

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



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: METALUX

Report Number: P892922

Luminaire Tested: 2MB-SC3-AOL-UNV-CC83-HI-4000K

Issue Date: 11/11/2024

Test Information

Test Method: LM-79-2019
Report Number: P892922
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2404-077-2)
Test Lab: INNOVATION CENTER
Issue Date: 11/11/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: METALUX
Catalog Number: 2MB-SC3-AOL-UNV-CC83-HI-4000K
Description: Selectable 2FT MICROBAY LINEAR BAY with AISLE OPTICS WITH CLEAR LENS NO UPLIGHT, 800
4000K CCT, HI lumen setting
Light Source: -
Ballast/Driver: -

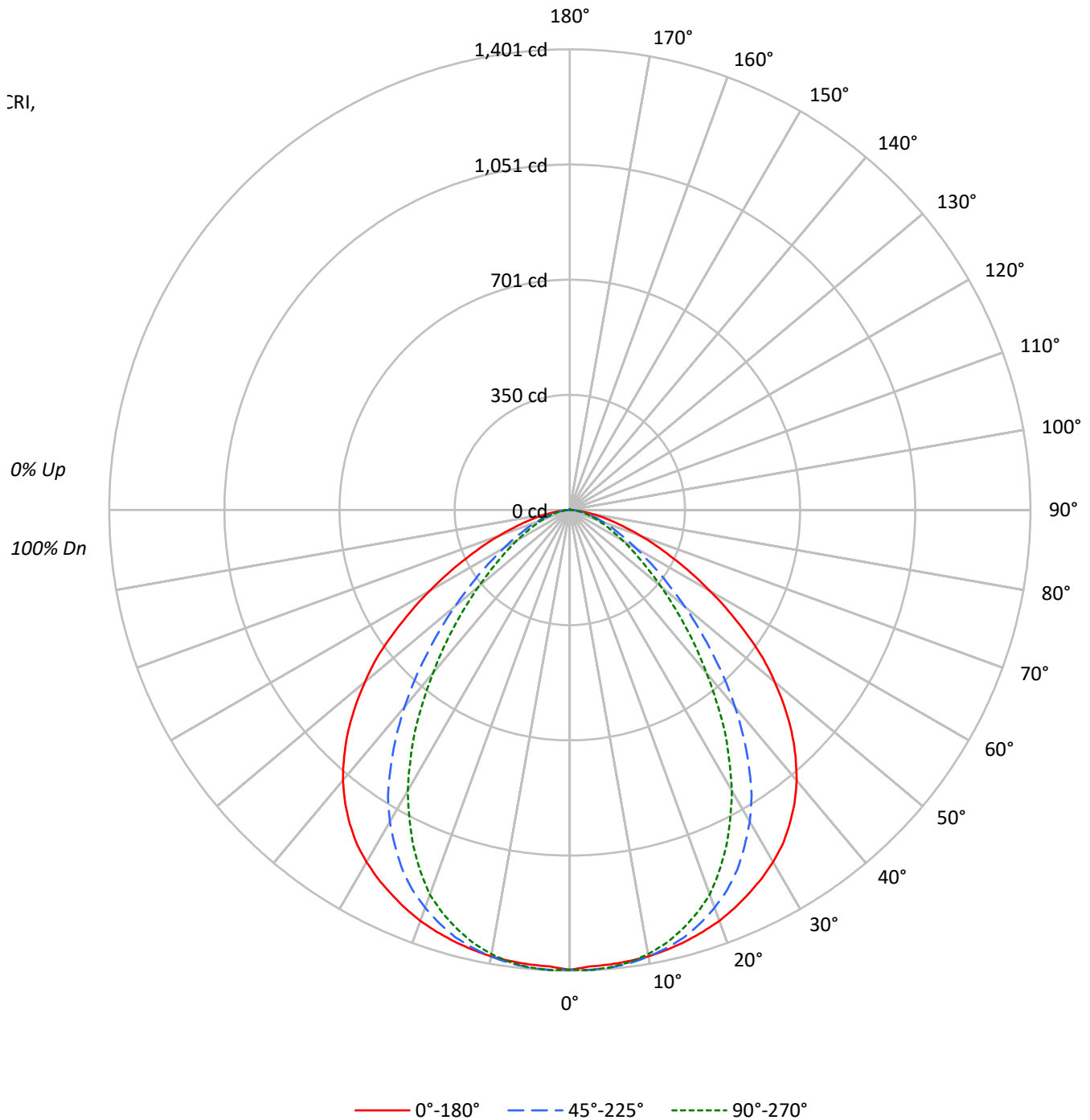
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2849.9 lumens
Efficiency: N/A
Efficacy: 135.7 lumens/watt
Spacing Criteria (0/90/45): 1.31 / 1.08 / 1.18
Luminous Opening: Rectangular (W 0.27' x L: 1.98' x H: 0')
CIE Type: Direct

