

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: P894619

Luminaire Tested: 8TMB-14HL-LVRA-UNV-L940

Issue Date: 11/11/2024

Test Information

Test Method: LM-79-2019
Report Number: P894619
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2404-077-26)
Test Lab: INNOVATION CENTER
Issue Date: 11/11/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: METALUX
Catalog Number: 8TMB-14HL-LVRA-UNV-L940
Description: 14000 Lumen 8FT MICROBAY LINEAR BAY with LOUVER WITH AISLE OPTIC, 90CRI, 4000K CCT
Light Source: -
Ballast/Driver: -

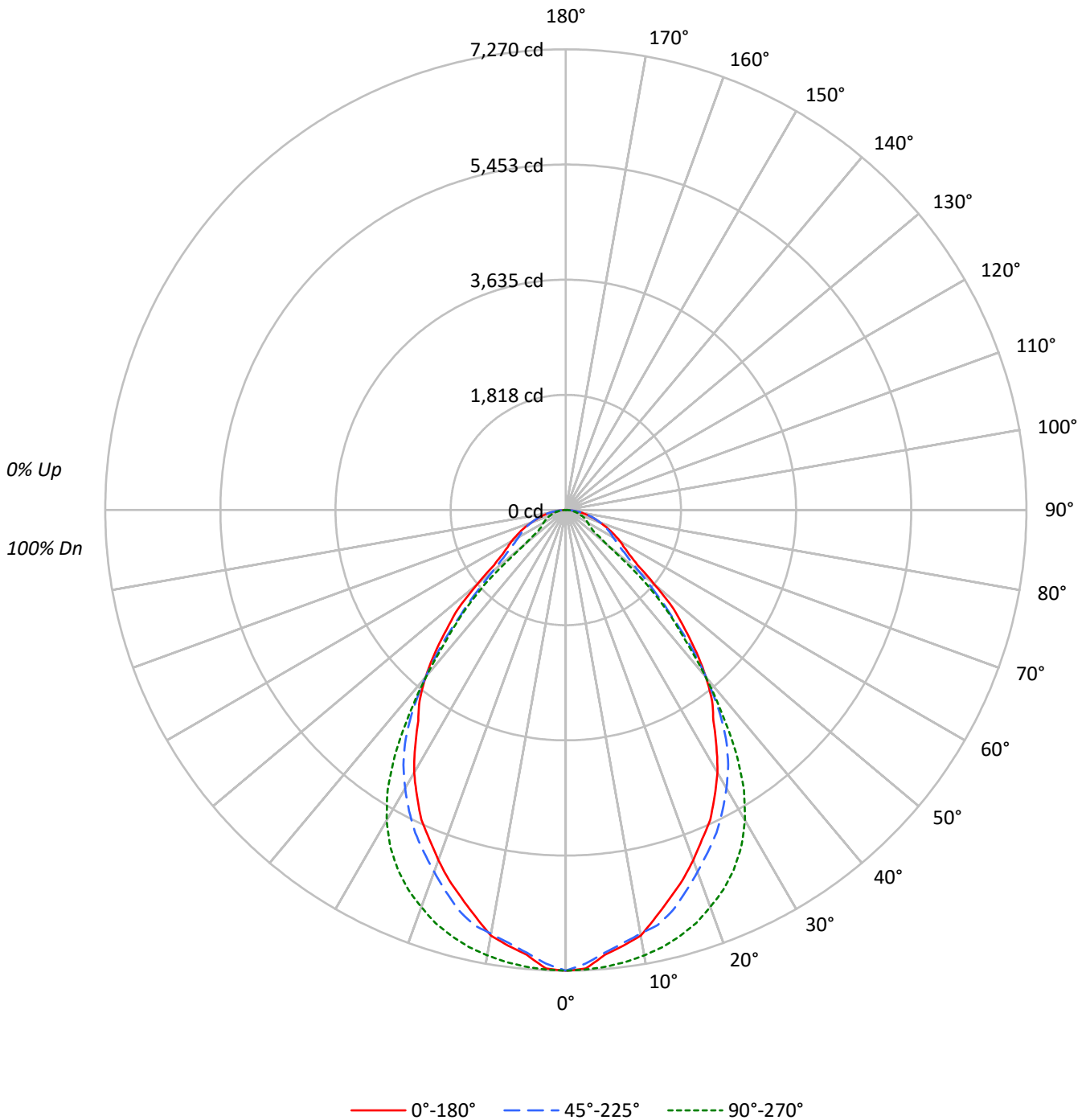
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 11799.0 lumens
Efficiency: N/A
Efficacy: 113.9 lumens/watt
Spacing Criteria (0/90/45): 1.02 / 1.16 / 1.12
Luminous Opening: Rectangular (W 0.38' x L: 7.98' x H: 0')
CIE Type: Direct

