

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

Brand: CORELITE

Report Number: P936605

Luminaire Tested: SQ4-FB-025U-125D-B50-1D-UNV-W2A-W-12

Issue Date: 12/17/2024

Test Information

Test Method: LM-79-2019
Report Number: P936605
REPORT IS A COMBINATION OF REPORTS P933432 AND P933786
Test Lab: INNOVATION CENTER
Issue Date: 12/17/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-FB-025U-125D-B50-1D-UNV-W2A-W-12
Description: CORELITE SQ4 SUSPENDED INDIRECT LED LUMINAIRE WITH Batwing Frosted Continuous Roll L
Light Source: -
Ballast/Driver: -

Summary

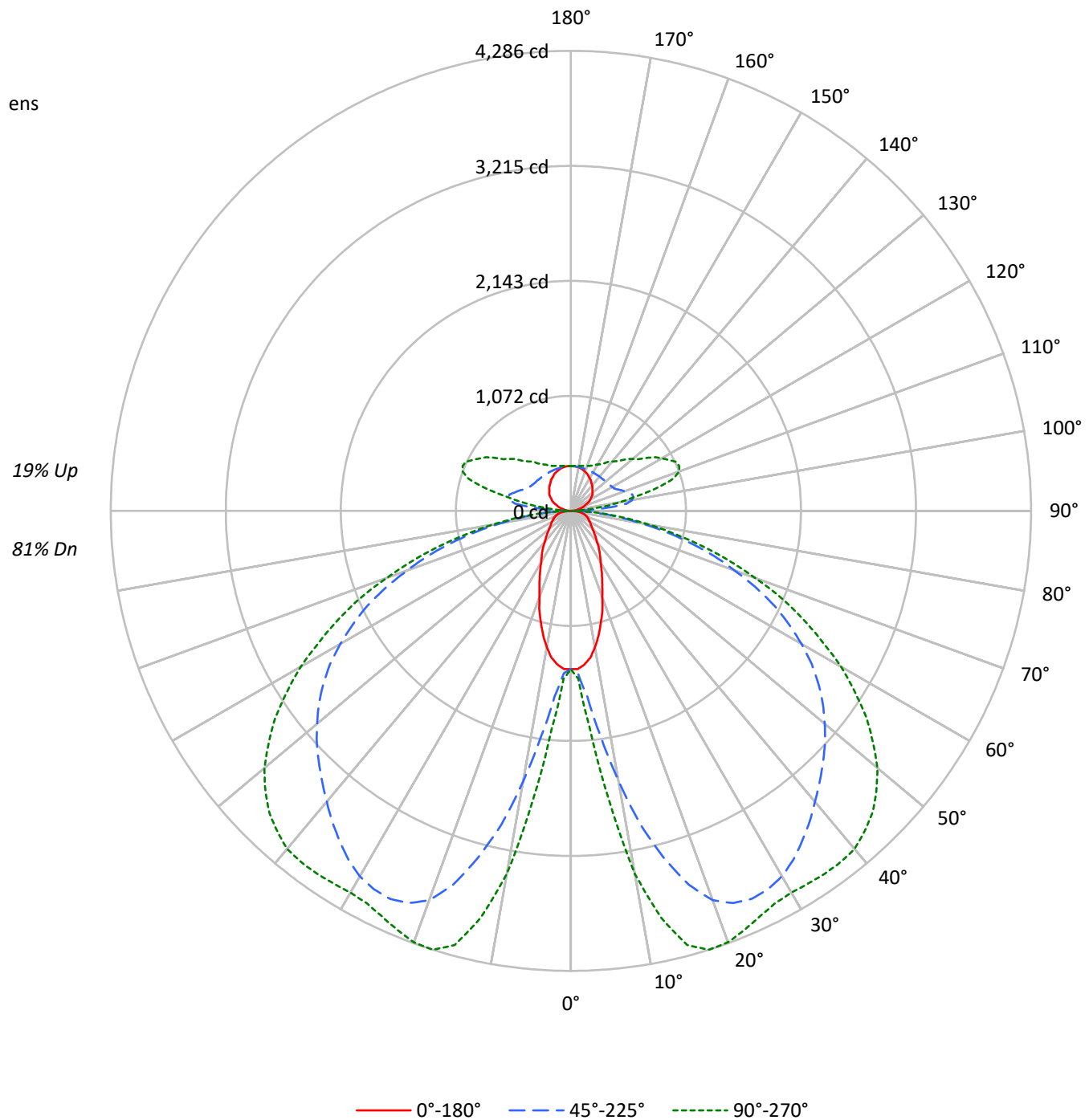
Lumens per Lamp: N/A
Luminaire Lumens: 14120.2 lumens
Efficiency: N/A
Efficacy: 94.9 lumens/watt
Spacing Criteria (0/90/45): 0.71 / 2.69 / 2.33
Luminous Opening: Rectangular w/ Sides (W: 0.29' x L: 12' x H: 0.1')
CIE Type: Semi-Direct

