

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: P565169

Luminaire Tested: **SQ4-PW1-150U-125D-830-1D-UNV-STD-W-12**

Issue Date: 7/30/2021

**Test Information**

Test Method: LM-79-2019  
Report Number: P565169  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-25, G2-2106-289-3)  
Test Lab: INNOVATION CENTER  
Issue Date: 7/30/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: SQ4-PW1-150U-125D-830-1D-UNV-STD-W-12  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE WAVES CONTINUOUS LENS.  
DOWNLIGHT 1250 LUMENS PER FOOT  
UPLIGHT 1500 LUMENS PER FOOT  
Light Source: 3000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

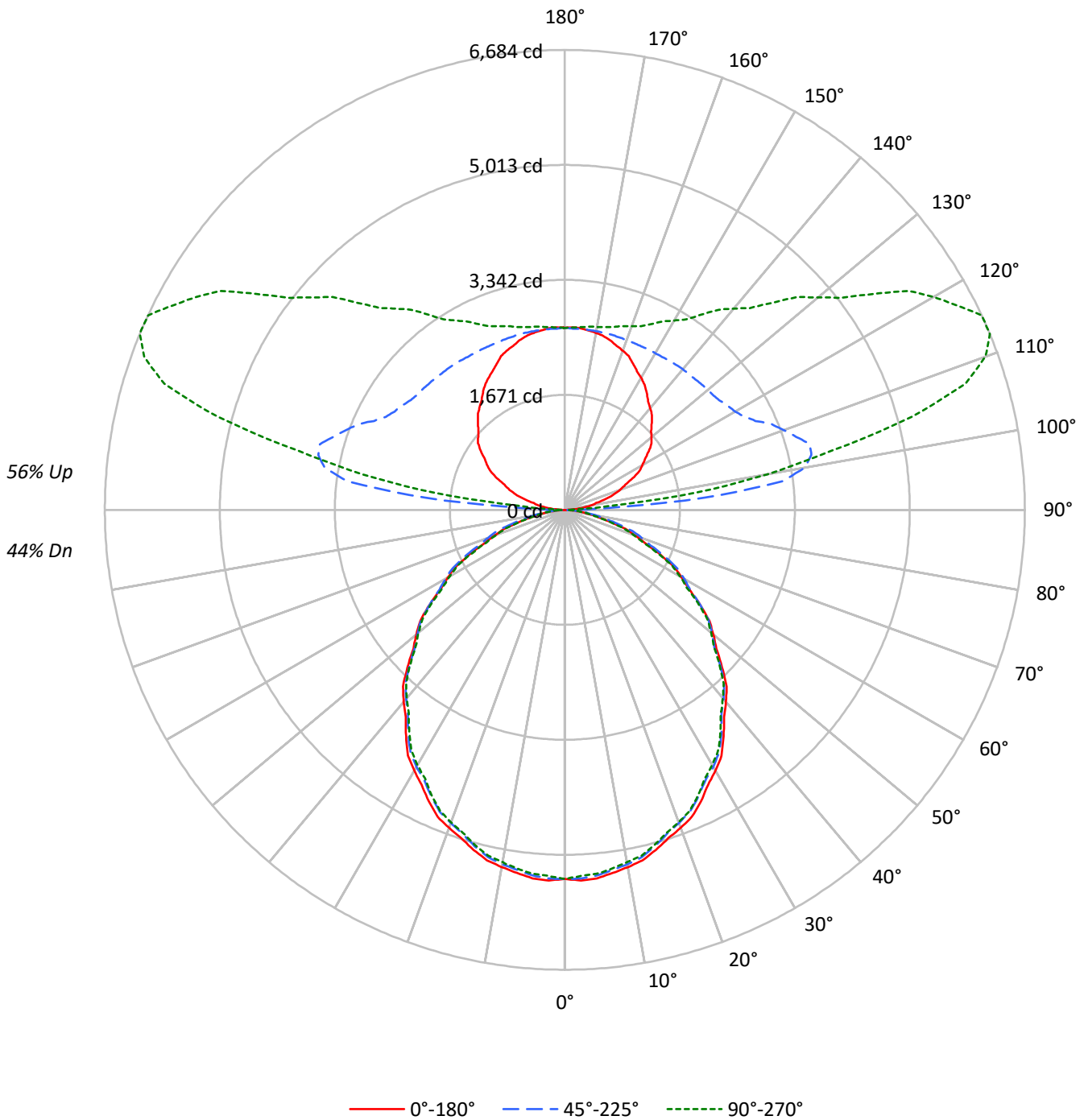
Lumens per Lamp: N/A  
Luminaire Lumens: 30707.6 lumens  
Efficiency: N/A  
Efficacy: 119.8 lumens/watt  
Spacing Criteria (0/90/45): 1.22 / 1.19 / 1.31  
Luminous Opening: Rectangular (W 0.29' x L: 12' x H: 0')  
CIE Type: General Diffuse

