

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: P518854

Luminaire Tested: **SQ4-BB-125U-125D-830-1D-UNV-STD-W-8**

Issue Date: 4/29/2021

Test Information

Test Method: LM-79-2019
Report Number: P518854
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-24, 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-125U-125D-830-1D-UNV-STD-W-8
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH BLACK BAFFLE
DOWNLIGHT 1250 LUMENS PER FOOT
UPLIGHT 1250 LUMENS PER FOOT
Light Source: 3000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

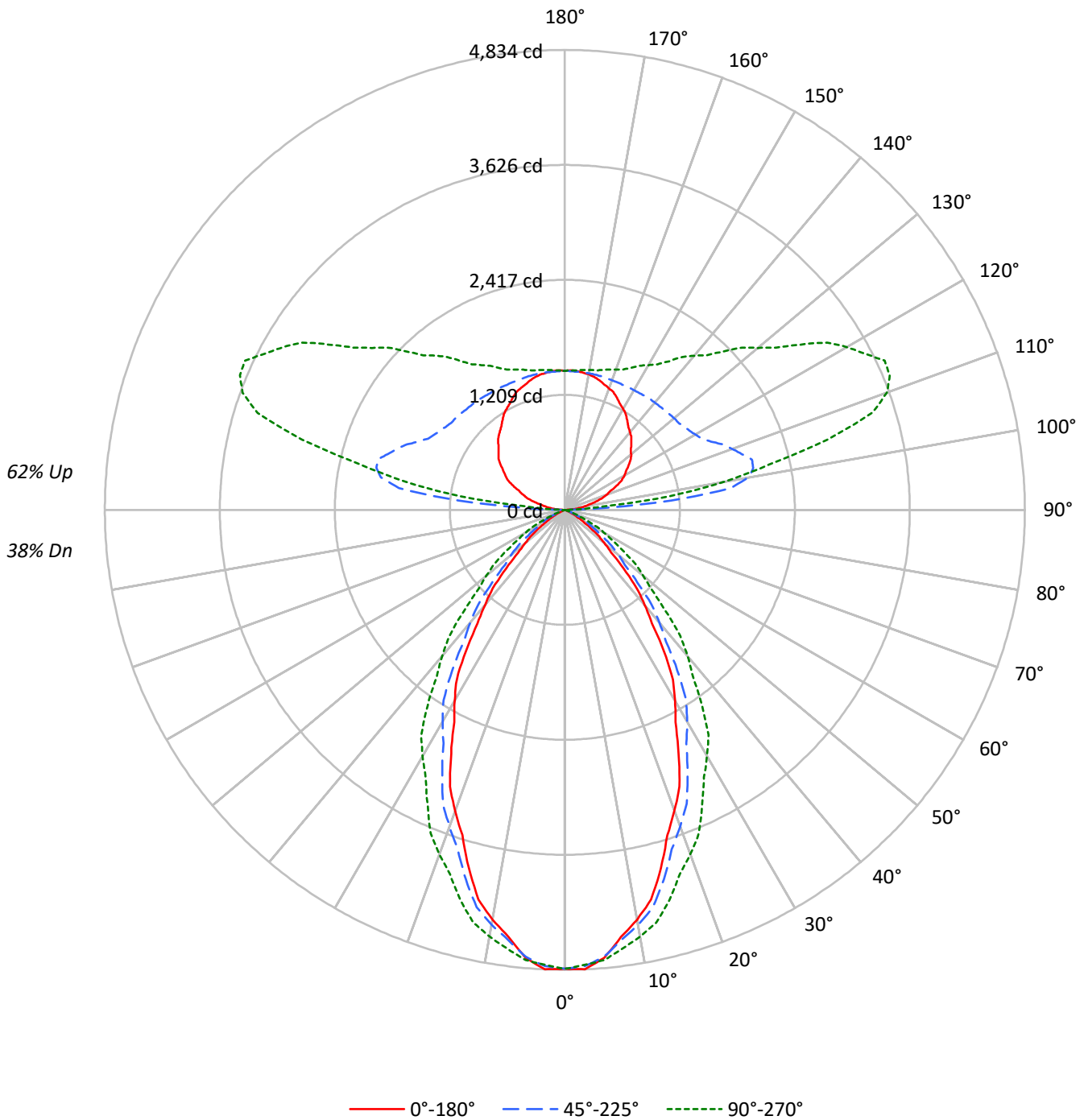
Lumens per Lamp: N/A
Luminaire Lumens: 15194.3 lumens
Efficiency: N/A
Efficacy: 99.5 lumens/watt
Spacing Criteria (0/90/45): 0.85 / 0.97 / 0.97
Luminous Opening: Rectangular (W 0.29' x L: 8' x H: 0')
CIE Type: Semi-Indirect

