

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: P938206

Luminaire Tested: SQ4-FB-125U-125D-B50-1D-UNV-W2A-W-4

Issue Date: 12/17/2024

Test Information

Test Method: LM-79-2019
Report Number: P938206
REPORT IS A COMBINATION OF REPORTS P933600 AND P933786
Test Lab: INNOVATION CENTER
Issue Date: 12/17/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-FB-125U-125D-B50-1D-UNV-W2A-W-4
Description: CORELITE SQ4 SUSPENDED INDIRECT LED LUMINAIRE WITH Batwing Frosted Continuous Roll L
Light Source: -
Ballast/Driver: -

Summary

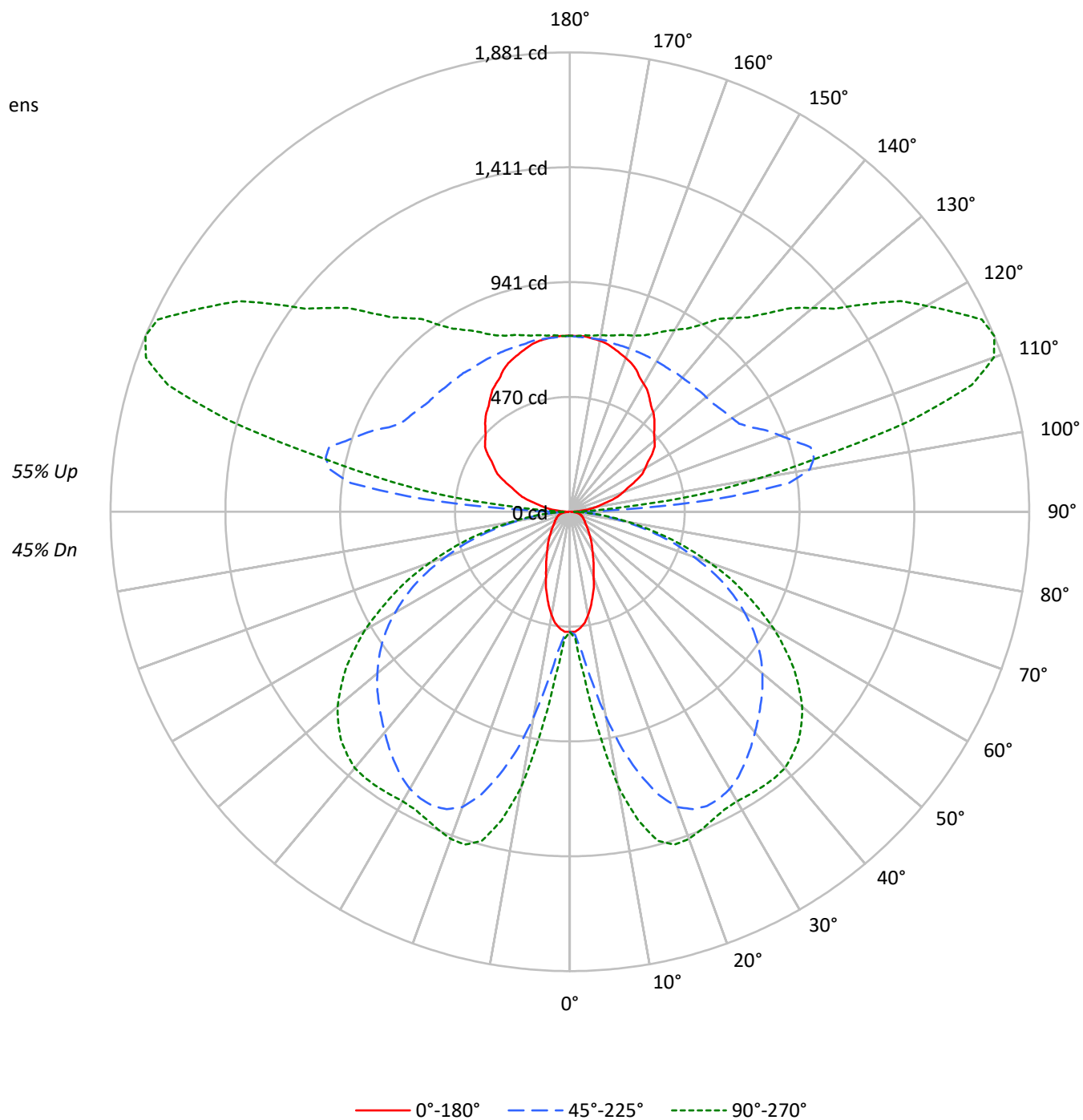
Lumens per Lamp: N/A
Luminaire Lumens: 8476.1 lumens
Efficiency: N/A
Efficacy: 112.7 lumens/watt
Spacing Criteria (0/90/45): 0.71 / 2.69 / 2.33
Luminous Opening: Rectangular w/ Sides (W: 0.29' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 75.2
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	106	106	106	106	97	97	97	97	80	80	80	65	65	65	51	51	51
1	96	92	88	84	88	84	81	77	70	67	65	57	55	53	45	44	42
2	87	79	73	68	79	73	67	63	61	56	53	49	46	44	39	37	35
3	79	69	62	56	72	64	57	52	53	48	44	43	39	36	34	31	29
4	72	61	53	47	66	56	49	43	47	41	37	38	34	31	30	27	25
5	66	54	46	39	60	50	42	37	41	36	31	34	29	26	27	23	21
6	60	48	40	34	55	44	37	31	37	31	27	30	26	23	24	21	18
7	56	43	35	29	51	40	32	27	33	28	23	27	23	20	22	18	16
8	52	39	31	26	47	36	29	24	30	25	21	25	20	17	20	16	14
9	48	35	28	23	44	33	26	21	27	22	18	23	18	15	18	15	12
10	45	32	25	20	41	30	23	19	25	20	16	21	17	14	17	13	11

