

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-LD5-30HE-W-FLI-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 (P26703)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: HBLED-LD5-30HE-W-FLI-UNV-L835-ED2-U  
Description: METALUX HIGH BAY LINEAR LED  
Light Source: -  
Ballast/Driver: -

Luminaire Equipment: Sample No.    Condition    Description

**Summary**

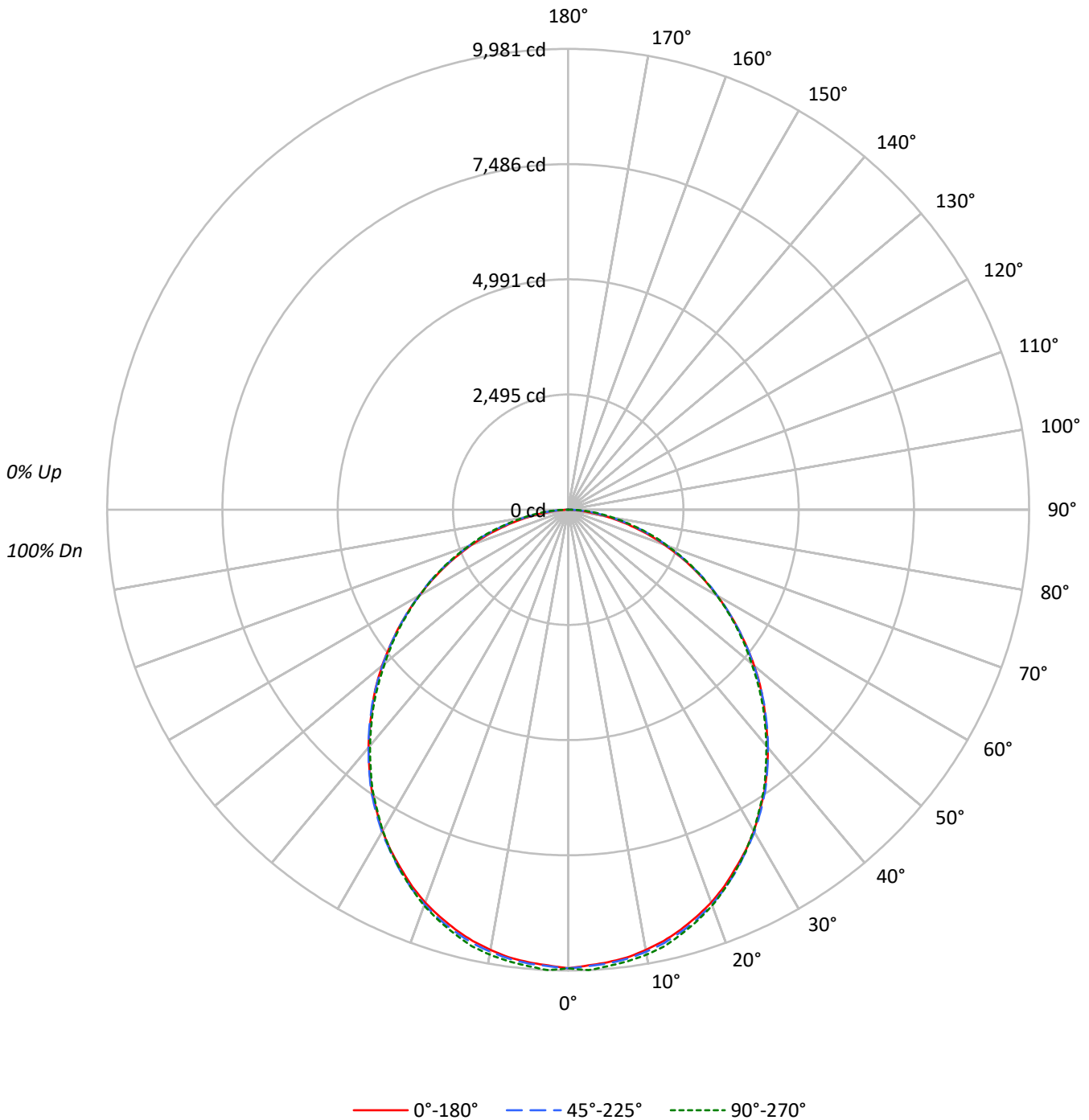
Lumens per Lamp: N/A  
Luminaire Lumens: 25947.0 lumens  
Efficiency: N/A  
Efficacy: 144.1 lumens/watt  
Spacing Criteria (0/90/45): 1.2 / 1.2 / 1.31  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

