

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: **8ILED-LD5-14-W-ASY-UNV-L850-CD2-U**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P#  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P34179)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 8ILED-LD5-14-W-ASY-UNV-L850-CD2-U  
Description: Metalux 8' ILED WITH ASYMMETRIC DIRECTIONAL LOUVER DISTRIBUTION

Light Source: (1) 5000 CCT, 80 CRI LEDS  
Ballast/Driver: -

**Summary**

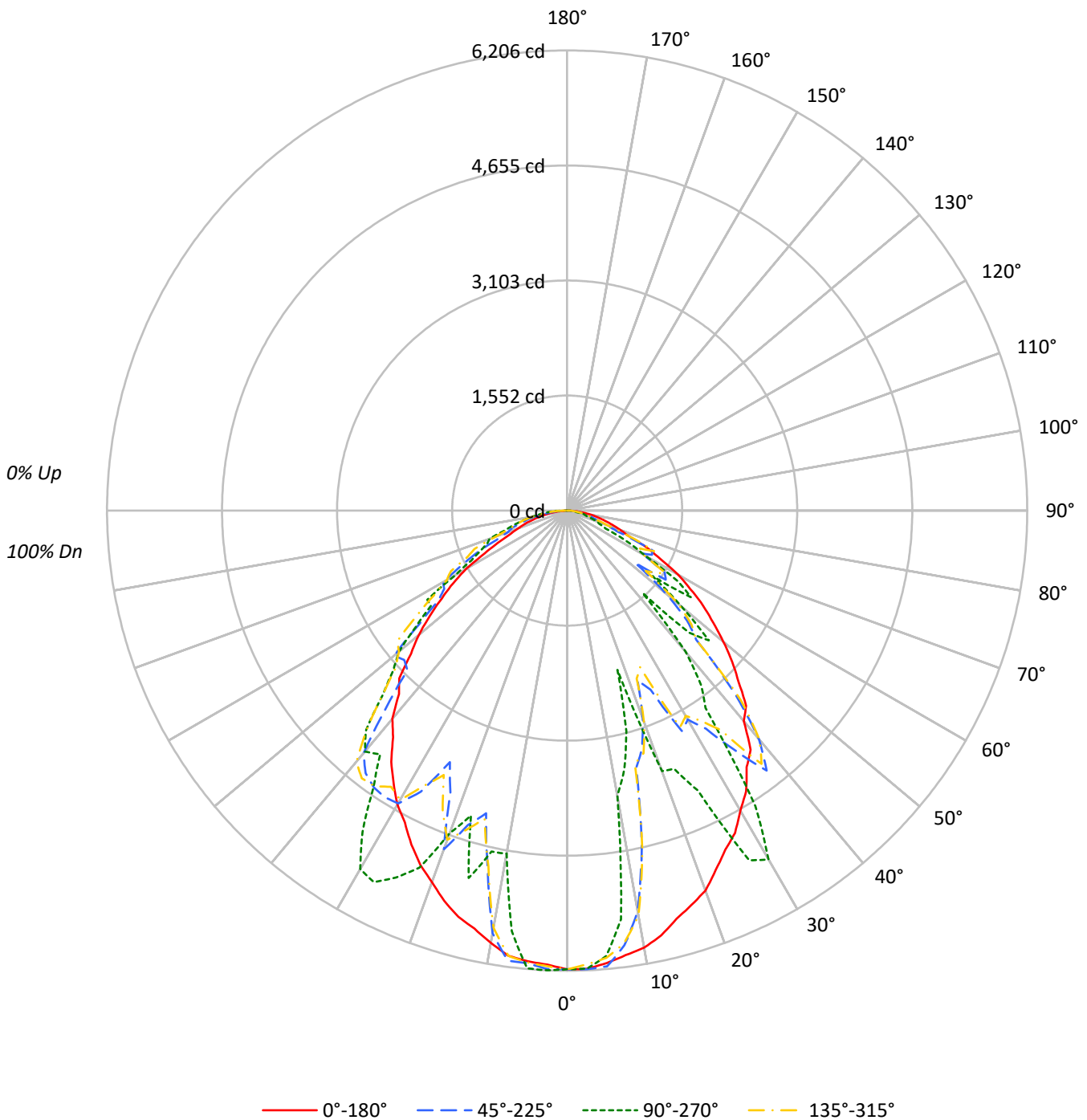
Lumens per Lamp: N/A  
Luminaire Lumens: 12184.0 lumens  
Efficiency: N/A  
Efficacy: 120.9 lumens/watt  
Spacing Criteria (0/90/45): 1.13 / 1.25 / 1.27  
Luminous Opening: Rectangular w/ Sides (W: 0.92' x L: 8' x H: 0.1')  
CIE Type: Direct

