

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: P392803

Luminaire Tested: **12EN-LD2-23-UNV-L82765-W2A-1-U (3000K)**

Issue Date: 3/28/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P392803  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1910-563-36)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/28/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 12EN-LD2-23-UNV-L82765-W2A-1-U (3000K)  
Description: 1X2 ENCOUNTER, 2300 LUMENS, VIVIDTUNE TUNABLE WHITE  
Light Source: 3000K/5000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 2105.5 lumens  
Efficiency: N/A  
Efficacy: 109.1 lumens/watt  
Spacing Criteria (0/90/45): 1.28 / 1.26 / 1.39  
Luminous Opening: Rectangular (W 1' x L: 2' x H: 0')  
CIE Type: Direct

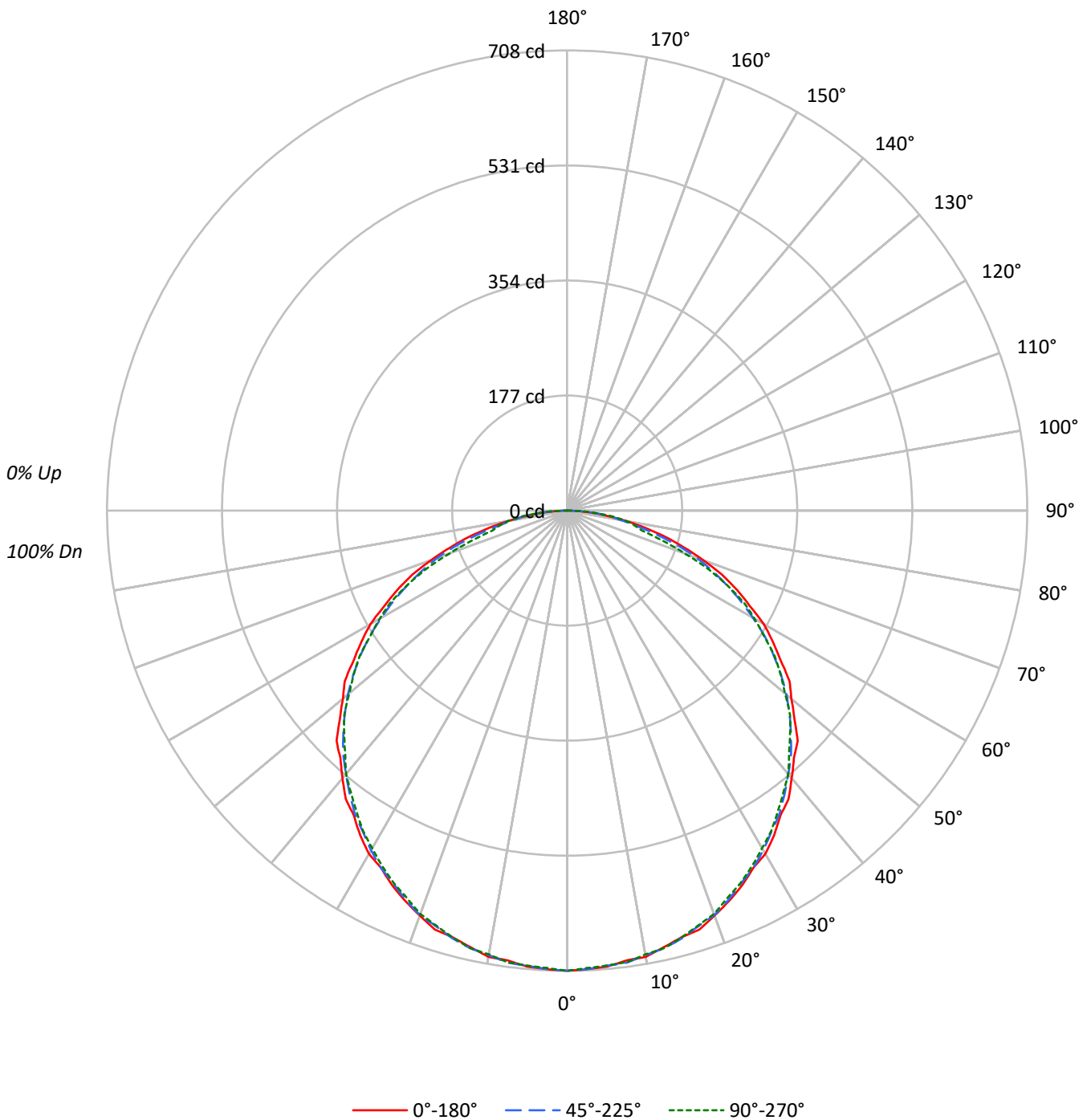
Input Watts (W): 19.3  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	108	104	99	95	106	101	97	94	97	94	91	93	90	88	89	87	85	83
2	98	90	83	77	96	88	82	76	84	79	74	81	77	73	78	74	71	69
3	89	79	70	64	87	77	69	63	74	67	62	71	66	61	69	64	60	58
4	82	70	61	54	79	68	60	53	66	58	53	63	57	52	61	56	51	49
5	75	62	53	46	73	61	52	46	59	51	45	57	50	45	55	49	44	42
6	69	56	47	40	67	55	46	40	53	45	40	51	44	39	50	44	39	37
7	64	50	42	35	62	50	41	35	48	40	35	47	40	35	45	39	34	32
8	60	46	37	31	58	45	37	31	44	36	31	43	36	31	41	35	31	29
9	56	42	34	28	54	42	34	28	40	33	28	39	33	28	38	32	28	26
10	52	39	31	26	51	38	31	25	37	30	25	36	30	25	35	29	25	23