Input Watts (W): 180  
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	104	100	96	106	102	98	95	98	95	92	94	91	89	90	88	86	84					84			
2	99	91	85	79	97	89	83	78	86	81	76	83	78	74	80	76	73	71					71			
3	91	80	72	66	88	79	71	65	76	69	64	73	68	63	71	66	62	60					60			
4	83	71	63	56	81	70	62	56	68	61	55	65	59	54	63	58	53	51					51			
5	77	64	55	49	75	63	54	48	61	53	48	59	52	47	57	51	47	45					45			
6	71	58	49	42	69	57	48	42	55	47	42	53	47	42	52	46	41	39					39			
7	66	52	44	38	64	52	43	38	50	43	37	49	42	37	47	41	37	35					35			
8	61	48	39	34	60	47	39	34	46	39	33	45	38	33	43	37	33	31					31			
9	57	44	36	30	56	43	36	30	42	35	30	41	35	30	40	34	30	28					28			
10	54	41	33	28	52	40	33	28	39	32	27	38	32	27	37	31	27	25					25			

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

	0°	45°	90°
0°	13365	13365	13365
5°	13289	13327	13402
10°	13229	13282	13368
15°	13112	13184	13248
20°	12964	13026	13064
25°	12724	12796	12777
30°	12489	12523	12472
35°	12180	12211	12133
40°	11814	11814	11723
45°	11401	11432	11315
50°	11009	10991	10853
55°	10533	10534	10439
60°	10022	10034	9995
65°	9446	9541	9565
70°	8725	8964	8973
75°	7711	8210	8337
80°	6323	7190	7596
85°	4389	6036	6827



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	939.4	3.6
10°-20°	2672.5	10.3
20°-30°	3971.5	15.3
30°-40°	4643.7	17.9
40°-50°	4629.9	17.8
50°-60°	4017.1	15.5
60°-70°	2967.1	11.4
70°-80°	1661.2	6.4
80°-90°	443.3	1.7
90°-100°	1.3	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°	7583.4	29.2
0°-40°	12227.2	47.1
0°-60°	20874.1	80.4
0°-90°	25945.7	100.0
90°-120°	1.3	0.0
90°-150°	1.3	0.0
90°-180°	1.0	0.0
0°-180°	25947.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	9933	9933	9933	9933	9933	
5°	9839	9901	9867	9910	9923	935
15°	9413	9479	9464	9510	9511	2655
25°	8571	8640	8619	8638	8607	3951
35°	7415	7480	7434	7433	7387	4632
45°	5992	6055	6008	5983	5947	4625
55°	4490	4521	4491	4483	4450	4015
65°	2967	2996	2997	3012	3004	2934
75°	1483	1527	1579	1591	1604	1580
85°	284	344	391	426	442	345
90°	0	6	8	17	16	12
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



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	9933.2	9933.2	9933.2	9933.2	9933.2
2.5°	9878.9	9937.7	9896.6	9935.8	9981.3
5°	9839.1	9901.0	9866.9	9910.5	9923.1
7.5°	9781.0	9841.0	9808.2	9851.8	9865.0
10°	9682.5	9747.5	9721.6	9770.9	9784.8
12.5°	9567.5	9628.8	9611.7	9669.2	9678.7
15°	9413.4	9479.1	9464.5	9510.0	9510.6
17.5°	9242.8	9304.7	9294.0	9329.4	9328.1
20°	9053.9	9120.3	9097.5	9136.1	9124.1
22.5°	8830.3	8901.1	8872.6	8904.9	8874.5
25°	8570.7	8639.6	8619.3	8638.3	8606.7
27.5°	8319.3	8382.5	8340.8	8363.5	8330.0
30°	8038.8	8092.5	8060.3	8067.9	8027.5
32.5°	7723.6	7787.4	7748.2	7747.0	7704.0
35°	7415.3	7480.4	7434.3	7433.0	7386.9
37.5°	7074.2	7134.9	7080.6	7083.7	7030.0
40°	6726.2	6778.6	6726.2	6723.7	6674.4
42.5°	6348.4	6417.9	6369.9	6375.6	6309.9
45°	5991.5	6055.3	6008.0	5983.3	5946.7
47.5°	5635.9	5663.7	5624.5	5618.2	5566.4
50°	5259.4	5280.3	5250.6	5243.0	5184.9
52.5°	4870.3	4906.3	4868.4	4858.3	4819.8
55°	4490.0	4521.0	4490.6	4483.1	4450.2
57.5°	4107.2	4147.6	4116.7	4109.1	4082.6
60°	3724.4	3736.4	3728.8	3740.2	3714.3
62.5°	3344.1	3371.9	3380.8	3377.6	3357.4
65°	2967.0	2996.1	2996.7	3011.9	3004.3
67.5°	2581.1	2619.0	2629.7	2645.5	2652.4
70°	2217.8	2246.9	2278.5	2288.0	2281.0
72.5°	1852.1	1898.8	1934.2	1942.4	1972.1
75°	1483.2	1527.4	1579.2	1590.6	1603.8
77.5°	1140.8	1199.6	1246.3	1261.5	1277.9
80°	816.1	881.2	927.9	948.8	980.4
82.5°	535.7	602.0	649.4	670.2	708.8
85°	284.3	343.6	391.0	425.8	442.2
87.5°	84.0	134.5	161.7	171.8	186.3
90°	0.0	6.3	7.6	17.1	15.8
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)