

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: P565053

Luminaire Tested: **SQ4-PW1-125U-100D-835-1D-UNV-STD-W-12**

Issue Date: 7/30/2021

Test Information

Test Method: LM-79-2019
Report Number: P565053
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-24, 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-PW1-125U-100D-835-1D-UNV-STD-W-12
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE WAVES CONTINUOUS LENS.
DOWNLIGHT 1000 LUMENS PER FOOT
UPLIGHT 1250 LUMENS PER FOOT
Light Source: 3500K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 26330.8 lumens
Efficiency: N/A
Efficacy: 130.9 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

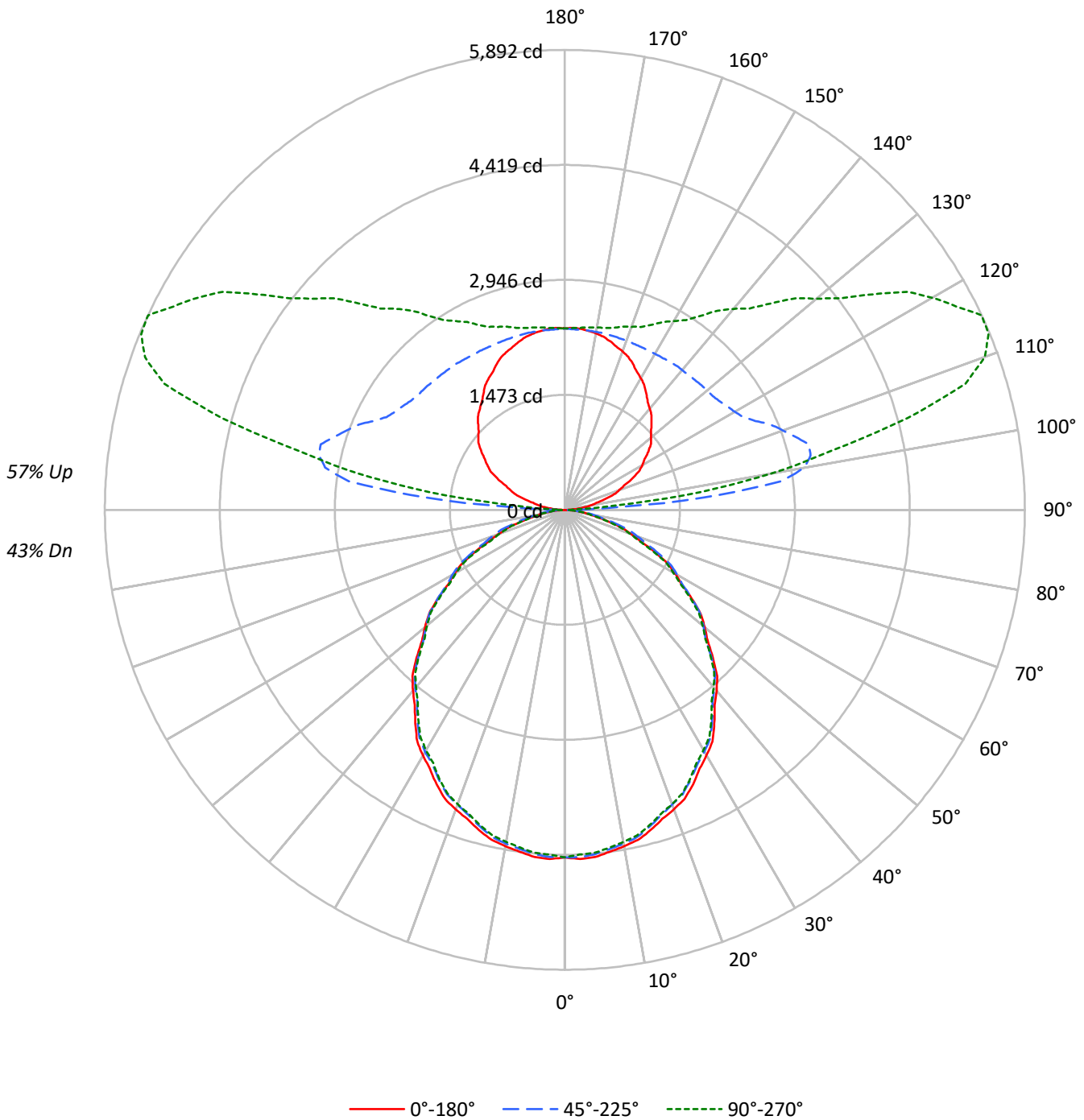
Input Watts (W): 201.2
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