Input Watts (W): 103.6
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: 0.997
Total Harmonic Distortion (THDi): 5.03
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT

TEST NUMBER: P894619
CATALOG NUMBER: 8TMB-14HL-LVRA-UNV-L940

Luminous Intensity Polar Plot





TEST NUMBER: P894619
 CATALOG NUMBER: 8TMB-14HL-LVRA-UNV-L940

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
RCR																				
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100	100	100
1	111	107	104	101	108	105	102	99	101	98	96	97	95	93	93	92	90	88	88	88
2	103	96	91	86	101	95	90	85	91	87	83	88	85	82	85	82	80	78	78	78
3	96	87	80	75	94	86	80	75	83	78	73	80	76	72	78	74	71	69	69	69
4	89	79	72	66	87	78	71	66	76	70	65	73	68	64	71	67	63	62	62	62
5	83	72	65	59	81	71	64	59	69	63	58	67	62	58	66	61	57	55	55	55
6	78	66	59	53	76	65	58	53	64	57	53	62	57	52	61	56	52	50	50	50
7	73	61	54	48	71	60	53	48	59	52	48	58	52	47	56	51	47	45	45	45
8	68	57	49	44	67	56	49	44	55	48	44	53	48	43	52	47	43	41	41	41
9	64	52	45	40	63	52	45	40	51	44	40	50	44	40	49	44	40	38	38	38
10	61	49	42	37	60	48	42	37	47	41	37	47	41	37	46	40	37	35	35	35

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	25795	25795	25795
5°	25100	24986	25767
10°	24566	24458	25707
15°	23298	24014	25562
20°	22194	22944	25172
25°	21112	22014	24530
30°	19614	20781	23161
35°	17588	19097	20314
40°	15934	15968	15882
45°	13323	11799	11508
50°	10063	8305	4706
55°	7569	6641	2967
60°	7034	6116	2859
65°	6544	6104	2863
70°	5987	5987	2819
75°	5677	5830	2723
80°	5245	5513	2795
85°	4576	4804	3049

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 22.5°
 Vertical Angle: 45°
 Luminance: 13633 cd/sqm



TEST NUMBER: P894619
 CATALOG NUMBER: 8TMB-14HL-LVRA-UNV-L940

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	671.6	5.7
10°-20°	1850.4	15.7
20°-30°	2623.9	22.2
30°-40°	2703.2	22.9
40°-50°	1888.1	16.0
50°-60°	906.0	7.7
60°-70°	635.6	5.4
70°-80°	397.4	3.4
80°-90°	122.9	1.0
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°	5145.8	43.6
0°-40°	7849.0	66.5
0°-60°	10643.1	90.2
0°-90°	11799.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	11799.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	7270	7270	7270	7270	7270	
5°	7047	7038	7015	7199	7234	667
15°	6342	6389	6537	6725	6959	1786
25°	5393	5447	5623	6003	6266	2466
35°	4060	4171	4409	4501	4690	2559
45°	2655	2717	2352	2232	2293	2046
55°	1224	1164	1074	688	480	1147
65°	780	729	727	553	341	772
75°	414	408	425	367	199	436
85°	112	112	118	116	75	126
90°	0	0	0	0	0	



