.7
150°-160°	434.7	4.8
160°-170°	265.8	3.0
170°-180°	89.6	1.0
0°-30°	866.1	9.6
0°-40°	1395.9	15.5
0°-60°	2378.8	26.4
0°-90°	2923.1	32.4
90°-120°	2898.1	32.2
90°-150°	5295.0	58.8
90°-180°	6085.0	67.5
0°-180°	9008.2	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1148	1148	1148	1148	1148	
5°	1151	1138	1142	1139	1137	109
15°	1096	1082	1083	1081	1079	309
25°	1002	985	983	977	980	460
35°	861	849	849	841	844	538
45°	692	686	683	681	680	534
55°	513	512	513	506	505	458
65°	325	335	341	328	317	322
75°	150	164	172	160	146	160
85°	25	33	37	35	33	33
90°	3	6	12	14	15	5
95°	64	237	796	327	213	69
105°	216	333	1332	2034	1915	230
115°	387	467	1073	2124	2416	380
125°	530	604	972	1646	1932	472
135°	638	707	946	1333	1503	494
145°	740	792	934	1135	1221	463
155°	835	862	926	1018	1050	385
165°	904	915	930	967	974	255
175°	936	938	932	946	942	89
180°	936	936	936	936	936	

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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1148.1	1148.1	1148.1	1148.1	1148.1
2.5°	1154.6	1145.1	1148.1	1145.6	1140.0
5°	1151.2	1138.3	1142.1	1139.0	1137.0
7.5°	1139.4	1127.6	1130.3	1127.1	1125.9
10°	1128.9	1117.1	1119.8	1115.7	1113.7
12.5°	1116.8	1104.1	1106.9	1102.8	1101.6
15°	1095.5	1081.7	1083.4	1081.3	1079.4
17.5°	1070.9	1056.8	1057.1	1053.9	1053.5
20°	1053.1	1038.2	1036.9	1032.9	1034.8
22.5°	1033.6	1018.0	1016.6	1011.0	1013.8
25°	1001.5	984.6	983.3	977.3	980.2
27.5°	964.2	947.6	947.6	939.2	942.4
30°	936.7	920.9	922.6	912.5	916.5
32.5°	907.6	893.3	894.2	884.2	888.2
35°	860.9	849.0	848.7	840.7	843.7
37.5°	813.1	802.6	801.0	796.3	797.1
40°	779.9	771.0	767.8	764.8	764.8
42.5°	745.1	737.0	733.8	731.6	730.8
45°	691.9	686.0	682.8	680.8	679.8
47.5°	639.3	633.8	631.0	629.6	628.6
50°	602.9	598.9	597.8	594.8	593.8
52.5°	566.5	564.1	563.0	559.2	558.2
55°	512.9	511.9	512.9	505.8	504.8
57.5°	457.0	458.6	461.9	452.3	449.9
60°	419.8	423.8	427.9	416.7	412.7
62.5°	381.8	388.1	393.9	381.0	375.5
65°	324.7	334.6	340.9	327.5	316.6
67.5°	269.7	282.0	289.5	275.1	262.8
70°	231.7	245.5	253.9	239.4	225.6
72.5°	198.5	213.9	220.7	207.1	193.2
75°	149.7	163.6	172.0	160.5	145.7
77.5°	106.2	119.3	126.2	116.3	104.0
80°	77.9	91.7	97.1	88.8	78.9
82.5°	55.2	66.7	70.4	65.4	58.7
85°	25.3	33.2	37.4	35.4	33.4
87.5°	7.1	13.2	17.8	18.1	19.2
90°	3.0	5.9	12.0	13.5	15.0
92.5°	27.0	112.0	200.2	73.1	56.9
95°	64.4	237.3	795.7	327.1	212.8
97.5°	106.7	265.8	1178.7	907.5	657.2
100°	137.9	282.9	1320.1	1329.5	1080.4
102.5°	167.8	302.3	1347.7	1642.6	1406.4
105°	215.8	333.0	1332.1	2033.7	1915.0
107.5°	266.7	371.0	1257.8	2222.3	2265.7
110°	302.7	396.5	1200.3	2262.9	2403.5

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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	335.1	425.3	1146.3	2230.8	2438.3
115°	386.6	467.2	1072.9	2123.9	2415.5
117.5°	431.6	511.8	1024.6	1973.5	2305.2
120°	461.5	540.6	1005.5	1871.7	2205.7
122.5°	490.3	565.9	989.9	1776.6	2093.0
125°	530.5	603.7	972.5	1645.8	1931.5
127.5°	564.6	637.9	962.3	1535.2	1781.7
130°	587.4	660.7	957.5	1467.6	1691.8
132.5°	609.0	678.7	952.7	1410.8	1613.8
135°	638.3	707.2	945.5	1333.0	1502.9
137.5°	671.3	734.0	941.9	1267.7	1412.7
140°	689.3	750.8	939.5	1224.1	1351.6
142.5°	709.7	766.5	937.1	1185.4	1297.7
145°	740.2	791.5	933.5	1134.8	1221.2
147.5°	769.6	814.4	930.2	1092.1	1159.2
150°	791.2	827.8	929.0	1066.6	1120.8
152.5°	808.0	842.2	927.8	1044.8	1089.7
155°	834.6	862.5	926.0	1018.2	1050.4
157.5°	859.2	880.6	926.3	998.8	1020.7
160°	873.6	892.6	927.5	987.8	1004.0
162.5°	885.6	902.3	928.7	978.2	990.8
165°	903.6	915.3	930.5	966.7	974.0
167.5°	917.4	924.4	932.0	959.7	962.0
170°	924.5	930.4	932.0	956.0	956.0
172.5°	930.5	934.1	932.0	951.2	950.0
175°	936.5	938.0	932.0	945.5	942.5
177.5°	938.9	937.8	931.7	940.1	937.7
180°	936.5	936.5	936.5	936.5	936.5

(END OF REPORT)