TEST NUMBER: P565053

CATALOG NUMBER: SQ4-PW1-125U-100D-835-1D-UNV-STD-W-12

Luminous Intensity Polar Plot





TEST NUMBER: P565053

CATALOG NUMBER: SQ4-PW1-125U-100D-835-1D-UNV-STD-W-12

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	105	105	105	105	96	96	96	96	79	79	79	64	64	64	50	50	50	43
1	96	92	88	85	88	84	81	78	70	67	65	56	55	53	44	43	42	36
2	88	80	74	69	80	74	69	64	61	57	54	50	47	45	39	37	36	31
3	80	71	64	58	73	65	59	54	54	49	46	44	41	38	34	32	30	26
4	73	63	55	49	67	58	51	45	48	43	39	39	35	32	31	28	26	22
5	67	56	48	42	61	51	44	39	43	38	33	35	31	28	28	25	23	19
6	62	50	42	36	56	46	39	34	39	33	29	32	28	25	25	22	20	17
7	57	45	37	32	52	42	35	30	35	30	26	29	25	22	23	20	18	15
8	53	41	33	28	48	38	31	26	32	27	23	26	22	19	21	18	16	14
9	49	37	30	25	45	34	28	23	29	24	20	24	20	17	19	17	14	12
10	46	34	27	22	42	32	25	21	27	22	18	22	18	16	18	15	13	11

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	13692	13692	13692
5°	13781	13672	13611
10°	13671	13560	13487
15°	13526	13376	13326
20°	13364	13159	13133
25°	13178	12938	12898
30°	12899	12704	12620
35°	12532	12356	12282
40°	12142	11952	11905
45°	11669	11516	11465
50°	11186	11091	11017
55°	10663	10663	10495
60°	10013	10206	9844
65°	9162	9619	8935
70°	8077	8853	7865
75°	6898	7923	6712
80°	5349	6670	5419
85°	3462	5120	4566



TEST NUMBER: P565053

CATALOG NUMBER: SQ4-PW1-125U-100D-835-1D-UNV-STD-W-12

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	419.2	1.6
10°-20°	1183.6	4.5
20°-30°	1755.7	6.7
30°-40°	2054.3	7.8
40°-50°	2045.2	7.8
50°-60°	1766.1	6.7
60°-70°	1271.3	4.8
70°-80°	666.6	2.5
80°-90°	170.7	0.6
90°-100°	1086.8	4.1
100°-110°	2927.6	11.1
110°-120°	3072.5	11.7
120°-130°	2493.2	9.5
130°-140°	1955.4	7.4
140°-150°	1501.2	5.7
150°-160°	1079.4	4.1
160°-170°	659.4	2.5
170°-180°	222.4	0.8
0°-30°	3358.6	12.8
0°-40°	5412.9	20.6
0°-60°	9224.2	35.0
0°-90°	11332.8	43.0
90°-120°	7086.9	26.9
90°-150°	13036.8	49.5
90°-180°	14998.0	57.0
0°-180°	26330.8	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	4452	4452	4452	4452	4452	
5°	4464	4414	4429	4417	4409	423
15°	4248	4194	4201	4193	4185	1197
25°	3883	3818	3813	3790	3801	1786
35°	3338	3292	3291	3260	3271	2087
45°	2683	2660	2648	2640	2636	2070
55°	1989	1985	1989	1961	1957	1774
65°	1259	1298	1322	1270	1228	1248
75°	580	634	667	622	565	622
85°	98	129	145	137	129	129
90°	6	18	36	38	38	15
95°	166	591	1782	911	630	173
105°	542	843	3238	4844	4546	569
115°	956	1170	2696	5210	5892	941
125°	1305	1499	2421	4092	4815	1165
135°	1572	1754	2353	3301	3738	1213
145°	1817	1959	2323	2822	3031	1140
155°	2063	2138	2302	2532	2613	950
165°	2237	2264	2311	2403	2415	631
175°	2326	2323	2314	2347	2341	221
180°	2323	2323	2323	2323	2323	