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

	0°	45°	90°
0°	3811	3811	3811
5°	3806	3796	3796
10°	3810	3794	3789
15°	3787	3797	3787
20°	3798	3793	3782
25°	3780	3758	3753
30°	3790	3750	3728
35°	3760	3742	3712
40°	3776	3718	3718
45°	3819	3707	3693
50°	3771	3687	3663
55°	3761	3641	3658
60°	3762	3554	3584
65°	3668	3446	3457
70°	3508	3334	3017
75°	3261	2957	2479
80°	2842	2557	2870
85°	2266	2717	2773



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	66.9	3.2
10°-20°	192.2	9.1
20°-30°	292.5	13.9
30°-40°	356.3	16.9
40°-50°	377.5	17.9
50°-60°	349.6	16.6
60°-70°	271.9	12.9
70°-80°	151.5	7.2
80°-90°	46.9	2.2
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°	551.6	26.2
0°-40°	907.9	43.1
0°-60°	1635.1	77.7
0°-90°	2105.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2105.5	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	708	708	708	708	708	
5°	704	702	703	704	703	67
15°	680	682	682	682	680	193
25°	636	636	633	631	632	294
35°	572	572	570	567	565	360
45°	502	494	487	483	485	384
55°	401	397	388	385	390	360
65°	288	282	271	273	272	284
75°	157	152	142	128	119	165
85°	37	38	44	45	45	43
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	708.1	708.1	708.1	708.1	708.1
2.5°	706.3	706.3	706.3	706.3	704.4
5°	704.4	701.7	702.6	704.4	702.6
7.5°	698.0	700.8	701.7	701.7	700.8
10°	697.1	694.3	694.3	694.3	693.4
12.5°	687.9	688.8	689.7	689.7	689.7
15°	679.7	682.4	681.5	681.5	679.7
17.5°	676.0	671.4	670.5	670.5	669.6
20°	663.1	661.3	662.2	660.4	660.4
22.5°	650.3	649.4	648.5	647.6	644.8
25°	636.5	636.5	632.9	631.0	632.0
27.5°	620.0	621.9	620.0	618.2	616.4
30°	609.9	605.4	603.5	601.7	599.9
32.5°	592.5	590.7	585.2	582.4	584.3
35°	572.3	572.3	569.6	566.8	565.0
37.5°	559.5	554.0	549.4	546.7	546.7
40°	537.5	537.5	529.2	525.6	529.2
42.5°	516.4	516.4	510.0	508.1	505.4
45°	501.7	493.5	487.0	483.4	485.2
47.5°	474.2	472.4	464.1	461.4	465.0
50°	450.4	449.4	440.3	438.4	437.5
52.5°	431.1	422.8	414.6	411.8	413.7
55°	400.8	397.2	388.0	385.2	389.8
57.5°	375.1	371.5	360.5	358.6	358.6
60°	349.5	341.2	330.2	328.4	333.0
62.5°	316.4	312.8	300.8	301.8	306.4
65°	288.0	281.6	270.6	273.3	271.5
67.5°	257.7	250.4	241.2	237.6	234.8
70°	222.9	218.3	211.9	199.0	191.7
72.5°	188.0	184.4	177.9	159.6	154.1
75°	156.8	152.3	142.2	127.5	119.2
77.5°	122.9	122.9	109.1	102.7	106.4
80°	91.7	92.6	82.5	89.9	92.6
82.5°	62.4	61.5	67.9	70.6	70.6
85°	36.7	37.6	44.0	44.9	44.9
87.5°	14.7	17.4	20.2	21.1	22.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)