Input Watts (W): 152.7
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



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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	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	104	104	104	104	95	95	95	95	77	77	77	60	60	60	45	45	45	38
1	96	93	89	86	88	84	82	79	69	67	66	55	54	53	42	41	41	35
2	89	83	77	73	81	75	71	67	62	59	56	50	48	46	39	37	36	31
3	82	74	67	62	75	68	62	58	56	52	49	45	43	41	35	34	33	28
4	76	66	59	54	69	61	55	50	51	47	43	41	38	36	33	31	29	26
5	70	60	53	47	64	55	49	44	46	42	38	38	35	32	30	28	27	23
6	65	54	47	42	59	50	44	39	42	37	34	35	32	29	28	26	24	21
7	60	49	42	37	55	46	39	35	39	34	31	32	29	26	26	24	22	19
8	56	45	38	33	51	42	36	31	36	31	28	30	26	24	24	22	20	18
9	53	41	35	30	48	39	32	28	33	28	25	28	24	22	23	20	19	17
10	49	38	32	27	45	36	30	26	31	26	23	26	22	20	21	19	17	15

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	22249	22249	22249
5°	21890	21836	21998
10°	20482	20756	21334
15°	18620	19211	20281
20°	16529	17388	18911
25°	14394	15534	17375
30°	12329	13684	15921
35°	10223	11616	14165
40°	7854	9288	12070
45°	5678	7033	9711
50°	3868	5241	7703
55°	2515	3791	5986
60°	1442	2669	4327
65°	382	1630	2191
70°	189	503	630
75°	84	41	0
80°	61	0	0
85°	0	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	440.1	2.9
10°-20°	1125.6	7.4
20°-30°	1409.1	9.3
30°-40°	1301.6	8.6
40°-50°	874.6	5.8
50°-60°	451.7	3.0
60°-70°	141.5	0.9
70°-80°	8.9	0.1
80°-90°	3.6	0.0
90°-100°	683.9	4.5
100°-110°	1842.3	12.1
110°-120°	1933.4	12.7
120°-130°	1568.9	10.3
130°-140°	1230.4	8.1
140°-150°	944.7	6.2
150°-160°	679.2	4.5
160°-170°	415.0	2.7
170°-180°	139.9	0.9
0°-30°	2974.8	19.6
0°-40°	4276.4	28.1
0°-60°	5602.7	36.9
0°-90°	5756.7	37.9
90°-120°	4459.5	29.4
90°-150°	8203.5	54.0
90°-180°	9438.0	62.1
0°-180°	15194.3	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	4823	4823	4823	4823	4823	
5°	4727	4679	4716	4732	4750	438
15°	3899	3885	4022	4158	4246	1086
25°	2828	2851	3052	3261	3414	1296
35°	1815	1861	2063	2305	2515	1125
45°	870	923	1078	1288	1489	684
55°	313	365	471	605	744	292
65°	35	67	149	180	201	59
75°	5	5	2	0	0	7
85°	0	0	0	0	0	1
90°	4	11	22	24	24	7
95°	104	372	1121	573	397	109
105°	341	530	2037	3048	2861	358
115°	602	736	1697	3278	3708	592
125°	821	943	1523	2575	3030	733
135°	989	1104	1481	2077	2352	763
145°	1144	1233	1462	1776	1907	717
155°	1298	1345	1449	1594	1644	598
165°	1408	1424	1454	1512	1520	397
175°	1464	1462	1456	1477	1473	139
180°	1462	1462	1462	1462	1462	

