

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: P564010

Luminaire Tested: **SQ4-PR1-050U-100D-935-1D-UNV-STD-W-4**

Issue Date: 7/30/2021

**Test Information**

Test Method: LM-79-2019  
Report Number: P564010  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-21, 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-PR1-050U-100D-935-1D-UNV-STD-W-4  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE RIPPLE CONTINUOUS LENS.  
DOWNLIGHT 1000 LUMENS PER FOOT  
UPLIGHT 500 LUMENS PER FOOT  
Light Source: 3500K CCT, 90 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

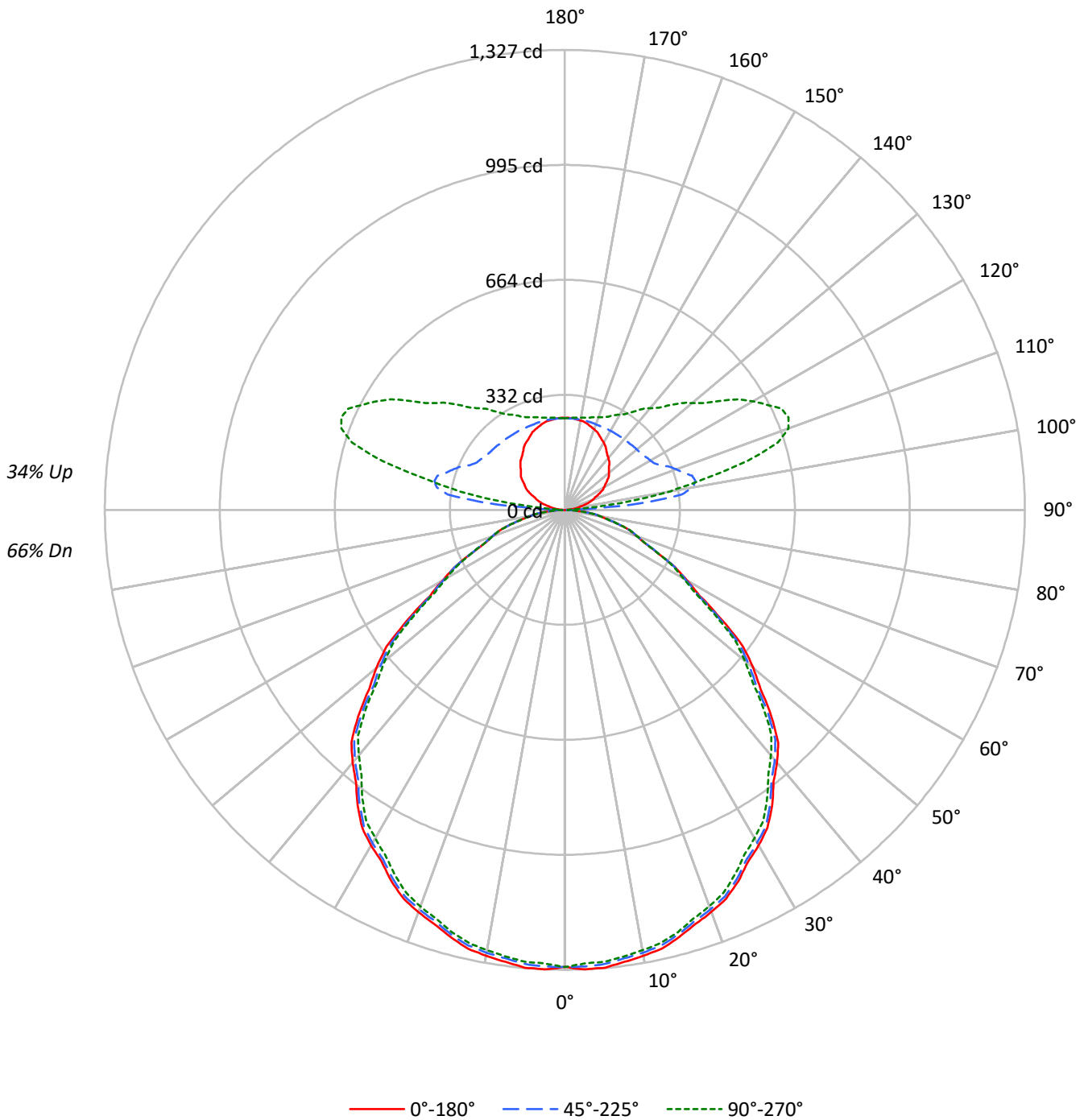
Lumens per Lamp: N/A  
Luminaire Lumens: 5029.1 lumens  
Efficiency: N/A  
Efficacy: 111.5 lumens/watt  
Spacing Criteria (0/90/45): 1.26 / 1.24 / 1.35  
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')  
CIE Type: Semi-Direct

