

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

Brand: CORELITE

Report Number: P688975

Luminaire Tested: SQ4R-PW1-075D-92765-1-UNV-STD-W-4_5700K

Issue Date: 5/22/2023

Test Information

Test Method: LM-79-2019
Report Number: P688975
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2203-586-35)
Test Lab: INNOVATION CENTER
Issue Date: 5/22/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4R-PW1-075D-92765-1-UNV-STD-W-4_5700K
Description: CORELITE SQ4R RECESSED LED LUMINAIRE WITH PERCEIVE WAVES CONTINUOUS LENS.
750 LUMENS PER FOOT
Light Source: 5700K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3072.9 lumens
Efficiency: N/A
Efficacy: 93.4 lumens/watt
Spacing Criteria (0/90/45): 1.25 / 1.2 / 1.29
Luminous Opening: Rectangular (W 0.29' x L: 3.83' x H: 0')
CIE Type: Direct

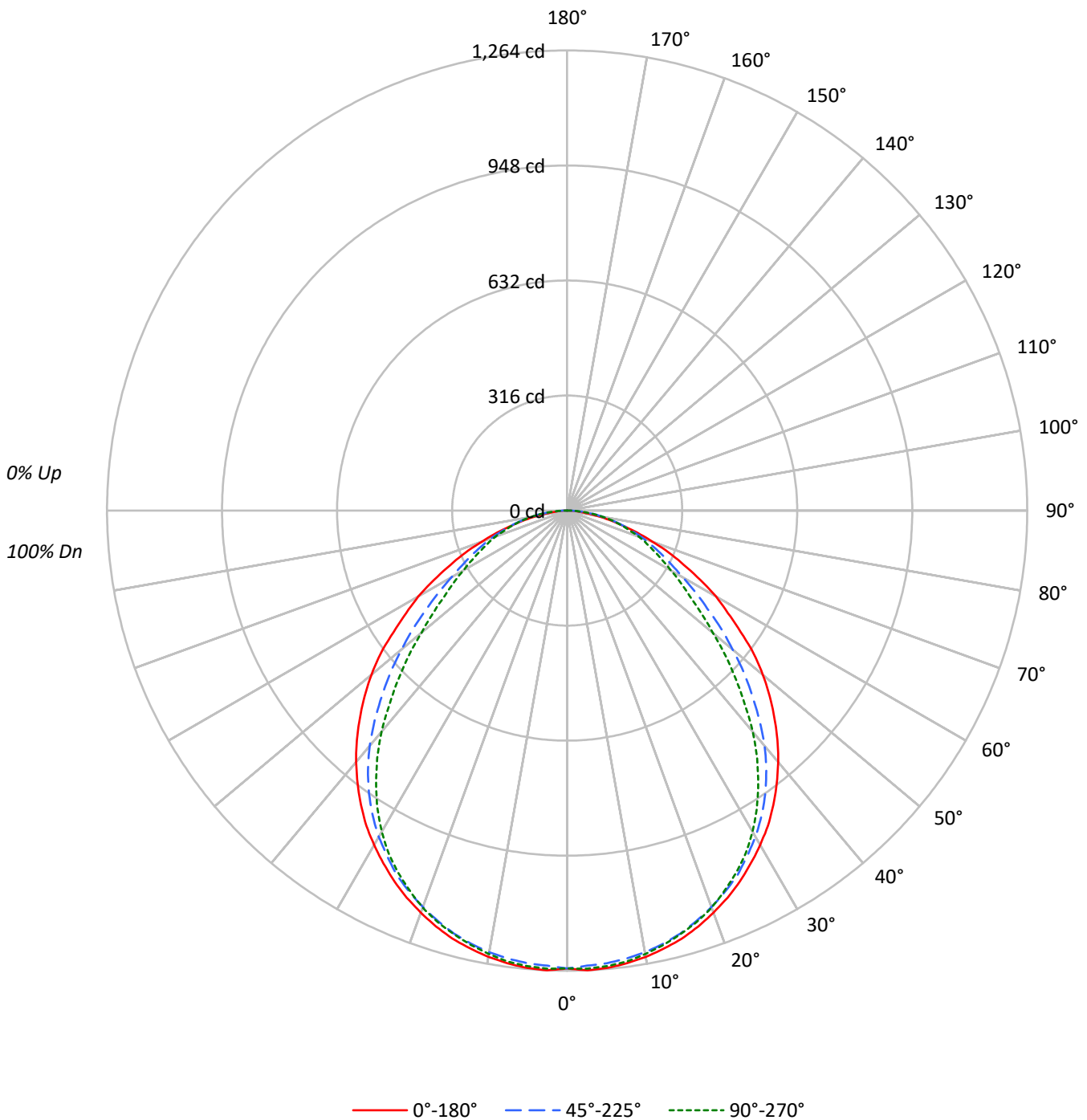
Input Watts (W): 32.9
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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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	50	30	10	0	
RCR																						
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100				100
1	109	105	101	97	107	103	99	96	99	96	93	95	92	90	91	89	87	85				85
2	100	92	86	81	98	91	85	80	87	82	78	84	80	76	81	77	74	72				72
3	92	82	74	68	89	80	73	67	77	71	66	75	69	65	72	68	64	62				62
4	85	73	65	58	82	72	64	58	69	63	57	67	61	56	65	60	56	54				54
5	78	66	57	51	76	65	57	50	63	55	50	61	54	49	59	53	49	47				47
6	72	59	51	45	70	59	50	44	57	49	44	55	49	44	54	48	43	41				41
7	67	54	46	40	65	53	45	40	52	45	39	50	44	39	49	43	39	37				37
8	63	50	41	36	61	49	41	36	48	40	35	46	40	35	45	39	35	33				33
9	59	46	38	32	57	45	37	32	44	37	32	43	36	32	42	36	32	30				30
10	55	42	34	29	54	42	34	29	41	34	29	40	33	29	39	33	29	27				27

