

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: CORELITE

Report Number: P511848

Luminaire Tested: **SQW-F-100U-050D-930-1D-UNV-STD-W-4**

Issue Date: 4/9/2021

Test Information

Test Method: LM-79-08
Report Number: P511848
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2101-105-18,
Test Lab: INNOVATION CENTER
Issue Date: 4/9/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQW-F-100U-050D-930-1D-UNV-STD-W-4
Description: CORELITE SQW WALL MOUNTED LED LUMINAIRE
DOWNLIGHT 500 LUMENS PER FOOT
UPLIGHT 1000 LUMENS PER FOOT
Light Source: 3000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

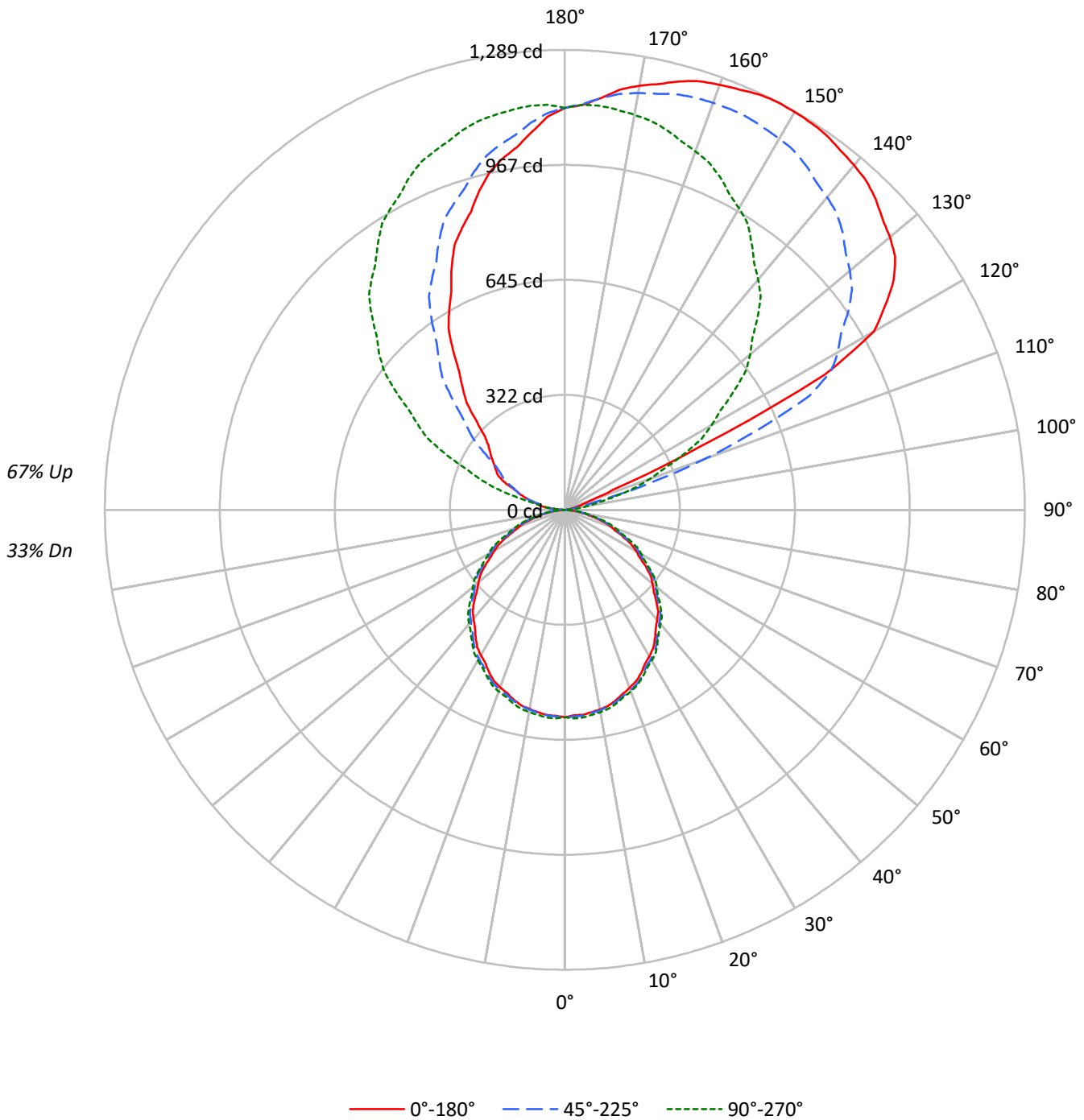
Lumens per Lamp: N/A
Luminaire Lumens: 4734.9 lumens
Efficiency: N/A
Efficacy: 107.6 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.25 / 1.35
Luminous Opening: Rectangular (W 4' x L: 0.08' x H: 0')
CIE Type: Semi-Indirect