Input Watts (W): 256.3  
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	106	106	106	106	97	97	97	97	80	80	80	65	65	65	51	51	51	44
1	97	92	89	85	88	85	82	79	70	68	66	57	56	54	45	44	43	38
2	88	81	75	70	80	74	69	65	62	58	55	50	48	45	40	38	37	32
3	80	71	64	58	73	65	59	54	55	50	46	45	41	38	35	33	31	27
4	73	63	55	49	67	58	51	46	48	43	39	40	36	33	32	29	27	23
5	67	56	48	42	62	52	45	39	43	38	34	36	32	29	29	26	23	20
6	62	50	42	36	57	46	39	34	39	34	30	32	28	25	26	23	21	18
7	57	45	37	32	52	42	35	30	35	30	26	29	25	22	24	21	18	16
8	53	41	33	28	49	38	31	26	32	27	23	27	23	20	22	19	16	14
9	50	37	30	25	45	35	28	24	30	24	21	25	21	18	20	17	15	13
10	46	34	27	22	42	32	25	21	27	22	19	23	19	16	19	16	13	11

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

	0°	45°	90°
0°	16492	16492	16492
5°	16599	16468	16395
10°	16467	16334	16245
15°	16292	16111	16051
20°	16097	15850	15819
25°	15873	15584	15536
30°	15537	15302	15201
35°	15096	14883	14794
40°	14625	14397	14340
45°	14056	13871	13809
50°	13473	13360	13270
55°	12844	12844	12642
60°	12060	12293	11858
65°	11037	11587	10762
70°	9729	10663	9474
75°	8309	9544	8085
80°	6443	8033	6526
85°	4167	6168	5501



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	505.0	1.6
10°-20°	1425.7	4.6
20°-30°	2114.8	6.9
30°-40°	2474.5	8.1
40°-50°	2463.5	8.0
50°-60°	2127.3	6.9
60°-70°	1531.3	5.0
70°-80°	803.0	2.6
80°-90°	204.6	0.7
90°-100°	1229.6	4.0
100°-110°	3324.5	10.8
110°-120°	3495.2	11.4
120°-130°	2839.1	9.2
130°-140°	2227.0	7.3
140°-150°	1709.2	5.6
150°-160°	1229.3	4.0
160°-170°	750.9	2.4
170°-180°	253.2	0.8
0°-30°	4045.5	13.2
0°-40°	6520.0	21.2
0°-60°	11110.8	36.2
0°-90°	13649.7	44.5
90°-120°	8049.2	26.2
90°-150°	14824.5	48.3
90°-180°	17058.0	55.5
0°-180°	30707.6	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	5363	5363	5363	5363	5363	
5°	5377	5317	5334	5320	5311	509
15°	5117	5052	5060	5051	5041	1442
25°	4678	4599	4593	4564	4578	2151
35°	4021	3965	3964	3927	3940	2514
45°	3232	3204	3189	3180	3175	2494
55°	2396	2391	2396	2362	2358	2137
65°	1517	1563	1592	1530	1479	1503
75°	699	764	803	750	680	750
85°	118	155	175	165	156	156
90°	6	17	37	40	37	17
95°	191	670	2045	1058	629	200
105°	618	955	3688	5440	5217	651
115°	1088	1330	3059	5921	6684	1074
125°	1490	1707	2757	4652	5465	1328
135°	1786	1997	2683	3756	4252	1380
145°	2076	2232	2646	3215	3460	1299
155°	2344	2436	2623	2884	2979	1081
165°	2552	2577	2634	2737	2751	719
175°	2649	2646	2637	2671	2666	251
180°	2646	2646	2646	2646	2646	