Input Watts (W): 148.8
Input Voltage (V): NR
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
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10
RCR																	
0	114	114	114	114	110	110	110	110	100	100	100	92	92	92	84	84	84
1	104	99	94	90	99	95	91	87	87	84	81	80	77	75	73	71	70
2	94	85	78	72	89	82	75	70	75	70	66	69	65	61	63	60	57
3	85	74	66	59	81	71	64	58	65	59	54	60	55	51	55	51	48
4	77	65	56	49	74	63	54	48	58	51	45	53	47	43	49	44	40
5	71	58	49	42	67	55	47	41	51	44	39	47	41	36	43	38	34
6	65	51	42	36	62	49	41	35	46	39	33	42	36	31	39	34	30
7	60	46	37	31	57	45	36	30	41	34	29	38	32	27	35	30	26
8	55	42	33	27	53	40	32	27	37	30	25	35	29	24	32	27	23
9	52	38	30	24	49	37	29	24	34	27	23	32	26	22	29	24	20
10	48	35	27	22	46	34	26	21	31	25	20	29	23	19	27	22	18

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4561	4561	4561
5°	4458	5273	6131
10°	4045	7688	10164
15°	3439	10047	12273
20°	2801	11646	12508
25°	2337	12190	12254
30°	1972	12270	12231
35°	1745	12069	12547
40°	1521	11808	12874
45°	1378	11618	12924
50°	1265	11447	12710
55°	1213	11196	12147
60°	1243	10709	11257
65°	1296	9966	10035
70°	1383	8698	8477
75°	1538	7098	6616
80°	1694	4929	4458
85°	1536	2620	2282

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 45°

Luminance: 12924 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	190.8	1.4
10°-20°	845.4	6.0
20°-30°	1478.8	10.5
30°-40°	1903.6	13.5
40°-50°	2126.3	15.1
50°-60°	2036.5	14.4
60°-70°	1613.9	11.4
70°-80°	949.0	6.7
80°-90°	265.2	1.9
90°-100°	203.8	1.4
100°-110°	535.9	3.8
110°-120°	555.7	3.9
120°-130°	445.7	3.2
130°-140°	349.7	2.5
140°-150°	268.4	1.9
150°-160°	193.3	1.4
160°-170°	118.3	0.8
170°-180°	40.0	0.3
0°-30°	2514.9	17.8
0°-40°	4418.6	31.3
0°-60°	8581.3	60.8
0°-90°	11409.5	80.8
90°-120°	1295.4	9.2
90°-150°	2359.2	16.7
90°-180°	2711.0	19.2
0°-180°	14120.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1475	1475	1475	1475	1475	
5°	1437	1541	1736	1963	2034	133
15°	1076	1987	3348	4059	4187	300
25°	688	2252	3988	4163	4168	317
35°	465	2153	3755	3969	4125	290
45°	318	1716	3319	3803	3974	246
55°	228	1090	2817	3272	3362	207
65°	180	578	2091	2352	2385	179
75°	133	356	1148	1261	1266	139
85°	47	109	284	313	318	50
90°	3	8	21	11	11	6
95°	27	106	351	181	123	30
105°	97	146	592	899	839	102
115°	172	208	475	947	1080	169
125°	238	268	432	729	860	212
135°	284	313	418	589	668	220
145°	330	351	413	502	542	207
155°	373	383	413	453	466	171
165°	402	408	413	429	434	114
175°	418	418	416	421	421	40
180°	418	418	418	418	418	

