

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-LD5-24HE-N-UNV-L835-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 (P23767)
Test Lab: INNOVATION CENTER P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: HBLED-LD5-24HE-N-UNV-L835-ED2-U
Description: METALUX HIGH BAY LINEAR LED
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

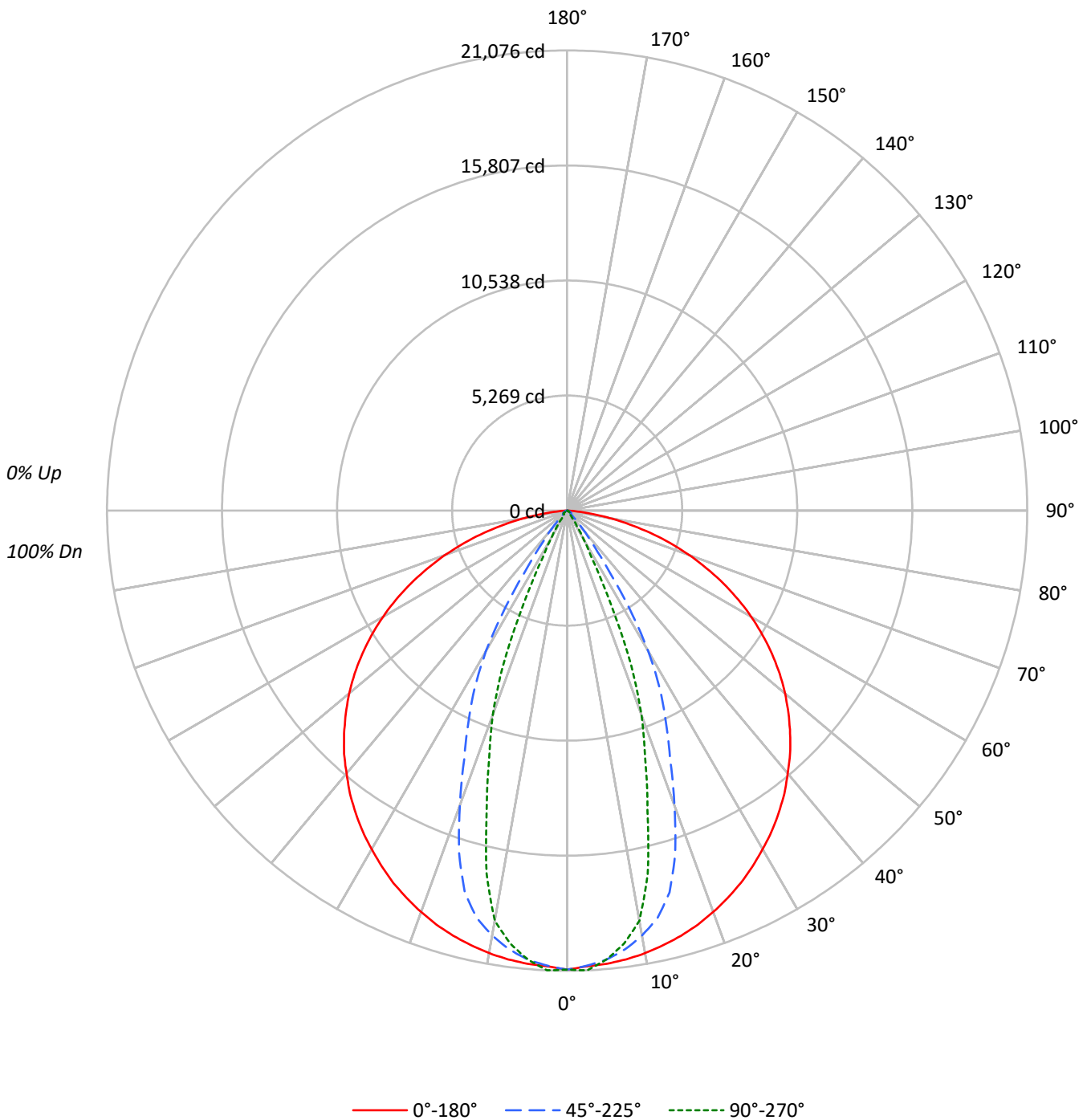
Lumens per Lamp: N/A
Luminaire Lumens: 22346.9 lumens
Efficiency: N/A
Efficacy: 152.7 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 0.62 / 0.77
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 146.3
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	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°	28289	28289	28289
5°	28138	27889	27877
10°	28120	26995	26048
15°	28080	25220	19824
20°	28015	20560	14270
25°	27944	15897	7029
30°	27820	11553	2280
35°	27754	5126	587
40°	27609	2082	395
45°	27486	584	421
50°	27271	414	467
55°	26879	493	199
60°	26215	549	121
65°	25137	350	143
70°	23352	311	177
75°	20429	234	244
80°	15275	287	349
85°	7566	371	463