Input Watts (W): 100.8  
Input Voltage (V):  
Input Current (A<sub>in</sub>): 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	100	96	99	96	93	95	93	90	91	90	88					86				
2	101	93	87	81	98	91	85	80	88	83	79	84	80	77	81	78	75					73				
3	92	82	75	69	90	81	74	68	78	72	67	75	70	66	73	68	65					63				
4	85	74	65	59	83	72	65	59	70	63	58	68	62	57	65	60	56					54				
5	78	66	58	51	76	65	57	51	63	56	51	61	55	50	59	54	50					47				
6	73	60	51	45	71	59	51	45	57	50	45	56	49	44	54	48	44					42				
7	68	55	46	40	66	54	46	40	52	45	40	51	44	40	50	44	39					37				
8	63	50	42	36	61	49	41	36	48	41	36	47	40	36	46	40	35					34				
9	59	46	38	33	58	45	38	33	44	37	32	43	37	32	42	36	32					30				
10	55	43	35	30	54	42	35	30	41	34	30	40	34	29	39	34	29					28				

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

	0°	90°	180°	270°
0°	9081	9081	9081	9081
5°	9016	8805	8982	9045
10°	8903	5712	8806	6871
15°	8633	4550	8588	7575
20°	8480	5618	8289	6951
25°	8126	6419	8000	8414
30°	7861	8661	7704	8900
35°	7500	5411	7346	7573
40°	7023	4355	6951	7449
45°	6707	4356	6560	6581
50°	6185	4055	5881	5981
55°	5634	4513	5188	4966
60°	4961	2967	4506	4289
65°	4029	1614	3494	3625
70°	3166	1413	2921	3668
75°	2833	1045	2593	2990
80°	2595	726	2179	2444
85°	2299	537	1491	2006



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	563.0	4.6
10°-20°	1307.6	10.7
20°-30°	1946.3	16.0
30°-40°	2454.6	20.1
40°-50°	2223.1	18.2
50°-60°	1848.4	15.2
60°-70°	1116.7	9.2
70°-80°	553.8	4.5
80°-90°	170.5	1.4
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°	3816.9	31.3
0°-40°	6271.5	51.5
0°-60°	10343.0	84.9
0°-90°	12184.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	12184.0	100.0