TEST NUMBER: P565053

CATALOG NUMBER: SQ4-PW1-125U-100D-835-1D-UNV-STD-W-12

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	4452.1	4452.1	4452.1	4452.1	4452.1
2.5°	4477.2	4440.4	4452.1	4442.2	4420.7
5°	4463.9	4414.0	4428.6	4416.7	4409.0
7.5°	4418.4	4372.4	4383.1	4370.4	4365.8
10°	4377.6	4331.6	4342.3	4326.4	4318.8
12.5°	4330.5	4281.4	4292.1	4276.3	4271.7
15°	4248.2	4194.5	4201.1	4193.1	4185.4
17.5°	4152.4	4098.0	4099.1	4086.5	4085.0
20°	4083.4	4025.9	4020.6	4005.1	4012.8
22.5°	4008.1	3947.5	3942.2	3920.5	3931.2
25°	3883.4	3818.2	3812.7	3789.5	3801.0
27.5°	3739.0	3674.6	3674.7	3642.0	3654.3
30°	3632.3	3570.9	3577.4	3538.5	3553.9
32.5°	3519.3	3464.1	3467.6	3428.7	3444.0
35°	3338.1	3292.1	3291.0	3259.9	3271.4
37.5°	3153.0	3112.3	3105.9	3087.9	3091.0
40°	3024.3	2989.8	2977.2	2965.5	2965.5
42.5°	2889.4	2857.9	2845.4	2836.7	2833.7
45°	2683.0	2660.0	2647.7	2639.8	2636.0
47.5°	2479.1	2457.6	2446.9	2441.3	2437.5
50°	2337.9	2322.5	2318.2	2306.4	2302.6
52.5°	2196.6	2187.4	2183.3	2168.3	2164.5
55°	1988.7	1984.9	1988.7	1961.2	1957.4
57.5°	1772.2	1778.4	1791.1	1754.0	1744.8
60°	1627.9	1643.2	1659.3	1615.8	1600.4
62.5°	1480.4	1504.9	1527.5	1477.5	1456.1
65°	1259.1	1297.5	1321.9	1270.0	1227.8
67.5°	1045.8	1093.3	1122.6	1066.6	1019.1
70°	898.3	952.0	984.6	928.4	874.7
72.5°	769.6	829.4	855.9	802.9	749.2
75°	580.5	634.2	666.8	622.4	564.9
77.5°	411.9	462.5	489.5	450.8	403.2
80°	302.0	355.7	376.6	344.3	306.0
82.5°	214.2	258.7	273.0	253.6	227.5
85°	98.1	128.7	145.1	137.1	129.4
87.5°	26.3	50.1	66.7	67.4	70.5
90°	5.9	17.5	35.5	38.5	38.5
92.5°	72.2	255.1	504.3	242.8	168.7
95°	165.7	591.1	1781.7	911.1	630.4
97.5°	264.6	676.7	2794.4	2334.5	1760.3
100°	340.3	710.8	3116.4	3260.6	2705.0
102.5°	413.7	758.7	3223.0	3954.3	3498.2
105°	541.6	842.6	3237.8	4843.9	4545.9
107.5°	662.3	930.9	3099.8	5301.1	5378.1
110°	742.8	997.5	2974.4	5443.1	5723.8

TEST NUMBER: P565053

CATALOG NUMBER: SQ4-PW1-125U-100D-835-1D-UNV-STD-W-12

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	828.1	1064.2	2853.6	5411.7	5873.0
115°	955.9	1170.1	2696.2	5209.5	5892.5
117.5°	1072.5	1273.4	2574.2	4886.9	5647.4
120°	1148.3	1342.2	2512.7	4655.4	5436.7
122.5°	1214.6	1406.2	2467.7	4418.6	5197.6
125°	1305.2	1499.1	2420.9	4091.8	4815.2
127.5°	1392.2	1583.2	2391.3	3803.5	4449.4
130°	1444.3	1635.3	2379.5	3638.4	4205.5
132.5°	1496.4	1685.0	2367.6	3492.9	4013.8
135°	1571.5	1753.8	2352.9	3301.0	3737.9
137.5°	1643.1	1817.9	2345.2	3138.2	3497.0
140°	1692.9	1860.7	2338.1	3038.0	3362.1
142.5°	1745.0	1901.2	2333.3	2944.5	3217.6
145°	1817.2	1959.0	2323.3	2822.2	3030.6
147.5°	1895.3	2018.6	2313.2	2719.4	2883.2
150°	1947.4	2054.5	2308.5	2654.9	2790.9
152.5°	1994.7	2087.9	2306.1	2602.2	2712.7
155°	2062.8	2138.1	2302.5	2532.3	2613.3
157.5°	2122.6	2181.1	2303.1	2483.1	2537.5
160°	2160.5	2209.7	2305.5	2454.4	2494.9
162.5°	2193.6	2233.6	2307.9	2430.5	2459.4
165°	2237.4	2263.5	2311.4	2403.4	2415.0
167.5°	2272.9	2288.0	2314.4	2382.6	2387.2
170°	2296.6	2302.4	2314.4	2370.6	2370.6
172.5°	2310.8	2312.0	2316.7	2358.8	2358.8
175°	2326.2	2323.3	2314.4	2346.8	2341.0
177.5°	2332.7	2328.1	2316.2	2335.0	2330.4
180°	2323.3	2323.3	2323.3	2323.3	2323.3

(END OF REPORT)