

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: P#

Luminaire Tested: **HBLED-LD5-18HE-W-AI-UNV-L840-ED2-U**

Issue Date: 3/3/2020

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: P#
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P23765)
Test Lab: INNOVATION CENTER P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: HBLED-LD5-18HE-W-AI-UNV-L840-ED2-U
Description: METALUX HIGH BAY LINEAR LED
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

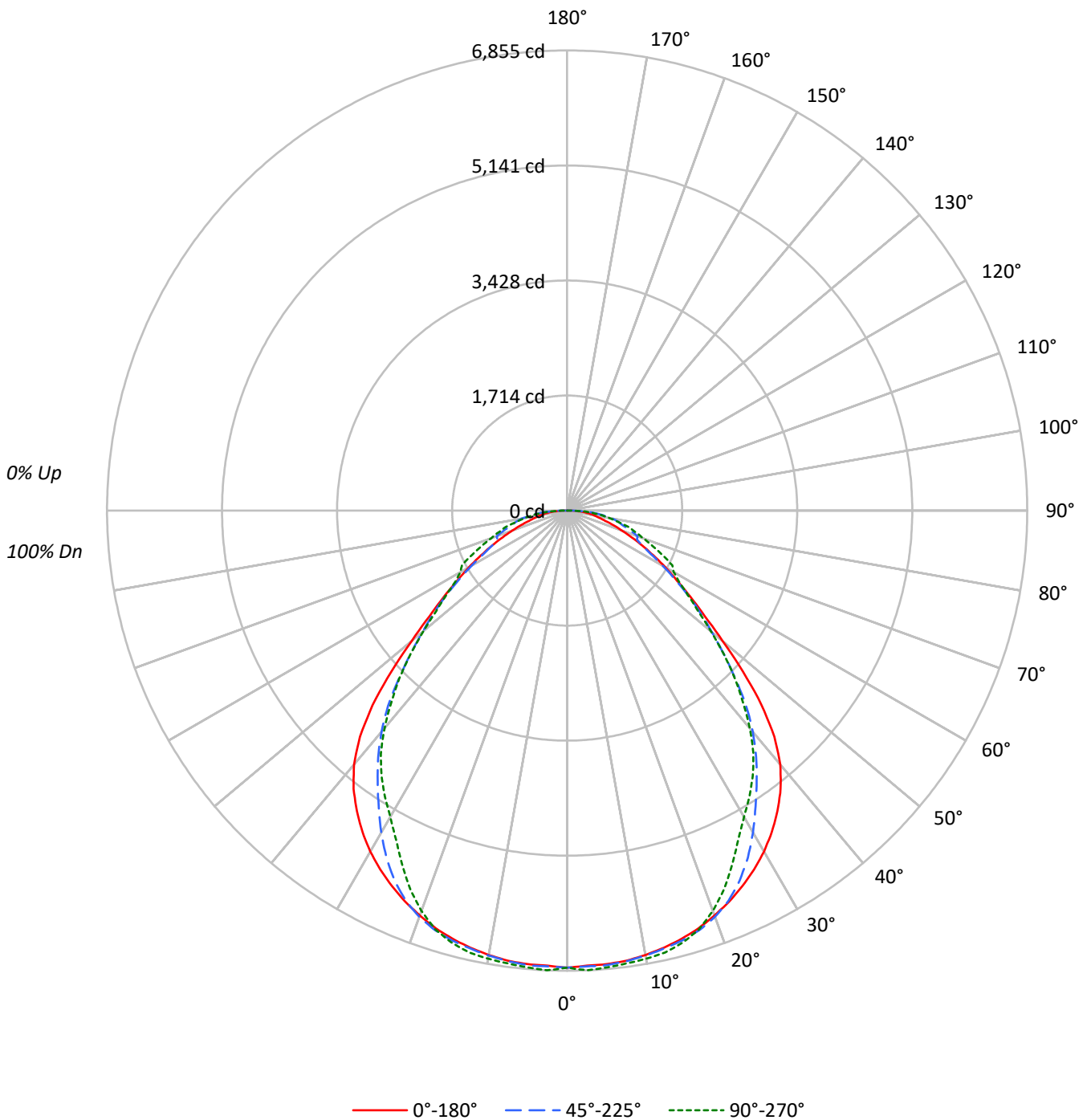
Lumens per Lamp: N/A
Luminaire Lumens: 15761.0 lumens
Efficiency: N/A
Efficacy: 140.8 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 1.16 / 1.26
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 111.9
Input Voltage (V): NR
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: 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	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					100			
1	109	105	101	97	107	103	99	96	98	95	93	95	92	90	91	89	87	85					85			
2	100	93	86	81	98	91	85	80	87	82	78	84	80	76	81	78	75	73					73			
3	92	82	75	69	90	81	74	68	78	72	67	75	70	66	73	68	65	63					63			
4	85	74	66	59	83	73	65	59	70	64	58	68	62	57	66	61	57	55					55			
5	79	67	58	52	77	66	58	52	64	57	51	62	55	51	60	54	50	48					48			
6	73	61	52	46	71	60	52	46	58	51	45	56	50	45	55	49	45	43					43			
7	68	55	47	41	66	54	47	41	53	46	41	52	45	40	50	44	40	38					38			
8	64	51	43	37	62	50	42	37	49	42	37	48	41	36	46	41	36	34					34			
9	60	47	39	34	58	46	39	33	45	38	33	44	38	33	43	37	33	31					31			
10	56	43	36	31	55	43	35	31	42	35	30	41	35	30	40	34	30	29					29			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	9162	9162	9162
5°	9161	9181	9226
10°	9184	9196	9263
15°	9198	9232	9278
20°	9189	9223	9086
25°	9166	9028	8636
30°	9112	8602	8183
35°	8974	8085	7917
40°	8674	7560	7435
45°	7797	6751	6725
50°	6324	5880	5839
55°	5251	5153	5151
60°	4546	4413	4934
65°	3940	3915	4974
70°	3397	4392	4741
75°	3046	4501	4942
80°	3167	5299	4959
85°	3595	6107	5666



