

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: P601202

Luminaire Tested: 24D3X-LP-90-L840

Issue Date: 10/6/2023

Test Information

Test Method: LM-79-2019
Report Number: P601202
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2305-008-4)
Test Lab: INNOVATION CENTER
Issue Date: 10/6/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: 24D3X-LP-90-L840
Description: 2x4 D3X-LP AT 9000LM 4000K 80CRI
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

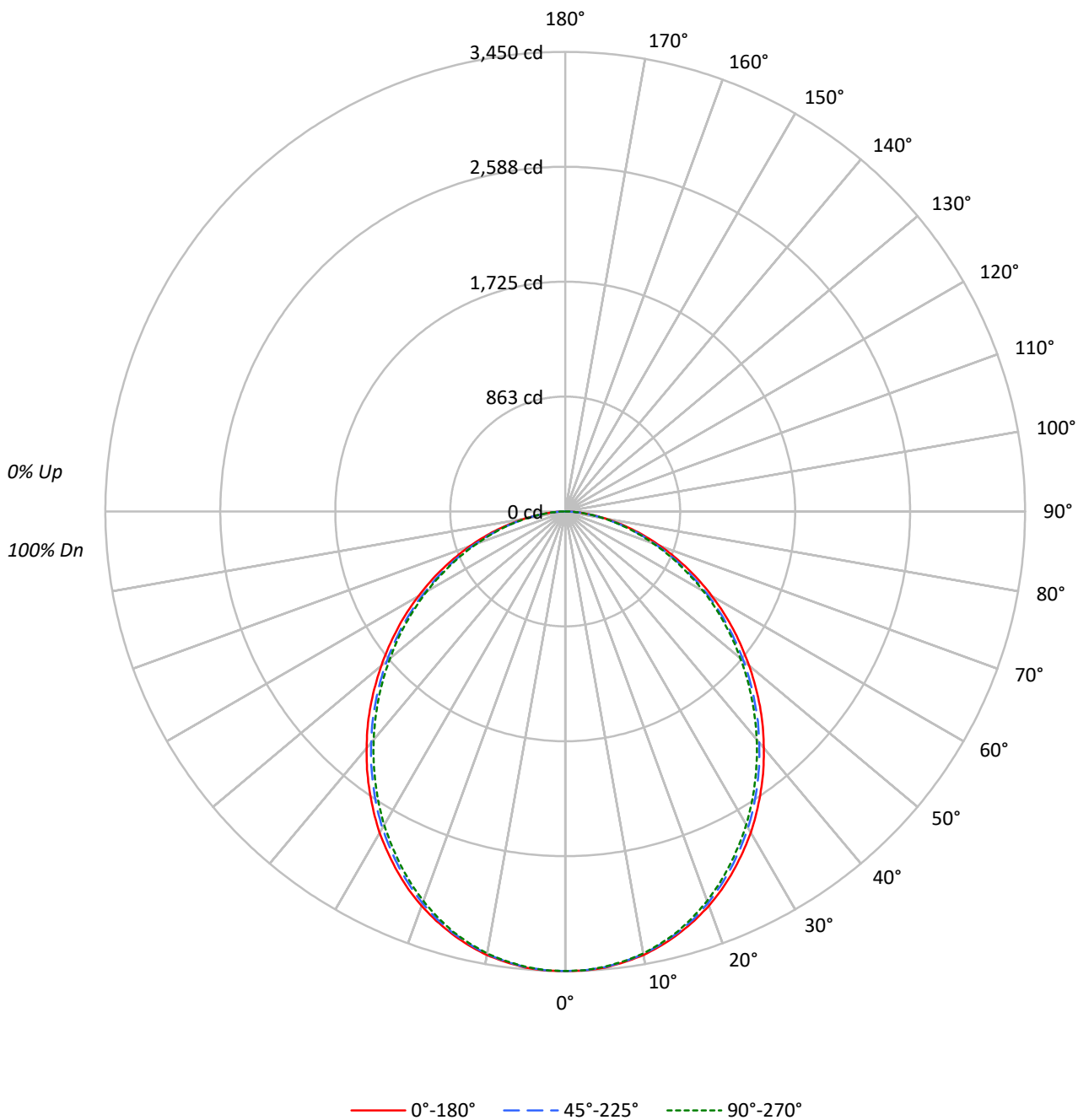
Lumens per Lamp: N/A
Luminaire Lumens: 8698.0 lumens
Efficiency: N/A
Efficacy: 124.8 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.18 / 1.29
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 69.7
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



