

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: P564681

Luminaire Tested: **SQ4-PW1-050U-100D-935-1D-UNV-STD-W-12**

Issue Date: 7/30/2021

Test Information

Test Method: LM-79-2019
Report Number: P564681
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-21, 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-PW1-050U-100D-935-1D-UNV-STD-W-12
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE WAVES CONTINUOUS LENS.
DOWNLIGHT 1000 LUMENS PER FOOT
UPLIGHT 500 LUMENS PER FOOT
Light Source: 3500K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 15037.7 lumens
Efficiency: N/A
Efficacy: 111.9 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: Semi-Direct

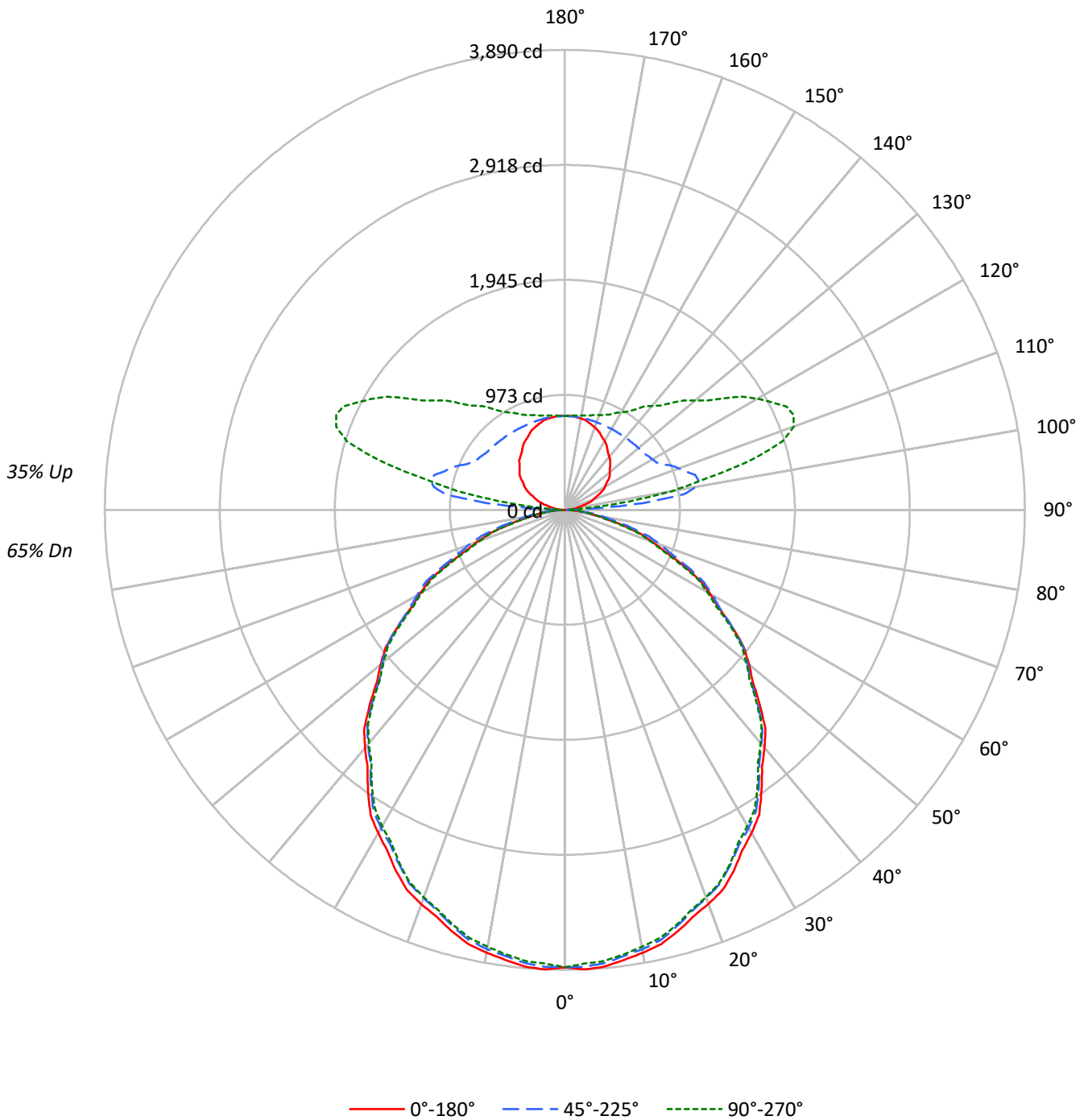
Input Watts (W): 134.4
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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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	111	111	111	111	104	104	104	104	92	92	92	81	81	81	70	70	70	65
1	101	97	93	90	95	91	88	85	81	78	76	71	69	68	62	61	60	55
2	92	85	79	73	87	80	75	70	71	67	63	63	59	57	55	53	50	47
3	84	75	67	61	79	71	64	59	63	58	53	56	51	48	49	46	43	40
4	77	66	58	52	72	63	55	50	56	50	45	50	45	41	44	40	37	34
5	71	59	51	45	67	56	48	43	50	44	39	45	40	36	39	36	32	30
6	66	53	45	39	61	50	43	37	45	39	34	40	35	31	36	32	29	26
7	61	48	40	34	57	46	38	33	41	35	30	37	32	28	33	29	25	23
8	56	44	36	30	53	42	34	29	38	31	27	34	29	25	30	26	23	21
9	53	40	32	27	49	38	31	26	34	29	24	31	26	22	28	24	21	19
10	49	37	29	24	46	35	28	24	32	26	22	29	24	20	26	22	19	17

