

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: P518521

Luminaire Tested: **SQ4-BB-075U-075D-835-1D-UNV-STD-W-6**

Issue Date: 4/29/2021

**Test Information**

Test Method: LM-79-2019  
Report Number: P518521  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-22, 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-075U-075D-835-1D-UNV-STD-W-6  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH BLACK BAFFLE  
DOWNLIGHT 750 LUMENS PER FOOT  
UPLIGHT 750 LUMENS PER FOOT  
Light Source: 3500K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

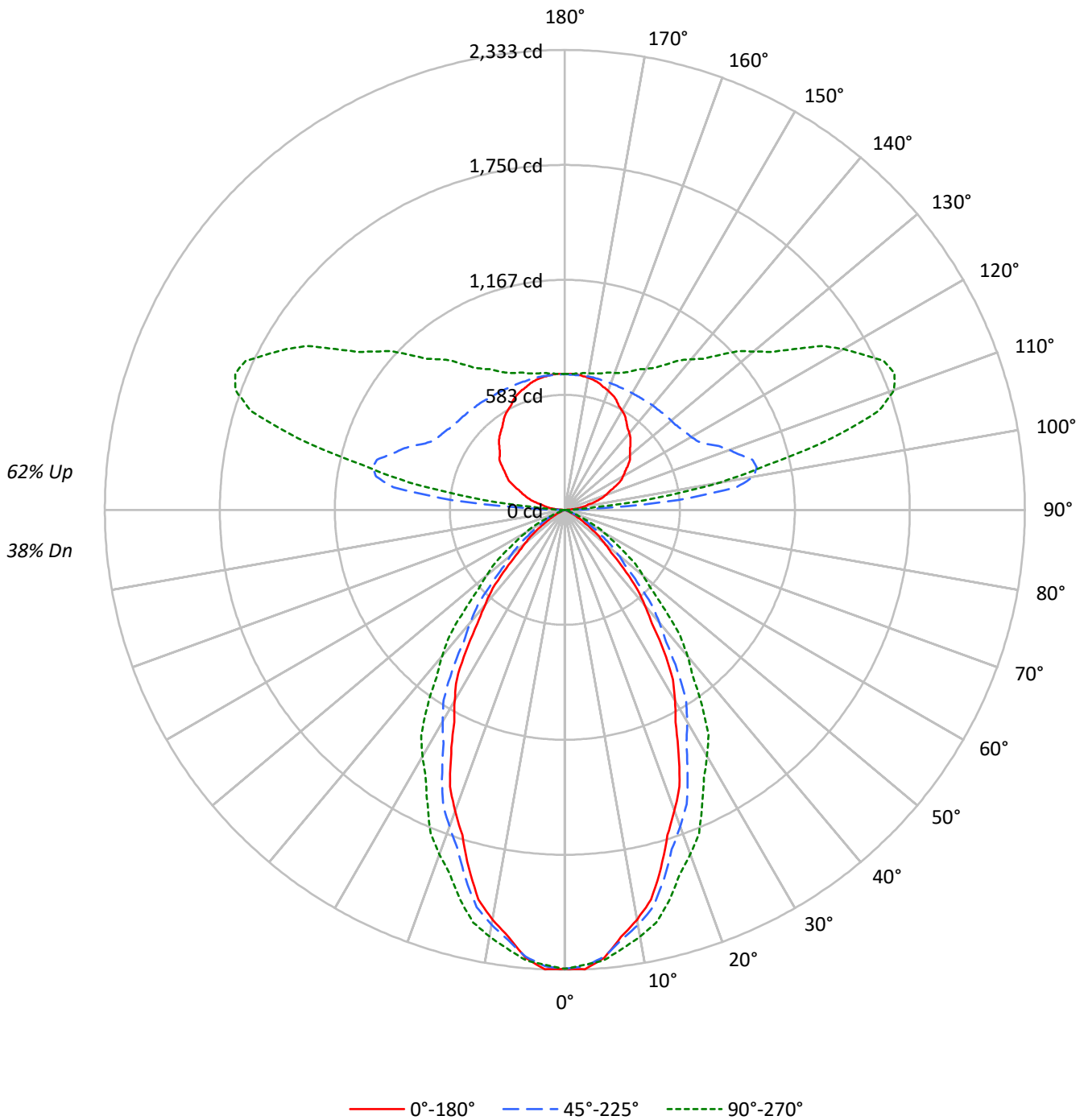
Lumens per Lamp: N/A  
Luminaire Lumens: 7269.2 lumens  
Efficiency: N/A  
Efficacy: 106.9 lumens/watt  
Spacing Criteria (0/90/45): 0.85 / 0.97 / 0.97  
Luminous Opening: Rectangular (W 0.29' x L: 6' x H: 0')  
CIE Type: Semi-Indirect

