

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-LD5-48HE-N-UNV-L740-ED4-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 (P23767)
Test Lab: INNOVATION CENTER P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: HBLED-LD5-48HE-N-UNV-L740-ED4-U
Description: METALUX HIGH BAY LINEAR LED
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

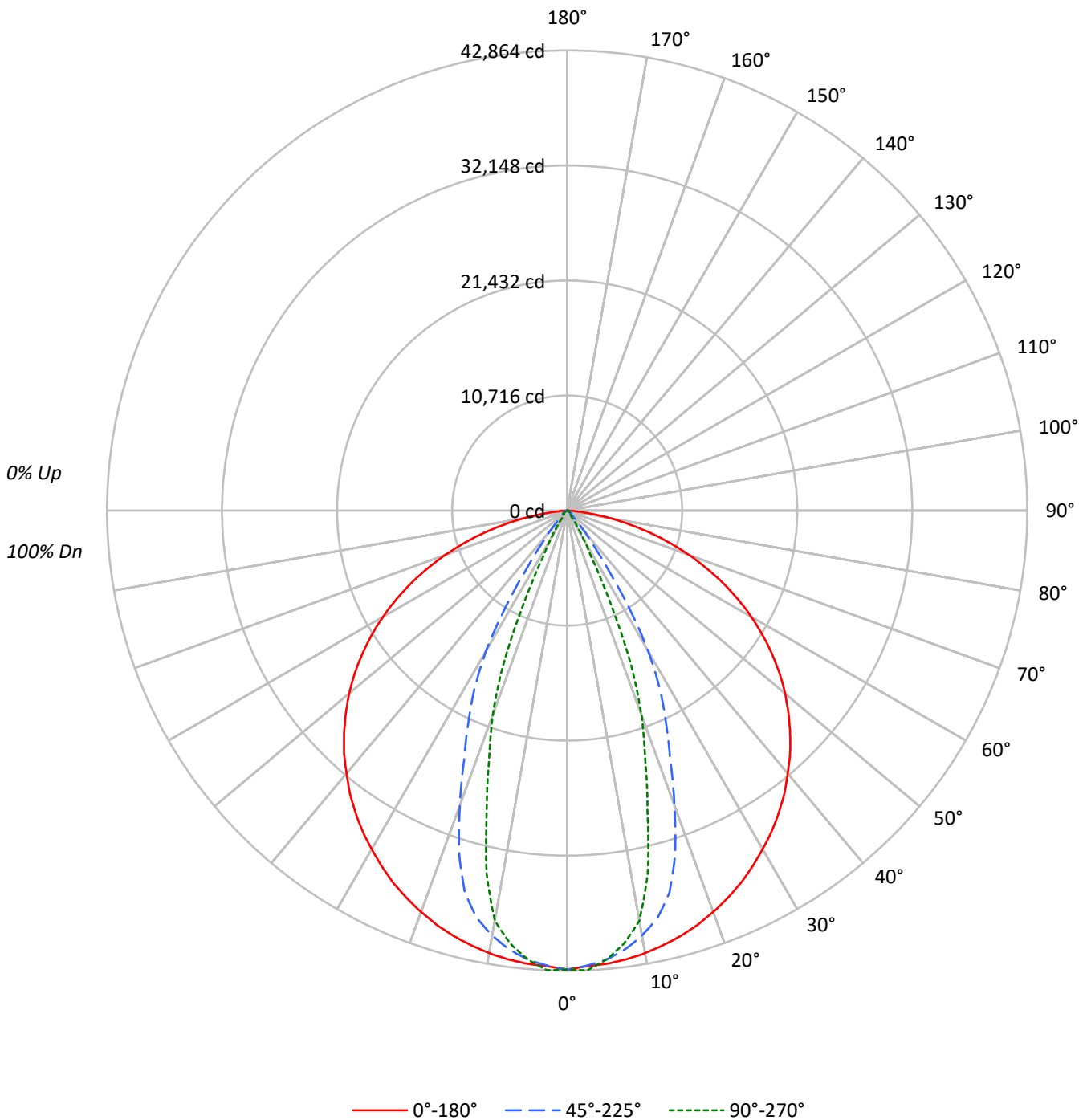
Lumens per Lamp: N/A
Luminaire Lumens: 45449.0 lumens
Efficiency: N/A
Efficacy: 158.8 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 0.62 / 0.77
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 286.2
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	0	
RCR																						
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100				100
1	112	108	105	102	109	106	103	101	102	100	98	98	96	95	95	93	92	90				90
2	105	98	93	89	102	97	92	88	93	89	86	90	87	84	87	85	82	81				81
3	98	90	84	79	96	88	83	78	86	81	77	83	79	76	81	77	74	73				73
4	92	82	76	70	90	81	75	70	79	73	69	77	72	68	75	71	67	66				66
5	86	76	69	64	84	75	68	63	73	67	63	71	66	62	70	65	62	60				60
6	81	70	63	58	79	70	63	58	68	62	58	66	61	57	65	60	57	55				55
7	76	66	58	54	75	65	58	53	63	57	53	62	57	53	61	56	52	51				51
8	72	61	54	49	71	61	54	49	59	53	49	58	53	49	57	52	49	47				47
9	68	57	51	46	67	57	50	46	56	50	46	55	49	46	54	49	45	44				44
10	65	54	47	43	64	53	47	43	53	47	43	52	46	43	51	46	42	41				41

