

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: P937302

Luminaire Tested: SQ4-FB-075U-100D-B40-1D-UNV-W2A-W-4

Issue Date: 12/17/2024

Test Information

Test Method: LM-79-2019
Report Number: P937302
REPORT IS A COMBINATION OF REPORTS P933503 AND P933786
Test Lab: INNOVATION CENTER
Issue Date: 12/17/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-FB-075U-100D-B40-1D-UNV-W2A-W-4
Description: CORELITE SQ4 SUSPENDED INDIRECT LED LUMINAIRE WITH Batwing Frosted Continuous Roll L
Light Source: -
Ballast/Driver: -

Summary

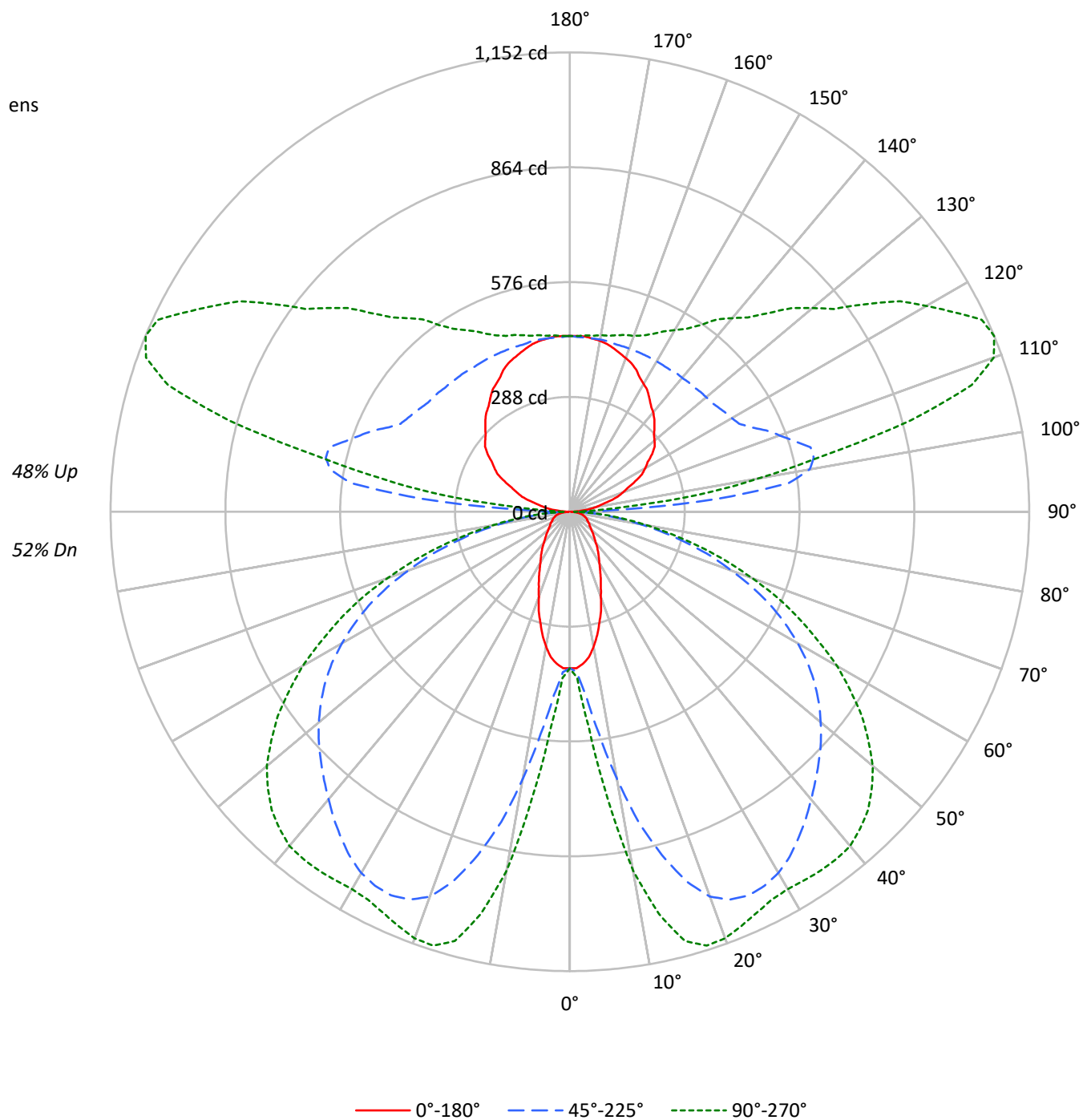
Lumens per Lamp: N/A
Luminaire Lumens: 5897.2 lumens
Efficiency: N/A
Efficacy: 115.2 lumens/watt
Spacing Criteria (0/90/45): 0.71 / 2.69 / 2.33
Luminous Opening: Rectangular w/ Sides (W: 0.29' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 51.2
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	108	108	108	108	99	99	99	99	84	84	84	70	70	70	58	58	58
1	98	93	89	85	90	86	82	79	73	70	68	61	59	57	50	49	47
2	88	80	74	69	81	74	69	64	63	59	55	53	50	47	43	41	39
3	80	70	62	56	74	65	58	53	55	50	46	46	42	39	38	35	32
4	73	62	53	47	67	57	50	44	49	43	38	41	36	33	33	30	27
5	67	55	46	40	61	51	43	37	43	37	33	36	32	28	30	26	23
6	61	49	40	34	56	45	38	32	39	33	28	32	28	24	27	23	20
7	56	44	35	30	52	41	33	28	35	29	24	29	25	21	24	20	18
8	52	39	31	26	48	37	29	24	31	26	21	27	22	19	22	18	16
9	49	36	28	23	45	33	26	22	29	23	19	24	20	16	20	17	14
10	45	33	25	20	42	31	24	19	26	21	17	22	18	15	19	15	12