**CANDELA DISTRIBUTION:**

	0°	90°	180°	270°	360°	Flux
0°	6187	6187	6187	6187	6187	
5°	6126	6033	6103	6197	6126	580
15°	5700	3082	5670	5131	5700	1612
25°	5046	4165	4968	5460	5046	2333
35°	4222	3250	4136	4549	4222	2653
45°	3272	2327	3200	3516	3272	2524
55°	2241	2038	2064	2243	2241	1994
65°	1191	573	1033	1288	1191	1170
75°	523	259	478	742	523	561
85°	156	72	101	268	156	173
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
0°	6186.9	6186.9	6186.9	6186.9	6186.9	6186.9	6186.9	6186.9	6186.9	6186.9	6186.9
2.5°	6184.8	6220.6	6191.1	6184.8	6182.7	6189.0	6125.8	6106.8	6127.9	6191.1	6189.0
5°	6125.8	6178.5	6170.0	6081.5	6033.0	6085.7	6056.2	6060.4	6102.6	6146.8	6125.8
7.5°	6047.8	6113.1	5915.0	5664.1	5560.8	5691.5	5885.5	6037.2	6056.2	6127.9	6123.7
10°	5986.6	6045.7	5484.9	4631.2	3906.1	4479.4	5544.0	5915.0	5921.3	6020.4	5788.5
12.5°	5866.5	5782.2	4656.5	3629.9	3568.8	3665.8	4688.1	5643.0	5775.8	5843.3	4949.5
15°	5700.0	5449.1	3596.2	3172.5	3081.9	3185.1	3533.0	5406.9	5670.4	5733.7	4226.5
17.5°	5575.6	5101.3	3358.0	2809.9	2253.4	2681.3	3429.7	5206.7	5518.7	5417.5	4447.8
20°	5453.3	4751.4	2982.8	3056.6	3739.5	3041.8	3029.2	4818.8	5331.1	4728.2	4861.0
22.5°	5242.5	4003.0	2472.7	3644.7	3769.1	3608.8	2453.7	4137.9	5173.0	4268.6	4112.7
25°	5046.5	3317.9	2664.5	3783.8	4165.4	3731.1	2327.2	3280.0	4968.5	3817.5	3741.6
27.5°	4901.0	3130.3	3353.8	4350.9	5318.4	4051.5	3294.8	3029.2	4740.8	3611.0	4275.0
30°	4671.3	2868.9	3254.7	5312.1	5432.2	5217.2	3197.8	2913.2	4578.5	3821.8	4559.5
32.5°	4490.0	2548.5	3488.7	5010.6	4726.1	4985.4	3358.0	2717.2	4357.2	4022.0	4582.7
35°	4222.3	2415.7	3948.2	4382.5	3250.5	4243.3	3613.1	2495.8	4135.8	3716.4	4551.1
37.5°	4064.2	1987.8	4420.4	2972.2	2970.1	2976.5	4306.6	2200.7	3853.4	3155.6	4464.7
40°	3703.7	2150.1	4026.2	2717.2	2481.1	2774.1	4036.8	1796.0	3665.8	2788.8	4270.7
42.5°	3573.0	2413.6	3351.7	2232.3	1505.1	2369.4	3471.8	2276.6	3358.0	2913.2	3623.6
45°	3271.6	2350.4	2464.2	1412.3	2327.2	1507.2	2453.7	2251.3	3199.9	3071.3	3046.0
47.5°	3018.6	2204.9	2194.4	2169.1	2592.8	2105.9	2274.5	2114.3	2856.3	2987.0	2980.7
50°	2748.8	2280.8	1749.6	2280.8	2006.8	2312.4	1945.7	1989.9	2613.9	2801.5	3043.9
52.5°	2481.1	2386.2	1148.8	1705.3	1454.5	1764.4	1336.5	1964.6	2335.6	2632.9	2514.8
55°	2240.8	2371.5	1623.1	1465.0	2038.4	1395.5	1465.0	2177.5	2063.7	2369.4	2118.5
57.5°	1971.0	2002.6	1562.0	1787.6	1764.4	1876.1	1570.4	1930.9	1823.4	2108.0	1966.7
60°	1726.4	1490.3	1148.8	1397.6	1201.5	1553.6	1169.9	1591.5	1568.3	1656.9	1930.9
62.5°	1414.4	1205.8	1290.1	1022.4	942.3	1007.6	1106.7	1153.1	1254.2	1403.9	1602.1
65°	1191.0	952.8	1271.1	651.4	573.4	763.1	1294.3	1018.2	1032.9	1271.1	1334.3
67.5°	891.7	702.0	729.4	522.8	472.2	512.2	910.6	788.4	828.4	940.2	1028.7
70°	763.1	624.0	529.1	430.0	427.9	432.1	571.3	588.1	704.1	792.6	851.6
72.5°	636.6	514.3	421.6	354.1	320.4	390.0	417.4	484.8	596.6	942.3	777.8
75°	522.8	594.4	341.5	290.9	259.3	284.6	335.2	440.6	478.5	586.0	636.6
77.5°	421.6	345.7	267.7	242.4	231.9	250.8	259.3	459.5	375.2	453.2	537.5
80°	328.8	257.2	208.7	162.3	139.1	158.1	206.6	234.0	276.1	337.3	400.5
82.5°	236.1	196.0	145.5	118.0	101.2	115.9	137.0	164.4	187.6	231.9	280.4
85°	156.0	128.6	103.3	84.3	71.7	82.2	92.8	103.3	101.2	139.1	179.2
87.5°	78.0	69.6	69.6	61.1	50.6	56.9	63.2	54.8	29.5	61.1	109.6
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):**

