

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-LD5-12HE-W-FLI-UNV-L835-ED1-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 (P26703)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: HBLED-LD5-12HE-W-FLI-UNV-L835-ED1-U  
Description: METALUX HIGH BAY LINEAR LED  
Light Source: -  
Ballast/Driver: -

Luminaire Equipment: Sample No.    Condition    Description

**Summary**

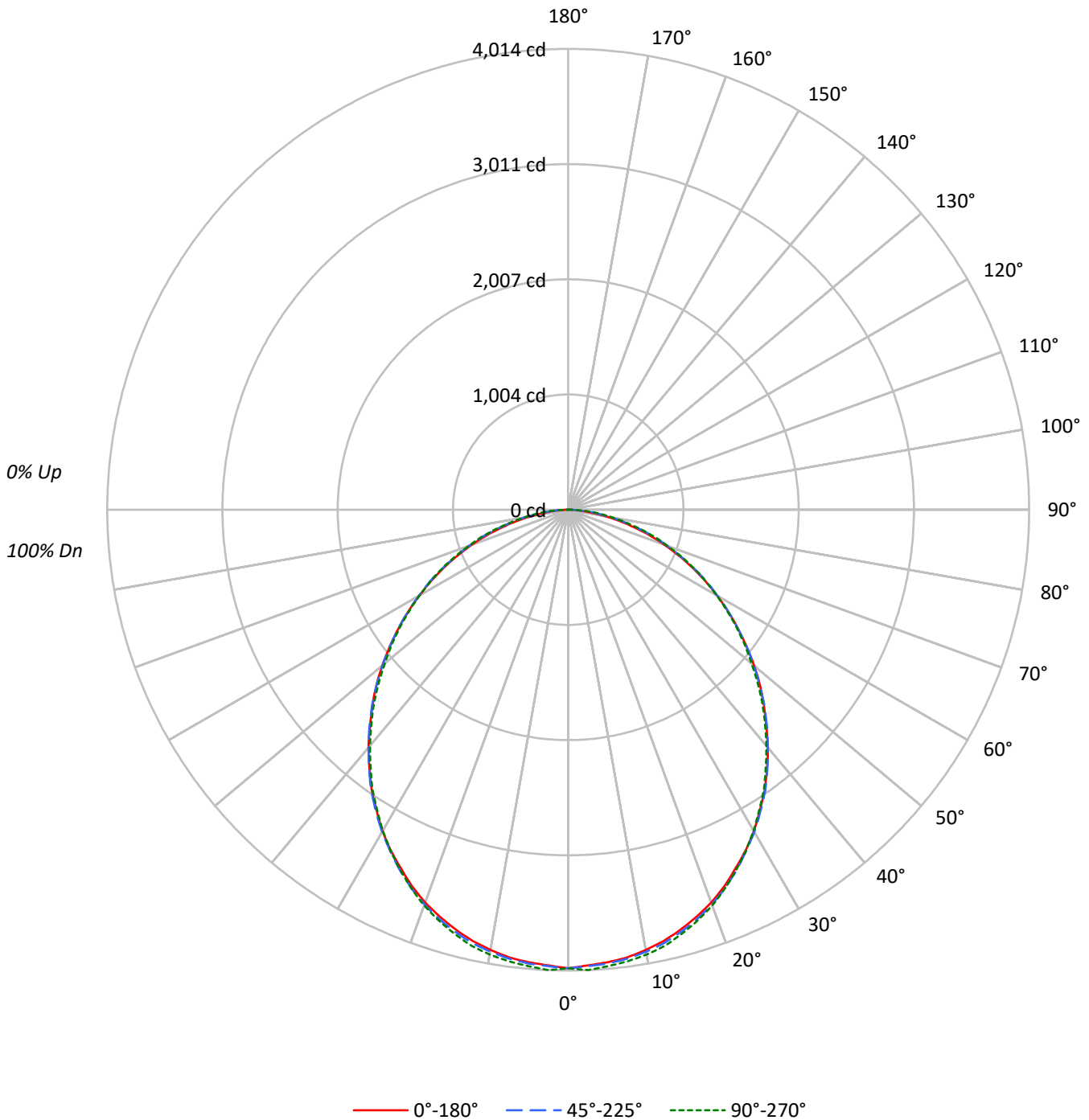
Lumens per Lamp: N/A  
Luminaire Lumens: 10434.0 lumens  
Efficiency: N/A  
Efficacy: 143.7 lumens/watt  
Spacing Criteria (0/90/45): 1.2 / 1.2 / 1.31  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

Input Watts (W): 72.6  
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	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	109	104	100	96	106	102	98	95	98	95	92	94	91	89	90	88	86	84
2	99	91	85	79	97	89	83	78	86	81	76	83	78	74	80	76	73	71
3	91	80	72	66	88	79	71	65	76	69	64	73	68	63	71	66	62	60
4	83	71	63	56	81	70	62	56	68	61	55	65	59	54	63	58	53	51
5	77	64	55	49	75	63	54	48	61	53	48	59	52	47	57	51	47	45
6	71	58	49	42	69	57	48	42	55	47	42	53	47	42	52	46	41	39
7	66	52	44	38	64	52	43	38	50	43	37	49	42	37	47	41	37	35
8	61	48	39	34	60	47	39	34	46	39	33	45	38	33	43	37	33	31
9	57	44	36	30	56	43	36	30	42	35	30	41	35	30	40	34	30	28
10	54	41	33	28	52	40	33	28	39	32	27	38	32	27	37	31	27	25