TEST NUMBER: P601202
CATALOG NUMBER: 24D3X-LP-90-L840

Luminous Intensity Polar Plot





TEST NUMBER: P601202
 CATALOG NUMBER: 24D3X-LP-90-L840

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20	
RC	80				70				50				30				10	
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	109	105	100	97	106	102	99	95	98	95	92	94	92	89	91	89	87	85
2	100	92	85	79	97	90	84	78	86	81	77	83	79	75	80	76	73	71
3	91	81	73	67	89	79	72	66	76	70	65	74	68	64	71	66	63	60
4	84	72	63	57	81	71	63	56	68	61	56	66	60	55	64	58	54	52
5	77	64	56	49	75	63	55	49	61	54	48	59	53	48	57	52	47	45
6	71	58	49	43	69	57	49	43	55	48	43	54	47	42	52	46	42	40
7	66	53	44	38	64	52	44	38	51	43	38	49	42	38	48	42	37	35
8	62	48	40	34	60	48	40	34	46	39	34	45	39	34	44	38	33	32
9	58	44	36	31	56	44	36	31	43	36	31	42	35	31	41	35	30	29
10	54	41	33	28	53	41	33	28	40	33	28	39	32	28	38	32	28	26

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4641	4641	4641
5°	4642	4637	4633
10°	4619	4608	4604
15°	4573	4557	4546
20°	4511	4481	4455
25°	4425	4377	4343
30°	4327	4261	4220
35°	4204	4124	4078
40°	4071	3976	3928
45°	3932	3820	3764
50°	3771	3655	3590
55°	3605	3479	3414
60°	3419	3283	3222
65°	3219	3068	3006
70°	2994	2834	2763
75°	2717	2564	2522
80°	2354	2228	2240
85°	1942	1916	1791

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 3932 cd/sqm



TEST NUMBER: P601202
 CATALOG NUMBER: 24D3X-LP-90-L840

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	325.8	3.7
10°-20°	922.1	10.6
20°-30°	1358.9	15.6
30°-40°	1573.1	18.1
40°-50°	1553.1	17.9
50°-60°	1330.3	15.3
60°-70°	961.8	11.1
70°-80°	530.2	6.1
80°-90°	142.8	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°	2606.8	30.0
0°-40°	4179.9	48.1
0°-60°	7063.3	81.2
0°-90°	8698.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	8698.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3450	3450	3450	3450	3450	
5°	3437	3435	3433	3430	3430	326
15°	3283	3280	3272	3267	3263	926
25°	2981	2973	2948	2934	2925	1372
35°	2560	2543	2510	2489	2483	1600
45°	2066	2038	2007	1988	1978	1592
55°	1537	1508	1483	1462	1455	1374
65°	1011	988	964	949	944	1002
75°	523	506	493	492	485	555
85°	126	126	124	116	116	148
90°	0	0	0	0	0	



TEST NUMBER: P601202
 CATALOG NUMBER: 24D3X-LP-90-L840

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3449.6	3449.6	3449.6	3449.6	3449.6
2.5°	3449.6	3449.6	3446.4	3446.4	3446.4
5°	3436.6	3434.9	3433.3	3430.0	3430.0
7.5°	3412.1	3412.1	3407.2	3407.2	3403.9
10°	3381.0	3377.8	3372.9	3372.9	3369.6
12.5°	3336.9	3333.7	3327.1	3325.5	3320.6
15°	3283.0	3279.8	3271.6	3266.7	3263.4
17.5°	3221.0	3216.1	3206.3	3198.1	3191.6
20°	3150.7	3144.2	3129.5	3119.7	3111.5
22.5°	3070.7	3064.2	3042.9	3031.5	3023.3
25°	2980.9	2972.7	2948.2	2933.5	2925.3
27.5°	2884.5	2874.7	2846.9	2830.6	2822.4
30°	2784.9	2770.2	2742.4	2722.8	2716.3
32.5°	2673.8	2659.1	2631.3	2608.5	2601.9
35°	2559.5	2543.1	2510.5	2489.2	2482.7
37.5°	2441.9	2420.6	2391.2	2370.0	2360.2
40°	2317.7	2296.5	2263.8	2241.0	2236.1
42.5°	2193.6	2167.5	2139.7	2116.8	2107.0
45°	2066.2	2038.4	2007.4	1987.8	1978.0
47.5°	1932.3	1906.1	1878.3	1855.5	1847.3
50°	1801.6	1773.8	1746.0	1724.8	1715.0
52.5°	1667.6	1639.9	1613.7	1595.8	1586.0
55°	1537.0	1507.6	1483.1	1461.8	1455.3
57.5°	1404.7	1378.5	1350.8	1331.2	1326.3
60°	1270.7	1247.9	1220.1	1202.1	1197.2
62.5°	1141.7	1118.8	1092.7	1074.7	1066.6
65°	1011.0	988.2	963.7	949.0	944.1
67.5°	883.6	862.4	841.2	826.5	823.2
70°	761.1	739.9	720.3	707.2	702.3
72.5°	638.6	623.9	604.3	596.2	591.3
75°	522.7	506.3	493.3	491.6	485.1
77.5°	410.0	408.3	387.1	383.8	383.8
80°	303.8	298.9	287.5	284.2	289.1
82.5°	209.1	205.8	199.3	197.6	196.0
85°	125.8	125.8	124.1	116.0	116.0
87.5°	57.2	55.5	53.9	55.5	60.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)