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	12108	12108	12108
5°	12185	12061	12139
10°	12168	12042	12090
15°	12133	11987	12003
20°	12040	11875	11892
25°	11934	11745	11659
30°	11789	11501	11321
35°	11608	11152	10754
40°	11336	10605	9975
45°	10960	9795	8936
50°	10508	8886	7820
55°	9769	7896	6919
60°	9088	7066	6350
65°	8064	6554	6003
70°	7006	6235	5917
75°	5773	5892	5654
80°	4568	5555	5555
85°	3391	5004	5181

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 10960 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	119.3	3.9
10°-20°	340.8	11.1
20°-30°	510.5	16.6
30°-40°	593.1	19.3
40°-50°	559.6	18.2
50°-60°	436.6	14.2
60°-70°	296.4	9.6
70°-80°	166.9	5.4
80°-90°	49.5	1.6
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	970.7	31.6
0°-40°	1563.8	50.9
0°-60°	2560.1	83.3
0°-90°	3072.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3072.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1258	1258	1258	1258	1258	
5°	1261	1258	1248	1258	1256	120
15°	1217	1212	1203	1209	1204	343
25°	1124	1119	1106	1102	1098	517
35°	988	978	949	928	915	617
45°	805	781	719	674	656	621
55°	582	548	470	425	412	523
65°	354	322	288	270	264	354
75°	155	162	158	152	152	169
85°	31	44	45	45	47	37
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1257.7	1257.7	1257.7	1257.7	1257.7
2.5°	1264.1	1260.9	1251.2	1260.9	1259.3
5°	1260.9	1257.7	1248.0	1257.7	1256.1
7.5°	1254.4	1252.8	1241.5	1251.2	1249.6
10°	1244.7	1243.1	1231.8	1239.9	1236.7
12.5°	1231.8	1230.2	1218.9	1225.3	1222.1
15°	1217.3	1212.4	1202.7	1209.2	1204.3
17.5°	1197.9	1193.0	1181.7	1186.6	1184.9
20°	1175.2	1170.4	1159.1	1163.9	1160.7
22.5°	1151.0	1146.1	1133.2	1134.8	1130.0
25°	1123.5	1118.7	1105.7	1102.5	1097.6
27.5°	1092.8	1089.6	1070.2	1066.9	1062.1
30°	1060.5	1055.6	1034.6	1028.1	1018.4
32.5°	1026.5	1016.8	994.2	981.2	969.9
35°	987.7	978.0	948.9	927.9	915.0
37.5°	945.7	931.1	898.8	869.7	856.8
40°	902.0	885.9	843.8	805.0	793.7
42.5°	855.2	835.8	782.4	742.0	722.6
45°	805.0	780.8	719.4	674.1	656.3
47.5°	754.9	724.2	657.9	609.4	590.0
50°	701.6	664.4	593.3	541.5	522.1
52.5°	646.6	606.2	533.5	480.1	465.6
55°	582.0	548.0	470.4	425.2	412.2
57.5°	523.8	486.6	418.7	379.9	370.2
60°	472.0	426.8	367.0	337.9	329.8
62.5°	412.2	371.8	324.9	302.3	294.2
65°	354.0	321.7	287.7	270.0	263.5
67.5°	303.9	276.4	253.8	239.3	236.0
70°	248.9	234.4	221.5	210.2	210.2
72.5°	202.1	197.2	189.1	182.7	177.8
75°	155.2	161.7	158.4	152.0	152.0
77.5°	118.0	127.7	129.3	126.1	127.7
80°	82.4	97.0	100.2	98.6	100.2
82.5°	51.7	69.5	72.7	72.7	74.4
85°	30.7	43.6	45.3	45.3	46.9
87.5°	12.9	21.0	22.6	22.6	22.6
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)