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4561	4561	4561
5°	4451	5267	6130
10°	4032	7672	10163
15°	3423	10017	12272
20°	2784	11600	12508
25°	2320	12130	12253
30°	1953	12196	12230
35°	1724	11985	12546
40°	1501	11712	12873
45°	1356	11508	12923
50°	1241	11324	12709
55°	1184	11058	12146
60°	1210	10558	11256
65°	1252	9805	10034
70°	1323	8533	8477
75°	1453	6940	6616
80°	1554	4797	4458
85°	1308	2530	2282

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 45°

Luminance: 12923 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	63.6	0.8
10°-20°	281.8	3.3
20°-30°	492.9	5.8
30°-40°	634.5	7.5
40°-50°	708.7	8.4
50°-60°	678.8	8.0
60°-70°	537.9	6.3
70°-80°	316.3	3.7
80°-90°	90.6	1.1
90°-100°	351.2	4.1
100°-110°	923.4	10.9
110°-120°	957.5	11.3
120°-130°	768.0	9.1
130°-140°	602.6	7.1
140°-150°	462.5	5.5
150°-160°	333.1	3.9
160°-170°	203.8	2.4
170°-180°	68.9	0.8
0°-30°	838.2	9.9
0°-40°	1472.7	17.4
0°-60°	2860.2	33.7
0°-90°	3805.1	44.9
90°-120°	2232.1	26.3
90°-150°	4065.2	48.0
90°-180°	4671.0	55.1
0°-180°	8476.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	492	492	492	492	492	
5°	479	514	578	654	678	44
15°	359	662	1116	1353	1396	100
25°	229	751	1329	1388	1389	106
35°	155	718	1252	1323	1375	97
45°	106	572	1106	1268	1324	82
55°	76	364	939	1090	1120	69
65°	60	193	697	784	795	60
75°	44	118	382	420	422	46
85°	16	36	95	104	106	17
90°	5	14	37	18	18	5
95°	46	182	605	312	212	52
105°	166	252	1021	1550	1446	176
115°	295	359	818	1631	1862	292
125°	411	461	744	1257	1483	365
135°	490	539	721	1015	1150	379
145°	568	604	711	866	933	356
155°	642	660	711	781	804	295
165°	693	702	711	739	749	196
175°	721	721	716	725	725	68
180°	721	721	721	721	721	

