

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: P564321

Luminaire Tested: **SQ4-PR1-100U-125D-935-1D-UNV-STD-W-12**

Issue Date: 7/30/2021

**Test Information**

Test Method: LM-79-2019  
Report Number: P564321  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-23, G2-2106-289-4)  
Test Lab: INNOVATION CENTER  
Issue Date: 7/30/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: SQ4-PR1-100U-125D-935-1D-UNV-STD-W-12  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE RIPPLE CONTINUOUS LENS.  
DOWNLIGHT 1250 LUMENS PER FOOT  
UPLIGHT 1000 LUMENS PER FOOT  
Light Source: 3500K CCT, 90 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

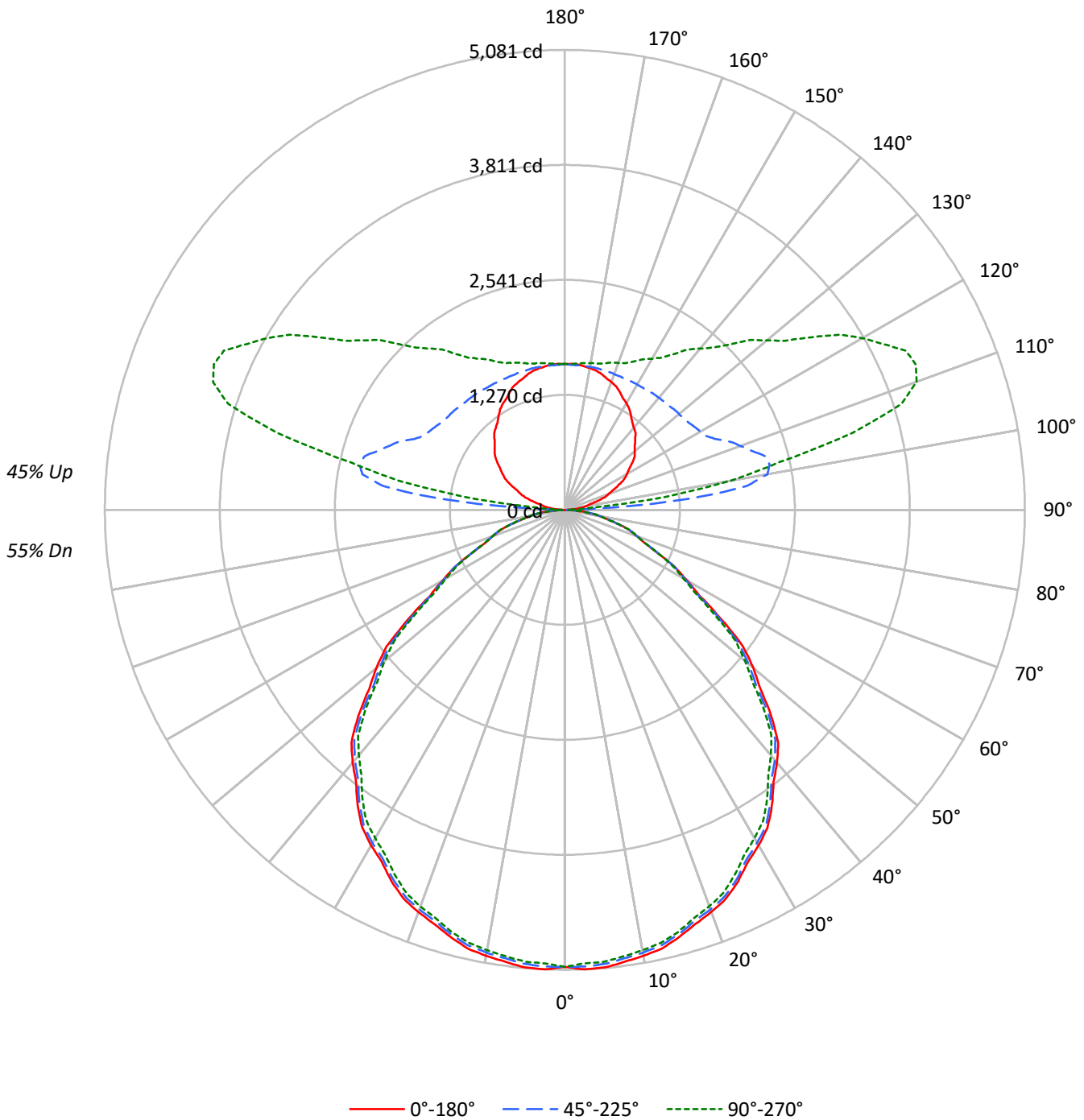
Lumens per Lamp: N/A  
Luminaire Lumens: 23096.3 lumens  
Efficiency: N/A  
Efficacy: 107.5 lumens/watt  
Spacing Criteria (0/90/45): 1.26 / 1.24 / 1.35  
Luminous Opening: Rectangular (W 0.29' x L: 12' x H: 0')  
CIE Type: General Diffuse

