

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: P522018

Luminaire Tested: SQ4-WB-150U-050D-92765-1D-UNV-STD-W-4_3500K

Issue Date: 5-5-2021

Test Information

Test Method: LM-79-2019
Report Number: P522018
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2101-105-51, G2-2009-966-13)
Test Lab: INNOVATION CENTER
Issue Date: 5-5-2021
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-WB-150U-050D-92765-1D-UNV-STD-W-4_3500K
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH WHITE BAFFLE
DOWNLIGHT 500 LUMENS PER FOOT
UPLIGHT 1500 LUMENS PER FOOT
Light Source: 2700K-6500K CCT, 90 CRI LEDS, TUNED TO 3500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 8361.5 lumens
Efficiency: N/A
Efficacy: 116.3 lumens/watt
Spacing Criteria (0/90/45): 0.89 / 1 / 1.02
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: Semi-Indirect

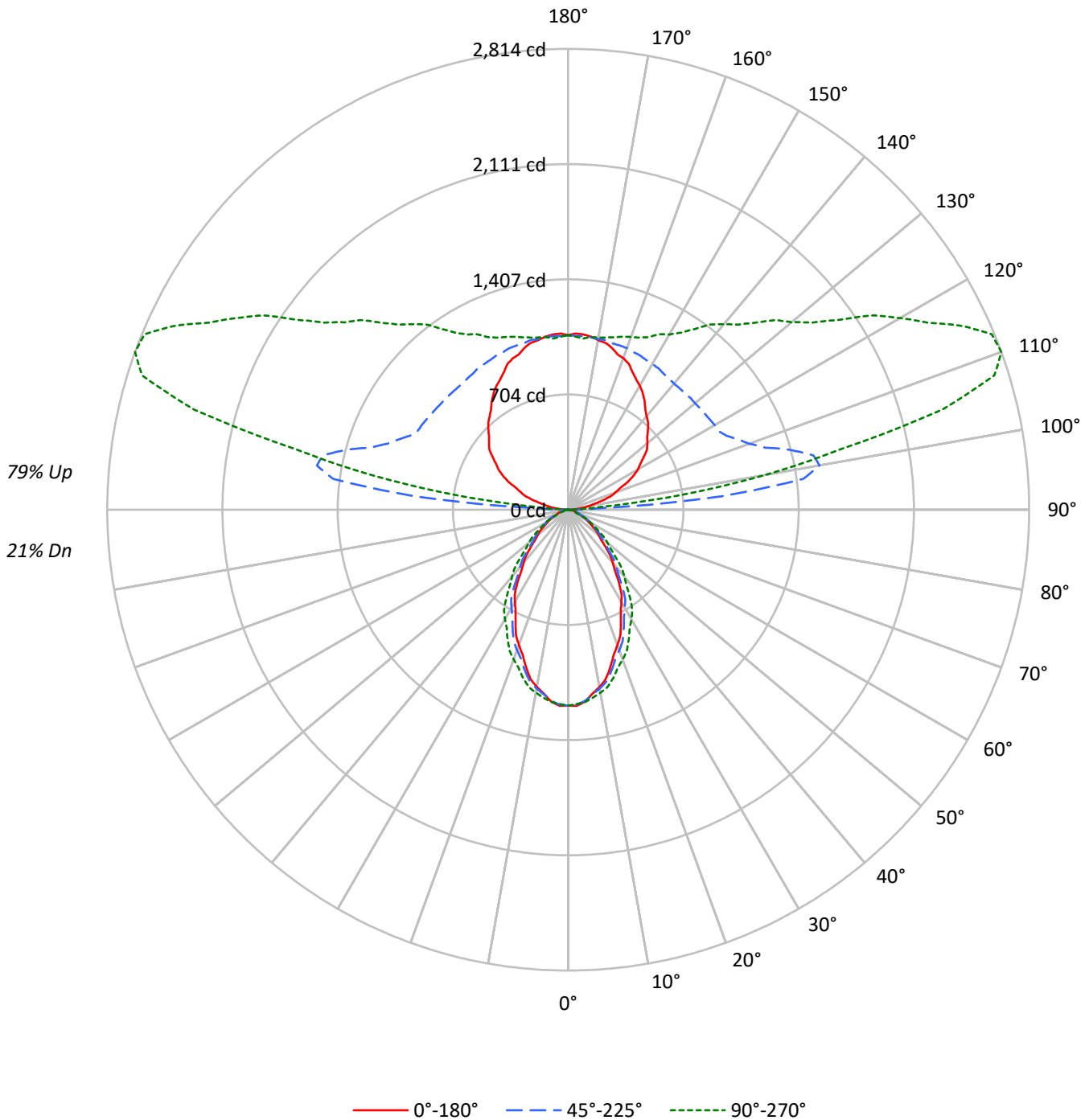
Input Watts (W): 71.9
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Luminous Intensity Polar Plot



