

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: P130675

Luminaire Tested: **TBLED-LD1-11-M-UNV-L835-CD1-CG**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P130675  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25358)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: TBLED-LD1-11-M-UNV-L835-CD1-CG  
Description: METALUX TOP BAY LED LOW-BAY LUMINAIRE.  
MEDIUM DISTRIBUTION WITH CLEAR GLASS LENS.  
Light Source: (160) 3500K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 10610.1 lumens  
Efficiency: N/A  
Efficacy: 98.2 lumens/watt  
Spacing Criteria (0/90/45): 1.33 / 1.33 / 1.33  
Luminous Opening: Circular (Dia: 1.12' x H: 0')  
CIE Type: Direct

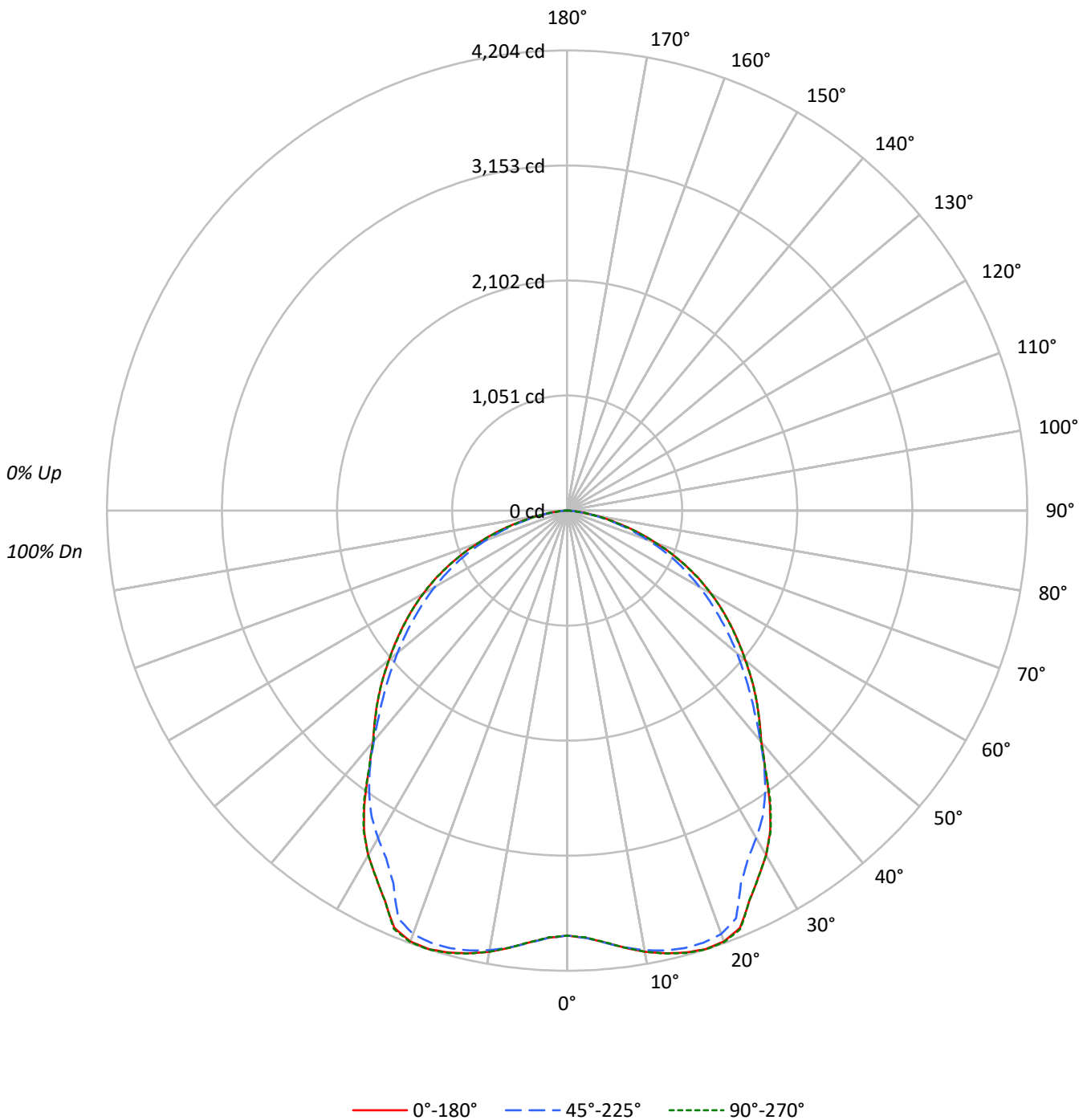
Input Watts (W): 108  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	110	105	101	98	107	103	99	96	99	96	93	95	92	90	91	89	88					85				
2	100	92	86	81	98	91	85	80	87	82	78	84	80	76	81	77	74					72				
3	92	82	74	68	89	80	73	67	77	71	66	74	69	65	72	68	64					62				
4	84	73	64	58	82	71	64	58	69	62	57	67	61	56	65	59	55					53				
5	78	65	57	50	76	64	56	50	62	55	49	60	54	49	58	53	48					46				
6	72	59	50	44	70	58	50	44	56	49	44	55	48	43	53	47	43					41				
7	67	54	45	39	65	53	45	39	51	44	39	50	43	38	49	43	38					36				
8	62	49	41	35	61	48	41	35	47	40	35	46	39	35	45	39	34					33				
9	58	45	37	32	57	45	37	32	43	36	31	42	36	31	41	35	31					29				
10	55	42	34	29	53	41	34	29	40	33	29	39	33	29	38	33	28					27				

