

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: P564248

Luminaire Tested: **SQ4-PR1-100U-050D-930-1D-UNV-STD-W-8**

Issue Date: 7/30/2021

Test Information

Test Method: LM-79-2019
Report Number: P564248
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-23, G2-2106-289-4)
Test Lab: INNOVATION CENTER
Issue Date: 7/30/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4-PR1-100U-050D-930-1D-UNV-STD-W-8
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE RIPPLE CONTINUOUS LENS.
DOWNLIGHT 500 LUMENS PER FOOT
UPLIGHT 1000 LUMENS PER FOOT
Light Source: 3000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

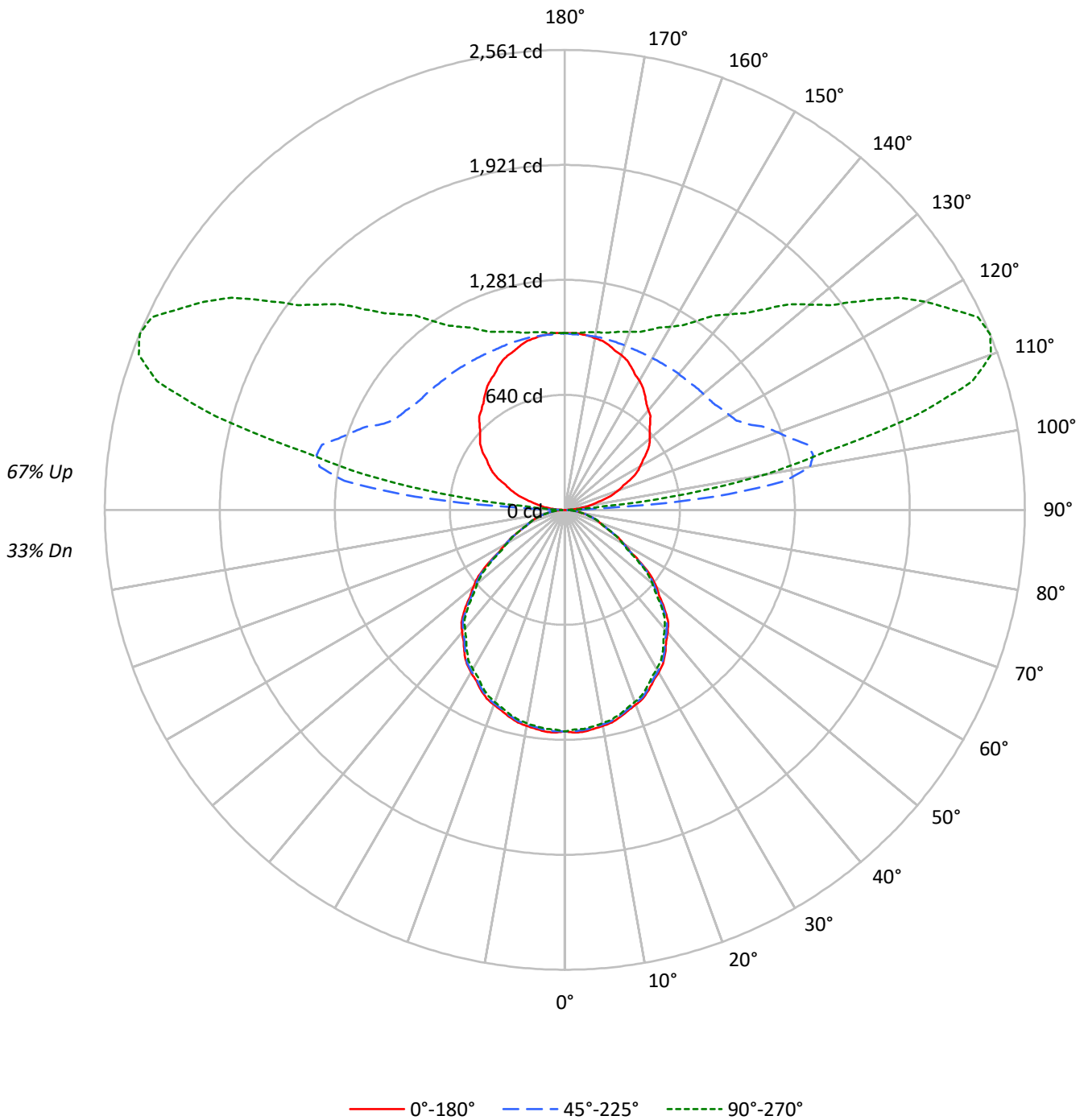
Lumens per Lamp: N/A
Luminaire Lumens: 9478.1 lumens
Efficiency: N/A
Efficacy: 111.9 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.24 / 1.35
Luminous Opening: Rectangular (W 0.29' x L: 8' x H: 0')
CIE Type: Semi-Indirect