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	11897	11897	11897
5°	11974	11879	11827
10°	11878	11782	11718
15°	11752	11622	11579
20°	11612	11433	11411
25°	11450	11242	11207
30°	11208	11038	10966
35°	10890	10736	10672
40°	10550	10385	10345
45°	10139	10006	9962
50°	9719	9637	9572
55°	9265	9265	9119
60°	8700	8868	8553
65°	7962	8358	7763
70°	7018	7693	6835
75°	5994	6885	5832
80°	4647	5795	4707
85°	3006	4450	3970



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	364.3	2.4
10°-20°	1028.4	6.8
20°-30°	1525.5	10.1
30°-40°	1785.0	11.9
40°-50°	1777.0	11.8
50°-60°	1534.5	10.2
60°-70°	1104.6	7.3
70°-80°	579.3	3.9
80°-90°	146.7	1.0
90°-100°	381.7	2.5
100°-110°	1037.0	6.9
110°-120°	1066.3	7.1
120°-130°	852.5	5.7
130°-140°	669.8	4.5
140°-150°	513.6	3.4
150°-160°	369.4	2.5
160°-170°	225.9	1.5
170°-180°	76.1	0.5
0°-30°	2918.2	19.4
0°-40°	4703.2	31.3
0°-60°	8014.8	53.3
0°-90°	9845.4	65.5
90°-120°	2485.0	16.5
90°-150°	4521.0	30.1
90°-180°	5192.0	34.5
0°-180°	15037.7	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3868	3868	3868	3868	3868	
5°	3879	3835	3848	3838	3831	367
15°	3691	3644	3650	3643	3637	1040
25°	3374	3318	3313	3293	3303	1552
35°	2900	2860	2860	2832	2842	1813
45°	2331	2311	2301	2294	2290	1799
55°	1728	1725	1728	1704	1701	1542
65°	1094	1127	1149	1104	1067	1084
75°	504	551	579	541	491	541
85°	85	112	126	119	112	112
90°	3	10	18	23	23	7
95°	56	209	665	289	194	60
105°	184	287	1140	1736	1634	196
115°	327	397	913	1816	2069	323
125°	450	512	826	1392	1642	401
135°	542	602	803	1134	1278	419
145°	626	672	793	963	1036	393
155°	708	733	788	865	890	327
165°	767	777	790	823	826	217
175°	795	798	793	803	800	76
180°	795	795	795	795	795	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3868.4	3868.4	3868.4	3868.4	3868.4
2.5°	3890.2	3858.2	3868.4	3859.8	3841.2
5°	3878.6	3835.3	3848.0	3837.6	3830.9
7.5°	3839.1	3799.1	3808.4	3797.4	3793.4
10°	3803.7	3763.7	3773.0	3759.2	3752.5
12.5°	3762.8	3720.1	3729.4	3715.6	3711.6
15°	3691.2	3644.5	3650.3	3643.3	3636.7
17.5°	3608.0	3560.7	3561.7	3550.7	3549.4
20°	3548.0	3498.1	3493.5	3480.0	3486.7
22.5°	3482.6	3429.9	3425.3	3406.5	3415.8
25°	3374.2	3317.6	3312.9	3292.6	3302.6
27.5°	3248.8	3192.8	3192.9	3164.5	3175.2
30°	3156.1	3102.8	3108.4	3074.6	3087.9
32.5°	3057.9	3009.9	3012.9	2979.2	2992.5