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

	0°	45°	90°
0°	42048	42048	42048
5°	43050	43077	43021
10°	45008	44838	44993
15°	46857	46394	46900
20°	48269	47437	48344
25°	47041	44883	47011
30°	45439	43197	45455
35°	42617	41695	42753
40°	39006	38824	38951
45°	37457	36212	37457
50°	35772	34077	35816
55°	34413	32098	34315
60°	32911	30286	32911
65°	30740	28095	30740
70°	27282	24914	27282
75°	22614	20455	22292
80°	16332	14960	16008
85°	9778	8970	9455



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	382.2	3.6
10°-20°	1177.2	11.1
20°-30°	1777.8	16.8
30°-40°	1940.9	18.3
40°-50°	1894.2	17.9
50°-60°	1627.3	15.3
60°-70°	1150.3	10.8
70°-80°	556.5	5.2
80°-90°	103.8	1.0
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°	3337.2	31.5
0°-40°	5278.0	49.7
0°-60°	8799.5	82.9
0°-90°	10610.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	10610.1	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	3883	3883	3883	3883	3883	
5°	3960	3962	3963	3961	3958	382
15°	4180	4172	4138	4173	4184	1182
25°	3937	3948	3756	3949	3935	1815
35°	3224	3057	3154	3050	3234	2006
45°	2446	2494	2365	2485	2446	1885
55°	1823	1844	1700	1840	1818	1630
65°	1200	1162	1096	1161	1200	1183
75°	540	514	489	513	533	578
85°	79	75	72	73	76	108
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0
2.5°	3906.2	3904.9	3903.6	3904.9	3907.5	3907.5	3907.5	3906.2	3906.2	3907.5	3906.2
5°	3960.4	3957.8	3959.1	3957.8	3962.9	3961.7	3961.7	3962.9	3962.9	3962.9	3961.7
7.5°	4027.4	4024.9	4024.9	4024.9	4026.2	4026.2	4026.2	4026.2	4024.9	4024.9	4024.9
10°	4093.2	4089.4	4090.7	4089.4	4090.7	4088.1	4085.5	4082.9	4080.3	4077.8	4079.0
12.5°	4142.3	4141.0	4143.6	4143.6	4141.0	4137.1	4130.7	4124.2	4119.0	4116.5	4119.0
15°	4179.7	4182.3	4183.5	4182.3	4177.1	4166.8	4159.0	4148.7	4142.3	4138.4	4142.3
17.5°	4200.3	4200.3	4197.7	4190.0	4181.0	4171.9	4160.3	4150.0	4143.6	4139.7	4144.8
20°	4188.7	4187.4	4178.4	4166.8	4152.6	4141.0	4130.7	4121.6	4117.8	4116.5	4119.0
22.5°	4125.5	4128.1	4122.9	4115.2	4104.8	4088.1	4068.7	4050.7	4036.5	4031.3	4036.5
25°	3937.1	3935.9	3944.9	3960.4	3970.7	3925.5	3864.9	3806.9	3766.9	3756.5	3766.9