Input Watts (W): 45.1  
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	50	30	10	0	
RCR																						
0	111	111	111	111	104	104	104	104	92	92	92	81	81	81	70	70	70	66				
1	102	97	94	90	95	92	88	85	81	79	76	72	70	68	63	62	60	56				
2	93	85	79	74	87	81	75	71	72	68	64	63	60	57	56	53	51	48				
3	85	76	68	62	80	71	65	60	64	58	54	56	52	49	50	47	44	41				
4	78	67	59	53	73	64	56	51	57	51	47	51	46	42	45	41	38	35				
5	72	60	52	46	67	57	50	44	51	45	40	46	41	37	40	37	34	31				
6	66	54	46	40	62	51	44	38	46	40	35	41	36	33	37	33	30	27				
7	61	49	41	35	58	47	39	34	42	36	31	38	33	29	34	30	26	24				
8	57	45	37	31	54	42	35	30	38	32	28	34	30	26	31	27	24	22				
9	53	41	33	28	50	39	32	27	35	29	25	32	27	23	29	24	21	19				
10	50	37	30	25	47	36	29	24	33	27	23	29	25	21	26	22	20	18				

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

	0°	45°	90°
0°	12169	12169	12169
5°	12279	12184	12121
10°	12240	12155	12091
15°	12186	12111	12046
20°	12125	12047	11958
25°	12040	11958	11820
30°	11910	11825	11656
35°	11734	11631	11465
40°	11466	11343	11138
45°	10999	10806	10584
50°	10175	9931	9736
55°	8881	8680	8498
60°	7484	7422	7274
65°	6473	6499	6449
70°	5945	5975	5975
75°	5711	5711	5750
80°	5372	5430	5372
85°	4330	4806	4806



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	124.7	2.5
10°-20°	356.9	7.1
20°-30°	538.3	10.7
30°-40°	641.4	12.8
40°-50°	632.3	12.6
50°-60°	483.2	9.6
60°-70°	299.1	5.9
70°-80°	169.9	3.4
80°-90°	52.7	1.0
90°-100°	127.2	2.5
100°-110°	345.7	6.9
110°-120°	355.4	7.1
120°-130°	284.2	5.7
130°-140°	223.3	4.4
140°-150°	171.2	3.4
150°-160°	123.1	2.4
160°-170°	75.3	1.5
170°-180°	25.4	0.5
0°-30°	1019.9	20.3
0°-40°	1661.2	33.0
0°-60°	2776.8	55.2
0°-90°	3298.4	65.6
90°-120°	828.3	16.5
90°-150°	1507.0	30.0
90°-180°	1731.0	34.4
0°-180°	5029.1	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1319	1319	1319	1319	1319	
5°	1326	1311	1316	1311	1309	126
15°	1276	1262	1268	1263	1261	360
25°	1183	1168	1175	1162	1161	544
35°	1042	1030	1033	1019	1018	650
45°	843	832	828	813	811	646
55°	552	543	540	530	528	495
65°	296	294	298	295	295	300
75°	160	160	160	161	161	169
85°	41	43	45	45	45	48
90°	1	3	6	8	8	3
95°	19	70	222	96	65	20
105°	61	96	380	579	545	65
115°	109	132	304	605	690	108
125°	150	171	275	464	547	134
135°	181	201	268	378	426	140
145°	209	224	264	321	345	131
155°	236	244	262	288	297	109
165°	256	259	263	274	275	72
175°	265	266	264	268	267	25
180°	265	265	265	265	265	