Input Watts (W): 68  
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	85	82	79	69	67	66	55	54	53	42	41	41	35
2	89	83	77	73	81	76	71	67	62	59	57	50	48	46	39	38	37	32
3	82	74	68	62	75	68	62	58	56	52	49	46	43	41	36	34	33	28
4	76	66	59	54	69	61	55	50	51	47	43	42	39	36	33	31	30	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	38	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	20
8	56	45	38	33	52	42	36	31	36	31	28	30	26	24	24	22	20	18
9	53	42	35	30	48	39	33	28	33	28	25	28	24	22	23	20	19	17
10	49	38	32	27	45	36	30	26	31	26	23	26	23	20	21	19	17	15

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	14317	14317	14317
5°	14087	14052	14156
10°	13181	13356	13729
15°	11983	12362	13051
20°	10637	11190	12169
25°	9263	9997	11181
30°	7934	8806	10246
35°	6578	7475	9116
40°	5054	5977	7767
45°	3653	4526	6250
50°	2489	3373	4957
55°	1618	2440	3852
60°	929	1717	2785
65°	246	1049	1409
70°	122	324	405
75°	55	26	0
80°	39	0	0
85°	0	0	0



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	212.4	2.9
10°-20°	543.3	7.5
20°-30°	680.1	9.4
30°-40°	628.2	8.6
40°-50°	422.1	5.8
50°-60°	218.0	3.0
60°-70°	68.3	0.9
70°-80°	4.3	0.1
80°-90°	1.8	0.0
90°-100°	325.1	4.5
100°-110°	894.5	12.3
110°-120°	923.3	12.7
120°-130°	739.7	10.2
130°-140°	581.0	8.0
140°-150°	445.2	6.1
150°-160°	320.1	4.4
160°-170°	195.7	2.7
170°-180°	66.0	0.9
0°-30°	1435.8	19.8
0°-40°	2064.0	28.4
0°-60°	2704.1	37.2
0°-90°	2778.5	38.2
90°-120°	2142.9	29.5
90°-150°	3908.8	53.8
90°-180°	4491.0	61.8
0°-180°	7269.2	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	2328	2328	2328	2328	2328	
5°	2282	2258	2276	2284	2293	212
15°	1882	1875	1941	2007	2050	524
25°	1365	1376	1473	1574	1648	626
35°	876	898	996	1113	1214	543
45°	420	445	520	622	718	330
55°	151	176	228	292	359	141
65°	17	32	72	87	97	29
75°	2	2	1	0	0	3
85°	0	0	0	0	0	0
90°	2	6	10	13	13	3
95°	48	178	575	246	157	51
105°	160	246	986	1501	1401	169
115°	283	345	790	1574	1786	279
125°	390	445	717	1213	1421	348
135°	471	522	697	981	1110	363
145°	544	581	686	836	900	341
155°	616	636	682	751	773	283
165°	666	674	685	713	717	188
175°	689	691	686	695	694	65
180°	689	689	689	689	689	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	2327.7	2327.7	2327.7	2327.7	2327.7
2.5°	2333.1	2311.1	2316.9	2316.8	2310.6
5°	2281.5	2258.4	2275.9	2284.0	2292.8
7.5°	2185.1	2167.1	2200.7	2225.9	2244.1
10°	2110.4	2094.9	2138.5	2172.9	2198.2
12.5°	2023.9	2012.0	2064.6	2111.8	2144.1
15°	1881.8	1875.2	1941.4	2006.6	2049.6
