

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: P564761

Luminaire Tested: **SQ4-PW1-075U-100D-830-1D-UNV-STD-W-12**

Issue Date: 7/30/2021

**Test Information**

Test Method: LM-79-2019  
Report Number: P564761  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-22, 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-PW1-075U-100D-830-1D-UNV-STD-W-12  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE WAVES CONTINUOUS LENS.  
DOWNLIGHT 1000 LUMENS PER FOOT  
UPLIGHT 750 LUMENS PER FOOT  
Light Source: 3000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 19172.6 lumens  
Efficiency: N/A  
Efficacy: 118.2 lumens/watt  
Spacing Criteria (0/90/45): 1.22 / 1.19 / 1.31  
Luminous Opening: Rectangular (W 0.29' x L: 12' x H: 0')  
CIE Type: General Diffuse

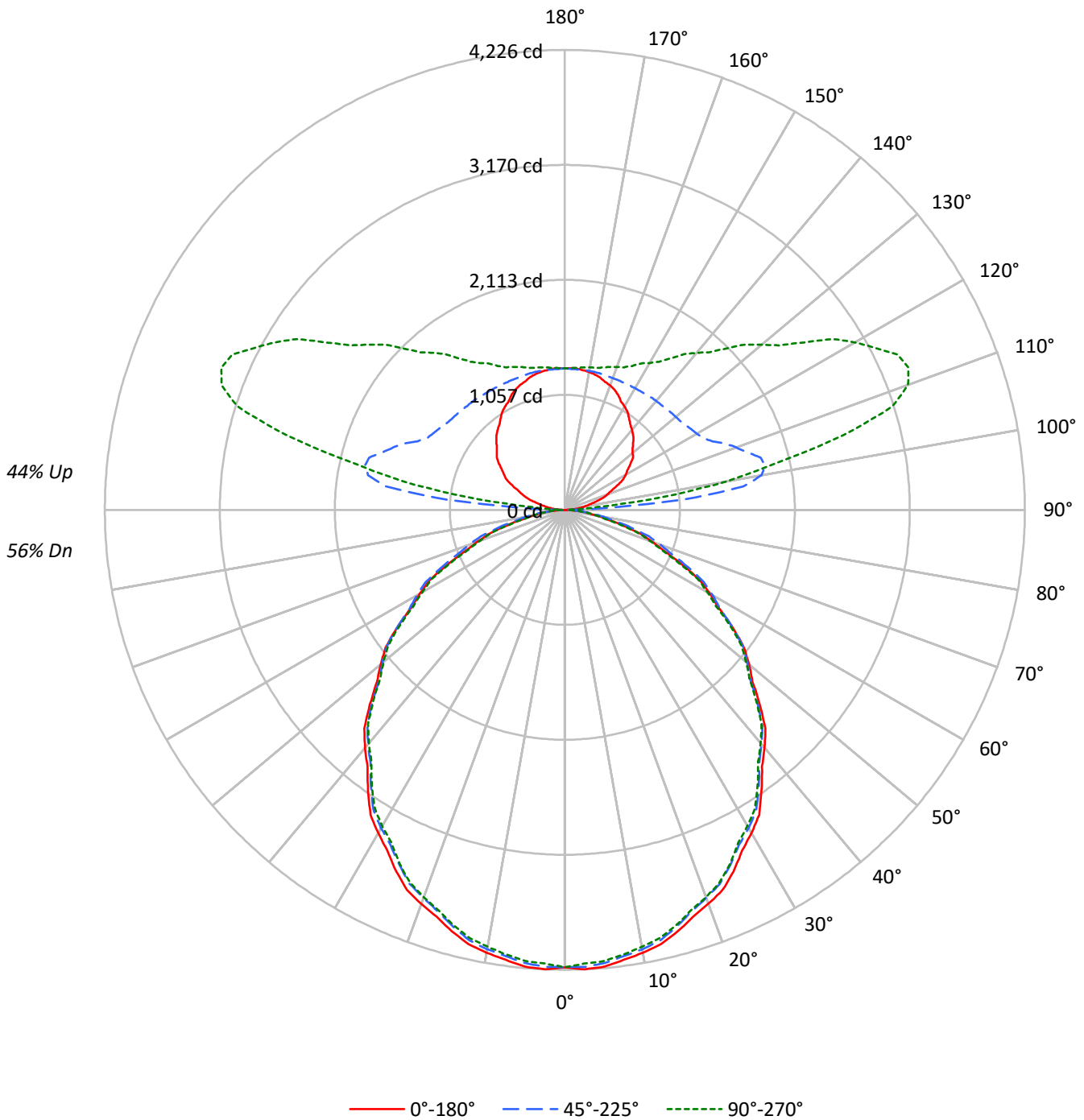
Input Watts (W): 162.2  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