35°	2900.5	2860.5	2859.6	2832.5	2842.5
37.5°	2739.6	2704.3	2698.7	2683.1	2685.7
40°	2627.8	2597.8	2586.9	2576.7	2576.7
42.5°	2510.6	2483.2	2472.4	2464.8	2462.2
45°	2331.3	2311.3	2300.6	2293.7	2290.4
47.5°	2154.0	2135.4	2126.1	2121.3	2117.9
50°	2031.3	2018.0	2014.3	2004.0	2000.7
52.5°	1908.6	1900.7	1897.1	1884.0	1880.7
55°	1728.0	1724.7	1728.0	1704.1	1700.7
57.5°	1539.9	1545.2	1556.2	1524.0	1516.0
60°	1414.4	1427.8	1441.7	1403.9	1390.6
62.5°	1286.3	1307.6	1327.2	1283.8	1265.2
65°	1094.1	1127.4	1148.6	1103.5	1066.8
67.5°	908.7	950.0	975.5	926.8	885.5
70°	780.5	827.2	855.5	806.7	760.1
72.5°	668.7	720.7	743.7	697.6	651.0
75°	504.4	551.1	579.4	540.8	490.8
77.5°	357.9	401.9	425.4	391.7	350.4
80°	262.4	309.1	327.2	299.2	265.8
82.5°	186.1	224.8	237.2	220.3	197.7
85°	85.2	111.9	126.1	119.1	112.5
87.5°	22.3	42.5	55.4	56.5	59.1
90°	2.6	10.1	17.9	23.0	23.0
92.5°	23.0	104.5	181.5	78.0	66.0
95°	56.3	208.8	664.8	289.3	194.3
97.5°	93.1	230.6	1019.2	792.9	556.9
100°	117.6	245.1	1127.6	1143.1	923.1
102.5°	142.2	259.7	1156.3	1413.7	1219.7
105°	184.1	286.6	1140.4	1736.4	1633.9
107.5°	227.6	318.1	1074.5	1903.1	1931.6
110°	258.3	340.8	1025.4	1935.9	2058.4



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	284.9	363.4	976.3	1908.7	2093.2
115°	327.3	397.3	912.9	1816.1	2068.6
117.5°	367.2	434.2	872.5	1684.9	1969.4
120°	393.8	458.8	854.0	1596.9	1879.4
122.5°	416.3	481.3	841.8	1508.7	1781.2
125°	450.0	512.5	825.9	1391.6	1641.6
127.5°	480.2	542.2	817.2	1302.8	1517.3
130°	498.6	558.6	813.1	1247.1	1439.6
132.5°	517.0	577.0	809.0	1199.5	1370.0
135°	542.1	602.1	802.9	1133.5	1278.5
137.5°	569.2	623.7	799.8	1075.2	1197.2
140°	585.6	638.1	797.8	1038.1	1148.1
142.5°	601.9	650.4	795.7	1009.0	1101.0
145°	626.5	671.5	792.7	963.1	1035.6
147.5°	654.1	692.6	790.1	926.9	983.9
150°	672.5	705.0	790.1	906.2	951.2
152.5°	686.8	715.3	788.1	887.6	924.6
155°	708.3	733.3	787.6	864.8	889.8
157.5°	729.3	748.8	787.6	849.4	868.4
160°	741.5	759.0	787.6	839.0	854.0
162.5°	753.8	767.3	789.6	830.8	841.8
165°	767.1	777.1	790.1	823.4	825.9
167.5°	780.9	785.9	792.7	814.7	816.7
170°	785.0	790.0	792.7	810.6	810.6
172.5°	789.1	792.1	792.7	806.5	806.5
175°	795.2	797.7	792.7	802.8	800.3
177.5°	797.3	797.3	791.1	799.2	795.2
180°	795.2	795.2	795.2	795.2	795.2

(END OF REPORT)