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	648.3	4.1
10°-20°	1872.4	11.9
20°-30°	2781.0	17.6
30°-40°	3157.1	20.0
40°-50°	2822.4	17.9
50°-60°	1951.4	12.4
60°-70°	1287.6	8.2
70°-80°	868.7	5.5
80°-90°	372.1	2.4
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°	5301.7	33.6
0°-40°	8458.9	53.7
0°-60°	13232.6	84.0
0°-90°	15761.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	15761.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	6809	6809	6809	6809	6809	
5°	6783	6825	6798	6825	6831	646
15°	6603	6635	6628	6665	6660	1864
25°	6174	6232	6081	5900	5817	2845
35°	5464	5349	4922	4851	4820	3407
45°	4097	3750	3548	3575	3534	3116
55°	2238	2043	2197	2166	2196	2033
65°	1238	1099	1230	1438	1562	1235
75°	586	737	866	925	951	640
85°	233	324	396	398	367	243
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	6809.2	6809.2	6809.2	6809.2	6809.2
2.5°	6786.1	6828.5	6796.9	6826.2	6854.7
5°	6783.0	6824.7	6797.7	6825.4	6830.8
7.5°	6763.7	6802.3	6770.7	6797.7	6803.8
10°	6722.1	6767.6	6730.6	6772.2	6779.9
12.5°	6668.1	6714.4	6682.0	6739.1	6742.2
15°	6603.4	6635.0	6628.0	6665.1	6660.4
17.5°	6521.6	6557.9	6552.5	6561.7	6540.1
20°	6417.5	6458.4	6441.4	6399.0	6345.8
22.5°	6305.7	6355.1	6288.0	6180.8	6106.0
25°	6173.9	6232.5	6081.4	5900.2	5816.9
27.5°	6028.2	6080.6	5829.2	5607.2	5520.8
30°	5864.7	5887.1	5537.0	5325.7	5267.1
32.5°	5675.8	5643.4	5224.7	5085.1	5051.2
35°	5463.7	5348.8	4922.5	4850.7	4819.9
37.5°	5224.7	5014.2	4624.1	4590.9	4558.5
40°	4938.6	4627.9	4304.1	4282.5	4233.1
42.5°	4569.3	4207.7	3948.6	3923.2	3879.2
45°	4097.4	3750.4	3547.7	3574.6	3534.5
47.5°	3554.6	3291.7	3162.9	3236.9	3162.9
50°	3021.0	2844.4	2809.0	2876.1	2789.7
52.5°	2583.8	2425.0	2498.2	2509.8	2458.1
55°	2238.4	2043.3	2196.8	2165.9	2196.0
57.5°	1937.7	1719.5	1908.4	1872.9	1976.2
60°	1689.4	1444.2	1640.0	1632.3	1833.6
62.5°	1445.7	1249.9	1407.2	1520.5	1768.0
65°	1237.6	1098.8	1229.8	1438.0	1562.2
67.5°	1037.8	985.4	1125.0	1240.6	1376.3
70°	863.6	890.6	1116.5	1094.9	1205.2
72.5°	717.1	808.8	985.4	989.3	1067.1
75°	586.0	737.1	865.9	925.3	950.7
77.5°	487.3	668.5	781.9	802.7	778.0
80°	408.7	589.1	683.9	674.7	640.0
82.5°	330.0	446.4	539.0	547.5	506.6
85°	232.9	323.8	395.6	397.9	367.0
87.5°	124.9	199.7	239.8	246.7	228.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)