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CANDELA DISTRIBUTION (FULL):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
0°	1474.7	1474.7	1474.7	1474.7	1474.7	1474.7	1474.7	1474.7	1474.7	1474.7	1474.7
2.5°	1474.7	1474.7	1484.1	1488.9	1498.3	1503.1	1512.6	1522.0	1550.5	1555.3	1564.7
5°	1436.7	1455.6	1517.3	1541.0	1607.4	1697.5	1735.5	1797.1	1925.1	1963.1	1986.7
7.5°	1379.8	1422.5	1574.3	1612.2	1778.1	2015.2	2114.8	2247.6	2451.5	2551.0	2631.6
10°	1289.8	1379.8	1650.1	1740.1	2010.4	2370.8	2555.7	2740.6	3048.9	3186.3	3238.6
12.5°	1190.2	1337.1	1730.7	1854.0	2242.8	2769.1	2992.0	3195.9	3546.8	3731.7	3760.1
15°	1076.3	1275.5	1806.5	1986.7	2489.4	3101.1	3347.5	3598.9	3926.1	4058.9	4092.0
17.5°	976.8	1228.1	1877.7	2067.3	2679.0	3399.8	3651.1	3859.7	4125.2	4215.3	4239.1
20°	853.5	1152.2	1925.1	2171.6	2878.2	3617.8	3859.7	4020.9	4201.1	4258.0	4267.4
22.5°	763.4	1071.6	1953.6	2209.6	3010.9	3750.7	3954.6	4082.5	4205.8	4224.8	4229.5
25°	687.5	981.5	1948.8	2252.2	3124.7	3831.3	3987.7	4082.5	4153.7	4163.1	4163.1
27.5°	616.4	882.0	1929.8	2261.8	3210.1	3850.2	3973.5	4039.8	4073.1	4092.0	4092.0
30°	554.8	787.1	1882.4	2242.8	3248.0	3831.3	3930.8	3964.0	3997.2	4025.6	4039.8
32.5°	507.3	697.0	1811.3	2204.9	3252.7	3783.8	3855.0	3874.0	3921.3	3987.7	4011.4
35°	464.7	606.9	1730.7	2152.7	3224.4	3708.0	3755.3	3774.4	3869.2	3968.8	4001.9
37.5°	422.0	540.5	1626.4	2062.6	3181.7	3617.8	3651.1	3684.3	3831.3	3949.8	3987.7
40°	379.3	483.6	1503.1	1963.1	3115.3	3508.9	3537.2	3589.5	3783.8	3921.3	3959.2
42.5°	346.1	436.3	1370.4	1858.8	3029.9	3385.6	3428.2	3504.1	3726.9	3874.0	3916.6
45°	317.7	388.8	1228.1	1716.5	2920.8	3257.5	3319.2	3423.5	3660.5	3802.8	3840.7
47.5°	289.3	355.7	1081.1	1569.5	2802.3	3129.5	3210.1	3328.6	3570.5	3708.0	3741.1
50°	265.5	322.4	934.1	1413.0	2674.3	2992.0	3086.8	3210.1	3456.6	3584.7	3627.4
52.5°	246.6	294.0	796.6	1256.5	2527.3	2849.7	2958.8	3086.8	3319.2	3442.4	3470.8
55°	227.6	270.3	678.1	1090.5	2375.5	2698.0	2816.6	2939.9	3167.4	3271.7	3290.7
57.5°	218.1	251.3	578.5	934.1	2214.3	2527.3	2660.0	2773.9	2987.2	3067.8	3086.8
60°	203.9	237.0	502.6	801.4	2038.9	2366.1	2479.9	2593.7	2773.9	2840.2	2854.5
62.5°	189.7	227.6	445.7	673.3	1858.8	2176.4	2290.2	2394.5	2546.3	2593.7	2612.7
65°	180.2	218.1	403.0	578.5	1673.8	1977.3	2091.0	2181.2	2304.5	2351.8	2361.3
67.5°	170.7	208.7	369.9	497.9	1488.9	1778.1	1863.4	1948.8	2043.7	2091.0	2095.8
70°	156.4	199.1	341.4	440.9	1299.2	1550.5	1621.6	1711.7	1787.6	1811.3	1825.5
72.5°	147.0	184.9	322.4	398.3	1104.8	1332.4	1398.8	1451.0	1517.3	1541.0	1541.0
75°	132.7	166.0	303.5	355.7	905.6	1090.5	1147.5	1199.6	1251.7	1261.3	1247.1
77.5°	118.5	147.0	260.8	298.7	706.5	863.0	910.4	938.9	981.5	991.0	995.7
80°	99.6	128.1	203.9	232.4	512.1	635.4	668.6	692.3	730.2	730.2	739.7
82.5°	75.8	99.6	147.0	166.0	346.1	436.3	464.7	478.9	502.6	502.6	502.6
85°	47.4	61.6	94.8	109.1	208.7	265.5	284.5	289.3	308.2	313.0	313.0
87.5°	23.7	33.2	61.6	66.4	109.1	137.5	137.5	147.0	147.0	142.2	137.5
90°	2.8	5.0	7.3	7.8	12.3	18.3	21.3	19.0	14.2	10.6	10.6
92.5°	11.2	30.3	49.4	54.2	76.1	105.4	120.1	105.3	75.6	53.3	51.2
95°	26.9	61.8	96.8	105.5	187.4	296.5	351.1	313.3	237.7	181.0	174.6
97.5°	46.6	77.4	108.3	115.9	252.4	434.4	525.4	501.5	453.7	417.9	405.6
100°	61.7	89.7	117.6	124.6	276.1	478.0	579.0	580.8	584.2	586.8	572.3
102.5°	74.6	100.7	126.7	133.3	286.9	491.8	594.1	624.6	685.4	731.0	718.5
105°	96.6	118.6	140.7	146.2	295.0	493.2	592.4	660.6	797.1	899.4	892.7
107.5°	119.0	139.5	160.2	165.3	296.5	471.3	558.7	653.9	844.2	987.1	988.6
110°	134.1	152.7	171.3	176.0	294.2	451.9	530.7	637.1	849.8	1009.5	1016.5

