

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: P519531

Luminaire Tested: **SQ4-WB-125U-125D-840-1D-UNV-STD-W-12**

Issue Date: 4/29/2021

Test Information

Test Method: LM-79-2019
Report Number: P519531
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-24, G2-2009-966-13)
Test Lab: INNOVATION CENTER
Issue Date: 4/29/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4-WB-125U-125D-840-1D-UNV-STD-W-12
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH WHITE BAFFLE
DOWNLIGHT 1250 LUMENS PER FOOT
UPLIGHT 1250 LUMENS PER FOOT
Light Source: 4000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

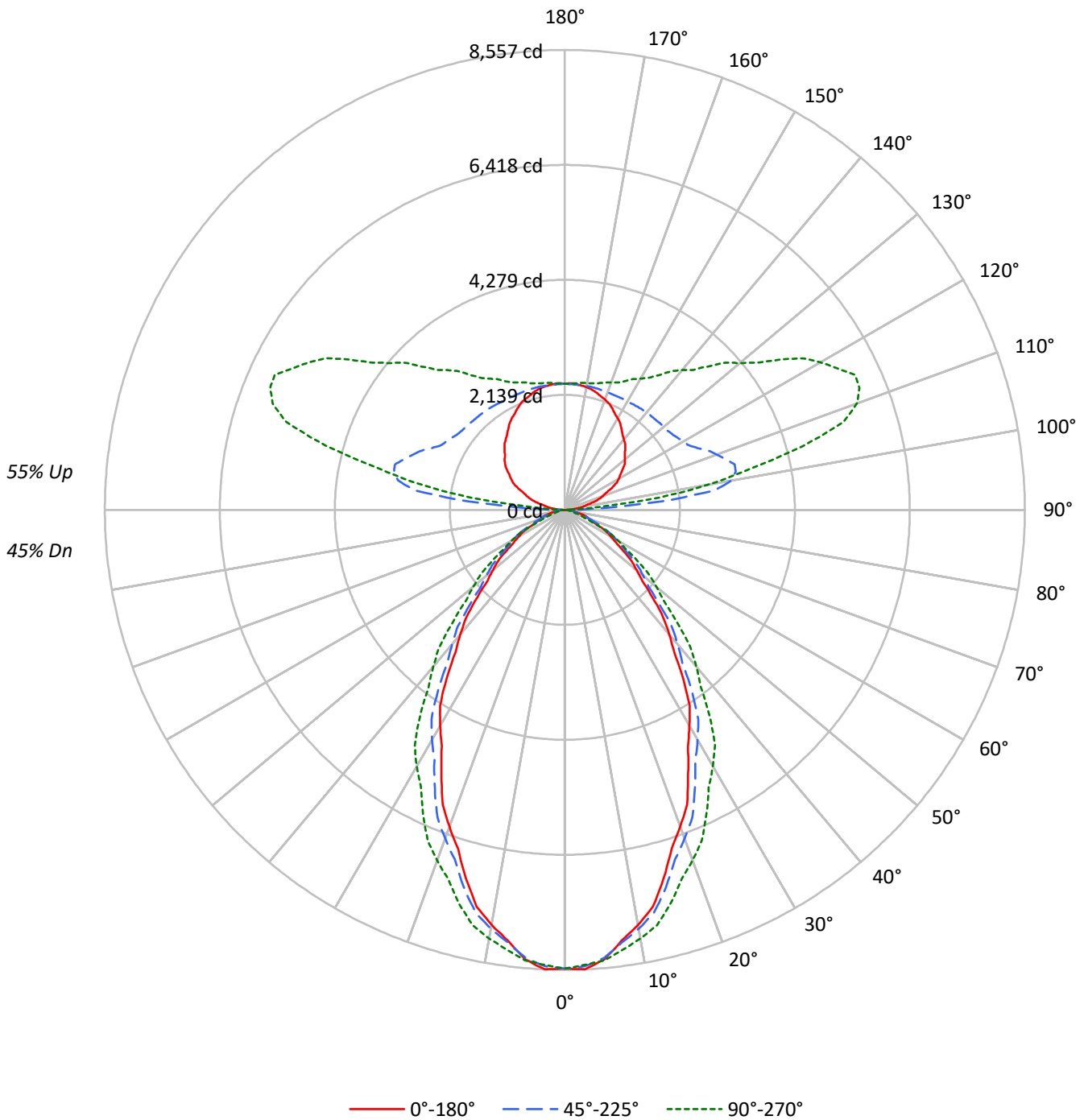
Lumens per Lamp: N/A
Luminaire Lumens: 27593.2 lumens
Efficiency: N/A
Efficacy: 118.0 lumens/watt
Spacing Criteria (0/90/45): 0.89 / 1 / 1.02
Luminous Opening: Rectangular (W 0.29' x L: 12' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 233.8
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	106	106	106	106	97	97	97	97	81	81	81	65	65	65	52	52	52	45
1	98	94	90	87	90	86	83	81	72	70	68	59	58	57	47	46	46	40
2	90	83	78	73	82	77	72	68	64	61	58	53	51	49	43	41	40	35
3	83	74	67	62	76	68	63	58	58	54	50	48	45	43	39	37	35	31
4	76	66	59	54	70	61	55	50	52	47	44	44	40	38	36	33	31	28
5	70	60	52	47	65	55	49	44	47	42	39	40	36	33	33	30	28	25
6	65	54	46	41	60	50	44	39	43	38	34	36	33	30	30	27	25	23
7	61	49	42	36	56	46	39	34	39	34	31	33	30	27	28	25	23	20
8	56	45	38	33	52	42	35	31	36	31	28	31	27	24	26	23	21	19
9	53	41	34	29	49	39	32	28	33	28	25	29	25	22	24	21	19	17
10	49	38	31	27	46	36	29	25	31	26	23	27	23	20	22	20	18	16