Input Watts (W): 44
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	57	57	57	41	41	41	33
1	94	90	86	83	85	81	78	75	65	63	61	50	48	47	36	35	34	28
2	86	78	72	67	77	71	66	61	57	53	50	44	41	39	32	30	29	23
3	78	69	62	56	70	62	56	51	50	46	42	39	36	33	28	26	25	20
4	71	61	53	47	64	55	48	43	44	39	36	34	31	28	25	23	21	17
5	65	54	46	40	59	49	42	37	39	34	31	31	27	24	22	20	18	15
6	60	48	40	35	54	44	37	32	35	30	27	28	24	21	20	18	16	13
7	55	43	36	30	50	39	33	28	32	27	23	25	21	19	18	16	14	11
8	51	39	32	27	46	36	29	25	29	24	21	23	19	17	17	14	13	10
9	48	36	28	24	43	33	26	22	27	22	18	21	17	15	16	13	11	9
10	44	33	26	21	40	30	24	19	24	20	16	19	16	13	14	12	10	8

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	18768	18768	18768
5°	18684	18943	18710
10°	18615	18874	18589
15°	18474	18765	18420
20°	18251	18608	18196
25°	17990	18385	17876
30°	17671	18174	17551
35°	17365	17866	17176
40°	16959	17595	16790
45°	16523	17285	16340
50°	16096	16895	15860
55°	15578	16473	15353
60°	14893	15972	14686
65°	13914	15190	13731
70°	12840	14342	12689
75°	11304	13001	11204
80°	9168	10935	9317
85°	5298	7373	6187