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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									20										
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	50	30	10	0														
RCR																																						
0	100	100	100	100	89	89	89	89	67	67	67	47	47	47	29	29	29	21																				
1	92	88	84	81	81	78	75	72	59	57	56	42	41	40	27	26	26	19																				
2	84	77	72	67	74	69	64	60	53	50	47	38	36	34	24	23	22	16																				
3	77	68	62	56	68	61	55	51	47	43	40	34	31	30	22	21	20	14																				
4	70	61	53	48	62	54	48	43	42	38	34	30	28	26	20	18	17	13																				
5	65	54	47	41	57	48	42	37	37	33	30	27	25	23	18	17	15	12																				
6	60	48	41	36	53	43	37	32	34	29	26	25	22	20	17	15	14	10																				
7	55	44	36	31	49	39	33	29	31	26	23	23	20	18	15	14	12	9																				
8	51	40	33	28	45	36	30	25	28	24	21	21	18	16	14	12	11	9																				
9	48	36	29	25	42	33	27	22	26	21	18	19	16	14	13	11	10	8																				
10	44	33	26	22	39	30	24	20	24	19	17	18	15	13	12	11	9	7																				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	11036	11036	11036
5°	10899	10860	10923
10°	10297	10391	10631
15°	9506	9726	10162
20°	8632	8956	9549
25°	7742	8164	8896
30°	6923	7375	8220
35°	6054	6491	7419
40°	5095	5499	6423
45°	4205	4568	5363
50°	3511	3827	4468
55°	2981	3285	3690
60°	2546	2847	2945
65°	2028	2395	1901
70°	1799	1869	1160
75°	1665	1515	709
80°	1536	1392	611
85°	1387	1281	498