TEST NUMBER: P894619
 CATALOG NUMBER: 8TMB-14HL-LVRA-UNV-L940

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	7270.0	7270.0	7270.0	7270.0	7270.0
2.5°	7241.9	7219.5	7165.1	7264.4	7256.9
5°	7047.1	7037.7	7015.2	7198.8	7234.4
7.5°	6936.5	6917.8	6891.6	7093.9	7193.2
10°	6818.5	6841.0	6788.5	6974.0	7135.1
12.5°	6574.9	6634.9	6706.1	6850.3	7063.9
15°	6342.5	6389.4	6537.4	6724.8	6959.0
17.5°	6125.2	6179.5	6306.9	6588.0	6837.2
20°	5877.9	5952.8	6076.5	6436.2	6666.7
22.5°	5623.0	5692.4	5847.9	6233.9	6490.6
25°	5392.6	5446.9	5623.0	6003.4	6265.7
27.5°	5087.2	5188.3	5355.1	5722.3	5997.8
30°	4787.4	4873.6	5072.2	5381.3	5653.0
32.5°	4425.7	4551.3	4770.5	5006.6	5233.3
35°	4060.4	4170.9	4408.9	4500.7	4689.9
37.5°	3794.3	3824.3	3959.2	3947.9	4054.7
40°	3440.2	3500.1	3447.6	3307.1	3428.9
42.5°	3057.9	3129.1	2917.4	2754.4	2797.5
45°	2655.1	2716.9	2351.5	2231.6	2293.4
47.5°	2306.6	2300.9	1896.2	1815.6	1729.4
50°	1823.1	1883.1	1504.6	1354.7	852.5
52.5°	1424.0	1446.5	1240.4	865.7	560.2
55°	1223.5	1163.6	1073.6	687.7	479.7
57.5°	1086.8	1011.8	951.9	638.9	438.5
60°	991.2	906.9	861.9	607.1	402.9
62.5°	882.5	816.9	800.1	579.0	371.0
65°	779.5	728.9	727.0	552.7	341.0
67.5°	676.4	648.3	655.8	520.9	307.3
70°	577.1	571.5	577.1	479.7	271.7
72.5°	492.8	487.2	502.2	427.2	232.3
75°	414.1	408.5	425.3	367.2	198.6
77.5°	329.8	333.5	344.8	305.4	166.8
80°	256.7	256.7	269.8	239.8	136.8
82.5°	183.6	185.5	193.0	176.1	106.8
85°	112.4	112.4	118.0	116.2	74.9
87.5°	37.5	43.1	50.6	54.3	37.5
90°	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P894619
 CATALOG NUMBER: 8TMB-14HL-LVRA-UNV-L940

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	16.94	18.29	17.30	18.61	18.92	13.27	14.62	13.64	14.94	15.25
	3H	18.68	19.88	19.06	20.21	20.58	15.25	16.45	15.63	16.78	17.15
	4H	19.35	20.48	19.75	20.83	21.21	15.95	17.08	16.35	17.43	17.81
	6H	19.86	20.89	20.27	21.26	21.66	16.47	17.51	16.89	17.88	18.28
	8H	20.03	21.01	20.46	21.40	21.81	16.66	17.65	17.09	18.04	18.44
	12H	20.14	21.08	20.57	21.46	21.89	16.80	17.74	17.23	18.12	18.55
4H	2H	17.47	18.60	17.87	18.95	19.33	14.89	16.02	15.30	16.37	16.75
	3H	19.45	20.38	19.86	20.78	21.18	17.07	18.00	17.48	18.40	18.81
	4H	20.25	21.08	20.68	21.50	21.94	17.95	18.79	18.39	19.20	19.65
	6H	20.89	21.62	21.35	22.06	22.53	18.59	19.32	19.06	19.76	20.23
	8H	21.11	21.79	21.58	22.23	22.70	18.80	19.48	19.27	19.93	20.40
	12H	21.27	21.87	21.75	22.35	22.82	18.96	19.56	19.45	20.04	20.52
8H	4H	20.53	21.21	21.00	21.66	22.13	18.60	19.28	19.07	19.72	20.19
	6H	21.32	21.87	21.82	22.37	22.85	19.46	20.02	19.96	20.51	20.99
	8H	21.62	22.12	22.14	22.63	23.12	19.79	20.29	20.31	20.80	21.29
	12H	21.85	22.29	22.37	22.79	23.36	20.05	20.49	20.57	20.99	21.56
12H	4H	20.55	21.15	21.04	21.63	22.11	18.67	19.27	19.16	19.75	20.23
	6H	21.37	21.87	21.89	22.38	22.87	19.60	20.10	20.12	20.61	21.10
	8H	21.73	22.17	22.25	22.67	23.24	20.01	20.45	20.53	20.95	21.52