

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: P860125

Luminaire Tested: **SPHB-36SE-M-L740-CD**

Issue Date: 7/11/2024

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.



**Test Information**

Test Method: LM-79-08  
Report Number: P860125  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2404-343-1)  
Test Lab: INNOVATION CENTER  
Issue Date: 7/11/2024  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: SPHB-36SE-M-L740-CD  
Description: 36000 Lumen Standard Efficacy Select Pro High Bay with Medium Lens and, 4000K 70CRI LEDs  
Light Source: -  
Ballast/Driver: -

Luminaire Equipment: Sample No.   Condition   Description

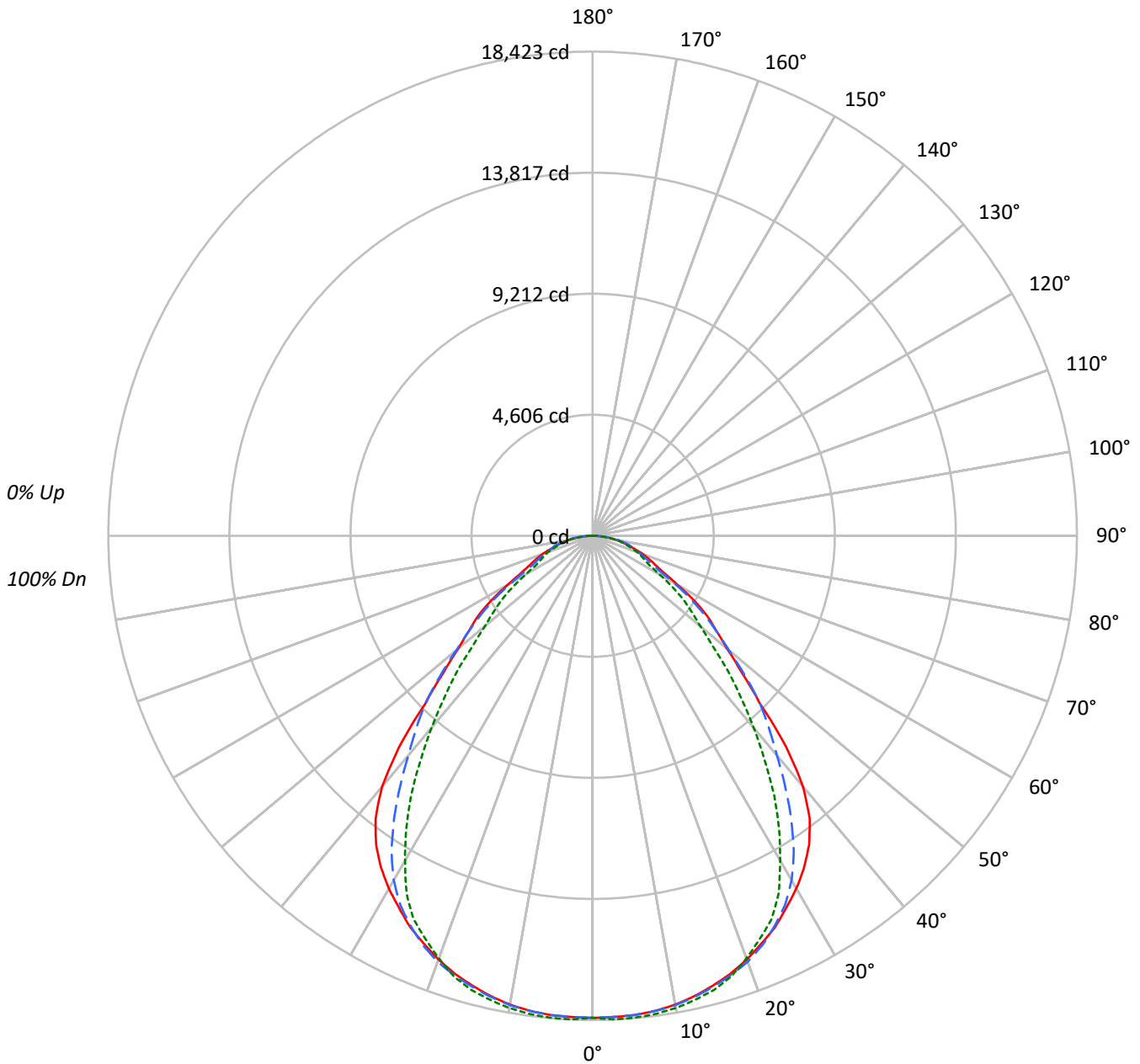
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 38069.0 lumens  
Efficiency: N/A  
Efficacy: 158.1 lumens/watt  
Spacing Criteria (0/90/45): 1.25 / 1.16 / 1.22  
Luminous Opening: Rectangular (W 1' x L: 2.04' x H: 0')  
CIE Type: Direct  
  
Input Watts (W): 240.8  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): 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

TEST NUMBER: P860125

CATALOG NUMBER: SPHB-36SE-M-L740-CD

### 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	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	106	103	99	108	104	101	98	100	97	95	96	94	92	92	91	89	87			
2	102	95	89	84	99	93	87	83	89	85	81	86	82	79	83	80	77	75			
3	94	85	78	72	92	83	77	71	80	75	70	78	73	69	75	71	68	66			
4	87	76	69	63	85	75	68	62	73	66	61	70	65	61	68	64	60	58			
5	81	69	61	55	79	68	61	55	66	59	54	64	58	54	62	57	53	51			
6	75	63	55	49	73	62	54	49	60	54	48	59	53	48	57	52	48	46			
7	70	58	50	44	68	57	49	44	55	49	44	54	48	43	53	47	43	41			
8	66	53	45	40	64	52	45	40	51	44	39	50	44	39	49	43	39	37			
9	61	49	41	36	60	48	41	36	47	41	36	46	40	36	45	40	36	34			
10	58	45	38	33	57	45	38	33	44	37	33	43	37	33	42	37	33	31			

