

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: METALUX

Report Number: P188527

Luminaire Tested: **24SR-LD2-39-C-UNV-L830-CD1-PG-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P188527
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P24780)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24SR-LD2-39-C-UNV-L830-CD1-PG-U
Description: METALUX 2X4 SKYRIDGE LED FIXTURE WITH PRIMARY GREEN SKYTRIM.

Light Source: EATON LED 3000K
Ballast/Driver: OSRAM ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2387.0 lumens
Efficiency: N/A
Efficacy: 74.8 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 2.25 / 2.05
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

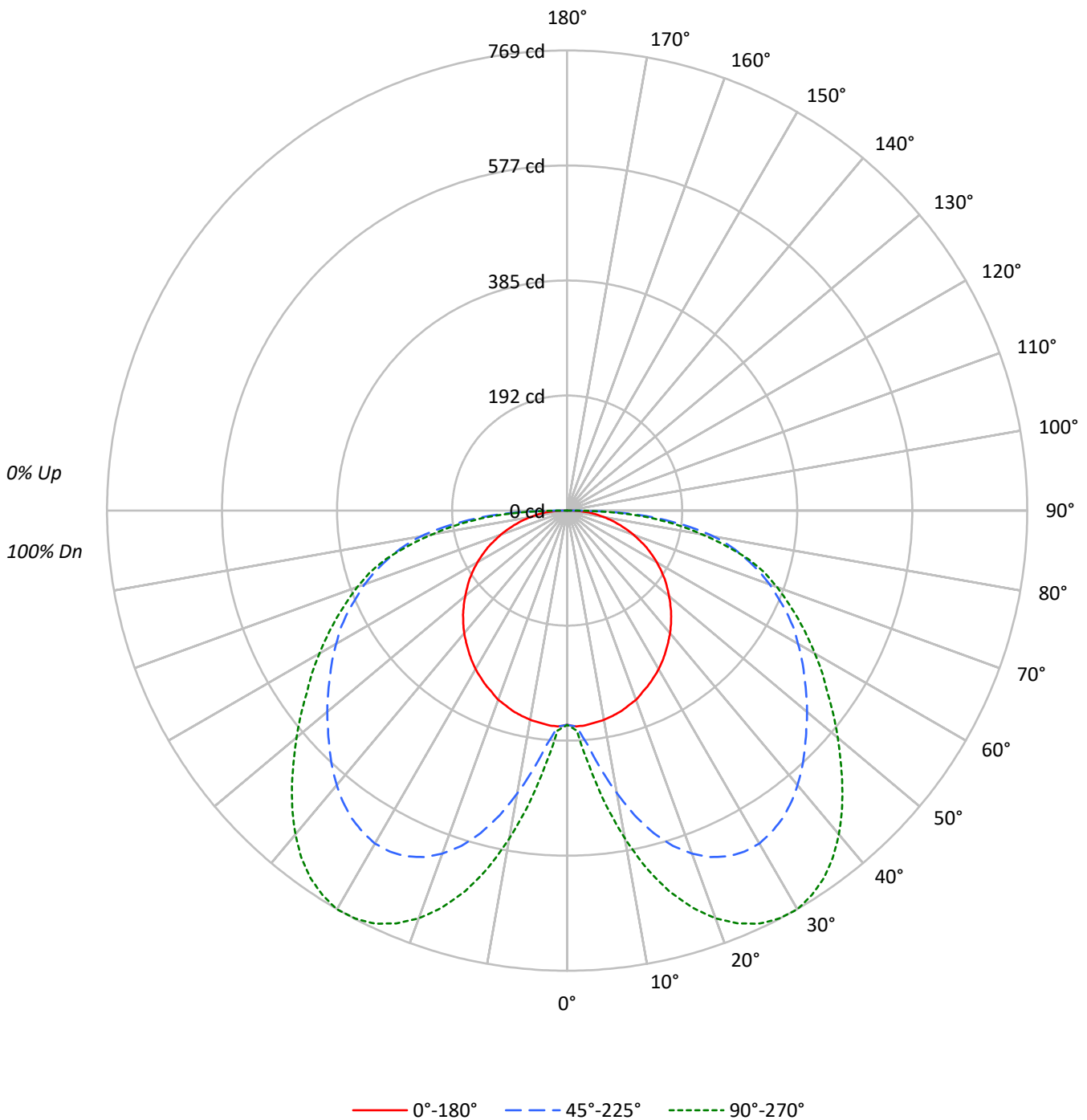
Input Watts (W): 31.9
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	106	100	95	90	103	98	93	88	93	89	86	89	86	83	86	83	80	78
2	95	85	77	70	92	83	76	69	80	73	68	76	71	66	73	69	65	62
3	86	73	64	57	83	72	63	56	69	61	55	66	59	54	63	58	53	51
4	78	64	54	47	75	63	54	46	60	52	46	58	51	45	55	49	44	42
5	71	57	47	39	69	56	46	39	53	45	39	51	44	38	49	43	38	35
6	65	51	41	34	63	50	40	34	48	39	33	46	39	33	44	38	33	30
7	60	46	36	29	58	45	36	29	43	35	29	42	34	29	40	33	28	26
8	56	41	32	26	54	41	32	26	39	31	25	38	31	25	37	30	25	23
9	52	38	29	23	50	37	29	23	36	28	23	35	28	23	34	27	22	20
10	49	34	26	20	47	34	26	20	33	25	20	32	25	20	31	25	20	18