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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	5362.7	5362.7	5362.7	5362.7	5362.7
2.5°	5393.0	5348.6	5362.7	5350.8	5324.9
5°	5376.9	5316.9	5334.4	5320.0	5310.8
7.5°	5322.1	5266.7	5279.6	5264.3	5258.8
10°	5273.0	5217.5	5230.4	5211.3	5202.1
12.5°	5216.3	5157.1	5170.0	5150.9	5145.4
15°	5117.0	5052.4	5060.3	5050.7	5041.4
17.5°	5001.8	4936.2	4937.5	4922.3	4920.5
20°	4918.6	4849.3	4843.0	4824.3	4833.6
22.5°	4827.9	4754.9	4748.5	4722.3	4735.3
25°	4677.6	4599.1	4592.6	4564.5	4578.4
27.5°	4503.8	4426.1	4426.3	4386.9	4401.7
30°	4375.2	4301.3	4309.1	4262.3	4280.7
32.5°	4239.2	4172.6	4176.8	4130.0	4148.4
35°	4020.9	3965.4	3964.2	3926.7	3940.5
37.5°	3797.9	3748.9	3741.2	3719.5	3723.2
40°	3642.9	3601.3	3586.2	3572.0	3572.0
42.5°	3480.3	3442.5	3427.4	3416.9	3413.3
45°	3231.8	3204.1	3189.3	3179.7	3175.1
47.5°	2986.1	2960.3	2947.4	2940.7	2936.0
50°	2816.0	2797.5	2792.4	2778.1	2773.5
52.5°	2645.9	2634.8	2629.9	2611.8	2607.2
55°	2395.5	2390.9	2395.5	2362.3	2357.7
57.5°	2134.7	2142.1	2157.4	2112.7	2101.6
60°	1960.8	1979.3	1998.6	1946.2	1927.8
62.5°	1783.2	1812.7	1839.9	1779.7	1753.9
65°	1516.7	1562.9	1592.3	1529.7	1478.9
67.5°	1259.7	1316.9	1352.3	1284.8	1227.5
70°	1082.0	1146.7	1185.9	1118.3	1053.6
72.5°	927.0	999.1	1031.0	967.1	902.5
75°	699.3	764.0	803.2	749.7	680.4
77.5°	496.1	557.1	589.7	543.0	485.7
80°	363.8	428.5	453.6	414.7	368.5
82.5°	258.0	311.6	328.9	305.5	274.0
85°	118.1	155.1	174.8	165.2	155.9
87.5°	31.4	59.5	79.2	79.9	83.0
90°	5.7	16.8	37.0	39.8	37.0
92.5°	80.9	294.7	581.5	252.5	182.8
95°	190.8	669.8	2044.8	1058.2	629.4
97.5°	306.4	768.1	3187.4	2637.8	1937.2
100°	393.0	807.9	3542.8	3694.8	2987.5
102.5°	472.8	863.2	3668.1	4496.2	3967.1
105°	618.0	954.9	3688.0	5440.1	5217.4
107.5°	752.4	1059.8	3526.9	6029.0	6103.1
110°	857.2	1135.7	3383.3	6187.1	6501.8

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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	950.6	1211.3	3251.2	6155.5	6684.1
115°	1087.9	1330.2	3058.7	5921.1	6684.1
117.5°	1222.3	1449.6	2931.6	5562.8	6427.7
120°	1304.3	1527.1	2856.5	5305.8	6188.5
122.5°	1381.8	1600.1	2810.9	5030.3	5919.7
125°	1489.5	1706.7	2756.8	4652.0	5465.1
127.5°	1588.6	1801.9	2724.9	4343.4	5058.5
130°	1643.2	1863.2	2711.2	4152.7	4798.7
132.5°	1700.2	1918.0	2697.5	3980.7	4575.5
135°	1785.6	1997.3	2682.7	3756.3	4251.9
137.5°	1871.6	2071.6	2670.2	3574.2	3978.0
140°	1930.9	2117.5	2665.6	3457.0	3816.2
142.5°	1987.8	2163.3	2656.5	3351.2	3665.8
145°	2076.1	2232.1	2645.7	3215.2	3460.2
147.5°	2156.4	2294.6	2633.2	3092.0	3280.2
150°	2215.7	2338.2	2628.6	3025.1	3175.4
152.5°	2270.4	2377.3	2626.3	2962.9	3086.6
155°	2343.8	2435.7	2622.9	2884.2	2978.9
157.5°	2420.2	2484.2	2623.5	2829.4	2891.8
160°	2463.4	2516.4	2625.8	2794.8	2839.4
162.5°	2497.6	2541.6	2628.1	2767.2	2800.6
165°	2551.7	2576.8	2634.3	2737.2	2751.1
167.5°	2588.8	2606.0	2634.9	2711.4	2718.0
170°	2611.5	2619.9	2637.2	2699.8	2699.8
172.5°	2629.8	2631.4	2637.2	2686.1	2683.9
175°	2648.6	2645.8	2637.2	2671.2	2665.6
177.5°	2654.8	2648.1	2636.6	2659.2	2652.5
180°	2645.7	2645.7	2645.7	2645.7	2645.7

(END OF REPORT)