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3641	3641	3641
5°	3554	4205	4895
10°	3220	6127	8115
15°	2733	7998	9798
20°	2222	9262	9986
25°	1852	9684	9783
30°	1559	9738	9765
35°	1377	9569	10018
40°	1197	9350	10278
45°	1082	9189	10319
50°	991	9041	10148
55°	945	8829	9697
60°	964	8430	8988
65°	998	7829	8011
70°	1056	6814	6768
75°	1158	5541	5282
80°	1240	3828	3558
85°	1043	2020	1821

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 45°

Luminance: 10319 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	50.8	0.9
10°-20°	225.0	3.8
20°-30°	393.5	6.7
30°-40°	506.6	8.6
40°-50°	565.9	9.6
50°-60°	542.0	9.2
60°-70°	429.5	7.3
70°-80°	252.6	4.3
80°-90°	71.9	1.2
90°-100°	215.0	3.6
100°-110°	565.3	9.6
110°-120°	586.1	9.9
120°-130°	470.2	8.0
130°-140°	368.9	6.3
140°-150°	283.1	4.8
150°-160°	203.9	3.5
160°-170°	124.8	2.1
170°-180°	42.2	0.7
0°-30°	669.3	11.3
0°-40°	1175.9	19.9
0°-60°	2283.7	38.7
0°-90°	3037.6	51.5
90°-120°	1366.5	23.2
90°-150°	2488.7	42.2
90°-180°	2860.0	48.5
0°-180°	5897.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	392	392	392	392	392	
5°	382	410	462	522	541	35
15°	286	529	891	1080	1114	80
25°	183	599	1061	1108	1109	84
35°	124	573	999	1056	1098	77
45°	84	457	883	1012	1058	65
55°	60	290	750	871	895	55
65°	48	154	556	626	635	48
75°	35	95	305	336	337	37
85°	13	29	76	83	84	13
90°	3	8	22	11	11	3
95°	28	111	370	191	130	32
105°	102	154	625	949	885	108
115°	181	220	501	998	1140	179
125°	252	282	455	769	908	223
135°	300	330	441	621	704	232
145°	348	370	436	530	571	218
155°	393	404	436	478	492	181
165°	424	430	436	453	458	120
175°	441	441	438	444	444	42
180°	441	441	441	441	441	