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	26252	26252	26252
5°	25925	25832	25982
10°	24493	24715	25288
15°	22611	23135	24173
20°	20533	21305	22715
25°	18417	19421	21162
30°	16467	17544	19553
35°	14400	15440	17648
40°	12120	13083	15278
45°	10002	10866	12756
50°	8351	9104	10627
55°	7089	7812	8776
60°	6059	6773	7004
65°	4825	5696	4525
70°	4277	4446	2761
75°	3962	3605	1691
80°	3648	3317	1459
85°	3303	3038	1189



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	783.0	2.8
10°-20°	2036.5	7.4
20°-30°	2637.9	9.6
30°-40°	2583.2	9.4
40°-50°	1977.3	7.2
50°-60°	1317.6	4.8
60°-70°	719.0	2.6
70°-80°	299.6	1.1
80°-90°	90.3	0.3
90°-100°	1097.8	4.0
100°-110°	2957.1	10.7
110°-120°	3103.4	11.2
120°-130°	2518.3	9.1
130°-140°	1975.0	7.2
140°-150°	1516.3	5.5
150°-160°	1090.2	4.0
160°-170°	666.1	2.4
170°-180°	224.6	0.8
0°-30°	5457.4	19.8
0°-40°	8040.6	29.1
0°-60°	11335.4	41.1
0°-90°	12444.3	45.1
90°-120°	7158.3	25.9
90°-150°	13168.0	47.7
90°-180°	15149.0	54.9
0°-180°	27593.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	8536	8536	8536	8536	8536	
5°	8398	8313	8368	8387	8416	781
15°	7102	7076	7266	7464	7592	1983
25°	5427	5442	5723	5973	6236	2496
35°	3836	3854	4113	4389	4701	2384
45°	2300	2344	2498	2687	2933	1793
55°	1322	1377	1457	1512	1637	1199
65°	663	718	783	684	622	689
75°	333	333	303	208	142	356
85°	94	94	86	56	34	102
90°	6	18	36	39	39	16
95°	167	597	1800	920	637	175
105°	547	851	3270	4893	4592	575
115°	966	1182	2723	5262	5952	950
125°	1318	1514	2445	4133	4864	1177
135°	1587	1772	2376	3334	3776	1225
145°	1836	1979	2347	2851	3061	1151
155°	2084	2160	2326	2558	2640	959
165°	2260	2286	2335	2428	2439	637
175°	2350	2347	2338	2370	2365	223
180°	2347	2347	2347	2347	2347	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	8536.2	8536.2	8536.2	8536.2	8536.2
2.5°	8557.2	8481.0	8500.2	8499.7	8476.3
5°	8397.6	8313.4	8367.6	8387.0	8416.3
7.5°	8086.0	8022.2	8121.2	8194.4	8253.8
10°	7843.2	7788.3	7914.4	8021.0	8097.9
12.5°	7561.6	7515.4	7671.7	7814.8	7915.2
15°	7101.6	7076.0	7266.4	7464.1	7592.3
17.5°	6609.5	6597.0	6815.5	7046.2	7210.2
20°	6273.8	6270.2	6509.8	6750.1	6940.6
22.5°	5935.2	5943.3	6195.2	6445.1	6661.9
25°	5427.3	5442.0	5723.2	5972.7	6236.4
27.5°	4957.7	4964.2	5255.1	5518.4	5799.7
30°	4637.0	4655.3	4940.4	5213.0	5506.0
32.5°	4316.4	4337.6	4616.8	4898.5	5197.4
35°	3835.5	3853.8	4112.6	4389.4	4700.7
37.5°	3339.6	3364.5	3594.3	3855.9	4162.1
40°	3018.9	3055.6	3258.7	3505.2	3805.5
42.5°	2710.3	2755.7	2944.0	3177.9	3448.9
45°	2299.8	2343.7	2498.3	2687.4	2932.8
47.5°	1946.2	1996.7	2115.5	2278.3	2487.8
50°	1745.4	1793.1	1902.8	2023.4	2221.1
52.5°	1568.6	1616.3	1714.0	1807.0	1975.4
55°	1322.2	1377.1	1457.0	1512.3	1636.8
57.5°	1119.9	1172.7	1236.0	1261.0	1336.4
60°	985.1	1043.7	1101.2	1098.4	1138.7
62.5°	862.2	912.0	969.4	929.7	931.9
65°	663.0	717.9	782.8	684.0	621.8
67.5°	535.6	547.3	614.3	477.0	403.0
70°	475.7	475.7	494.4	369.4	307.1
72.5°	418.8	418.8	401.5	300.4	235.2
75°	333.4	333.4	303.4	208.3	142.3
77.5°	256.9	254.0	232.2	155.4	103.4
80°	206.0	206.0	187.3	122.7	82.4
82.5°	161.1	161.1	145.3	95.9	61.4
85°	93.6	93.6	86.1	55.7	33.7
87.5°	34.2	36.5	37.1	25.7	22.8
90°	6.0	17.7	35.9	38.9	38.9
92.5°	72.9	257.7	509.4	245.2	170.4
95°	167.4	597.1	1799.6	920.3	636.7
97.5°	267.2	683.5	2822.5	2358.0	1778.1
100°	343.8	717.9	3147.8	3293.5	2732.3
102.5°	417.9	766.3	3255.4	3994.1	3533.4
105°	547.0	851.0	3270.3	4892.7	4591.6
107.5°	669.0	940.3	3131.0	5354.5	5432.2
110°	750.3	1007.5	3004.3	5497.9	5781.4