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CANDELA DISTRIBUTION (FULL):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
0°	491.5	491.5	491.5	491.5	491.5	491.5	491.5	491.5	491.5	491.5	491.5
2.5°	491.5	491.5	494.6	496.2	499.4	501.0	504.2	507.3	516.8	518.4	521.5
5°	478.9	485.2	505.8	513.6	535.7	565.8	578.4	599.0	641.7	654.3	662.2
7.5°	459.9	474.1	524.7	537.3	592.6	671.6	704.9	749.2	817.1	850.2	877.1
10°	429.8	459.9	549.9	580.0	670.1	790.2	851.8	913.5	1016.2	1062.1	1079.4
12.5°	396.7	445.7	576.8	617.9	747.6	923.0	997.2	1065.2	1182.2	1243.8	1253.2
15°	358.7	425.2	602.1	662.2	829.7	1033.6	1115.8	1199.5	1308.6	1352.8	1363.9
17.5°	325.6	409.4	625.9	689.1	892.9	1133.1	1216.9	1286.5	1374.9	1405.0	1412.9
20°	284.5	384.1	641.7	723.8	959.3	1205.9	1286.5	1340.2	1400.3	1419.2	1422.4
22.5°	254.4	357.2	651.1	736.5	1003.6	1250.1	1318.1	1360.7	1401.8	1408.2	1409.7
25°	229.2	327.2	649.6	750.7	1041.5	1277.0	1329.2	1360.7	1384.5	1387.6	1387.6
27.5°	205.5	293.9	643.2	753.8	1069.9	1283.3	1324.4	1346.5	1357.6	1363.9	1363.9
30°	184.9	262.4	627.5	747.6	1082.6	1277.0	1310.1	1321.2	1332.3	1341.8	1346.5
32.5°	169.1	232.3	603.7	734.9	1084.2	1261.2	1284.9	1291.2	1307.0	1329.2	1337.0
35°	154.9	202.3	576.8	717.5	1074.7	1235.9	1251.7	1258.0	1289.6	1322.8	1333.8
37.5°	140.7	180.2	542.1	687.5	1060.5	1205.9	1216.9	1228.0	1277.0	1316.5	1329.2
40°	126.5	161.2	501.0	654.3	1038.3	1169.5	1179.0	1196.4	1261.2	1307.0	1319.6
42.5°	115.3	145.4	456.7	619.5	1009.8	1128.5	1142.7	1168.0	1242.2	1291.2	1305.5
45°	105.9	129.6	409.4	572.1	973.5	1085.8	1106.3	1141.1	1220.1	1267.5	1280.1
47.5°	96.4	118.5	360.3	523.1	934.0	1043.1	1069.9	1109.5	1190.0	1235.9	1247.0
50°	88.5	107.5	311.3	470.9	891.3	997.2	1028.9	1069.9	1152.1	1194.8	1209.1
52.5°	82.2	98.0	265.5	418.8	842.4	949.8	986.2	1028.9	1106.3	1147.4	1156.9
55°	75.8	90.0	226.0	363.5	791.8	899.3	938.8	979.9	1055.7	1090.4	1096.8
57.5°	72.7	83.8	192.8	311.3	738.0	842.4	886.6	924.6	995.6	1022.5	1028.9
60°	68.0	79.0	167.6	267.1	679.6	788.7	826.6	864.5	924.6	946.7	951.4
62.5°	63.2	75.8	148.6	224.4	619.5	725.4	763.4	798.1	848.7	864.5	870.8
65°	60.1	72.7	134.3	192.8	557.9	659.0	697.0	727.0	768.1	783.9	787.1
67.5°	56.9	69.6	123.3	166.0	496.2	592.6	621.1	649.6	681.2	697.0	698.5
70°	52.1	66.4	113.8	147.0	433.0	516.8	540.5	570.5	595.8	603.7	608.5
72.5°	49.0	61.6	107.5	132.7	368.3	444.1	466.3	483.6	505.8	513.6	513.6
75°	44.3	55.3	101.2	118.5	301.9	363.5	382.5	399.8	417.2	420.4	415.6
77.5°	39.5	49.0	87.0	99.6	235.5	287.7	303.5	312.9	327.2	330.3	331.9
80°	33.2	42.7	68.0	77.4	170.6	211.7	222.9	230.7	243.4	243.4	246.6
82.5°	25.3	33.2	49.0	55.3	115.3	145.4	154.9	159.6	167.6	167.6	167.6
85°	15.8	20.5	31.6	36.3	69.6	88.5	94.8	96.4	102.7	104.3	104.3
87.5°	7.9	11.0	20.5	22.1	36.3	45.9	45.9	49.0	49.0	47.4	45.9
90°	4.9	8.7	12.6	13.5	21.3	31.6	36.7	32.6	24.5	18.4	18.4
92.5°	19.3	52.2	85.1	93.3	131.2	181.8	207.0	181.4	130.3	91.9	88.3
95°	46.4	106.6	166.8	181.8	322.9	510.9	605.0	539.9	409.7	312.0	300.8
97.5°	80.2	133.3	186.4	199.7	434.9	748.4	905.2	864.0	781.8	720.0	699.0
100°	106.4	154.6	202.7	214.7	475.7	823.6	997.6	1000.6	1006.7	1011.1	986.0
102.5°	128.6	173.5	218.5	229.7	494.4	847.3	1023.8	1076.2	1181.1	1259.8	1238.3
105°	166.3	204.5	242.5	252.0	508.3	850.0	1020.9	1138.5	1373.5	1549.9	1538.3
107.5°	205.0	240.5	276.0	284.9	510.9	812.2	962.9	1126.9	1454.8	1700.7	1703.5
110°	231.2	263.2	295.1	303.2	507.0	778.7	914.5	1097.8	1464.5	1739.5	1751.5