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 5363 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	109.7	1.3
10°-20°	285.4	3.4
20°-30°	369.7	4.4
30°-40°	362.0	4.3
40°-50°	277.1	3.3
50°-60°	184.6	2.2
60°-70°	100.8	1.2
70°-80°	42.0	0.5
80°-90°	11.9	0.1
90°-100°	485.5	5.8
100°-110°	1381.5	16.5
110°-120°	1323.6	15.8
120°-130°	1047.6	12.5
130°-140°	840.8	10.1
140°-150°	658.3	7.9
150°-160°	481.7	5.8
160°-170°	298.3	3.6
170°-180°	101.2	1.2
0°-30°	764.8	9.1
0°-40°	1126.7	13.5
0°-60°	1588.4	19.0
0°-90°	1743.1	20.8
90°-120°	3190.6	38.2
90°-150°	5737.2	68.6
90°-180°	6618.0	79.1
0°-180°	8361.5	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1196	1196	1196	1196	1196	
5°	1177	1165	1173	1175	1179	109
15°	995	992	1018	1046	1064	278
25°	760	763	802	837	874	350
35°	538	540	576	615	659	334
45°	322	328	350	377	411	251
55°	185	193	204	212	229	168
65°	93	101	110	96	87	97
75°	47	47	42	29	20	50
85°	13	13	12	8	5	14
90°	0	0	0	0	0	3
95°	53	209	940	325	200	60
105°	215	326	1408	2487	2364	227
115°	399	482	1068	2262	2656	393
125°	563	624	1019	1691	2022	504
135°	689	746	1007	1428	1614	531
145°	812	854	1015	1236	1347	507
155°	928	950	1039	1117	1163	429
165°	1025	1029	1051	1074	1090	288
175°	1074	1068	1064	1057	1049	102
180°	1066	1066	1066	1066	1066	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1196.2	1196.2	1196.2	1196.2	1196.2
2.5°	1199.1	1188.5	1191.2	1191.1	1187.8
5°	1176.8	1165.0	1172.6	1175.3	1179.4
7.5°	1133.1	1124.2	1138.0	1148.3	1156.6
10°	1099.1	1091.4	1109.1	1124.0	1134.8
12.5°	1059.6	1053.2	1075.0	1095.1	1109.2
15°	995.2	991.6	1018.3	1046.0	1063.9
17.5°	926.2	924.4	955.1	987.4	1010.4
20°	879.2	878.7	912.2	945.9	972.6
22.5°	831.7	832.8	868.1	903.2	933.5
25°	760.5	762.6	802.0	837.0	873.9
27.5°	694.7	695.6	736.4	773.3	812.7
30°	649.8	652.4	692.3	730.5	771.6
32.5°	604.9	607.8	647.0	686.4	728.3
35°	537.5	540.0	576.3	615.1	658.7
37.5°	468.0	471.5	503.7	540.3	583.2
40°	423.0	428.2	456.6	491.2	533.3
42.5°	379.8	386.2	412.6	445.3	483.3
45°	322.3	328.4	350.1	376.6	411.0
47.5°	272.7	279.8	296.4	319.3	348.6
50°	244.6	251.3	266.6	283.5	311.3
52.5°	219.8	226.5	240.2	253.2	276.8
55°	185.3	193.0	204.2	211.9	229.4
57.5°	156.9	164.3	173.2	176.7	187.3
60°	138.0	146.3	154.3	153.9	159.6
62.5°	120.8	127.8	135.8	130.3	130.6
65°	92.9	100.6	109.7	95.9	87.1
67.5°	75.1	76.7	86.1	66.8	56.5
70°	66.7	66.7	69.3	51.8	43.0
72.5°	58.7	58.7	56.3	42.1	33.0
75°	46.7	46.7	42.5	29.2	19.9
77.5°	36.0	35.6	32.5	21.8	14.5
80°	28.9	28.9	26.2	17.2	11.5
82.5°	22.6	22.6	20.4	13.4	8.6
85°	13.1	13.1	12.1	7.8	4.7
87.5°	4.6	4.6	4.2	2.5	2.1
90°	0.0	0.0	0.0	0.0	0.0
92.5°	16.2	85.9	199.3	58.0	43.8
95°	52.7	209.1	939.9	325.3	200.5
97.5°	96.8	245.0	1447.5	1035.8	709.8
100°	127.6	266.3	1557.7	1577.8	1215.4
102.5°	161.6	289.2	1533.4	2019.7	1703.2
105°	214.7	325.6	1407.8	2486.7	2363.9
107.5°	268.6	368.0	1261.2	2618.4	2727.7
110°	305.9	399.0	1176.9	2568.0	2813.6

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	341.5	429.9	1120.2	2448.9	2799.0
115°	399.1	482.2	1067.5	2261.5	2655.6
117.5°	449.7	527.7	1036.3	2056.6	2474.1
120°	490.2	555.6	1033.1	1939.5	2339.6
122.5°	522.6	588.0	1025.0	1836.8	2208.4
125°	563.1	624.5	1018.9	1690.8	2021.6
127.5°	607.3	664.7	1015.7	1603.6	1876.1
130°	630.0	687.4	1010.8	1542.9	1780.5
132.5°	654.3	710.1	1010.8	1495.4	1714.1
135°	688.7	746.2	1006.7	1428.3	1614.4
137.5°	721.1	777.0	1006.3	1371.4	1532.2
140°	745.4	802.9	1004.7	1324.2	1478.7
142.5°	773.0	820.9	1009.6	1286.6	1425.2
145°	812.3	853.9	1014.8	1236.1	1347.0
147.5°	845.9	886.3	1023.8	1185.2	1281.0
150°	875.1	902.8	1027.0	1168.3	1235.6
152.5°	897.8	927.1	1030.2	1145.5	1208.1
155°	927.7	949.5	1039.2	1117.2	1162.7
157.5°	965.0	978.1	1041.2	1104.3	1136.8
160°	984.5	994.4	1049.3	1094.5	1122.2
162.5°	995.8	1007.3	1050.9	1086.2	1107.6
165°	1025.0	1028.9	1051.3	1073.9	1089.8
167.5°	1044.8	1041.3	1060.6	1070.9	1077.2
170°	1051.3	1049.3	1057.4	1059.6	1067.5
172.5°	1065.9	1059.2	1062.2	1056.3	1062.6
175°	1073.6	1067.6	1063.5	1057.2	1049.3
177.5°	1076.8	1067.3	1062.2	1055.8	1057.4
180°	1065.5	1065.5	1065.5	1065.5	1065.5

(END OF REPORT)