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	57534	57534	57534
5°	57226	56720	56696
10°	57190	54903	52977
15°	57110	51292	40318
20°	56977	41814	29021
25°	56832	32331	14296
30°	56580	23497	4636
35°	56447	10425	1193
40°	56151	4234	804
45°	55900	1188	856
50°	55464	843	949
55°	54665	1002	406
60°	53316	1117	246
65°	51123	713	291
70°	47494	632	360
75°	41549	476	497
80°	31066	583	709
85°	15387	753	942



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	3968.2	8.7
10°-20°	9922.6	21.8
20°-30°	10747.6	23.6
30°-40°	7959.1	17.5
40°-50°	5732.6	12.6
50°-60°	3549.6	7.8
60°-70°	2183.0	4.8
70°-80°	1150.8	2.5
80°-90°	235.5	0.5
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°	24638.4	54.2
0°-40°	32597.5	71.7
0°-60°	41879.7	92.1
0°-90°	45449.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	45449.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	42760	42760	42760	42760	42760	
5°	42370	42527	41996	42026	41977	###
15°	40999	40047	36823	31314	28944	11574
25°	38281	35065	21778	13700	9630	17639
35°	34365	24227	6347	1493	726	21500
45°	29378	13649	624	452	450	22656
55°	23304	2811	427	386	173	20803
65°	16058	297	224	142	92	15844
75°	7992	69	92	120	96	8442
85°	997	26	49	73	61	###
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	42760.5	42760.5	42760.5	42760.5	42760.5
2.5°	42485.9	42756.4	42437.0	42675.0	42864.2
5°	42369.9	42526.6	41995.6	42026.1	41977.3
7.5°	42166.5	42129.9	41236.9	40846.3	40675.4
10°	41859.3	41617.3	40185.2	39369.5	38775.5
12.5°	41462.7	40921.6	38873.2	36279.6	34668.5
15°	40998.9	40046.9	36822.7	31314.2	28944.3
17.5°	40445.6	39096.9	33470.4	26245.0	24129.4
20°	39792.6	38037.1	29202.7	22329.2	20268.6
22.5°	39064.4	36747.4	25057.0	18557.8	15618.4
25°	38281.2	35065.2	21777.9	13700.2	9629.8
27.5°	37376.0	32902.9	18702.2	8069.6	4914.6
30°	36417.9	30299.1	15124.1	4340.9	2984.1
32.5°	35451.7	27347.5	10701.8	2711.6	1692.4
35°	34365.4	24227.1	6346.6	1493.1	726.2
37.5°	33232.4	21367.0	3751.0	679.4	465.8
40°	31969.2	18753.1	2410.5	451.6	457.7
42.5°	30748.7	16316.2	1356.8	445.5	453.6
45°	29377.6	13649.3	624.5	451.6	449.6
47.5°	27959.8	10884.9	404.8	455.7	455.7
50°	26497.2	7782.8	402.8	465.8	453.6
52.5°	24953.3	4855.6	419.0	463.8	372.3
55°	23303.6	2811.2	427.2	386.5	172.9
57.5°	21594.8	1657.9	431.2	221.7	97.6
60°	19812.9	917.4	415.0	164.8	91.5
62.5°	17976.0	437.3	327.5	154.6	89.5
65°	16057.8	297.0	223.8	142.4	91.5
67.5°	14066.4	229.9	177.0	134.3	93.6
70°	12072.9	170.9	160.7	134.3	91.5
72.5°	10046.8	115.9	134.3	136.3	91.5
75°	7992.3	69.2	91.5	120.0	95.6
77.5°	5956.1	42.7	71.2	124.1	115.9
80°	4009.4	36.6	75.3	115.9	91.5
82.5°	2353.5	32.5	73.2	89.5	73.2
85°	996.7	26.4	48.8	73.2	61.0
87.5°	187.1	22.4	38.6	59.0	52.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)