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	482	482	482
5°	486	530	581
10°	485	656	761
15°	484	777	917
20°	482	873	1038
25°	478	946	1131
30°	475	998	1195
35°	472	1031	1230
40°	470	1052	1241
45°	468	1069	1237
50°	465	1096	1236
55°	466	1135	1246
60°	466	1199	1287
65°	467	1290	1353
70°	465	1417	1467
75°	465	1606	1631
80°	480	1929	1776
85°	562	2399	2157



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	39.9	1.7
10°-20°	150.7	6.3
20°-30°	274.1	11.5
30°-40°	363.7	15.2
40°-50°	398.4	16.7
50°-60°	391.6	16.4
60°-70°	355.2	14.9
70°-80°	281.5	11.8
80°-90°	131.9	5.5
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°	464.7	19.5
0°-40°	828.3	34.7
0°-60°	1618.3	67.8
0°-90°	2387.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2387.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	358	358	358	358	358	
5°	360	363	392	420	430	34
15°	347	431	558	633	658	98
25°	322	476	638	728	762	148
35°	287	465	628	717	749	180
45°	246	418	562	630	650	190
55°	199	367	484	522	531	177
65°	147	317	405	417	425	144
75°	90	245	309	309	314	95
85°	36	132	155	140	140	37
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	358.1	358.1	358.1	358.1	358.1	358.1	358.1	358.1	358.1	358.1	358.1
2.5°	361.1	360.1	360.1	360.1	359.1	359.1	359.1	360.1	360.1	361.1	363.0
5°	360.1	359.1	359.1	359.1	361.1	364.0	369.9	376.8	384.7	392.5	401.4
7.5°	357.1	357.1	357.1	360.1	368.9	380.7	395.5	410.2	423.0	436.8	449.6
10°	355.1	355.1	357.1	367.0	384.7	404.3	424.0	443.7	461.4	480.1	497.8
12.5°	351.2	351.2	357.1	375.8	400.4	426.0	450.6	475.2	498.8	521.4	541.1
15°	347.3	347.3	360.1	386.6	416.1	446.6	476.2	504.7	532.2	557.8	580.4
17.5°	341.4	342.4	362.0	394.5	429.9	464.4	496.8	529.3	558.8	587.3	610.9
20°	336.5	338.4	364.0	401.4	440.7	479.1	515.5	549.0	580.4	610.0	635.5
22.5°	328.6	332.5	365.0	406.3	448.6	489.9	527.3	562.7	596.2	626.7	652.3
25°	321.7	326.6	364.0	408.3	454.5	496.8	535.2	571.6	606.0	637.5	664.1
27.5°	313.8	321.7	363.0	409.3	456.5	499.8	539.1	576.5	610.9	642.4	670.0
30°	306.0	315.8	360.1	408.3	455.5	498.8	538.1	576.5	610.9	642.4	669.0
32.5°	297.1	307.9	354.2	403.4	451.6	493.9	533.2	570.6	606.0	636.5	663.1
35°	287.3	300.1	347.3	396.5	443.7	486.0	524.4	561.7	596.2	627.7	653.2
37.5°	277.4	292.2	339.4	388.6	434.8	476.2	513.5	550.9	584.4	614.9	639.5
40°	267.6	283.3	330.6	378.8	424.0	464.4	501.7	538.1	569.6	599.1	621.8
42.5°	256.8	274.5	320.7	367.9	411.2	450.6	488.0	523.4	553.9	581.4	603.1
45°	245.9	263.7	309.9	356.1	399.4	436.8	473.2	507.6	536.2	561.7	582.4
47.5°	234.1	253.8	300.1	344.3	385.6	424.0	459.4	490.9	519.4	542.1	561.7
50°	222.3	243.0	288.3	332.5	372.9	410.2	444.7	475.2	501.7	523.4	540.1
52.5°	210.5	232.2	277.4	320.7	361.1	397.5	430.9	459.4	484.0	503.7	520.4
55°	198.7	221.4	266.6	308.9	349.2	384.7	417.1	443.7	467.3	484.0	497.8
57.5°	185.9	210.5	255.8	298.1	337.4	372.9	403.4	428.9	450.6	465.3	477.1