TEST NUMBER: P518854

CATALOG NUMBER: SQ4-BB-125U-125D-830-1D-UNV-STD-W-8

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	4822.9	4822.9	4822.9	4822.9	4822.9
2.5°	4834.1	4788.4	4800.5	4800.2	4787.4
5°	4727.2	4679.3	4715.5	4732.3	4750.5
7.5°	4527.5	4490.0	4559.7	4611.9	4649.7
10°	4372.5	4340.6	4430.9	4502.1	4554.5
12.5°	4193.3	4168.7	4277.8	4375.5	4442.5
15°	3898.9	3885.2	4022.5	4157.6	4246.5
17.5°	3583.4	3583.0	3739.8	3907.4	4014.6
20°	3366.9	3373.7	3541.9	3726.7	3852.2
22.5°	3150.4	3166.3	3345.9	3538.6	3682.4
25°	2827.9	2850.7	3051.9	3260.7	3413.6
27.5°	2518.1	2551.4	2763.0	2980.1	3166.2
30°	2314.6	2353.4	2568.9	2797.3	2988.9
32.5°	2114.9	2161.0	2371.1	2612.6	2807.8
35°	1815.3	1860.9	2062.6	2305.4	2515.3
37.5°	1505.9	1550.6	1747.6	1986.6	2213.3
40°	1304.3	1354.5	1542.3	1773.9	2004.3
42.5°	1121.4	1171.6	1348.2	1575.7	1793.3
45°	870.3	922.8	1078.0	1287.9	1488.6
47.5°	662.2	719.2	855.4	1045.3	1228.2
50°	539.0	596.0	730.3	897.6	1073.3
52.5°	440.1	495.3	616.4	774.1	935.2
55°	312.7	365.1	471.3	605.1	744.3
57.5°	216.1	261.2	356.5	468.2	577.2
60°	156.3	199.7	289.3	380.0	469.0
62.5°	104.1	143.8	231.5	300.9	360.7
65°	35.0	66.9	149.3	180.1	200.7
67.5°	17.7	21.4	78.4	82.8	89.6
70°	14.0	14.0	37.3	39.8	46.7
72.5°	10.3	10.3	14.9	19.2	20.5
75°	4.7	4.7	2.3	0.0	0.0
77.5°	2.3	2.3	1.9	0.0	0.0
80°	2.3	2.3	0.0	0.0	0.0
82.5°	0.5	0.5	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.7	2.2	4.5	4.8	4.8
90°	3.7	11.0	22.3	24.2	24.2
92.5°	45.4	160.5	317.3	152.8	106.2
95°	104.3	372.0	1121.1	573.3	396.7
97.5°	166.5	425.8	1758.4	1469.0	1107.7
100°	214.2	447.3	1961.0	2051.8	1702.2
102.5°	260.4	477.4	2028.1	2488.3	2201.3
105°	340.8	530.2	2037.4	3048.1	2860.6
107.5°	416.8	585.8	1950.6	3335.8	3384.2
110°	467.4	627.7	1871.6	3425.1	3601.8



TEST NUMBER: P518854

CATALOG NUMBER: SQ4-BB-125U-125D-830-1D-UNV-STD-W-8

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	521.1	669.7	1795.7	3405.4	3695.6
115°	601.5	736.3	1696.6	3278.2	3707.9
117.5°	674.9	801.3	1619.9	3075.2	3553.7
120°	722.6	844.6	1581.1	2929.5	3421.1
122.5°	764.3	884.9	1552.8	2780.4	3270.6
125°	821.3	943.3	1523.4	2574.8	3030.0
127.5°	876.0	996.2	1504.8	2393.4	2799.8
130°	908.8	1029.0	1497.3	2289.5	2646.4
132.5°	941.6	1060.3	1489.9	2197.9	2525.7
135°	988.9	1103.6	1480.6	2077.2	2352.1
137.5°	1034.0	1144.0	1475.7	1974.7	2200.5
140°	1065.3	1170.9	1471.2	1911.7	2115.6
142.5°	1098.0	1196.4	1468.3	1852.8	2024.7
145°	1143.5	1232.7	1461.9	1775.9	1907.0
147.5°	1192.6	1270.2	1455.6	1711.2	1814.3
150°	1225.4	1292.8	1452.6	1670.6	1756.2
152.5°	1255.2	1313.9	1451.1	1637.5	1707.0
155°	1298.0	1345.4	1448.9	1593.5	1644.4
157.5°	1335.7	1372.5	1449.3	1562.5	1596.8
160°	1359.5	1390.5	1450.8	1544.5	1570.0
162.5°	1380.4	1405.5	1452.3	1529.4	1547.6
165°	1407.9	1424.3	1454.5	1512.4	1519.7
167.5°	1430.3	1439.7	1456.3	1499.2	1502.2
170°	1445.2	1448.8	1456.3	1491.7	1491.7
172.5°	1454.1	1454.8	1457.8	1484.3	1484.3
175°	1463.8	1462.0	1456.3	1476.8	1473.1
177.5°	1467.9	1465.0	1457.5	1469.3	1466.4
180°	1461.9	1461.9	1461.9	1461.9	1461.9

(END OF REPORT)