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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	109	109	109	109	101	101	101	101	87	87	87	73	73	73	61	61	61	56
1	99	95	91	88	92	88	85	82	76	74	71	65	63	61	55	53	52	47
2	90	83	77	72	84	77	72	67	67	63	59	57	54	51	48	46	44	40
3	83	73	66	60	76	68	62	56	59	54	50	51	47	44	43	40	38	34
4	76	65	57	51	70	60	53	48	52	47	43	45	41	37	38	35	32	29
5	69	58	49	43	64	54	47	41	47	41	37	40	36	32	34	31	28	25
6	64	52	44	38	59	49	41	36	42	37	32	37	32	28	31	28	25	22
7	59	47	39	33	55	44	37	32	38	33	28	33	29	25	29	25	22	20
8	55	43	35	29	51	40	33	28	35	29	25	30	26	23	26	23	20	18
9	51	39	31	26	48	37	30	25	32	27	23	28	24	20	24	21	18	16
10	48	36	28	24	44	34	27	22	30	24	20	26	21	18	22	19	16	14

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

	0°	45°	90°
0°	12924	12924	12924
5°	13007	12905	12847
10°	12904	12800	12730
15°	12767	12625	12578
20°	12614	12421	12396
25°	12438	12212	12174
30°	12175	11991	11912
35°	11829	11663	11593
40°	11460	11282	11237
45°	11015	10870	10821
50°	10558	10469	10399
55°	10065	10065	9906
60°	9451	9633	9291
65°	8649	9080	8433
70°	7624	8356	7425
75°	6512	7479	6336
80°	5049	6294	5115
85°	3268	4834	4312



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	395.7	2.1
10°-20°	1117.2	5.8
20°-30°	1657.2	8.6
30°-40°	1939.1	10.1
40°-50°	1930.4	10.1
50°-60°	1667.0	8.7
60°-70°	1199.9	6.3
70°-80°	629.3	3.3
80°-90°	159.3	0.8
90°-100°	613.7	3.2
100°-110°	1688.6	8.8
110°-120°	1742.9	9.1
120°-130°	1396.4	7.3
130°-140°	1096.8	5.7
140°-150°	840.5	4.4
150°-160°	604.3	3.2
160°-170°	369.5	1.9
170°-180°	124.6	0.6
0°-30°	3170.1	16.5
0°-40°	5109.2	26.6
0°-60°	8706.7	45.4
0°-90°	10695.2	55.8
90°-120°	4045.3	21.1
90°-150°	7379.0	38.5
90°-180°	8477.0	44.2
0°-180°	19172.6	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	4202	4202	4202	4202	4202	
5°	4213	4166	4180	4169	4162	399
15°	4010	3959	3965	3958	3951	1130
25°	3666	3604	3599	3577	3588	1685
35°	3151	3107	3106	3077	3088	1970
45°	2532	2511	2499	2492	2488	1954
55°	1877	1874	1877	1851	1848	1675
65°	1188	1225	1248	1199	1159	1178
75°	548	599	629	588	533	587
85°	93	122	137	129	122	122
90°	3	11	19	25	25	9
95°	91	335	1085	464	296	97
105°	302	464	1861	2834	2644	318
115°	534	651	1492	2972	3372	527
125°	736	839	1354	2290	2683	657
135°	889	986	1315	1852	2096	686
145°	1027	1098	1296	1578	1700	644
155°	1163	1201	1288	1418	1459	534
165°	1257	1273	1293	1346	1354	354
175°	1301	1304	1296	1312	1310	124
180°	1301	1301	1301	1301	1301	