Input Watts (W): 84.7
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	103	103	103	103	93	93	93	93	74	74	74	56	56	56	40	40	40	33
1	94	90	86	83	85	81	78	75	65	63	61	50	48	47	36	35	34	28
2	86	79	73	68	77	71	66	62	57	53	50	44	42	40	32	30	29	24
3	78	69	62	57	70	63	57	52	50	46	43	39	36	34	28	26	25	20
4	72	61	54	48	64	56	49	44	45	40	36	35	31	29	25	23	22	17
5	66	55	47	41	59	50	43	38	40	35	31	31	28	25	23	21	19	15
6	60	49	41	35	54	44	38	33	36	31	27	28	25	22	21	18	17	13
7	56	44	36	31	50	40	33	29	33	28	24	25	22	19	19	17	15	12
8	52	40	32	27	47	36	30	25	30	25	21	23	20	17	17	15	13	11
9	48	36	29	24	43	33	27	22	27	22	19	21	18	15	16	14	12	10
10	45	33	26	22	40	30	24	20	25	20	17	20	16	14	15	12	11	9

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5691	5691	5691
5°	5742	5698	5668
10°	5724	5684	5654
15°	5699	5664	5633
20°	5670	5634	5592
25°	5631	5592	5528
30°	5570	5530	5451
35°	5487	5440	5362
40°	5363	5305	5209
45°	5143	5053	4950
50°	4759	4644	4553
55°	4153	4059	3974
60°	3499	3471	3402
65°	3027	3039	3016
70°	2780	2795	2795
75°	2670	2670	2690
80°	2513	2540	2513
85°	2027	2249	2249