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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1319.0	1319.0	1319.0	1319.0	1319.0
2.5°	1327.2	1315.6	1319.0	1316.1	1309.9
5°	1325.8	1311.4	1315.6	1311.0	1308.8
7.5°	1315.6	1301.4	1305.6	1301.0	1299.7
10°	1306.5	1293.2	1297.4	1292.8	1290.6
12.5°	1296.5	1282.3	1287.4	1281.9	1279.7
15°	1275.8	1262.5	1267.9	1263.3	1261.1
17.5°	1253.1	1238.9	1244.3	1239.0	1236.1
20°	1234.9	1221.6	1227.0	1219.0	1217.9
22.5°	1214.9	1201.6	1207.0	1196.3	1196.1
25°	1182.7	1168.2	1174.7	1162.2	1161.1
27.5°	1144.3	1130.9	1136.3	1123.6	1122.2
30°	1117.9	1104.6	1110.0	1096.3	1094.1
32.5°	1087.9	1075.5	1080.0	1066.3	1065.0
35°	1041.8	1029.6	1032.7	1019.1	1017.9
37.5°	989.3	978.2	980.0	965.0	963.9
40°	952.0	940.9	941.8	925.9	924.8
42.5°	911.2	900.0	899.1	883.2	882.1
45°	843.0	831.9	828.2	813.4	811.2
47.5°	765.3	754.2	747.3	735.2	733.7
50°	708.9	697.8	691.9	681.6	678.3
52.5°	648.0	636.9	631.9	622.5	619.2
55°	552.1	543.3	539.6	530.5	528.3
57.5°	461.0	455.0	454.0	445.1	444.2
60°	405.6	402.3	402.2	394.2	394.2
62.5°	358.3	355.9	357.6	352.4	351.5
65°	296.5	294.3	297.7	295.4	295.4
67.5°	247.7	247.7	249.7	248.8	248.8
70°	220.4	220.4	221.5	221.5	221.5
72.5°	195.9	195.0	197.9	197.9	197.0
75°	160.2	160.2	160.2	161.3	161.3
77.5°	124.7	125.0	125.9	125.6	124.7
80°	101.1	102.2	102.2	101.1	101.1
82.5°	77.5	78.6	78.6	78.4	77.5
85°	40.9	43.1	45.4	45.4	45.4
87.5°	12.0	16.0	19.4	19.7	18.8
90°	0.9	3.4	6.0	7.7	7.7
92.5°	7.7	34.8	60.5	26.0	22.0
95°	18.8	69.6	221.6	96.4	64.8
97.5°	31.0	76.9	339.7	264.3	185.6
100°	39.2	81.7	375.9	381.0	307.7
102.5°	47.4	86.6	385.4	471.2	406.6
105°	61.4	95.5	380.1	578.8	544.6
107.5°	75.9	106.0	358.2	634.4	643.9
110°	86.1	113.6	341.8	645.3	686.1

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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	95.0	121.1	325.4	636.2	697.7
115°	109.1	132.4	304.3	605.4	689.5
117.5°	122.4	144.7	290.8	561.6	656.5
120°	131.3	152.9	284.7	532.3	626.5
122.5°	138.8	160.4	280.6	502.9	593.7
125°	150.0	170.8	275.3	463.9	547.2
127.5°	160.1	180.7	272.4	434.3	505.8
130°	166.2	186.2	271.0	415.7	479.9
132.5°	172.3	192.3	269.7	399.8	456.7
135°	180.7	200.7	267.6	377.8	426.2
137.5°	189.7	207.9	266.6	358.4	399.1
140°	195.2	212.7	265.9	346.0	382.7
142.5°	200.6	216.8	265.2	336.3	367.0
145°	208.8	223.8	264.2	321.0	345.2
147.5°	218.0	230.9	263.4	309.0	328.0
150°	224.2	235.0	263.4	302.1	317.1
152.5°	228.9	238.4	262.7	295.9	308.2
155°	236.1	244.4	262.5	288.3	296.6
157.5°	243.1	249.6	262.5	283.1	289.5
160°	247.2	253.0	262.5	279.7	284.7
162.5°	251.3	255.8	263.2	276.9	280.6
165°	255.7	259.0	263.4	274.5	275.3
167.5°	260.3	262.0	264.2	271.6	272.2
170°	261.7	263.3	264.2	270.2	270.2
172.5°	263.0	264.0	264.2	268.8	268.8
175°	265.1	265.9	264.2	267.6	266.8
177.5°	265.8	265.8	263.7	266.4	265.1
180°	265.1	265.1	265.1	265.1	265.1

(END OF REPORT)