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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	4202.3	4202.3	4202.3	4202.3	4202.3
2.5°	4226.0	4191.3	4202.3	4193.0	4172.7
5°	4213.4	4166.4	4180.1	4168.8	4161.6
7.5°	4170.5	4127.0	4137.2	4125.2	4120.9
10°	4132.0	4088.5	4098.7	4083.7	4076.4
12.5°	4087.6	4041.2	4051.3	4036.4	4032.0
15°	4009.8	3959.1	3965.4	3957.8	3950.6
17.5°	3919.5	3868.1	3869.1	3857.2	3855.8
20°	3854.3	3800.0	3795.1	3780.4	3787.7
22.5°	3783.2	3726.0	3721.0	3700.5	3710.6
25°	3665.5	3603.9	3598.8	3576.9	3587.7
27.5°	3529.2	3468.4	3468.5	3437.7	3449.2
30°	3428.5	3370.6	3376.7	3340.0	3354.5
32.5°	3321.9	3269.7	3273.0	3236.3	3250.8
35°	3150.8	3107.4	3106.4	3077.0	3087.9
37.5°	2976.1	2937.7	2931.6	2914.7	2917.6
40°	2854.6	2822.0	2810.2	2799.1	2799.1
42.5°	2727.3	2697.6	2685.8	2677.6	2674.7
45°	2532.5	2510.8	2499.2	2491.7	2488.1
47.5°	2340.0	2319.7	2309.6	2304.3	2300.7
50°	2206.7	2192.2	2188.2	2177.0	2173.4
52.5°	2073.4	2064.7	2060.8	2046.7	2043.0
55°	1877.2	1873.5	1877.2	1851.2	1847.5
57.5°	1672.8	1678.6	1690.6	1655.6	1646.9
60°	1536.5	1551.0	1566.2	1525.1	1510.6
62.5°	1397.3	1420.5	1441.8	1394.6	1374.4
65°	1188.5	1224.7	1247.7	1198.7	1158.9
67.5°	987.1	1032.0	1059.7	1006.8	961.9
70°	847.9	898.6	929.3	876.3	825.7
72.5°	726.4	782.9	807.9	757.9	707.2
75°	548.0	598.7	629.4	587.5	533.2
77.5°	388.8	436.5	462.1	425.5	380.6
80°	285.1	335.8	355.4	325.0	288.8
82.5°	202.2	244.2	257.7	239.4	214.7
85°	92.6	121.5	137.0	129.4	122.2
87.5°	24.2	46.1	60.2	61.3	64.2
90°	2.8	10.9	19.4	24.9	24.9
92.5°	38.2	163.3	283.0	108.6	89.2
95°	91.4	335.0	1085.3	464.1	296.3
97.5°	149.0	371.5	1656.2	1276.1	900.4
100°	191.0	394.1	1835.7	1852.8	1511.7
102.5°	230.9	421.0	1882.2	2298.7	1985.7
105°	301.8	464.2	1860.6	2833.6	2644.1
107.5°	369.3	517.7	1754.8	3095.6	3151.9
110°	418.1	553.4	1675.1	3160.8	3355.7

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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	462.4	593.4	1595.3	3118.8	3415.5
115°	534.4	650.8	1492.3	2971.6	3372.3
117.5°	603.0	710.2	1427.0	2765.2	3218.4
120°	645.1	748.0	1398.2	2610.5	3078.8
122.5°	682.8	785.6	1378.3	2474.8	2919.3
125°	736.5	839.4	1353.9	2290.3	2682.9
127.5°	787.4	885.4	1337.8	2136.4	2480.8
130°	814.0	914.2	1329.0	2044.9	2358.9
132.5°	845.0	945.2	1322.3	1964.5	2248.2
135°	888.8	986.2	1315.1	1852.3	2095.9
137.5°	929.7	1020.2	1309.0	1761.6	1962.5
140°	960.7	1044.7	1306.8	1701.3	1882.7
142.5°	987.3	1064.7	1302.4	1647.6	1803.0
145°	1027.2	1097.6	1295.8	1578.2	1700.0
147.5°	1069.8	1130.5	1292.4	1516.7	1614.2
150°	1096.4	1150.6	1290.2	1483.0	1558.8
152.5°	1120.8	1170.6	1288.0	1453.9	1516.7
155°	1162.9	1200.8	1287.5	1418.5	1459.1
157.5°	1193.3	1224.2	1287.5	1389.4	1417.6
160°	1215.5	1239.8	1287.5	1373.8	1395.4
162.5°	1233.2	1253.2	1289.7	1360.4	1377.7
165°	1257.0	1273.2	1293.0	1345.8	1353.9
167.5°	1273.6	1286.1	1295.8	1333.5	1335.6
170°	1284.7	1292.8	1295.8	1329.0	1329.0
172.5°	1293.5	1297.3	1295.8	1322.3	1320.1
175°	1301.3	1304.0	1295.8	1312.3	1309.6
177.5°	1303.5	1303.5	1294.7	1307.8	1303.5
180°	1301.3	1301.3	1301.3	1301.3	1301.3

(END OF REPORT)