60°	173.1	198.7	244.0	287.3	325.6	360.1	389.6	414.2	432.9	445.7	456.5
62.5°	159.4	186.9	233.2	275.5	313.8	347.3	374.8	396.5	415.2	427.0	432.9
65°	146.6	175.1	221.4	263.7	301.0	332.5	359.1	379.7	395.5	405.3	410.2
67.5°	131.8	162.3	208.6	250.9	286.3	316.8	341.4	361.1	374.8	381.7	385.6
70°	118.1	149.5	194.8	236.1	269.6	299.1	322.7	341.4	353.2	360.1	361.1
72.5°	103.3	135.8	181.0	220.4	252.8	280.4	303.0	319.7	329.6	335.5	336.5
75°	89.5	121.0	164.3	201.7	232.2	257.8	279.4	295.1	305.0	308.9	308.9
77.5°	75.8	105.3	146.6	182.0	210.5	234.1	253.8	269.6	277.4	281.4	281.4
80°	62.0	90.5	127.9	160.4	185.9	207.6	227.3	241.0	248.9	248.9	243.0
82.5°	49.2	73.8	106.2	135.8	157.4	177.1	195.8	204.6	206.6	204.6	199.7
85°	36.4	56.1	82.6	105.3	124.9	138.7	150.5	156.4	157.4	155.4	151.5
87.5°	20.7	32.5	47.2	62.0	74.8	81.7	91.5	93.5	93.5	96.4	91.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
0°	358.1	358.1	358.1	358.1	358.1	358.1	358.1	358.1
2.5°	364.0	365.0	365.0	367.9	367.9	368.9	367.9	367.9
5°	407.3	411.2	417.1	423.0	425.0	428.9	428.0	429.9
7.5°	459.4	467.3	476.2	484.0	488.0	491.9	492.9	495.8
10°	511.6	521.4	532.2	543.1	549.0	551.9	555.8	556.8
12.5°	556.8	571.6	582.4	594.2	602.1	606.0	610.0	611.9
15°	598.1	612.9	626.7	639.5	647.3	653.2	657.2	658.2
17.5°	629.6	646.4	661.1	674.9	682.8	689.6	693.6	695.5
20°	654.2	672.9	687.7	701.4	710.3	718.2	724.1	725.1
22.5°	671.9	690.6	707.3	721.1	731.9	739.8	744.7	746.7
25°	684.7	704.4	721.1	734.9	745.7	754.6	759.5	761.5
27.5°	690.6	711.3	729.0	741.8	752.6	761.5	767.4	768.3
30°	691.6	711.3	729.0	742.8	753.6	762.4	767.4	769.3
32.5°	684.7	705.4	723.1	735.9	746.7	755.6	760.5	761.5
35°	674.9	693.6	710.3	723.1	733.9	741.8	746.7	748.7
37.5°	660.1	677.8	693.6	705.4	715.2	723.1	728.0	730.0
40°	642.4	659.1	673.9	684.7	693.6	700.5	704.4	706.4
42.5°	621.8	637.5	651.3	660.1	669.0	674.9	677.8	679.8
45°	600.1	614.9	625.7	633.6	641.4	646.4	649.3	650.3
47.5°	577.5	590.3	599.1	606.0	611.9	616.8	619.8	619.8
50°	554.9	565.7	572.6	579.5	584.4	587.3	589.3	590.3
52.5°	532.2	541.1	546.0	551.9	555.8	558.8	560.8	560.8
55°	508.6	515.5	519.4	524.4	528.3	530.3	532.2	531.2
57.5°	486.0	490.9	493.9	497.8	500.8	502.7	504.7	505.7
60°	462.4	466.3	467.3	471.2	474.2	476.2	477.1	478.1
62.5°	437.8	440.7	442.7	444.7	447.6	449.6	450.6	451.6
65°	413.2	415.2	415.2	419.1	422.0	423.0	424.0	425.0
67.5°	387.6	388.6	389.6	392.5	395.5	396.5	398.4	398.4
70°	362.0	362.0	363.0	366.0	368.9	369.9	371.9	372.9
72.5°	335.5	336.5	336.5	339.4	342.4	344.3	345.3	346.3
75°	307.9	307.9	308.9	309.9	310.9	311.9	311.9	313.8
77.5°	278.4	274.5	272.5	270.5	271.5	271.5	270.5	271.5
80°	237.1	232.2	229.2	228.2	229.2	228.2	228.2	229.2
82.5°	194.8	188.9	186.9	185.9	185.9	185.9	185.0	186.9
85°	146.6	142.7	140.7	138.7	139.7	139.7	138.7	139.7
87.5°	88.5	86.6	84.6	82.6	83.6	82.6	81.7	84.6
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)