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CANDELA DISTRIBUTION (FULL):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
0°	392.4	392.4	392.4	392.4	392.4	392.4	392.4	392.4	392.4	392.4	392.4
2.5°	392.4	392.4	395.0	396.2	398.7	400.0	402.5	405.0	412.7	413.9	416.4
5°	382.4	387.4	403.8	410.1	427.7	451.7	461.8	478.3	512.4	522.4	528.7
7.5°	367.2	378.6	419.0	429.1	473.2	536.3	562.8	598.1	652.4	678.9	700.3
10°	343.2	367.2	439.1	463.1	535.0	631.0	680.2	729.3	811.4	847.9	861.9
12.5°	316.8	355.8	460.6	493.4	596.9	737.0	796.3	850.5	943.9	993.1	1000.6
15°	286.4	339.4	480.7	528.7	662.5	825.3	890.9	957.8	1044.9	1080.2	1089.0
17.5°	260.0	326.8	499.7	550.2	713.0	904.8	971.6	1027.2	1097.9	1121.8	1128.1
20°	227.1	306.7	512.4	578.0	766.0	962.8	1027.2	1070.1	1118.0	1133.2	1135.7
22.5°	203.1	285.2	519.9	588.0	801.2	998.2	1052.4	1086.5	1119.3	1124.3	1125.6
25°	183.0	261.2	518.7	599.4	831.6	1019.6	1061.2	1086.5	1105.4	1107.9	1107.9
27.5°	164.1	234.7	513.6	601.9	854.2	1024.6	1057.5	1075.1	1083.9	1089.0	1089.0
30°	147.6	209.4	501.0	596.9	864.4	1019.6	1046.1	1054.9	1063.8	1071.3	1075.1
32.5°	135.0	185.5	482.1	586.8	865.6	1007.0	1025.9	1030.9	1043.5	1061.2	1067.6
35°	123.7	161.5	460.6	572.9	858.1	986.8	999.4	1004.5	1029.7	1056.2	1065.0
37.5°	112.3	143.8	432.8	548.9	846.7	962.8	971.6	980.5	1019.6	1051.2	1061.2
40°	100.9	128.7	400.0	522.4	829.0	933.8	941.3	955.3	1007.0	1043.5	1053.7
42.5°	92.2	116.1	364.7	494.7	806.3	900.9	912.3	932.6	991.9	1030.9	1042.3
45°	84.5	103.4	326.8	456.8	777.3	866.9	883.3	911.1	974.2	1012.0	1022.1
47.5°	77.0	94.6	287.7	417.7	745.8	832.9	854.2	885.9	950.2	986.8	995.6
50°	70.7	85.9	248.6	376.1	711.7	796.3	821.5	854.2	920.0	953.9	965.3
52.5°	65.6	78.2	212.0	334.4	672.6	758.4	787.4	821.5	883.3	916.1	923.7
55°	60.5	71.9	180.5	290.2	632.2	718.0	749.6	782.3	843.0	870.7	875.7
57.5°	58.1	66.8	153.9	248.6	589.3	672.6	707.9	738.2	794.9	816.4	821.5
60°	54.2	63.1	133.8	213.3	542.6	629.6	660.0	690.3	738.2	755.9	759.6
62.5°	50.5	60.5	118.6	179.2	494.7	579.2	609.5	637.3	677.7	690.3	695.3
65°	47.9	58.1	107.2	153.9	445.4	526.2	556.5	580.4	613.3	625.9	628.4
67.5°	45.5	55.5	98.5	132.5	396.2	473.2	495.9	518.7	543.9	556.5	557.7
70°	41.6	53.0	90.8	117.4	345.7	412.7	431.6	455.5	475.7	482.1	485.8
72.5°	39.2	49.2	85.9	106.0	294.0	354.6	372.3	386.1	403.8	410.1	410.1
75°	35.3	44.1	80.8	94.6	241.0	290.2	305.4	319.3	333.1	335.7	331.9
77.5°	31.5	39.2	69.4	79.5	188.0	229.7	242.3	249.8	261.2	263.8	265.0
80°	26.5	34.1	54.2	61.8	136.3	169.1	177.9	184.2	194.3	194.3	196.8
82.5°	20.2	26.5	39.2	44.1	92.2	116.1	123.7	127.5	133.8	133.8	133.8
85°	12.6	16.4	25.2	29.0	55.5	70.7	75.7	77.0	82.0	83.3	83.3
87.5°	6.3	8.8	16.4	17.7	29.0	36.6	36.6	39.2	39.2	37.8	36.6
90°	3.0	5.3	7.7	8.3	13.1	19.4	22.5	20.1	15.0	11.3	11.3
92.5°	11.8	32.0	52.0	57.1	80.3	111.3	126.7	111.1	79.7	56.2	54.1
95°	28.5	65.3	102.2	111.4	197.7	312.8	370.3	330.4	250.7	190.9	184.1
97.5°	49.2	81.7	114.1	122.2	266.3	458.2	554.2	529.0	478.6	440.8	427.9
100°	65.1	94.5	124.1	131.4	291.2	504.2	610.7	612.5	616.3	619.0	603.7
102.5°	78.8	106.3	133.7	140.6	302.6	518.8	626.8	658.9	723.0	771.2	758.0
105°	101.8	125.1	148.4	154.2	311.1	520.4	625.0	697.0	840.9	948.8	941.7
107.5°	125.5	147.3	168.9	174.4	312.8	497.2	589.4	689.8	890.5	1041.1	1042.9
110°	141.5	161.1	180.8	185.7	310.4	476.6	559.8	672.0	896.5	1064.8	1072.2

