

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: P688578

Luminaire Tested: SQ4R-PR1-075D-830-1-UNV-STD-W-4

Issue Date: 5/22/2023

Test Information

Test Method: LM-79-2019
Report Number: P688578
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2106-289-4)
Test Lab: INNOVATION CENTER
Issue Date: 5/22/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4R-PR1-075D-830-1-UNV-STD-W-4
Description: CORELITE SQ4R RECESSED LED LUMINAIRE WITH PERCEIVE RIPPLE CONTINUOUS LENS.
750 LUMENS PER FOOT
Light Source: 3000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2825.8 lumens
Efficiency: N/A
Efficacy: 105.4 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.23 / 1.34
Luminous Opening: Rectangular (W 0.29' x L: 3.83' x H: 0')
CIE Type: Direct

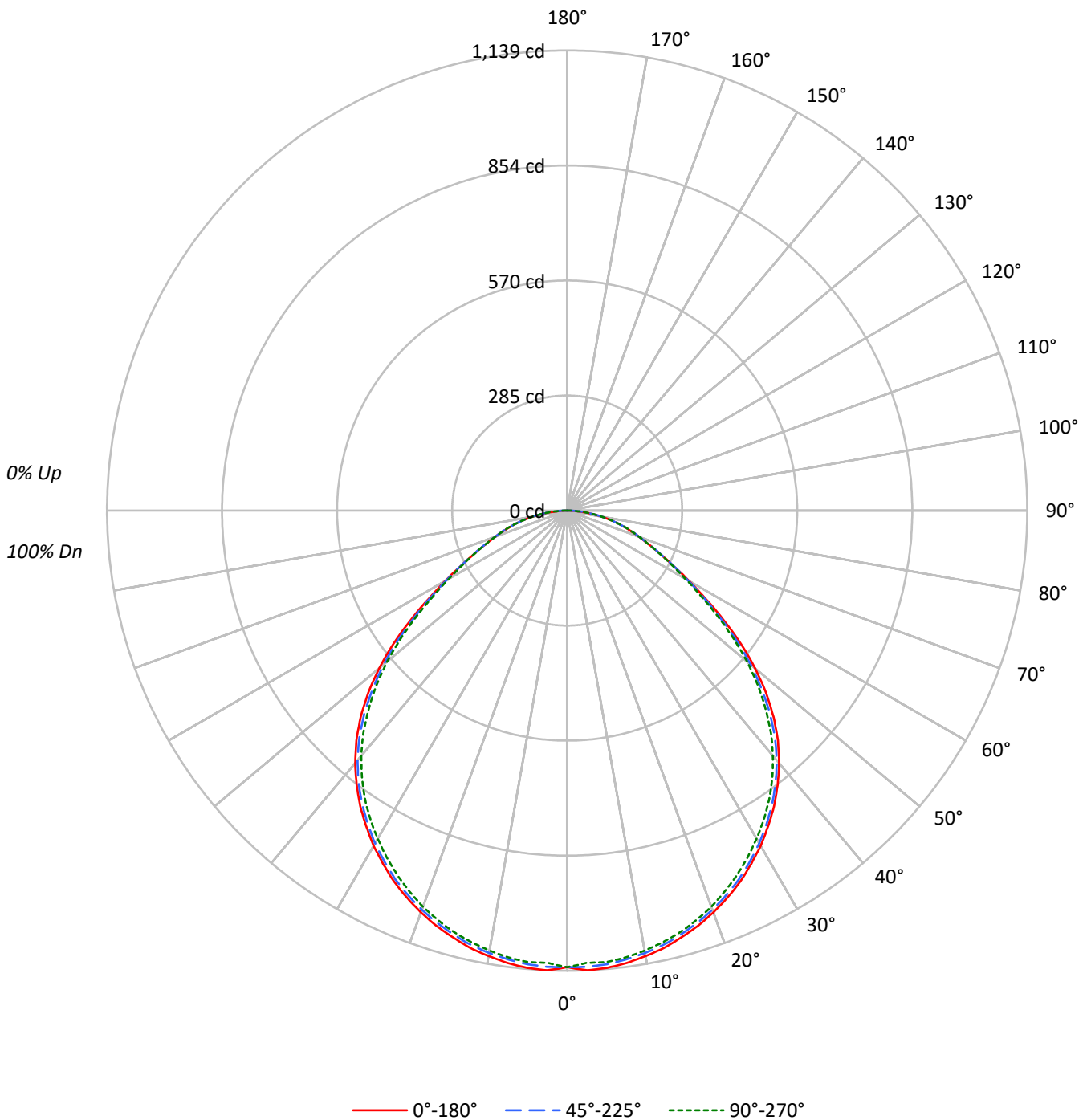
Input Watts (W): 26.8
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



