

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: P518892

Luminaire Tested: **SQ4-BB-150U-050D-935-1D-UNV-STD-W-4**

Issue Date: 4/29/2021

Test Information

Test Method: LM-79-2019
Report Number: P518892
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-25, G2-2009-966-12)
Test Lab: INNOVATION CENTER
Issue Date: 4/29/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4-BB-150U-050D-935-1D-UNV-STD-W-4
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH BLACK BAFFLE
DOWNLIGHT 500 LUMENS PER FOOT
UPLIGHT 1500 LUMENS PER FOOT
Light Source: 3500K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

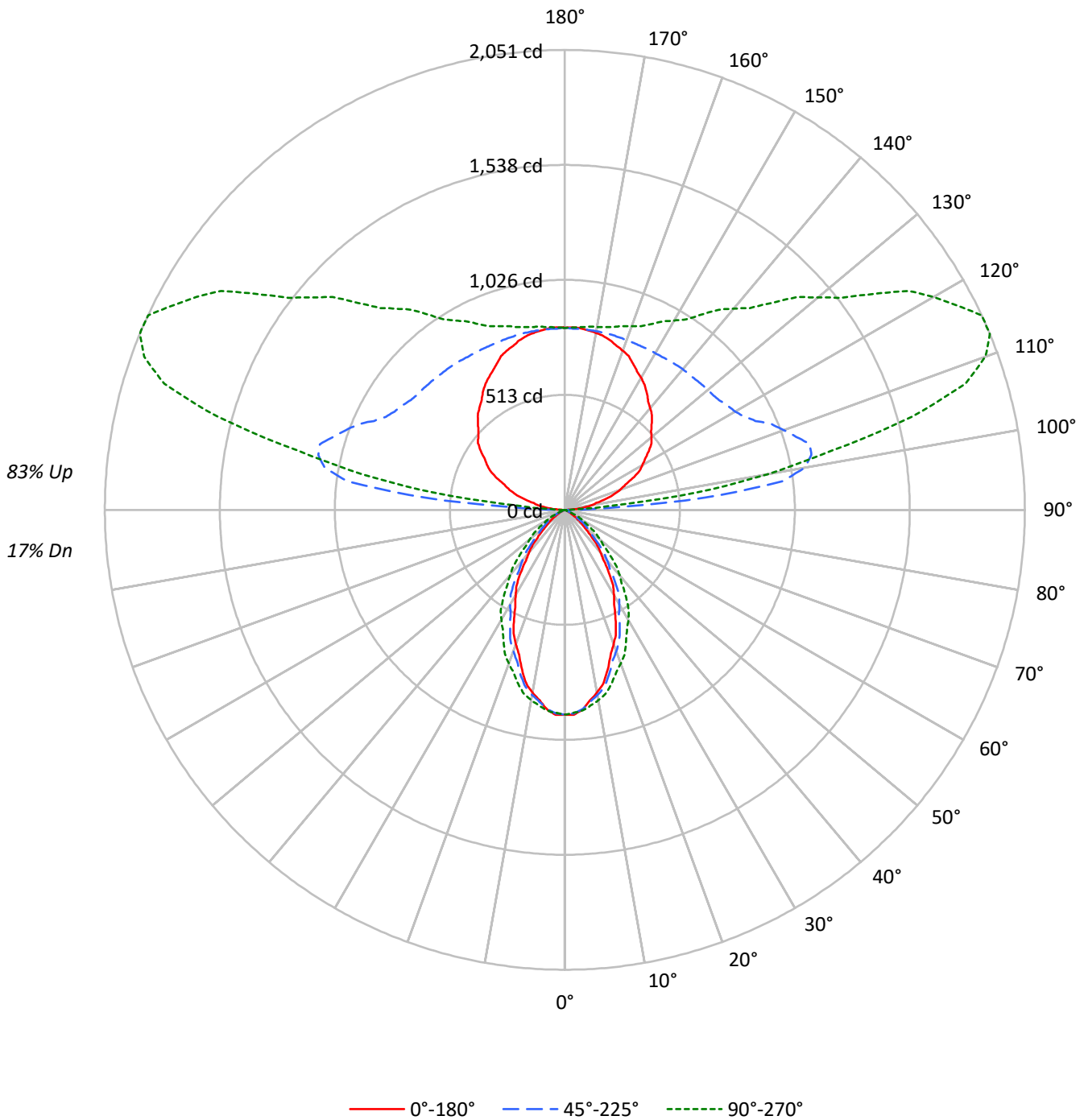
Lumens per Lamp: N/A
Luminaire Lumens: 6325.0 lumens
Efficiency: N/A
Efficacy: 113.6 lumens/watt
Spacing Criteria (0/90/45): 0.85 / 0.97 / 0.97
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: Semi-Indirect