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

	0°	45°	90°
0°	5374	5374	5374
5°	5344	5359	5390
10°	5320	5341	5376
15°	5273	5301	5327
20°	5213	5238	5253
25°	5117	5146	5138
30°	5022	5036	5015
35°	4898	4910	4879
40°	4751	4751	4714
45°	4585	4597	4550
50°	4427	4420	4364
55°	4236	4236	4198
60°	4030	4035	4019
65°	3798	3837	3846
70°	3509	3604	3609
75°	3100	3301	3353
80°	2543	2892	3054
85°	1765	2427	2745



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	377.8	3.6
10°-20°	1074.7	10.3
20°-30°	1597.1	15.3
30°-40°	1867.4	17.9
40°-50°	1861.8	17.8
50°-60°	1615.4	15.5
60°-70°	1193.1	11.4
70°-80°	668.0	6.4
80°-90°	178.2	1.7
90°-100°	0.5	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°	3049.5	29.2
0°-40°	4916.9	47.1
0°-60°	8394.1	80.4
0°-90°	10433.5	100.0
90°-120°	0.5	0.0
90°-150°	0.5	0.0
90°-180°	1.0	0.0
0°-180°	10434.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	3994	3994	3994	3994	3994	
5°	3957	3982	3968	3985	3990	376
15°	3785	3812	3806	3824	3824	1068
25°	3446	3474	3466	3474	3461	1589
35°	2982	3008	2990	2989	2970	1863
45°	2409	2435	2416	2406	2391	1860
55°	1806	1818	1806	1803	1790	1615
65°	1193	1205	1205	1211	1208	1180
75°	596	614	635	640	645	635
85°	114	138	157	171	178	139
90°	0	2	3	7	6	5
95°	0	0	0	0	0	0
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: P#

CATALOG NUMBER: HBLED-LD5-12HE-W-FLI-UNV-L835-ED1-U

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	3994.4	3994.4	3994.4	3994.4	3994.4
2.5°	3972.6	3996.2	3979.7	3995.4	4013.7
5°	3956.6	3981.5	3967.8	3985.3	3990.4
7.5°	3933.2	3957.3	3944.1	3961.7	3967.0
10°	3893.6	3919.7	3909.3	3929.1	3934.7
12.5°	3847.4	3872.0	3865.1	3888.3	3892.1
15°	3785.4	3811.8	3805.9	3824.2	3824.5
17.5°	3716.8	3741.7	3737.4	3751.6	3751.1
20°	3640.8	3667.5	3658.4	3673.9	3669.0
22.5°	3550.9	3579.4	3567.9	3580.9	3568.7
25°	3446.5	3474.2	3466.1	3473.7	3461.0
27.5°	3345.4	3370.8	3354.1	3363.2	3349.7
30°	3232.6	3254.2	3241.3	3244.3	3228.1
32.5°	3105.9	3131.5	3115.8	3115.3	3098.0
35°	2981.9	3008.1	2989.5	2989.0	2970.5
37.5°	2844.7	2869.1	2847.3	2848.6	2827.0
40°	2704.8	2725.9	2704.8	2703.8	2684.0
42.5°	2552.9	2580.8	2561.5	2563.8	2537.4
45°	2409.4	2435.0	2416.0	2406.1	2391.3
47.5°	2266.3	2277.5	2261.8	2259.2	2238.4
50°	2115.0	2123.3	2111.4	2108.3	2085.0
52.5°	1958.5	1973.0	1957.7	1953.7	1938.2
55°	1805.6	1818.0	1805.8	1802.8	1789.6
57.5°	1651.6	1667.9	1655.4	1652.4	1641.7
60°	1497.7	1502.5	1499.5	1504.0	1493.6
62.5°	1344.8	1355.9	1359.5	1358.2	1350.1
65°	1193.1	1204.8	1205.1	1211.2	1208.1
67.5°	1037.9	1053.2	1057.5	1063.8	1066.6
70°	891.9	903.5	916.2	920.1	917.3
72.5°	744.8	763.6	777.8	781.1	793.0
75°	596.4	614.2	635.0	639.6	645.0
77.5°	458.8	482.4	501.2	507.3	513.9
80°	328.2	354.4	373.2	381.5	394.2
82.5°	215.4	242.1	261.1	269.5	285.0
85°	114.3	138.2	157.2	171.2	177.8
87.5°	33.8	54.1	65.0	69.1	74.9
90°	0.0	2.5	3.0	6.9	6.4
92.5°	0.0	0.0	0.0	0.0	0.0
95°	0.0	0.0	0.0	0.0	0.0
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
107.5°	0.0	0.0	0.0	0.0	0.0
110°	0.0	0.0	0.0	0.0	0.0



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**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

(END OF REPORT)