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CANDELA DISTRIBUTION (continued):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
112.5°	149.1	166.7	184.5	188.9	294.3	434.9	505.2	614.1	831.8	995.2	1005.9
115°	171.5	187.8	204.2	208.3	297.0	415.3	474.6	579.5	789.2	946.6	961.5
117.5°	193.6	208.5	223.3	227.1	302.5	403.2	453.6	548.3	737.6	879.5	896.1
120°	206.5	220.5	234.5	238.0	307.0	399.0	445.1	531.5	704.6	834.3	850.4
122.5°	219.2	233.3	247.3	250.9	313.5	396.9	438.6	516.5	672.3	789.1	804.9
125°	238.5	251.4	264.3	267.5	322.2	395.2	431.6	497.7	630.1	729.4	743.9
127.5°	254.2	267.2	280.2	283.5	330.9	394.1	425.7	482.5	596.2	681.4	693.7
130°	262.6	276.7	290.7	294.1	337.3	394.7	423.5	474.1	575.3	651.1	662.5
132.5°	271.4	285.3	299.3	302.8	342.4	395.2	421.5	466.8	557.4	625.3	635.5
135°	284.3	297.0	309.7	312.9	348.0	394.8	418.2	456.1	531.9	588.8	597.6
137.5°	297.5	310.1	322.6	325.8	356.4	397.2	417.6	449.6	513.7	561.8	569.0
140°	308.4	320.0	331.7	334.6	361.6	397.6	415.6	443.3	498.7	540.2	547.0
142.5°	316.8	327.6	338.3	341.0	365.8	399.0	415.6	439.9	488.6	525.1	530.9
145°	329.8	339.1	348.5	350.8	371.5	399.0	412.8	432.7	472.5	502.3	506.7
147.5°	342.7	351.7	360.9	363.1	379.7	401.8	412.8	428.5	459.8	483.3	486.9
150°	351.1	359.3	367.5	369.6	384.0	403.2	412.8	426.1	452.5	472.3	475.2
152.5°	359.8	366.0	372.2	373.8	386.8	404.1	412.8	424.1	446.7	463.6	465.9
155°	372.7	377.2	381.9	383.0	392.9	406.2	412.8	421.8	439.8	453.3	454.8
157.5°	382.2	386.7	391.3	392.4	399.2	408.3	412.8	419.8	433.7	444.2	445.2
160°	388.7	392.2	395.7	396.6	402.0	409.2	412.8	418.8	430.8	439.7	440.3
162.5°	395.2	397.8	400.4	401.1	405.0	410.2	412.8	417.9	428.0	435.5	436.1
165°	402.2	404.5	406.9	407.5	409.3	411.6	412.8	416.5	423.7	429.1	429.6
167.5°	408.6	409.7	410.9	411.1	412.6	414.6	415.6	418.0	422.7	426.3	426.6
170°	412.8	413.9	415.1	415.3	415.4	415.5	415.6	418.0	422.7	426.3	426.3
172.5°	415.1	415.3	415.5	415.6	415.6	415.6	415.6	417.5	421.2	424.0	423.8
175°	418.2	418.2	418.2	418.2	417.3	416.2	415.6	416.8	419.2	421.0	421.0
177.5°	418.2	418.2	418.2	418.2	417.5	416.7	416.2	417.1	419.0	420.4	420.1
180°	418.2	418.2	418.2	418.2	418.2	418.2	418.2	418.2	418.2	418.2	418.2