17.5°	1729.5	1729.3	1805.0	1885.9	1937.6
20°	1625.0	1628.3	1709.5	1798.7	1859.2
22.5°	1520.5	1528.2	1614.9	1707.9	1777.3
25°	1364.9	1375.9	1473.0	1573.8	1647.5
27.5°	1215.3	1231.4	1333.6	1438.3	1528.2
30°	1117.1	1135.8	1239.9	1350.1	1442.6
32.5°	1020.7	1043.0	1144.4	1260.9	1355.2
35°	876.1	898.1	995.5	1112.7	1214.0
37.5°	726.8	748.4	843.5	958.8	1068.2
40°	629.5	653.7	744.4	856.1	967.3
42.5°	541.2	565.4	650.7	760.5	865.5
45°	420.0	445.4	520.3	621.6	718.5
47.5°	319.6	347.1	412.8	504.5	592.8
50°	260.1	287.7	352.5	433.2	518.0
52.5°	212.4	239.0	297.5	373.6	451.4
55°	150.9	176.2	227.5	292.1	359.2
57.5°	104.3	126.1	172.1	226.0	278.6
60°	75.5	96.4	139.6	183.4	226.4
62.5°	50.2	69.4	111.7	145.3	174.1
65°	16.9	32.3	72.1	86.9	96.8
67.5°	8.6	10.3	37.8	39.9	43.2
70°	6.8	6.8	18.0	19.2	22.5
72.5°	5.0	5.0	7.2	9.2	9.9
75°	2.3	2.3	1.1	0.0	0.0
77.5°	1.1	1.1	0.9	0.0	0.0
80°	1.1	1.1	0.0	0.0	0.0
82.5°	0.2	0.2	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.3	1.2	2.1	2.6	2.6
90°	1.5	5.8	10.3	13.2	13.2
92.5°	20.2	86.5	149.9	57.6	47.2
95°	48.4	177.5	574.9	245.8	156.9
97.5°	78.9	196.8	877.3	676.0	477.0
100°	101.2	208.8	972.4	981.5	800.8
102.5°	122.3	223.0	997.0	1217.7	1051.9
105°	159.9	245.9	985.6	1501.0	1400.6
107.5°	195.7	274.2	929.6	1639.8	1669.6
110°	221.5	293.2	887.3	1674.3	1777.6

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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	244.9	314.3	845.1	1652.1	1809.3
115°	283.1	344.7	790.5	1574.1	1786.4
117.5°	319.4	376.2	755.9	1464.8	1704.8
120°	341.7	396.2	740.7	1382.8	1630.9
122.5°	361.7	416.2	730.1	1311.0	1546.4
125°	390.1	444.6	717.2	1213.2	1421.2
127.5°	417.1	469.0	708.7	1131.7	1314.1
130°	431.2	484.3	704.0	1083.2	1249.6
132.5°	447.6	500.7	700.5	1040.6	1190.9
135°	470.8	522.4	696.7	981.2	1110.3
137.5°	492.5	540.4	693.4	933.2	1039.6
140°	508.9	553.4	692.3	901.2	997.3
142.5°	523.0	564.0	689.9	872.8	955.1
145°	544.1	581.4	686.4	836.0	900.5
147.5°	566.7	598.8	684.6	803.4	855.1
150°	580.8	609.5	683.5	785.6	825.7
152.5°	593.7	620.1	682.3	770.2	803.4
155°	616.0	636.1	682.0	751.4	772.9
157.5°	632.1	648.5	682.0	736.0	750.9
160°	643.9	656.8	682.0	727.7	739.2
162.5°	653.2	663.9	683.2	720.6	729.8
165°	665.9	674.5	684.9	712.9	717.2
167.5°	674.7	681.3	686.4	706.4	707.5
170°	680.5	684.8	686.4	704.0	704.0
172.5°	685.2	687.2	686.4	700.4	699.3
175°	689.3	690.8	686.4	695.2	693.7
177.5°	690.5	690.5	685.8	692.8	690.5
180°	689.3	689.3	689.3	689.3	689.3

(END OF REPORT)