TEST NUMBER: P688578

CATALOG NUMBER: SQ4R-PR1-075D-830-1-UNV-STD-W-4

Luminous Intensity Polar Plot



TEST NUMBER: P688578

CATALOG NUMBER: SQ4R-PR1-075D-830-1-UNV-STD-W-4

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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	110	105	101	98	107	103	99	96	99	96	93	95	92	90	91	89	87	85
2	100	93	86	81	98	91	85	80	87	82	78	84	80	76	81	78	75	72
3	92	82	74	68	90	80	73	68	78	71	66	75	70	65	72	68	64	62
4	85	73	65	58	82	72	64	58	69	63	57	67	61	56	65	60	56	54
5	78	66	57	51	76	65	57	50	63	55	50	61	54	49	59	53	49	47
6	72	59	51	45	70	58	50	44	57	49	44	55	49	44	53	48	43	41
7	67	54	46	40	65	53	45	39	52	44	39	50	44	39	49	43	39	37
8	63	49	41	36	61	49	41	35	47	40	35	46	40	35	45	39	35	33
9	58	45	37	32	57	45	37	32	44	37	32	43	36	32	42	36	31	30
10	55	42	34	29	54	41	34	29	40	34	29	40	33	29	39	33	29	27

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10882	10882	10882
5°	10980	10895	10839
10°	10945	10869	10812
15°	10897	10829	10771
20°	10842	10773	10693
25°	10766	10694	10569
30°	10650	10574	10423
35°	10493	10401	10252
40°	10254	10143	9960
45°	9836	9663	9464
50°	9099	8880	8705
55°	7943	7763	7598
60°	6693	6637	6504
65°	5788	5811	5766
70°	5317	5343	5343
75°	5107	5107	5141
80°	4801	4857	4801
85°	3866	4297	4297

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 9836 cd/sqm

TEST NUMBER: P688578

CATALOG NUMBER: SQ4R-PR1-075D-830-1-UNV-STD-W-4

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	106.9	3.8
10°-20°	306.0	10.8
20°-30°	461.5	16.3
30°-40°	550.0	19.5
40°-50°	542.6	19.2
50°-60°	413.9	14.6
60°-70°	255.4	9.0
70°-80°	145.5	5.2
80°-90°	43.9	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°	874.4	30.9
0°-40°	1424.5	50.4
0°-60°	2380.9	84.3
0°-90°	2825.8	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2825.8	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1130	1130	1130	1130	1130	
5°	1136	1124	1127	1124	1122	108
15°	1093	1082	1086	1083	1081	309
25°	1014	1001	1007	996	995	467
35°	893	882	885	873	872	558
45°	722	713	710	697	695	554
55°	473	465	462	455	453	424
65°	254	252	255	253	253	256
75°	137	137	137	138	138	145
85°	35	37	39	39	39	41
90°	0	0	0	0	0	

TEST NUMBER: P688578

CATALOG NUMBER: SQ4R-PR1-075D-830-1-UNV-STD-W-4

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1130.3	1130.3	1130.3	1130.3	1130.3
2.5°	1139.1	1126.4	1130.3	1127.4	1120.6
5°	1136.2	1123.5	1127.4	1123.5	1121.6
7.5°	1129.4	1116.7	1120.6	1116.7	1115.7
10°	1119.6	1107.9	1111.8	1107.9	1106.0
12.5°	1108.9	1096.3	1101.1	1096.3	1094.3
15°	1093.3	1081.7	1086.5	1082.6	1080.7
17.5°	1077.8	1065.1	1070.0	1066.1	1063.2
20°	1058.3	1046.6	1051.5	1044.7	1043.7
22.5°	1036.9	1025.2	1030.1	1020.3	1020.3
25°	1013.5	1000.8	1006.7	996.0	995.0
27.5°	986.2	974.6	979.4	968.7	967.7
30°	958.0	946.3	951.2	939.5	937.6
32.5°	925.9	915.2	919.1	907.4	906.4
35°	892.8	882.1	885.0	873.3	872.3
37.5°	855.8	846.0	848.0	835.3	834.4
40°	815.9	806.1	807.1	793.5	792.5
42.5°	772.1	762.3	761.3	747.7	746.7
45°	722.4	712.7	709.7	697.1	695.1
47.5°	667.9	658.1	652.3	641.6	640.6
50°	607.5	597.8	592.9	584.2	581.2
52.5°	542.3	532.6	528.7	520.9	517.9
55°	473.2	465.4	462.5	454.7	452.7
57.5°	407.0	401.1	400.1	392.4	391.4
60°	347.6	344.7	344.7	337.8	337.8
62.5°	296.9	295.0	296.9	293.1	292.1
65°	254.1	252.2	255.1	253.1	253.1
67.5°	218.1	218.1	220.0	219.1	219.1
70°	188.9	188.9	189.8	189.8	189.8
72.5°	162.6	161.6	164.5	164.5	163.6
75°	137.3	137.3	137.3	138.2	138.2
77.5°	112.0	112.0	112.9	112.9	112.0
80°	86.6	87.6	87.6	86.6	86.6
82.5°	61.3	62.3	62.3	62.3	61.3
85°	35.0	37.0	38.9	38.9	38.9
87.5°	12.7	16.6	19.5	19.5	18.5
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)