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	116.7	1.2
10°-20°	333.8	3.5
20°-30°	503.5	5.3
30°-40°	599.9	6.3
40°-50°	591.4	6.2
50°-60°	452.0	4.8
60°-70°	279.7	3.0
70°-80°	158.9	1.7
80°-90°	50.4	0.5
90°-100°	460.7	4.9
100°-110°	1271.9	13.4
110°-120°	1311.7	13.8
120°-130°	1054.1	11.1
130°-140°	828.4	8.7
140°-150°	635.3	6.7
150°-160°	456.6	4.8
160°-170°	279.2	2.9
170°-180°	94.1	1.0
0°-30°	953.9	10.1
0°-40°	1553.8	16.4
0°-60°	2597.2	27.4
0°-90°	3086.1	32.6
90°-120°	3044.3	32.1
90°-150°	5562.0	58.7
90°-180°	6392.0	67.4
0°-180°	9478.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1234	1234	1234	1234	1234	
5°	1240	1226	1230	1226	1224	118
15°	1193	1181	1186	1182	1180	337
25°	1106	1093	1099	1087	1086	509
35°	974	963	966	953	952	608
45°	788	778	775	761	759	604
55°	516	508	505	496	494	463
65°	277	275	278	276	276	281
75°	150	150	150	151	151	158
85°	38	40	42	42	42	45
90°	3	6	13	14	16	6
95°	68	249	836	344	224	72
105°	227	350	1399	2136	2012	241
115°	406	491	1127	2231	2537	399
125°	557	634	1022	1729	2029	496
135°	670	743	993	1400	1579	519
145°	778	831	981	1192	1283	487
155°	877	906	973	1070	1103	404
165°	949	962	978	1015	1023	268
175°	984	985	979	993	990	93
180°	984	984	984	984	984	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1233.7	1233.7	1233.7	1233.7	1233.7
2.5°	1241.3	1230.5	1233.7	1231.0	1225.2
5°	1240.0	1226.5	1230.5	1226.2	1224.1
7.5°	1230.5	1217.2	1221.1	1216.9	1215.6
10°	1222.0	1209.5	1213.5	1209.2	1207.1
12.5°	1212.6	1199.3	1204.1	1199.0	1196.9
15°	1193.3	1180.8	1185.9	1181.6	1179.5
17.5°	1172.0	1158.7	1163.8	1158.8	1156.1
20°	1155.0	1142.6	1147.6	1140.1	1139.1
22.5°	1136.3	1123.9	1128.9	1118.9	1118.7
25°	1106.2	1092.7	1098.7	1087.0	1086.0
27.5°	1070.2	1057.8	1062.8	1050.9	1049.6
30°	1045.6	1033.1	1038.2	1025.4	1023.3
32.5°	1017.5	1005.9	1010.1	997.3	996.1
35°	974.4	963.0	965.9	953.1	952.1
37.5°	925.3	914.9	916.6	902.5	901.5
40°	890.5	880.1	880.9	866.0	865.0
42.5°	852.2	841.8	840.9	826.0	825.0
45°	788.4	778.1	774.6	760.8	758.7
47.5°	715.8	705.4	699.0	687.7	686.2
50°	663.1	652.7	647.1	637.5	634.4
52.5°	606.1	595.7	591.0	582.2	579.1
55°	516.4	508.1	504.7	496.2	494.1
57.5°	431.2	425.6	424.6	416.3	415.5
60°	379.3	376.2	376.2	368.7	368.7
62.5°	335.1	332.9	334.5	329.6	328.8
65°	277.3	275.3	278.4	276.3	276.3
67.5°	231.6	231.6	233.6	232.7	232.7
70°	206.1	206.1	207.2	207.2	207.2
72.5°	183.2	182.4	185.1	185.1	184.3
75°	149.8	149.8	149.8	150.9	150.9
77.5°	116.7	116.9	117.7	117.5	116.7
80°	94.6	95.6	95.6	94.6	94.6
82.5°	72.5	73.5	73.5	73.3	72.5
85°	38.3	40.3	42.5	42.5	42.5
87.5°	11.7	15.6	19.5	19.8	19.3
90°	3.1	6.2	12.6	14.2	15.7
92.5°	28.3	117.6	210.3	76.7	59.8
95°	67.7	249.3	835.8	343.6	223.5
97.5°	112.1	279.2	1238.1	953.2	690.4
100°	144.8	297.2	1386.7	1396.5	1134.9
102.5°	176.3	317.6	1415.7	1725.5	1477.4
105°	226.7	349.8	1399.3	2136.3	2011.6
107.5°	280.2	389.8	1321.2	2334.4	2379.9
110°	318.0	416.5	1260.8	2377.0	2524.7

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	352.0	446.8	1204.1	2343.3	2561.3
115°	406.1	490.7	1127.0	2231.1	2537.3
117.5°	453.3	537.7	1076.3	2073.0	2421.5
120°	484.8	567.9	1056.2	1966.1	2317.0
122.5°	515.0	594.4	1039.8	1866.2	2198.6
125°	557.2	634.2	1021.5	1728.8	2028.9
127.5°	593.1	670.0	1010.8	1612.7	1871.5
130°	617.0	694.0	1005.8	1541.6	1777.1
132.5°	639.7	712.9	1000.8	1481.9	1695.2
135°	670.5	742.9	993.2	1400.2	1578.8
137.5°	705.2	771.0	989.4	1331.6	1484.0
140°	724.1	788.7	986.9	1285.9	1419.8
142.5°	745.5	805.2	984.4	1245.2	1363.1
145°	777.6	831.4	980.6	1192.0	1282.8
147.5°	808.4	855.5	977.2	1147.2	1217.7
150°	831.1	869.6	975.9	1120.4	1177.4
152.5°	848.7	884.7	974.6	1097.5	1144.6
155°	876.7	906.0	972.7	1069.5	1103.4
157.5°	902.5	925.0	973.1	1049.1	1072.2
160°	917.7	937.7	974.3	1037.7	1054.6
162.5°	930.3	947.8	975.6	1027.5	1040.7
165°	949.1	961.5	977.5	1015.4	1023.1
167.5°	963.6	971.0	979.0	1008.1	1010.5
170°	971.2	977.3	979.0	1004.2	1004.2
172.5°	977.5	981.2	979.0	999.2	997.9
175°	983.8	985.3	979.0	993.1	990.1
177.5°	986.3	985.1	978.7	987.5	985.0
180°	983.8	983.8	983.8	983.8	983.8

(END OF REPORT)