	247.5°	270°	292.5°	315°	337.5°	360°
0°	6186.9	6186.9	6186.9	6186.9	6186.9	6186.9
2.5°	6189.0	6205.9	6201.7	6149.0	6153.2	6184.8
5°	6144.7	6197.4	6184.8	6117.3	6113.1	6125.8
7.5°	5931.8	5721.0	6030.9	6058.3	6035.1	6047.8
10°	4839.9	4698.7	5057.0	5714.7	5988.7	5986.6
12.5°	4344.5	4711.3	4416.2	4913.7	5858.1	5866.5
15°	4953.7	5130.8	5023.3	4300.3	5710.5	5700.0
17.5°	4637.5	4312.9	4679.7	4511.1	5522.9	5575.6
20°	4135.8	4627.0	4184.3	4721.9	4865.2	5453.3
22.5°	5019.1	5213.0	4823.0	4382.5	4403.6	5242.5
25°	5143.4	5459.6	5046.5	3935.6	4011.5	5046.5
27.5°	5288.9	5649.4	5257.3	4182.2	3775.4	4901.0
30°	5350.0	5581.9	5447.0	4502.6	3849.2	4671.3
32.5°	5232.0	5139.2	5352.1	4418.3	3798.6	4490.0
35°	4618.6	4549.0	4873.6	4534.2	3752.2	4222.3
37.5°	3918.7	4142.2	4279.2	4551.1	3423.3	4064.2
40°	3859.7	4243.3	3952.4	4418.3	3134.6	3703.7
42.5°	3950.3	4015.7	3872.3	3998.8	2896.4	3573.0
45°	3514.0	3516.1	3748.0	3520.3	2921.6	3271.6
47.5°	3058.7	3176.7	3284.2	3136.7	2900.6	3018.6
50°	2685.6	2959.6	2944.8	2961.7	2702.4	2748.8
52.5°	2685.6	2571.7	2601.2	2881.6	2578.0	2481.1
55°	2285.0	2242.9	2434.7	2481.1	2476.9	2240.8
57.5°	2027.9	2236.6	2095.3	2135.4	2226.0	1971.0
60°	1800.2	1737.0	2006.8	1871.9	1973.1	1726.4
62.5°	1406.0	1460.8	1555.7	1768.6	1648.4	1414.4
65°	1203.7	1288.0	1347.0	1479.8	1334.3	1191.0
67.5°	1134.1	1169.9	1153.1	1355.4	1146.7	891.7
70°	997.1	1110.9	1035.0	1016.0	946.5	763.1
72.5°	830.5	866.4	946.5	809.5	731.5	636.6
75°	708.3	742.0	748.3	699.8	718.8	522.8
77.5°	562.8	598.7	594.4	596.6	594.4	421.6
80°	442.7	468.0	468.0	457.4	400.5	328.8
82.5°	333.1	358.4	364.7	331.0	297.2	236.1
85°	238.2	267.7	265.6	236.1	196.0	156.0
87.5°	153.9	187.6	191.8	151.8	115.9	78.0
90°	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)