Input Watts (W): 21
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: 0.996
Total Harmonic Distortion (THDi): 5.39961257980444
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				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	102	102	102	100
1	111	107	103	100	108	104	101	98	100	97	95	96	94	92	93	91	89	89	89	89	87
2	102	95	89	84	100	93	88	83	90	85	81	87	83	80	84	81	78	78	78	78	76
3	94	85	78	72	92	84	77	72	81	75	71	78	73	69	76	72	68	68	68	68	66
4	87	77	69	63	85	75	68	63	73	67	62	71	65	61	69	64	60	60	60	60	58
5	81	69	61	55	79	68	61	55	66	60	55	64	59	54	63	58	53	53	53	53	52
6	75	63	55	49	73	62	55	49	61	54	49	59	53	48	57	52	48	48	48	48	46
7	70	58	50	44	69	57	49	44	56	49	44	54	48	43	53	47	43	43	43	43	41
8	66	53	45	40	64	52	45	40	51	44	40	50	44	39	49	43	39	39	39	39	37
9	62	49	42	36	60	49	41	36	47	41	36	46	40	36	45	40	36	36	36	36	34
10	58	46	38	33	57	45	38	33	44	38	33	43	37	33	42	37	33	33	33	33	31

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	28624	28624	28624
5°	28520	28713	28694
10°	28652	28673	28515
15°	28792	28512	27991
20°	28977	28051	27125
25°	29084	27248	25454
30°	29231	25879	23308
35°	29154	23720	20555
40°	28700	20892	17281
45°	27643	17653	14259
50°	25924	14513	11500
55°	23415	11777	9246
60°	20165	9485	7662
65°	16759	7830	6367
70°	13752	6562	5430
75°	10918	5609	4707
80°	8243	4788	4233
85°	5545	4440	3994

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 27643 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	132.7	4.7
10°-20°	378.3	13.3
20°-30°	554.1	19.4
30°-40°	604.7	21.2
40°-50°	512.7	18.0
50°-60°	348.5	12.2
60°-70°	196.9	6.9
70°-80°	89.8	3.2
80°-90°	23.5	0.8
90°-100°	3.0	0.1
100°-110°	1.8	0.1
110°-120°	1.0	0.0
120°-130°	0.8	0.0
130°-140°	0.7	0.0
140°-150°	0.6	0.0
150°-160°	0.4	0.0
160°-170°	0.4	0.0
170°-180°	0.1	0.0
0°-30°	1065.1	37.4
0°-40°	1669.8	58.6
0°-60°	2531.0	88.8
0°-90°	2841.1	99.7
90°-120°	5.8	0.2
90°-150°	7.9	0.3
90°-180°	9.0	0.3
0°-180°	2849.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1398	1398	1398	1398	1398	
5°	1388	1395	1397	1400	1396	132
15°	1358	1357	1345	1330	1320	384
25°	1287	1266	1206	1151	1127	594
35°	1166	1092	949	850	822	728
45°	955	806	610	518	492	733
55°	656	485	330	274	259	585
65°	346	246	162	138	131	348
75°	138	101	71	62	60	149
85°	24	22	19	18	17	29
90°	0	3	4	5	5	1
95°	0	1	3	5	5	0
105°	0	1	2	3	3	0
115°	0	0	1	2	2	0
125°	0	0	1	2	2	0
135°	1	1	1	1	1	1
145°	1	1	1	1	1	1
155°	1	1	1	1	1	0
165°	1	1	1	2	2	0
175°	1	1	2	2	2	0
180°	2	2	2	2	2	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1397.9	1397.9	1397.9	1397.9	1397.9
2.5°	1389.4	1396.9	1399.8	1403.5	1400.7
5°	1387.5	1395.0	1396.9	1399.8	1396.0
7.5°	1383.7	1390.3	1390.3	1390.3	1387.5
10°	1378.0	1382.8	1379.0	1375.2	1371.4
12.5°	1369.5	1371.4	1363.9	1357.2	1349.7
15°	1358.2	1357.2	1345.0	1329.8	1320.4
17.5°	1345.0	1341.2	1318.5	1298.6	1285.4
20°	1329.8	1320.4	1287.3	1256.1	1244.8
22.5°	1310.0	1296.7	1250.4	1207.0	1188.1
25°	1287.3	1265.6	1206.0	1151.2	1126.6
27.5°	1263.7	1231.5	1151.2	1083.1	1056.7
30°	1236.3	1191.8	1094.5	1016.0	985.8
32.5°	1205.1	1148.4	1029.3	934.8	902.6
35°	1166.3	1091.6	948.9	849.7	822.3
37.5°	1122.8	1031.2	867.6	764.6	731.5
40°	1073.7	962.2	781.6	678.6	646.5
42.5°	1016.0	888.4	696.6	596.4	569.0
45°	954.6	806.2	609.6	517.9	492.4
47.5°	885.6	724.9	530.2	443.3	423.4
50°	813.8	643.6	455.6	380.9	361.0
52.5°	741.0	562.4	386.6	323.2	306.2
55°	655.9	484.9	329.9	274.1	259.0
57.5°	572.8	415.9	276.0	229.7	220.2
60°	492.4	349.7	231.6	193.8	187.1
62.5°	417.8	293.0	194.7	163.5	155.0
65°	345.9	245.7	161.6	138.0	131.4
67.5°	284.5	200.4	135.2	114.4	108.7
70°	229.7	161.6	109.6	93.6	90.7
72.5°	178.6	129.5	89.8	77.5	74.7
75°	138.0	101.1	70.9	62.4	59.5
77.5°	101.1	75.6	54.8	48.2	46.3
80°	69.9	53.9	40.6	36.9	35.9
82.5°	44.4	35.0	29.3	26.5	26.5
85°	23.6	21.7	18.9	18.0	17.0
87.5°	9.5	10.4	10.4	10.4	9.5
90°	0.0	2.8	3.8	4.7	4.7
92.5°	0.0	1.9	3.8	4.7	4.7
95°	0.0	0.9	2.8	4.7	4.7
97.5°	0.0	0.9	2.8	3.8	3.8
100°	0.0	0.9	1.9	3.8	3.8
102.5°	0.0	0.9	1.9	2.8	3.8
105°	0.0	0.9	1.9	2.8	2.8
107.5°	0.0	0.0	1.9	2.8	2.8
110°	0.0	0.0	0.9	1.9	2.8