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CANDELA DISTRIBUTION (continued):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
112.5°	256.8	287.3	317.7	325.4	507.1	749.3	870.5	1058.1	1433.4	1714.8	1733.3
115°	295.4	323.6	351.8	358.8	511.8	715.7	817.7	998.4	1360.0	1631.1	1656.7
117.5°	333.7	359.3	384.9	391.3	521.4	694.8	781.5	944.6	1270.8	1515.5	1543.9
120°	355.9	380.0	404.1	410.1	529.1	687.7	767.0	916.1	1214.1	1437.7	1465.4
122.5°	377.7	402.0	426.3	432.3	540.2	684.0	755.9	890.1	1158.5	1359.8	1387.1
125°	411.1	433.2	455.3	460.8	555.2	680.9	743.7	857.8	1085.8	1256.8	1281.9
127.5°	438.1	460.5	482.8	488.4	570.1	679.1	733.6	831.4	1027.3	1174.1	1195.3
130°	452.6	476.7	500.8	506.8	581.1	680.2	729.7	816.9	991.2	1121.9	1141.4
132.5°	467.7	491.8	515.8	521.8	590.0	680.9	726.4	804.4	960.4	1077.5	1094.9
135°	489.9	511.8	533.7	539.2	599.6	680.2	720.6	786.0	916.6	1014.6	1029.7
137.5°	512.6	534.2	556.0	561.4	614.1	684.4	719.6	774.8	885.2	968.1	980.4
140°	531.4	551.4	571.4	576.5	623.1	685.2	716.2	763.9	859.4	930.9	942.5
142.5°	545.9	564.4	582.9	587.6	630.4	687.6	716.2	758.1	841.9	904.8	914.7
145°	568.2	584.3	600.5	604.5	640.1	687.6	711.3	745.6	814.2	865.6	873.2
147.5°	590.5	606.2	621.9	625.8	654.3	692.3	711.3	738.3	792.3	832.8	839.0
150°	605.0	619.1	633.3	636.9	661.7	694.8	711.3	734.1	779.7	813.9	818.9
152.5°	620.0	630.7	641.5	644.2	666.6	696.4	711.3	730.8	769.7	798.9	802.7
155°	642.2	650.2	658.1	660.1	677.2	699.9	711.3	726.8	757.8	781.0	783.5
157.5°	658.7	666.4	674.1	676.0	687.8	703.5	711.3	723.4	747.5	765.5	767.3
160°	669.8	675.7	681.8	683.3	692.7	705.1	711.3	721.6	742.2	757.8	758.8
162.5°	680.9	685.4	689.9	691.1	697.8	706.9	711.3	720.0	737.5	750.6	751.5
165°	692.9	697.0	701.2	702.2	705.3	709.3	711.3	717.6	730.0	739.4	740.4
167.5°	704.1	706.0	708.0	708.4	711.1	714.5	716.2	720.3	728.4	734.6	735.1
170°	711.3	713.3	715.3	715.7	715.9	716.1	716.2	720.3	728.4	734.6	734.6
172.5°	715.3	715.6	716.1	716.2	716.2	716.2	716.2	719.4	725.8	730.7	730.3
175°	720.6	720.6	720.6	720.6	719.1	717.1	716.2	718.2	722.3	725.3	725.3
177.5°	720.6	720.6	720.6	720.6	719.5	717.9	717.1	718.7	722.0	724.4	723.9
180°	720.6	720.6	720.6	720.6	720.6	720.6	720.6	720.6	720.6	720.6	720.6