27.5°	3779.8	3778.5	3757.8	3712.7	3659.8	3618.5	3606.9	3600.5	3586.3	3579.8	3588.8
30°	3634.0	3621.1	3547.6	3453.4	3386.3	3369.5	3395.3	3430.2	3449.5	3454.7	3445.6
32.5°	3454.7	3419.8	3320.5	3238.0	3208.3	3195.4	3204.4	3249.6	3296.0	3321.8	3293.4
35°	3223.8	3194.1	3115.4	3070.3	3063.8	3049.6	3038.0	3065.1	3121.9	3154.1	3115.4
37.5°	2968.3	2982.5	2949.0	2925.8	2925.8	2911.6	2888.4	2897.4	2929.6	2960.6	2927.1
40°	2759.4	2785.2	2792.9	2786.4	2783.9	2765.8	2743.9	2738.7	2740.0	2746.5	2736.1
42.5°	2599.4	2603.3	2638.1	2649.7	2639.4	2620.0	2607.1	2599.4	2562.0	2545.2	2567.1
45°	2445.9	2448.5	2476.8	2510.4	2503.9	2483.3	2473.0	2448.5	2382.7	2364.6	2387.8
47.5°	2285.9	2300.1	2320.7	2355.6	2362.0	2341.4	2327.2	2284.6	2205.9	2190.5	2207.2
50°	2123.4	2150.5	2175.0	2191.7	2200.8	2182.7	2167.2	2116.9	2040.8	2022.8	2039.5
52.5°	1975.0	1999.5	2031.8	2026.6	2022.8	2018.9	2008.6	1957.0	1884.7	1860.2	1883.4
55°	1822.8	1847.3	1879.6	1857.6	1840.9	1847.3	1835.7	1793.1	1731.2	1700.2	1731.2
57.5°	1671.9	1691.2	1717.0	1689.9	1665.4	1673.2	1665.4	1635.7	1577.7	1548.0	1577.7
60°	1519.6	1531.3	1549.3	1520.9	1495.1	1500.3	1497.7	1466.8	1421.6	1398.4	1421.6
62.5°	1363.6	1370.0	1379.0	1351.9	1330.0	1328.7	1330.0	1299.1	1264.2	1248.7	1265.5
65°	1199.7	1202.3	1207.5	1180.4	1164.9	1158.4	1161.0	1132.6	1106.8	1096.5	1108.1
67.5°	1032.0	1034.6	1035.9	1010.1	999.8	990.7	992.0	971.4	948.2	941.7	950.7
70°	861.7	865.6	865.6	842.4	835.9	824.3	824.3	811.4	792.1	786.9	793.4
72.5°	701.8	699.2	699.2	679.8	674.7	663.1	661.8	657.9	639.9	634.7	641.1
75°	540.5	537.9	539.2	523.7	518.6	509.6	508.3	508.3	494.1	488.9	495.4
77.5°	390.9	393.5	392.2	380.6	375.4	371.5	375.4	375.4	362.5	357.3	363.8
80°	261.9	264.5	264.5	255.4	251.6	249.0	254.1	251.6	245.1	239.9	245.1
82.5°	158.7	158.7	158.7	156.1	150.9	150.9	154.8	154.8	148.4	144.5	148.4
85°	78.7	78.7	77.4	77.4	74.8	74.8	77.4	77.4	73.5	72.2	73.5
87.5°	27.1	25.8	25.8	25.8	24.5	25.8	25.8	25.8	24.5	24.5	24.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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**CANDELA DISTRIBUTION (continued):**

