

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: P518893

Luminaire Tested: **SQ4-BB-150U-050D-935-1D-UNV-STD-W-6**

Issue Date: 4/29/2021

Test Information

Test Method: LM-79-2019
Report Number: P518893
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-6
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

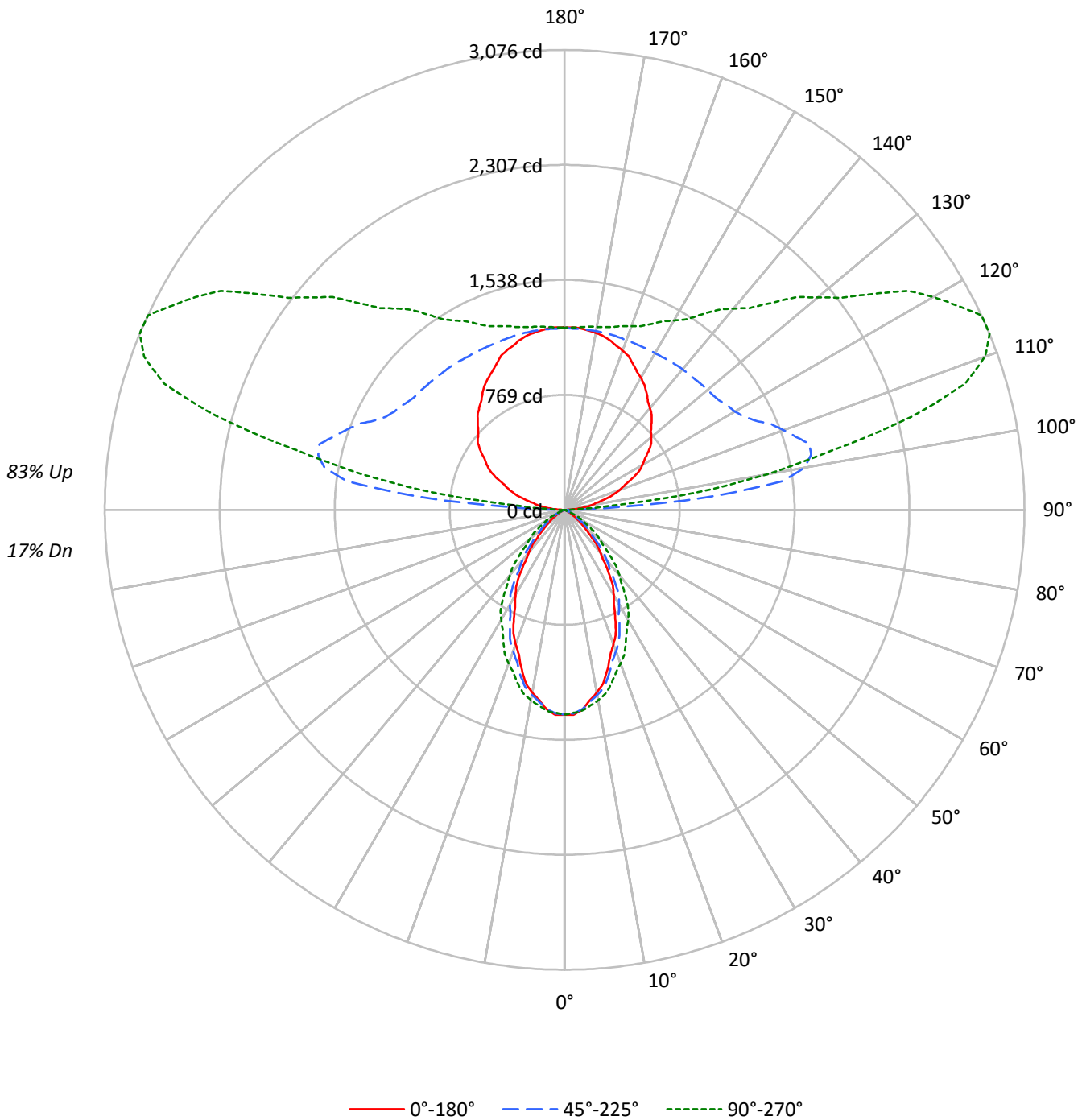
Lumens per Lamp: N/A
Luminaire Lumens: 9487.4 lumens
Efficiency: N/A
Efficacy: 112.8 lumens/watt
Spacing Criteria (0/90/45): 0.85 / 0.97 / 0.97
Luminous Opening: Rectangular (W 0.29' x L: 6' x H: 0')
CIE Type: Semi-Indirect

Input Watts (W): 84.1
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									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	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	8267	8329
10°	7755	7858	8078
15°	7050	7273	7678
20°	6258	6583	7160
25°	5450	5881	6578
30°	4668	5181	6028
35°	3871	4398	5363
40°	2974	3516	4569
45°	2149	2663	3677
50°	1464	1985	2917
55°	952	1435	2266
60°	546	1011	1639
65°	144	617	830
70°	72	191	239
75°	31	17	0
80°	25	0	0
85°	0	0	0