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	96774	96774	96774
5°	96965	96939	97490
10°	97049	97153	97749
15°	96766	97017	97691
20°	96343	96832	96058
25°	95639	95371	93752
30°	94428	92203	86941
35°	92446	84827	77487
40°	85792	75079	65631
45°	66932	67112	54314
50°	54666	55441	43864
55°	48978	47132	38542
60°	39210	37117	30838
65°	32860	30080	27272
70°	31199	28661	27764
75°	28307	30427	26778
80°	28447	31091	28225
85°	24749	28999	23580



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	1743.9	4.6
10°-20°	5015.4	13.2
20°-30°	7487.2	19.7
30°-40°	8169.8	21.5
40°-50°	6683.3	17.6
50°-60°	4394.3	11.5
60°-70°	2521.1	6.6
70°-80°	1527.7	4.0
80°-90°	513.0	1.3
90°-100°	13.3	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°	14246.5	37.4
0°-40°	22416.3	58.9
0°-60°	33493.9	88.0
0°-90°	38055.7	100.0
90°-120°	13.3	0.0
90°-150°	13.3	0.0
90°-180°	13.0	0.0
0°-180°	38069.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	18341	18341	18341	18341	18341	
5°	18307	18278	18302	18377	18406	###
15°	17714	17712	17760	17874	17884	5000
25°	16428	16466	16382	16183	16103	7557
35°	14352	14028	13169	12272	12030	8895
45°	8970	9640	8994	7939	7279	7120
55°	5324	5179	5124	4403	4190	4689
65°	2632	2593	2409	2344	2184	2691
75°	1388	1502	1492	1432	1314	1503
85°	409	464	479	418	390	443
90°	2	34	68	80	85	19
95°	2	5	7	7	5	1
105°	0	0	0	0	0	0
115°	0	0	0	0	0	0
125°	0	0	0	0	0	0
135°	0	0	0	0	0	0
145°	0	0	0	0	0	0
155°	0	0	0	0	0	0
165°	0	0	0	0	0	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	0



TEST NUMBER: P860125

CATALOG NUMBER: SPHB-36SE-M-L740-CD

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	18340.9	18340.9	18340.9	18340.9	18340.9
2.5°	18328.8	18302.2	18326.4	18401.4	18423.2
5°	18307.1	18278.0	18302.2	18377.2	18406.2
7.5°	18232.1	18215.1	18239.3	18314.3	18350.6
10°	18113.5	18094.2	18132.9	18198.2	18244.2
12.5°	17936.9	17929.7	17966.0	18060.3	18079.7
15°	17714.4	17712.0	17760.4	17874.1	17883.7
17.5°	17462.8	17460.4	17520.9	17595.9	17569.3
20°	17158.0	17175.0	17245.1	17175.0	17107.2
22.5°	16792.8	16846.0	16862.9	16642.8	16608.9
25°	16427.5	16466.2	16381.5	16183.2	16103.3
27.5°	15955.8	16001.7	15844.5	15561.5	15334.1
30°	15498.6	15455.0	15133.3	14586.6	14269.7
32.5°	14973.7	14818.8	14240.7	13486.0	13198.1
35°	14352.0	14027.8	13169.1	12271.6	12029.7
37.5°	13565.8	12973.1	12034.6	11098.4	10733.1
40°	12455.5	11770.9	10900.1	9932.4	9528.5
42.5°	10900.1	10646.1	9925.2	8836.6	8355.3
45°	8969.7	9639.7	8993.9	7939.2	7278.8
47.5°	7677.9	8609.3	7832.7	7070.8	6161.2
50°	6659.5	7300.6	6753.9	6066.9	5343.6
52.5°	5924.2	6117.7	5897.5	5142.8	4731.6
55°	5324.2	5179.1	5123.5	4402.6	4189.7
57.5°	4579.2	4499.4	4356.6	3839.0	3558.4
60°	3715.6	3884.9	3517.2	3369.7	2922.2
62.5°	3052.8	3219.7	2825.4	2815.7	2443.2
65°	2631.9	2593.2	2409.3	2344.0	2184.4
67.5°	2329.5	2208.6	2145.7	2061.0	2005.4
70°	2022.3	1971.5	1857.8	1874.7	1799.7
72.5°	1686.0	1751.4	1637.7	1669.1	1533.7
75°	1388.5	1502.2	1492.5	1432.1	1313.5
77.5°	1144.2	1265.1	1286.9	1231.3	1134.5
80°	936.2	1018.4	1023.2	989.4	928.9
82.5°	687.0	735.4	771.7	713.6	674.9
85°	408.8	464.4	479.0	418.5	389.5
87.5°	133.0	186.3	208.0	215.3	217.7
90°	2.4	33.9	67.7	79.8	84.7
92.5°	2.4	9.7	14.5	21.8	24.2
95°	2.4	4.8	7.3	7.3	4.8
97.5°	0.0	0.0	0.0	0.0	0.0
100°	0.0	0.0	0.0	0.0	0.0
102.5°	0.0	0.0	0.0	0.0	0.0
105°	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P860125

CATALOG NUMBER: SPHB-36SE-M-L740-CD

**CANDELA DISTRIBUTION (continued):**

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



Report Generated By 670246072 / DESKTOP-50001EG







— 0°-180°    - - 45°-225°    - - - - 90°-270°







107.5°	0.0	0.0	0.0	0.0	0.0
110°	0.0	0.0	0.0	0.0	0.0



(END OF REPORT)