Input Watts (W): 214.8  
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	108	108	108	108	100	100	100	100	86	86	86	73	73	73	60	60	60	55
1	99	95	91	88	92	88	85	82	76	73	71	64	63	61	54	53	52	47
2	91	83	77	72	84	78	72	68	67	63	60	57	54	52	48	46	44	40
3	83	73	66	60	77	69	62	57	59	54	50	51	47	44	43	40	38	34
4	76	65	57	51	70	61	54	49	53	47	43	45	41	38	38	35	33	29
5	70	58	50	44	65	54	47	42	47	42	37	41	36	33	35	31	29	26
6	64	52	44	38	60	49	42	37	43	37	33	37	32	29	31	28	25	23
7	60	47	39	34	55	44	37	32	39	33	29	34	29	26	29	25	23	20
8	55	43	35	30	51	40	33	29	35	30	26	31	26	23	26	23	20	18
9	51	39	32	27	48	37	30	26	33	27	23	28	24	21	24	21	18	16
10	48	36	29	24	45	34	27	23	30	25	21	26	22	19	23	19	17	15

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

	0°	45°	90°
0°	15530	15530	15530
5°	15670	15549	15468
10°	15620	15511	15430
15°	15551	15455	15371
20°	15473	15374	15260
25°	15364	15261	15084
30°	15198	15090	14874
35°	14974	14843	14631
40°	14633	14476	14213
45°	14036	13790	13507
50°	12985	12673	12423
55°	11334	11077	10844
60°	9550	9470	9283
65°	8261	8293	8230
70°	7587	7626	7626
75°	7287	7287	7339
80°	6856	6932	6856
85°	5526	6140	6140



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	477.5	2.1
10°-20°	1366.2	5.9
20°-30°	2060.7	8.9
30°-40°	2455.4	10.6
40°-50°	2420.8	10.5
50°-60°	1850.1	8.0
60°-70°	1144.9	5.0
70°-80°	650.3	2.8
80°-90°	201.2	0.9
90°-100°	754.6	3.3
100°-110°	2083.1	9.0
110°-120°	2148.4	9.3
120°-130°	1726.4	7.5
130°-140°	1356.8	5.9
140°-150°	1040.6	4.5
150°-160°	747.9	3.2
160°-170°	457.3	2.0
170°-180°	154.2	0.7
0°-30°	3904.5	16.9
0°-40°	6359.9	27.5
0°-60°	10630.7	46.0
0°-90°	12627.0	54.7
90°-120°	4986.1	21.6
90°-150°	9109.9	39.4
90°-180°	10469.0	45.3
0°-180°	23096.3	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	5050	5050	5050	5050	5050	
5°	5076	5020	5037	5019	5011	482
15°	4884	4833	4854	4836	4828	1378
25°	4528	4472	4497	4449	4445	2084
35°	3988	3942	3954	3901	3897	2489
45°	3227	3185	3171	3114	3106	2472
55°	2114	2080	2066	2031	2022	1894
65°	1135	1127	1140	1131	1131	1150
75°	613	613	613	618	618	648
85°	157	165	174	174	174	182
90°	5	10	21	23	26	14
95°	111	408	1369	563	366	119
105°	371	573	2292	3499	3295	395
115°	665	804	1846	3654	4156	654
125°	913	1039	1673	2832	3323	812
135°	1098	1217	1627	2293	2586	850
145°	1274	1362	1606	1952	2101	797
155°	1436	1484	1593	1752	1807	662
165°	1555	1575	1601	1663	1676	438
175°	1611	1614	1604	1627	1622	153
180°	1611	1611	1611	1611	1611	