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	836.4	1074.9	2882.3	5466.1	5932.0
115°	965.6	1181.9	2723.3	5262.0	5951.8
117.5°	1083.3	1286.2	2600.1	4936.1	5704.3
120°	1159.9	1355.7	2538.0	4702.2	5491.4
122.5°	1226.8	1420.3	2492.5	4463.0	5249.9
125°	1318.3	1514.1	2445.3	4132.9	4863.7
127.5°	1406.2	1599.1	2415.4	3841.8	4494.2
130°	1458.8	1651.7	2403.4	3675.0	4247.9
132.5°	1511.4	1702.0	2391.5	3528.0	4054.1
135°	1587.3	1771.5	2376.5	3334.2	3775.5
137.5°	1659.7	1836.2	2368.8	3169.8	3532.2
140°	1709.9	1879.4	2361.6	3068.5	3395.9
142.5°	1762.5	1920.4	2356.8	2974.1	3250.0
145°	1835.5	1978.7	2346.6	2850.6	3061.1
147.5°	1914.4	2038.9	2336.5	2746.8	2912.2
150°	1967.0	2075.1	2331.7	2681.6	2818.9
152.5°	2014.8	2108.9	2329.3	2628.4	2740.0
155°	2083.6	2159.6	2325.7	2557.7	2639.6
157.5°	2144.0	2203.0	2326.3	2508.1	2563.1
160°	2182.2	2231.9	2328.7	2479.1	2520.0
162.5°	2215.7	2256.0	2331.1	2454.9	2484.1
165°	2259.9	2286.2	2334.7	2427.6	2439.3
167.5°	2295.8	2311.0	2337.7	2406.5	2411.2
170°	2319.7	2325.6	2337.7	2394.5	2394.5
172.5°	2334.1	2335.2	2340.1	2382.5	2382.5
175°	2349.6	2346.7	2337.7	2370.4	2364.6
177.5°	2356.2	2351.5	2339.5	2358.5	2353.8
180°	2346.6	2346.6	2346.6	2346.6	2346.6

(END OF REPORT)