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CANDELA DISTRIBUTION (continued):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
112.5°	157.2	175.9	194.5	199.2	310.5	458.8	532.9	647.8	877.5	1049.7	1061.1
115°	180.9	198.1	215.4	219.6	313.3	438.2	500.6	611.3	832.6	998.5	1014.2
117.5°	204.3	219.9	235.6	239.5	319.2	425.3	478.4	578.3	777.9	927.8	945.2
120°	217.9	232.6	247.3	251.1	323.8	421.0	469.5	560.8	743.3	880.1	897.0
122.5°	231.2	246.1	260.9	264.6	330.6	418.7	462.7	544.8	709.2	832.5	849.2
125°	251.6	265.2	278.8	282.1	339.9	416.9	455.3	525.2	664.8	769.4	784.8
127.5°	268.3	281.9	295.6	299.0	349.1	415.8	449.1	509.1	629.0	718.8	731.8
130°	277.1	291.8	306.6	310.3	355.7	416.4	446.7	500.1	606.8	686.8	698.8
132.5°	286.3	301.0	315.7	319.4	361.2	416.9	444.6	492.4	588.0	659.6	670.3
135°	299.9	313.2	326.7	330.0	367.1	416.5	441.1	481.1	561.2	621.1	630.4
137.5°	313.8	327.1	340.4	343.7	376.0	419.1	440.5	474.3	542.0	592.7	600.2
140°	325.4	337.6	349.8	352.9	381.4	419.4	438.4	467.7	526.0	569.8	576.9
142.5°	334.2	345.5	356.8	359.7	385.9	421.0	438.4	464.1	515.4	553.9	560.0
145°	347.8	357.7	367.6	370.1	391.8	421.0	435.5	456.5	498.4	529.9	534.5
147.5°	361.5	371.0	380.7	383.1	400.5	423.8	435.5	452.0	485.0	509.8	513.6
150°	370.3	379.0	387.7	389.9	405.1	425.4	435.5	449.4	477.3	498.2	501.3
152.5°	379.5	386.1	392.7	394.3	408.1	426.3	435.5	447.4	471.2	489.1	491.3
155°	393.2	398.0	402.8	404.1	414.6	428.5	435.5	444.9	463.8	478.1	479.6
157.5°	403.2	408.0	412.8	413.9	421.1	430.7	435.5	442.8	457.5	468.6	469.7
160°	410.0	413.7	417.3	418.3	424.0	431.7	435.5	441.8	454.5	463.9	464.5
162.5°	416.9	419.6	422.4	423.1	427.2	432.7	435.5	440.8	451.4	459.5	460.0
165°	424.2	426.7	429.2	429.8	431.8	434.2	435.5	439.3	446.9	452.7	453.3
167.5°	431.0	432.1	433.4	433.7	435.3	437.4	438.4	440.9	446.0	449.7	450.0
170°	435.5	436.6	437.9	438.2	438.2	438.3	438.4	440.9	446.0	449.7	449.7
172.5°	437.9	438.2	438.3	438.4	438.4	438.4	438.4	440.4	444.4	447.3	447.1
175°	441.1	441.1	441.1	441.1	440.3	439.0	438.4	439.7	442.2	444.1	444.1
177.5°	441.1	441.1	441.1	441.1	440.4	439.5	439.0	440.0	442.0	443.5	443.2
180°	441.1	441.1	441.1	441.1	441.1	441.1	441.1	441.1	441.1	441.1	441.1