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CANDELA DISTRIBUTION (continued):

	80°	90°
0°	1474.7	1474.7
2.5°	1574.3	1564.7
5°	2024.7	2034.2
7.5°	2726.4	2721.7
10°	3390.2	3432.9
12.5°	3874.0	3883.4
15°	4167.9	4186.8
17.5°	4281.7	4286.4
20°	4286.4	4277.0
22.5°	4234.3	4224.8
25°	4172.6	4167.9
27.5°	4115.8	4120.5
30°	4092.0	4106.2
32.5°	4092.0	4115.8
35°	4101.5	4125.2
37.5°	4096.8	4125.2
40°	4077.8	4111.0
42.5°	4025.6	4049.4
45°	3945.0	3973.5
47.5°	3840.7	3859.7
50°	3708.0	3726.9
52.5°	3542.0	3546.8
55°	3342.9	3361.8
57.5°	3129.5	3134.2
60°	2892.4	2906.6
62.5°	2641.1	2641.1
65°	2375.5	2385.1
67.5°	2100.6	2124.3
70°	1820.8	1825.5
72.5°	1545.8	1545.8
75°	1261.3	1266.0
77.5°	991.0	991.0
80°	735.0	739.7
82.5°	507.3	516.9
85°	317.7	317.7
87.5°	147.0	132.7
90°	10.6	10.6
92.5°	42.8	34.3
95°	148.9	123.2
97.5°	356.8	307.8
100°	514.1	455.8
102.5°	668.7	618.8
105°	865.9	839.1
107.5°	995.2	1001.6
110°	1044.4	1072.3

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CANDELA DISTRIBUTION (continued):

	80°	90°
112.5°	1048.8	1091.7
115°	1021.0	1080.5
117.5°	962.0	1028.0
120°	914.5	978.6
122.5°	868.2	931.5
125°	802.1	860.4
127.5°	742.8	791.9
130°	707.9	753.3
132.5°	676.1	716.8
135°	632.6	667.6
137.5°	597.7	626.4
140°	573.8	600.6
142.5°	554.0	577.0
145°	524.2	541.6
147.5°	501.4	515.8
150°	487.0	498.7
152.5°	474.7	483.5
155°	460.6	466.4
157.5°	449.4	453.6
160°	442.7	445.1
162.5°	438.3	440.6
165°	432.1	434.4
167.5°	427.5	428.5
170°	426.3	426.3
172.5°	422.9	422.1
175°	421.0	421.0
177.5°	419.2	418.2
180°	418.2	418.2

(END OF REPORT)