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	54.9	1.2
10°-20°	156.4	3.3
20°-30°	234.3	4.9
30°-40°	278.5	5.9
40°-50°	285.0	6.0
50°-60°	254.2	5.4
60°-70°	188.6	4.0
70°-80°	103.3	2.2
80°-90°	25.0	0.5
90°-100°	27.7	0.6
100°-110°	130.8	2.8
110°-120°	384.4	8.1
120°-130°	558.8	11.8
130°-140°	597.9	12.6
140°-150°	569.9	12.0
150°-160°	470.3	9.9
160°-170°	308.0	6.5
170°-180°	106.8	2.3
0°-30°	445.6	9.4
0°-40°	724.1	15.3
0°-60°	1263.3	26.7
0°-90°	1580.2	33.4
90°-120°	542.9	11.5
90°-150°	2269.6	47.9
90°-180°	3155.0	66.6
0°-180°	4734.9	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	581	581	581	581	581	
5°	576	579	584	578	577	55
15°	553	557	561	554	551	156
25°	505	513	516	511	502	232
35°	440	448	453	447	436	275
45°	362	373	378	370	358	279
55°	277	286	293	285	273	247
65°	182	191	199	190	180	181
75°	91	97	104	97	90	96
85°	14	19	20	21	17	20
90°	2	2	2	3	6	2
95°	8	9	21	34	30	9
105°	35	98	145	93	99	43
115°	413	756	366	175	191	469
125°	1126	969	577	269	248	997
135°	1232	1101	763	451	348	951
145°	1280	1178	912	650	546	802
155°	1285	1214	1029	833	750	594
165°	1243	1206	1102	981	926	353
175°	1158	1158	1137	1089	1062	112
180°	1126	1126	1126	1126	1126	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°
0°	581.2	581.2	581.2	581.2	581.2	581.2	581.2	581.2	581.2
2.5°	576.8	579.2	579.9	579.4	585.0	580.1	579.9	579.3	578.0
5°	576.4	577.2	578.8	577.4	584.4	577.4	578.0	576.5	577.2
7.5°	572.2	572.9	573.9	573.1	579.5	573.1	573.6	572.0	572.0
10°	567.7	568.5	570.1	568.7	575.6	568.7	568.5	566.9	566.9
12.5°	562.6	563.4	565.0	563.6	570.6	563.6	563.4	561.2	561.8
15°	552.6	554.9	556.6	554.3	561.3	554.3	554.2	552.6	551.0
17.5°	540.7	543.0	545.8	543.4	549.7	542.6	543.4	539.8	538.4
20°	531.1	533.5	537.5	534.5	541.5	533.7	535.1	530.3	529.5
22.5°	520.9	522.7	528.6	525.5	531.9	524.8	525.6	519.5	518.7
25°	504.9	506.4	512.8	510.6	516.0	509.0	511.2	502.5	501.7
27.5°	486.6	488.9	494.7	493.3	499.5	491.7	493.9	484.8	483.4
30°	473.9	476.2	482.6	481.2	487.4	479.6	481.8	471.5	470.7
32.5°	459.9	463.5	469.3	469.1	474.0	466.9	467.8	458.1	456.7
35°	440.5	442.8	448.4	448.5	453.2	447.0	446.8	437.3	435.7
37.5°	418.2	421.3	427.3	428.2	432.7	425.8	424.7	416.1	413.6
40°	402.3	405.4	412.7	413.5	417.4	411.2	409.5	401.5	398.3
42.5°	387.1	390.2	397.4	398.3	402.2	396.6	393.6	386.2	381.8
45°	361.8	365.7	372.9	375.4	378.5	373.0	369.7	360.9	357.8
47.5°	337.6	340.7	348.1	352.1	353.5	349.8	345.5	336.1	332.8
50°	320.4	323.5	331.6	335.5	336.3	333.2	328.4	319.5	315.7
52.5°	302.6	305.7	314.4	318.4	319.2	316.0	311.2	302.4	298.5
55°	276.7	279.8	286.2	292.6	292.6	291.0	285.4	275.8	272.7
57.5°	249.0	252.0	260.0	265.6	265.7	263.5	257.8	249.0	245.8
60°	230.6	232.9	240.9	246.5	247.3	245.7	239.3	230.5	227.4
62.5°	210.2	213.2	221.2	227.4	228.8	226.7	219.6	211.4	207.0
65°	182.1	183.6	190.8	197.2	198.8	196.4	190.0	182.0	179.7
67.5°	154.4	155.3	162.2	168.6	170.3	167.8	161.4	155.9	152.2
70°	136.0	137.5	143.1	149.5	151.9	148.8	142.3	137.5	134.4
72.5°	117.5	119.1	124.7	130.4	132.8	130.3	124.5	119.7	116.6
75°	90.6	91.4	97.0	102.6	104.2	101.8	97.0	93.0	89.8
77.5°	65.2	66.0	71.9	75.2	76.6	75.2	71.4	67.5	65.4
80°	49.3	50.1	54.1	58.1	58.8	58.1	54.9	51.6	50.1
82.5°	34.0	34.8	39.4	42.1	42.3	42.8	40.2	37.6	35.5
85°	14.3	15.1	19.1	21.4	19.9	22.2	20.7	18.3	16.7
87.5°	2.4	2.4	4.3	6.0	6.0	6.8	5.7	5.5	4.4
90°	2.4	2.4	2.4	1.6	1.6	2.3	3.1	5.5	6.3
92.5°	4.2	4.2	4.2	5.3	6.0	12.3	8.2	9.2	8.8
95°	7.8	8.6	9.4	24.2	21.2	31.2	33.7	32.1	29.8
97.5°	13.8	14.6	19.6	66.4	46.9	42.3	55.2	58.5	55.4
100°	18.8	19.6	29.0	107.4	68.3	54.4	62.8	73.0	73.0
102.5°	24.5	25.9	46.0	162.0	95.9	68.6	72.2	81.8	84.3
105°	35.3	39.1	98.1	274.0	145.1	91.4	92.6	96.5	98.8
107.5°	55.1	70.7	253.4	379.5	206.9	119.5	122.1	120.6	119.6
110°	77.7	112.9	416.6	444.4	253.4	141.4	139.6	138.8	136.5