Input Watts (W): 55.7
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



TEST NUMBER: P518892
CATALOG NUMBER: SQ4-BB-150U-050D-935-1D-UNV-STD-W-4

Luminous Intensity Polar Plot





TEST NUMBER: P518892

CATALOG NUMBER: SQ4-BB-150U-050D-935-1D-UNV-STD-W-4

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	99	99	99	99	87	87	87	87	65	65	65	45	45	45	26	26	26	17
1	91	87	84	81	80	77	74	72	58	56	54	40	39	38	24	23	23	16
2	83	77	71	67	73	68	63	60	51	48	46	36	34	33	22	21	20	14
3	76	68	61	56	67	60	55	51	46	42	39	32	30	29	20	19	18	13
4	70	60	53	48	62	54	48	43	41	37	34	29	27	25	18	17	16	12
5	64	54	47	41	57	48	42	37	37	33	30	26	24	22	17	15	14	11
6	59	48	41	36	52	43	37	33	33	29	26	24	21	19	15	14	13	10
7	55	44	37	32	48	39	33	29	30	26	23	22	19	17	14	13	12	9
8	51	40	33	28	45	36	30	25	28	23	20	20	18	16	13	12	11	8
9	47	36	29	25	42	32	27	23	25	21	18	19	16	14	12	11	10	8
10	44	33	27	22	39	30	24	20	23	19	16	17	15	13	11	10	9	7

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	8424	8424	8424
5°	8288	8268	8329
10°	7754	7858	8078
15°	7050	7274	7679
20°	6258	6583	7160
25°	5449	5881	6578
30°	4668	5181	6028
35°	3870	4398	5362
40°	2974	3517	4569
45°	2150	2663	3677
50°	1464	1984	2917
55°	952	1435	2266
60°	546	1011	1639
65°	144	618	830
70°	73	192	237
75°	32	14	0
80°	21	0	0
85°	0	0	0



TEST NUMBER: P518892

CATALOG NUMBER: SQ4-BB-150U-050D-935-1D-UNV-STD-W-4

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	83.3	1.3
10°-20°	213.1	3.4
20°-30°	266.7	4.2
30°-40°	246.4	3.9
40°-50°	165.6	2.6
50°-60°	85.5	1.4
60°-70°	26.8	0.4
70°-80°	1.7	0.0
80°-90°	1.7	0.0
90°-100°	377.3	6.0
100°-110°	1020.1	16.1
110°-120°	1072.5	17.0
120°-130°	871.2	13.8
130°-140°	683.3	10.8
140°-150°	524.5	8.3
150°-160°	377.2	6.0
160°-170°	230.4	3.6
170°-180°	77.7	1.2
0°-30°	563.1	8.9
0°-40°	809.5	12.8
0°-60°	1060.6	16.8
0°-90°	1090.8	17.2
90°-120°	2469.9	39.0
90°-150°	4548.9	71.9
90°-180°	5234.0	82.8
0°-180°	6325.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	913	913	913	913	913	
5°	895	886	893	896	899	83
15°	738	736	762	787	804	206
25°	535	540	578	617	646	245
35°	344	352	390	436	476	213
45°	165	175	204	244	282	129
55°	59	69	89	115	141	55
65°	7	13	28	34	38	11
75°	1	1	0	0	0	1
85°	0	0	0	0	0	0
90°	2	5	11	12	11	4
95°	58	206	627	325	193	61
105°	190	293	1132	1669	1601	200
115°	334	408	938	1817	2051	330
125°	457	524	846	1428	1677	407
135°	548	613	823	1153	1305	423
145°	637	685	812	987	1062	399
155°	719	747	805	885	914	332
165°	783	791	808	840	844	221
175°	813	812	809	820	818	77
180°	812	812	812	812	812	