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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	5049.7	5049.7	5049.7	5049.7	5049.7
2.5°	5081.0	5036.8	5049.7	5038.7	5014.9
5°	5075.8	5020.5	5036.6	5019.1	5010.6
7.5°	5036.6	4982.2	4998.4	4980.9	4975.8
10°	5001.9	4950.8	4967.1	4949.5	4941.0
12.5°	4963.6	4909.1	4928.8	4907.7	4899.2
15°	4884.4	4833.4	4854.0	4836.4	4827.9
17.5°	4797.4	4743.0	4763.5	4743.2	4732.2
20°	4727.8	4676.8	4697.4	4666.8	4662.6
22.5°	4651.3	4600.3	4620.8	4579.9	4579.1
25°	4527.8	4472.5	4497.3	4449.4	4445.1
27.5°	4380.8	4329.7	4350.3	4301.5	4296.4
30°	4279.8	4228.8	4249.4	4197.0	4188.5
32.5°	4165.0	4117.4	4134.6	4082.3	4077.2
35°	3988.4	3941.7	3953.6	3901.3	3897.1
37.5°	3787.5	3745.0	3751.8	3694.3	3690.1
40°	3644.8	3602.3	3605.7	3544.7	3540.4
42.5°	3488.2	3445.7	3442.1	3381.2	3376.9
45°	3227.3	3184.8	3170.7	3114.0	3105.5
47.5°	2929.8	2887.3	2861.1	2814.8	2808.9
50°	2714.0	2671.5	2648.8	2609.4	2596.6
52.5°	2480.9	2438.4	2419.2	2383.2	2370.4
55°	2113.8	2079.8	2066.0	2031.0	2022.5
57.5°	1765.0	1742.0	1738.0	1704.0	1700.6
60°	1552.7	1540.0	1539.7	1509.3	1509.3
62.5°	1371.8	1362.5	1369.2	1349.1	1345.7
65°	1135.2	1126.7	1139.6	1130.9	1130.9
67.5°	948.2	948.2	956.0	952.5	952.5
70°	843.8	843.8	848.1	848.1	848.1
72.5°	749.8	746.4	757.7	757.6	754.2
75°	613.3	613.3	613.3	617.6	617.6
77.5°	477.6	478.4	481.9	481.0	477.6
80°	387.1	391.4	391.4	387.1	387.1
82.5°	296.6	300.9	301.0	300.0	296.6
85°	156.6	165.1	174.0	174.0	174.0
87.5°	46.3	60.9	73.7	74.2	71.3
90°	5.2	10.2	20.6	23.3	25.8
92.5°	46.4	192.6	344.4	125.7	98.0
95°	110.9	408.3	1368.9	562.7	366.1
97.5°	183.6	457.3	2027.9	1561.3	1130.7
100°	237.2	486.7	2271.3	2287.3	1858.8
102.5°	288.7	520.1	2318.7	2826.1	2419.8
105°	371.2	572.9	2291.9	3498.9	3294.7
107.5°	458.9	638.4	2164.0	3823.4	3898.0
110°	520.8	682.1	2065.0	3893.2	4135.2



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	576.5	731.7	1972.2	3838.1	4195.0
115°	665.1	803.8	1845.9	3654.2	4155.8
117.5°	742.5	880.6	1762.9	3395.4	3966.1
120°	794.0	930.2	1729.9	3220.2	3794.9
122.5°	843.5	973.6	1703.1	3056.5	3601.0
125°	912.6	1038.7	1673.2	2831.6	3323.1
127.5°	971.4	1097.4	1655.6	2641.3	3065.3
130°	1010.6	1136.6	1647.4	2524.9	2910.6
132.5°	1047.7	1167.7	1639.1	2427.2	2776.6
135°	1098.2	1216.7	1626.7	2293.4	2585.8
137.5°	1155.0	1262.9	1620.6	2181.0	2430.6
140°	1185.9	1291.8	1616.4	2106.1	2325.4
142.5°	1221.0	1318.8	1612.3	2039.5	2232.6
145°	1273.6	1361.8	1606.1	1952.4	2101.1
147.5°	1324.1	1401.2	1600.5	1878.9	1994.4
150°	1361.2	1424.2	1598.4	1835.1	1928.4
152.5°	1390.1	1449.1	1596.3	1797.6	1874.8
155°	1436.0	1483.9	1593.2	1751.8	1807.2
157.5°	1478.3	1515.1	1593.7	1718.4	1756.2
160°	1503.0	1535.8	1595.8	1699.6	1727.3
162.5°	1523.6	1552.4	1597.9	1682.9	1704.6
165°	1554.6	1574.7	1601.0	1663.1	1675.7
167.5°	1578.3	1590.4	1603.5	1651.1	1655.1
170°	1590.7	1600.7	1603.5	1644.8	1644.8
172.5°	1601.0	1607.0	1603.5	1636.5	1634.5
175°	1611.3	1613.8	1603.5	1626.6	1621.6
177.5°	1615.4	1613.4	1603.0	1617.4	1613.3
180°	1611.3	1611.3	1611.3	1611.3	1611.3

(END OF REPORT)