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0.0	0.0	0.9	1.9	2.8
115°	0.0	0.0	0.9	1.9	1.9
117.5°	0.0	0.0	0.9	1.9	1.9
120°	0.0	0.0	0.9	1.9	1.9
122.5°	0.0	0.0	0.9	1.9	1.9
125°	0.0	0.0	0.9	1.9	1.9
127.5°	0.0	0.9	0.9	0.9	1.9
130°	0.0	0.9	0.9	0.9	1.9
132.5°	0.9	0.9	0.9	0.9	0.9
135°	0.9	0.9	0.9	0.9	0.9
137.5°	0.9	0.9	0.9	0.9	0.9
140°	0.9	0.9	0.9	0.9	0.9
142.5°	0.9	0.9	0.9	0.9	0.9
145°	0.9	0.9	0.9	0.9	0.9
147.5°	0.9	0.9	0.9	0.9	0.9
150°	0.9	0.9	0.9	0.9	0.9
152.5°	0.9	0.9	0.9	0.9	0.9
155°	0.9	0.9	0.9	0.9	0.9
157.5°	0.9	0.9	0.9	0.9	0.9
160°	0.9	0.9	0.9	0.9	1.9
162.5°	0.9	0.9	0.9	1.9	1.9
165°	0.9	0.9	0.9	1.9	1.9
167.5°	0.9	0.9	0.9	1.9	1.9
170°	0.9	0.9	0.9	1.9	1.9
172.5°	0.9	0.9	0.9	1.9	1.9
175°	0.9	0.9	1.9	1.9	1.9
177.5°	0.9	0.9	1.9	1.9	1.9
180°	1.9	1.9	1.9	1.9	1.9



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CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	21.99	23.43	22.36	23.75	24.08	17.35	18.80	17.72	19.12	19.44
	3H	23.24	24.53	23.63	24.87	25.24	18.39	19.68	18.78	20.02	20.39
	4H	23.64	24.85	24.05	25.20	25.59	18.76	19.97	19.17	20.32	20.71
	6H	23.88	24.99	24.30	25.36	25.76	19.02	20.13	19.44	20.51	20.91
	8H	23.93	24.99	24.37	25.39	25.80	19.11	20.17	19.55	20.56	20.97
	12H	23.95	24.96	24.39	25.35	25.79	19.18	20.19	19.62	20.58	21.01
4H	2H	22.00	23.21	22.41	23.56	23.95	17.93	19.13	18.33	19.49	19.87
	3H	23.41	24.40	23.83	24.81	25.22	19.15	20.14	19.57	20.55	20.96
	4H	23.90	24.79	24.34	25.22	25.66	19.61	20.50	20.05	20.92	21.37
	6H	24.25	25.02	24.71	25.47	25.94	19.97	20.74	20.43	21.19	21.66
	8H	24.33	25.05	24.80	25.50	25.98	20.09	20.81	20.56	21.26	21.74
	12H	24.38	25.02	24.87	25.51	25.99	20.19	20.83	20.68	21.32	21.80
8H	4H	23.90	24.62	24.37	25.07	25.54	19.90	20.62	20.37	21.07	21.55
	6H	24.29	24.88	24.79	25.38	25.87	20.35	20.94	20.85	21.44	21.93
	8H	24.41	24.94	24.93	25.46	25.96	20.53	21.06	21.05	21.58	22.07
	12H	24.50	24.97	25.02	25.47	26.05	20.69	21.16	21.21	21.66	22.24
12H	4H	23.87	24.51	24.36	25.00	25.48	19.93	20.57	20.42	21.06	21.54
	6H	24.26	24.79	24.78	25.31	25.81	20.40	20.93	20.92	21.45	21.95
	8H	24.41	24.89	24.93	25.38	25.96	20.63	21.10	21.15	21.60	22.17