TEST NUMBER: P937302

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CANDELA DISTRIBUTION (continued):

	80°	90°
0°	392.4	392.4
2.5°	419.0	416.4
5°	538.8	541.4
7.5°	725.6	724.3
10°	902.3	913.6
12.5°	1030.9	1033.5
15°	1109.2	1114.2
17.5°	1139.5	1140.7
20°	1140.7	1138.2
22.5°	1126.9	1124.3
25°	1110.5	1109.2
27.5°	1095.3	1096.5
30°	1089.0	1092.8
32.5°	1089.0	1095.3
35°	1091.6	1097.9
37.5°	1090.2	1097.9
40°	1085.3	1094.0
42.5°	1071.3	1077.6
45°	1049.9	1057.5
47.5°	1022.1	1027.2
50°	986.8	991.9
52.5°	942.6	943.9
55°	889.6	894.6
57.5°	832.9	834.1
60°	769.7	773.6
62.5°	702.9	702.9
65°	632.2	634.7
67.5°	559.1	565.4
70°	484.6	485.8
72.5°	411.4	411.4
75°	335.7	336.9
77.5°	263.8	263.8
80°	195.6	196.8
82.5°	135.0	137.5
85°	84.5	84.5
87.5°	39.2	35.3
90°	11.3	11.3
92.5°	45.1	36.1
95°	157.1	130.0
97.5°	376.4	324.8
100°	542.2	480.7
102.5°	705.4	652.7
105°	913.5	885.2
107.5°	1049.7	1056.6
110°	1101.7	1131.2

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CANDELA DISTRIBUTION (continued):

	80°	90°
112.5°	1106.4	1151.6
115°	1077.0	1139.8
117.5°	1014.8	1084.4
120°	964.6	1032.3
122.5°	915.8	982.6
125°	846.2	907.6
127.5°	783.6	835.4
130°	746.7	794.6
132.5°	713.2	756.1
135°	667.4	704.3
137.5°	630.5	660.8
140°	605.3	633.5
142.5°	584.3	608.6
145°	552.9	571.4
147.5°	528.9	544.2
150°	513.7	526.1
152.5°	500.7	510.1
155°	485.8	492.0
157.5°	474.1	478.4
160°	467.0	469.5
162.5°	462.4	464.8
165°	455.8	458.3
167.5°	451.0	452.1
170°	449.7	449.7
172.5°	446.2	445.2
175°	444.1	444.1
177.5°	442.2	441.1
180°	441.1	441.1

(END OF REPORT)