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CANDELA DISTRIBUTION (continued):

	80°	90°
0°	491.5	491.5
2.5°	524.7	521.5
5°	674.8	678.0
7.5°	908.8	907.2
10°	1130.0	1144.2
12.5°	1291.2	1294.3
15°	1389.2	1395.5
17.5°	1427.2	1428.7
20°	1428.7	1425.6
22.5°	1411.3	1408.2
25°	1390.7	1389.2
27.5°	1371.8	1373.4
30°	1363.9	1368.7
32.5°	1363.9	1371.8
35°	1367.1	1374.9
37.5°	1365.5	1374.9
40°	1359.2	1370.2
42.5°	1341.8	1349.6
45°	1314.9	1324.4
47.5°	1280.1	1286.5
50°	1235.9	1242.2
52.5°	1180.6	1182.2
55°	1114.2	1120.5
57.5°	1043.1	1044.7
60°	964.1	968.8
62.5°	880.3	880.3
65°	791.8	794.9
67.5°	700.1	708.1
70°	606.9	608.5
72.5°	515.2	515.2
75°	420.4	422.0
77.5°	330.3	330.3
80°	245.0	246.6
82.5°	169.1	172.2
85°	105.9	105.9
87.5°	49.0	44.3
90°	18.4	18.4
92.5°	73.6	59.0
95°	256.6	212.3
97.5°	614.8	530.5
100°	885.7	785.3
102.5°	1152.3	1066.3
105°	1492.2	1445.9
107.5°	1714.7	1725.9
110°	1799.6	1847.7

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CANDELA DISTRIBUTION (continued):

	80°	90°
112.5°	1807.2	1881.2
115°	1759.3	1861.8
117.5°	1657.7	1771.3
120°	1575.8	1686.2
122.5°	1496.0	1605.0
125°	1382.2	1482.6
127.5°	1280.0	1364.7
130°	1219.7	1298.0
132.5°	1165.0	1235.0
135°	1090.1	1150.4
137.5°	1029.9	1079.3
140°	988.6	1034.9
142.5°	954.5	994.2
145°	903.3	933.3
147.5°	863.9	888.8
150°	839.2	859.4
152.5°	817.9	833.2
155°	793.6	803.7
157.5°	774.4	781.5
160°	762.9	767.0
162.5°	755.4	759.2
165°	744.5	748.6
167.5°	736.7	738.4
170°	734.6	734.6
172.5°	728.8	727.3
175°	725.3	725.3
177.5°	722.3	720.6
180°	720.6	720.6

(END OF REPORT)