	55°	60°	65°	70°	75°	80°	85°	90°
0°	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0	3883.0
2.5°	3907.5	3907.5	3906.2	3906.2	3906.2	3904.9	3903.6	3902.3
5°	3964.2	3962.9	3960.4	3961.7	3960.4	3960.4	3959.1	3957.8
7.5°	4027.4	4028.7	4026.2	4028.7	4028.7	4028.7	4027.4	4026.2
10°	4082.9	4086.8	4088.1	4091.9	4093.2	4094.5	4093.2	4091.9
12.5°	4125.5	4131.9	4137.1	4143.6	4147.4	4148.7	4146.1	4144.8
15°	4150.0	4159.0	4168.1	4178.4	4184.8	4187.4	4186.1	4183.5
17.5°	4151.3	4161.6	4173.2	4182.3	4191.3	4197.7	4202.9	4204.2
20°	4122.9	4131.9	4142.3	4153.9	4168.1	4179.7	4191.3	4195.2
22.5°	4046.8	4068.7	4090.7	4102.3	4113.9	4121.6	4128.1	4137.1
25°	3797.8	3863.6	3934.6	3964.2	3959.1	3934.6	3930.7	3934.6
27.5°	3603.0	3610.8	3619.8	3654.6	3703.7	3748.8	3774.6	3779.8
30°	3428.9	3391.5	3363.1	3379.9	3444.4	3533.4	3613.4	3635.3
32.5°	3248.3	3199.3	3187.6	3199.3	3227.6	3301.2	3410.8	3461.1
35°	3056.1	3035.4	3044.5	3054.8	3061.2	3101.2	3182.5	3234.1
37.5°	2887.1	2884.5	2902.5	2915.4	2915.4	2930.9	2972.2	2973.5
40°	2728.4	2741.3	2755.5	2773.5	2777.4	2783.9	2773.5	2755.5
42.5°	2589.1	2603.3	2612.3	2630.4	2640.7	2626.5	2592.9	2595.5
45°	2443.3	2470.4	2475.6	2494.9	2502.6	2465.2	2439.4	2445.9
47.5°	2279.5	2324.6	2334.9	2355.6	2349.1	2313.0	2294.9	2287.2
50°	2110.5	2169.8	2178.8	2193.0	2185.3	2167.2	2144.0	2126.0
52.5°	1958.3	2006.0	2012.4	2017.6	2024.0	2027.9	1998.2	1969.9
55°	1795.7	1833.1	1842.2	1837.0	1855.1	1875.7	1846.0	1817.6
57.5°	1638.3	1664.1	1670.6	1661.5	1687.3	1714.4	1692.5	1670.6
60°	1470.6	1496.4	1497.7	1493.8	1519.6	1542.9	1533.8	1519.6
62.5°	1305.5	1328.7	1324.9	1328.7	1349.4	1379.0	1372.6	1363.6
65°	1137.8	1159.7	1157.1	1164.9	1180.4	1207.5	1207.5	1199.7
67.5°	977.8	990.7	989.4	999.8	1011.4	1037.2	1039.8	1032.0
70°	817.9	824.3	823.0	834.6	843.7	870.8	870.8	861.7
72.5°	663.1	666.9	661.8	677.3	681.1	704.4	704.4	694.0
75°	514.7	513.4	508.3	517.3	528.9	545.7	541.8	532.8
77.5°	376.7	372.8	367.7	378.0	384.4	397.3	393.5	384.4
80°	255.4	251.6	245.1	254.1	259.3	267.0	263.2	256.7
82.5°	156.1	152.2	147.1	153.5	156.1	161.3	158.7	153.5
85°	77.4	74.8	72.2	73.5	77.4	78.7	77.4	76.1
87.5°	25.8	24.5	23.2	24.5	24.5	25.8	25.8	24.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)