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°
112.5°	145.4	241.5	584.1	501.2	299.2	165.7	153.4	162.6	158.5
115°	413.4	588.3	756.2	580.4	366.4	208.3	174.9	187.6	190.6
117.5°	820.7	887.8	841.1	647.3	431.9	257.4	194.6	206.1	212.1
120°	1000.2	985.7	882.6	692.5	474.6	292.1	210.2	217.4	222.8
122.5°	1064.9	1030.7	917.1	731.4	515.4	329.8	230.3	227.5	234.1
125°	1125.7	1081.3	968.8	784.5	577.4	390.2	269.1	243.3	247.9
127.5°	1166.7	1120.2	1014.3	835.9	638.4	452.3	319.8	268.3	263.6
130°	1189.3	1144.0	1042.6	865.0	678.6	493.7	356.2	290.8	279.3
132.5°	1206.9	1165.3	1067.1	896.4	713.1	533.2	393.8	320.2	303.1
135°	1231.7	1192.5	1100.6	938.2	763.3	591.5	451.1	372.9	348.3
137.5°	1250.6	1214.1	1127.5	974.6	812.4	648.1	509.4	431.8	406.5
140°	1260.7	1225.4	1143.8	996.7	842.5	683.8	548.4	470.1	444.8
142.5°	1269.5	1235.4	1157.6	1018.2	871.4	718.8	589.8	509.1	485.0
145°	1280.3	1248.1	1178.3	1048.9	912.4	770.5	650.3	568.3	546.0
147.5°	1285.5	1256.6	1194.3	1076.0	952.1	819.8	708.9	630.3	606.4
150°	1287.3	1259.7	1201.8	1092.5	975.9	851.6	745.3	671.8	647.2
152.5°	1289.2	1260.4	1206.9	1106.5	997.9	881.0	781.0	711.3	689.3
155°	1285.0	1259.7	1213.6	1123.6	1029.3	922.6	833.1	769.1	750.0
157.5°	1275.3	1258.2	1215.0	1137.5	1054.2	960.5	882.1	824.1	805.2
160°	1267.7	1253.2	1214.4	1145.2	1069.3	984.1	911.6	858.6	841.0
162.5°	1259.6	1244.4	1211.3	1150.4	1083.7	1006.5	940.4	889.5	875.5
165°	1243.4	1229.6	1205.8	1155.9	1102.2	1037.0	981.4	937.2	925.7
167.5°	1222.4	1213.8	1194.3	1157.6	1116.6	1063.7	1016.2	980.9	970.7
170°	1207.3	1201.2	1186.2	1157.2	1124.2	1080.5	1039.5	1007.9	1000.2
172.5°	1187.9	1185.4	1175.5	1154.8	1130.5	1094.1	1059.5	1032.4	1025.3
175°	1157.9	1161.0	1157.9	1149.0	1136.7	1112.2	1088.9	1067.6	1062.2
177.5°	1135.3	1136.5	1138.5	1138.4	1136.6	1125.5	1112.7	1101.5	1102.7
180°	1126.5	1126.5	1126.5	1126.5	1126.5	1126.5	1126.5	1126.5	1126.5

(END OF REPORT)