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	125.0	1.3
10°-20°	319.6	3.4
20°-30°	400.1	4.2
30°-40°	369.6	3.9
40°-50°	248.3	2.6
50°-60°	128.3	1.4
60°-70°	40.2	0.4
70°-80°	2.5	0.0
80°-90°	2.6	0.0
90°-100°	565.9	6.0
100°-110°	1530.2	16.1
110°-120°	1608.7	17.0
120°-130°	1306.7	13.8
130°-140°	1025.0	10.8
140°-150°	786.7	8.3
150°-160°	565.8	6.0
160°-170°	345.6	3.6
170°-180°	116.5	1.2
0°-30°	844.7	8.9
0°-40°	1214.3	12.8
0°-60°	1590.9	16.8
0°-90°	1636.2	17.2
90°-120°	3704.8	39.0
90°-150°	6823.3	71.9
90°-180°	7851.0	82.8
0°-180°	9487.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1370	1370	1370	1370	1370	
5°	1342	1329	1339	1344	1349	124
15°	1107	1103	1142	1181	1206	308
25°	803	810	867	926	969	368
35°	516	528	586	655	714	319
45°	247	262	306	366	423	194
55°	89	104	134	172	211	83
65°	10	19	42	51	57	17
75°	1	1	1	0	0	2
85°	0	0	0	0	0	0
90°	3	8	17	18	17	6
95°	88	308	941	487	290	92
105°	284	440	1698	2504	2401	300
115°	501	612	1408	2725	3076	494
125°	686	786	1269	2141	2515	611
135°	822	919	1235	1729	1957	635
145°	956	1027	1218	1480	1593	598
155°	1079	1121	1207	1328	1371	498
165°	1174	1186	1212	1260	1266	331
175°	1219	1218	1214	1230	1227	116
180°	1218	1218	1218	1218	1218	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1369.5	1369.5	1369.5	1369.5	1369.5
2.5°	1372.6	1359.7	1363.1	1363.0	1359.4
5°	1342.3	1328.7	1339.0	1343.7	1348.9
7.5°	1285.6	1275.0	1294.7	1309.6	1320.3
10°	1241.6	1232.5	1258.2	1278.4	1293.3
12.5°	1190.7	1183.7	1214.7	1242.4	1261.5
15°	1107.1	1103.2	1142.2	1180.6	1205.8
17.5°	1017.5	1017.4	1061.9	1109.5	1140.0
20°	956.0	958.0	1005.7	1058.2	1093.9
22.5°	894.6	899.1	950.1	1004.8	1045.6
25°	803.0	809.5	866.6	925.9	969.3
27.5°	715.0	724.5	784.6	846.2	899.1
30°	657.2	668.3	729.5	794.3	848.7
32.5°	600.5	613.6	673.3	741.8	797.3
35°	515.5	528.4	585.7	654.6	714.2
37.5°	427.6	440.3	496.2	564.1	628.5
40°	370.4	384.6	437.9	503.7	569.1
42.5°	318.4	332.7	382.8	447.4	509.2
45°	247.1	262.0	306.1	365.7	422.7
47.5°	188.0	204.2	242.9	296.8	348.8
50°	153.0	169.2	207.4	254.9	304.8
52.5°	125.0	140.6	175.0	219.8	265.5
55°	88.8	103.7	133.8	171.8	211.3
57.5°	61.4	74.2	101.2	132.9	163.9
60°	44.4	56.7	82.2	107.9	133.2
62.5°	29.5	40.8	65.7	85.5	102.4
65°	9.9	19.0	42.4	51.1	57.0
67.5°	5.0	6.1	22.3	23.5	25.4
70°	4.0	4.0	10.6	11.3	13.3
72.5°	2.9	2.9	4.2	5.4	5.8
75°	1.3	1.3	0.7	0.0	0.0
77.5°	0.7	0.7	0.5	0.0	0.0
80°	0.7	0.7	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°	0.5	1.5	3.4	3.7	3.4
90°	2.6	7.7	17.0	18.3	17.0
92.5°	37.2	135.7	267.7	116.2	84.2
95°	87.8	308.3	941.2	487.1	289.7
97.5°	141.0	353.5	1467.1	1214.1	891.6
100°	180.9	371.9	1630.7	1700.6	1375.0
102.5°	217.6	397.3	1688.3	2069.5	1826.0
105°	284.4	439.5	1697.5	2503.9	2401.4
107.5°	346.3	487.8	1623.3	2775.0	2809.1
110°	394.6	522.7	1557.2	2847.8	2992.6



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	437.5	557.5	1496.4	2833.2	3076.5
115°	500.7	612.2	1407.8	2725.3	3076.5
117.5°	562.6	667.2	1349.4	2560.4	2958.5
120°	600.4	702.9	1314.7	2442.1	2848.4
122.5°	636.0	736.5	1293.8	2315.3	2724.7
125°	685.6	785.5	1268.9	2141.2	2515.4
127.5°	731.2	829.3	1254.2	1999.1	2328.3
130°	756.3	857.6	1247.9	1911.4	2208.7
132.5°	782.6	882.8	1241.6	1832.2	2106.0
135°	821.9	919.3	1234.8	1728.9	1957.0
137.5°	861.5	953.5	1229.0	1645.1	1830.9
140°	888.7	974.6	1226.9	1591.2	1756.5
142.5°	914.9	995.7	1222.7	1542.4	1687.3
145°	955.6	1027.4	1217.7	1479.8	1592.6
147.5°	992.5	1056.1	1212.0	1423.2	1509.8
150°	1019.8	1076.2	1209.9	1392.3	1461.6
152.5°	1045.0	1094.2	1208.8	1363.8	1420.7
155°	1078.8	1121.1	1207.3	1327.5	1371.1
157.5°	1113.9	1143.4	1207.5	1302.3	1331.0
160°	1133.9	1158.2	1208.6	1286.4	1306.9
162.5°	1149.6	1169.8	1209.6	1273.7	1289.1
165°	1174.5	1186.0	1212.5	1259.8	1266.2
167.5°	1191.5	1199.5	1212.8	1248.0	1251.0
170°	1202.0	1205.9	1213.8	1242.7	1242.7
172.5°	1210.4	1211.2	1213.8	1236.3	1235.3
175°	1219.1	1217.8	1213.8	1229.5	1226.9
177.5°	1221.9	1218.9	1213.6	1224.0	1220.9
180°	1217.7	1217.7	1217.7	1217.7	1217.7

(END OF REPORT)