TEST NUMBER: P518892

CATALOG NUMBER: SQ4-BB-150U-050D-935-1D-UNV-STD-W-4

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	913.0	913.0	913.0	913.0	913.0
2.5°	915.1	906.5	908.7	908.7	906.3
5°	894.9	885.8	892.7	895.8	899.3
7.5°	857.1	850.0	863.2	873.0	880.2
10°	827.7	821.7	838.8	852.2	862.2
12.5°	793.8	789.1	809.8	828.3	841.0
15°	738.1	735.5	761.5	787.0	803.9
17.5°	678.4	678.3	707.9	739.7	760.0
20°	637.4	638.7	670.5	705.5	729.2
22.5°	596.4	599.4	633.4	669.9	697.1
25°	535.3	539.6	577.7	617.3	646.2
27.5°	476.7	483.0	523.1	564.1	599.4
30°	438.2	445.5	486.3	529.5	565.8
32.5°	400.3	409.1	448.8	494.6	531.5
35°	343.6	352.3	390.5	436.4	476.1
37.5°	285.1	293.5	330.8	376.1	419.0
40°	246.9	256.4	292.0	335.8	379.4
42.5°	212.3	221.8	255.2	298.3	339.5
45°	164.8	174.7	204.1	243.8	281.8
47.5°	125.4	136.1	161.9	197.9	232.5
50°	102.0	112.8	138.2	169.9	203.2
52.5°	83.3	93.8	116.7	146.5	177.0
55°	59.2	69.1	89.2	114.6	140.9
57.5°	40.9	49.5	67.5	88.6	109.3
60°	29.6	37.8	54.8	71.9	88.8
62.5°	19.7	27.2	43.8	57.0	68.3
65°	6.6	12.7	28.3	34.1	38.0
67.5°	3.4	4.0	14.8	15.7	17.0
70°	2.7	2.7	7.1	7.5	8.8
72.5°	1.9	1.9	2.8	3.6	3.9
75°	0.9	0.9	0.4	0.0	0.0
77.5°	0.4	0.4	0.4	0.0	0.0
80°	0.4	0.4	0.0	0.0	0.0
82.5°	0.1	0.1	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.3	1.0	2.3	2.4	2.3
90°	1.7	5.2	11.4	12.2	11.4
92.5°	24.8	90.4	178.4	77.5	56.1
95°	58.5	205.5	627.4	324.7	193.1
97.5°	94.0	235.7	978.0	809.4	594.4
100°	120.6	247.9	1087.1	1133.7	916.7
102.5°	145.1	264.9	1125.6	1379.7	1217.3
105°	189.6	293.0	1131.7	1669.3	1600.9
107.5°	230.9	325.2	1082.2	1850.0	1872.7
110°	263.0	348.5	1038.2	1898.5	1995.1



TEST NUMBER: P518892

CATALOG NUMBER: SQ4-BB-150U-050D-935-1D-UNV-STD-W-4

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	291.7	371.7	997.6	1888.8	2051.0
115°	333.8	408.2	938.5	1816.9	2051.0
117.5°	375.1	444.8	899.6	1706.9	1972.3
120°	400.2	468.6	876.5	1628.1	1898.9
122.5°	424.0	491.0	862.5	1543.5	1816.4
125°	457.0	523.7	845.9	1427.5	1677.0
127.5°	487.4	552.9	836.1	1332.8	1552.2
130°	504.2	571.7	831.9	1274.2	1472.5
132.5°	521.7	588.5	827.7	1221.5	1404.0
135°	547.9	612.9	823.2	1152.6	1304.7
137.5°	574.3	635.7	819.3	1096.7	1220.6
140°	592.5	649.7	817.9	1060.8	1171.0
142.5°	610.0	663.8	815.2	1028.3	1124.9
145°	637.1	684.9	811.8	986.6	1061.8
147.5°	661.7	704.1	808.0	948.8	1006.5
150°	679.9	717.5	806.6	928.2	974.4
152.5°	696.7	729.5	805.9	909.2	947.1
155°	719.2	747.4	804.8	885.0	914.1
157.5°	742.6	762.3	805.0	868.2	887.3
160°	755.9	772.1	805.7	857.6	871.3
162.5°	766.4	779.9	806.4	849.1	859.4
165°	783.0	790.7	808.3	839.9	844.2
167.5°	794.4	799.7	808.5	832.0	834.0
170°	801.3	803.9	809.2	828.4	828.4
172.5°	806.9	807.4	809.2	824.2	823.5
175°	812.7	811.8	809.2	819.7	817.9
177.5°	814.6	812.6	809.0	816.0	813.9
180°	811.8	811.8	811.8	811.8	811.8

(END OF REPORT)