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	1951.2	8.7
10°-20°	4878.9	21.8
20°-30°	5284.6	23.6
30°-40°	3913.4	17.5
40°-50°	2818.7	12.6
50°-60°	1745.3	7.8
60°-70°	1073.3	4.8
70°-80°	565.8	2.5
80°-90°	115.8	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°	12114.6	54.2
0°-40°	16028.0	71.7
0°-60°	20592.0	92.1
0°-90°	22346.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	22346.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	21025	21025	21025	21025	21025	
5°	20833	20910	20649	20664	20640	###
15°	20159	19691	18106	15397	14232	5691
25°	18823	17241	10708	6736	4735	8673
35°	16897	11912	3121	734	357	10571
45°	14445	6711	307	222	221	11140
55°	11458	1382	210	190	85	10229
65°	7896	146	110	70	45	7790
75°	3930	34	45	59	47	4151
85°	490	13	24	36	30	741
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	21025.1	21025.1	21025.1	21025.1	21025.1
2.5°	20890.0	21023.1	20866.0	20983.1	21076.1
5°	20833.0	20910.1	20649.0	20664.0	20640.0
7.5°	20733.0	20715.0	20275.9	20083.9	19999.9
10°	20582.0	20463.0	19758.8	19357.7	19065.7
12.5°	20386.9	20120.9	19113.7	17838.5	17046.3
15°	20158.9	19690.8	18105.5	15397.0	14231.8
17.5°	19886.9	19223.7	16457.2	12904.5	11864.3
20°	19565.8	18702.6	14358.8	10979.1	9965.9
22.5°	19207.7	18068.5	12320.4	9124.8	7679.5
25°	18822.6	17241.3	10708.1	6736.3	4734.9
27.5°	18377.6	16178.1	9195.8	3967.8	2416.5
30°	17906.5	14897.9	7436.4	2134.4	1467.3
32.5°	17431.4	13446.6	5262.0	1333.3	832.2
35°	16897.3	11912.3	3120.6	734.1	357.1
37.5°	16340.2	10506.0	1844.4	334.1	229.0
40°	15719.0	9220.8	1185.2	222.0	225.0
42.5°	15118.9	8022.6	667.1	219.0	223.0
45°	14444.8	6711.3	307.1	222.0	221.0
47.5°	13747.7	5352.0	199.0	224.0	224.0
50°	13028.5	3826.7	198.0	229.0	223.0
52.5°	12269.4	2387.5	206.0	228.0	183.0
55°	11458.2	1382.3	210.0	190.0	85.0
57.5°	10618.1	815.2	212.0	109.0	48.0
60°	9741.9	451.1	204.0	81.0	45.0
62.5°	8838.7	215.0	161.0	76.0	44.0
65°	7895.5	146.0	110.0	70.0	45.0
67.5°	6916.3	113.0	87.0	66.0	46.0
70°	5936.1	84.0	79.0	66.0	45.0
72.5°	4940.0	57.0	66.0	67.0	45.0
75°	3929.8	34.0	45.0	59.0	47.0
77.5°	2928.6	21.0	35.0	61.0	57.0
80°	1971.4	18.0	37.0	57.0	45.0
82.5°	1157.2	16.0	36.0	44.0	36.0
85°	490.1	13.0	24.0	36.0	30.0
87.5°	92.0	11.0	19.0	29.0	26.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)