

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: P295723

Luminaire Tested: **14RLN-LD5-31-RDP-UNV-L82765-W2A1-U-5700K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P295723  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P36061-R2)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 14RLN-LD5-31-RDP-UNV-L82765-W2A1-U-5700K  
Description: RLN LED 1x4 TUNABLE WHITE TROFFER  
WITH RDP LENS  
Light Source: (168) 80 CRI LEDS TUNED TO 5700K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 2759.0 lumens  
Efficiency: N/A  
Efficacy: 94.8 lumens/watt  
Spacing Criteria (0/90/45): 1.26 / 1.35 / 1.39  
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')  
CIE Type: Direct

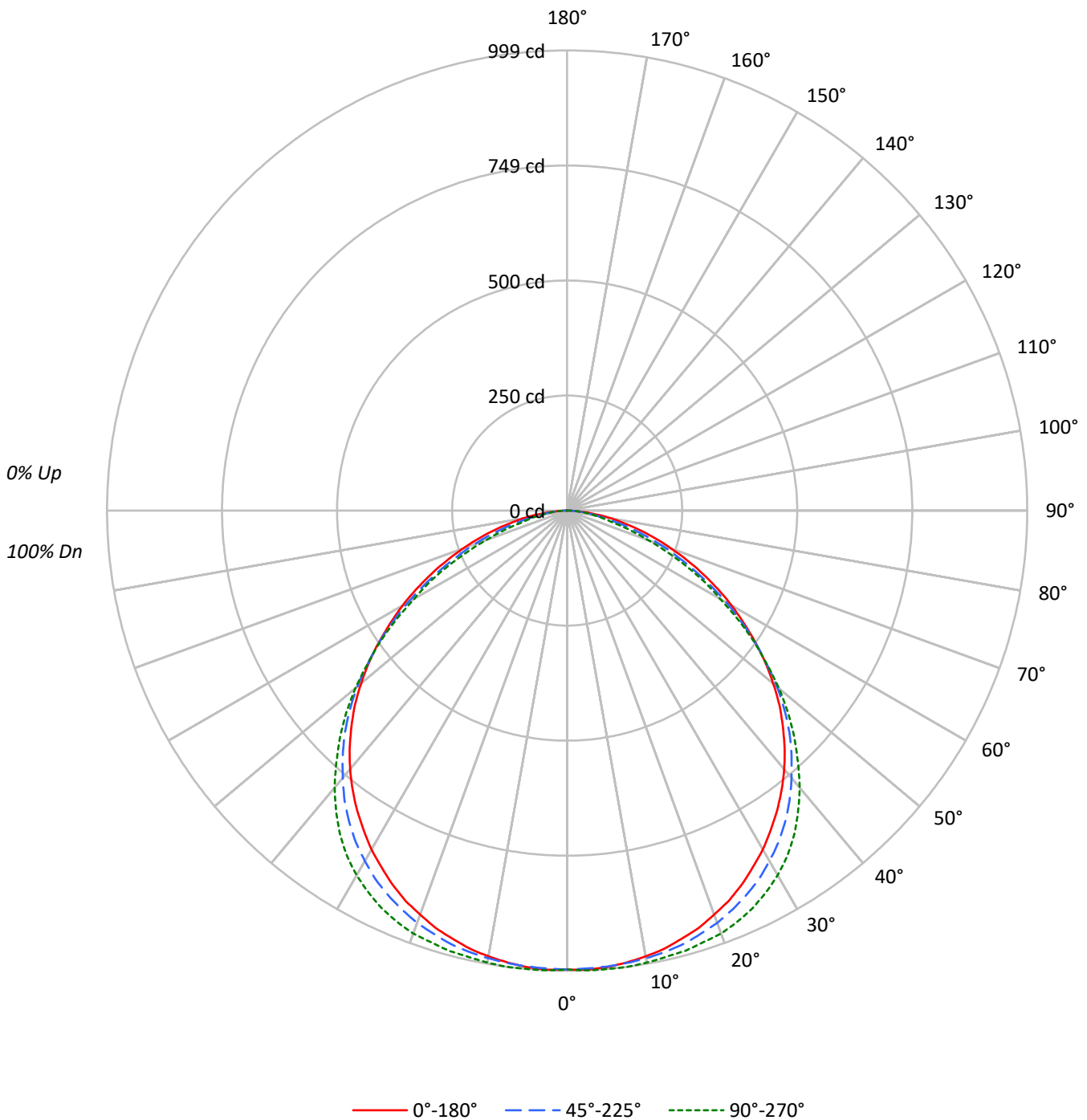
Input Watts (W): 29.109  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	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	105	101	97	107	103	99	96	98	95	93	94	92	90	91	89	87	85					85			
2	100	92	85	80	97	90	84	79	87	81	77	83	79	75	80	77	74	72					72			
3	91	81	73	67	89	79	72	66	77	70	65	74	68	64	71	67	63	61					61			
4	84	72	63	57	81	71	63	57	68	61	56	66	60	55	64	59	54	52					52			
5	77	64	56	49	75	63	55	49	61	54	48	59	53	48	57	52	47	45					45			
6	71	58	49	43	69	57	49	43	55	48	42	54	47	42	52	46	42	40					40			
7	66	53	44	38	64	52	44	38	50	43	38	49	42	37	48	42	37	35					35			
8	61	48	40	34	60	47	39	34	46	39	34	45	38	33	44	38	33	31					31			
9	57	44	36	30	56	44	36	30	42	35	30	41	35	30	40	34	30	28					28			
10	54	41	33	28	53	40	33	28	39	32	27	38	32	27	37	31	27	25					25			

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

	0°	45°	90°
0°	2681	2681	2681
5°	2688	2684	2699
10°	2685	2696	2723
15°	2680	2715	2757
20°	2673	2728	2798
25°	2661	2735	2828
30°	2640	2730	2840
35°	2611	2711	2823
40°	2576	2662	2759
45°	2519	2597	2655
50°	2444	2490	2513
55°	2341	2334	2321
60°	2220	2146	2065
65°	2068	1920	1815
70°	1887	1682	1467
75°	1696	1396	1097
80°	1508	1020	956
85°	1186	846	846



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	94.8	3.4
10°-20°	275.7	10.0
20°-30°	425.4	15.4
30°-40°	515.9	18.7
40°-50°	523.8	19.0
50°-60°	443.1	16.1
60°-70°	299.8	10.9
70°-80°	145.0	5.3
80°-90°	35.4	1.3
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°	795.9	28.8
0°-40°	1311.9	47.5
0°-60°	2278.8	82.6
0°-90°	2759.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2759.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	996	996	996	996	996	
5°	995	995	994	998	999	95
15°	962	968	974	985	990	272
25°	896	903	921	944	952	413
35°	795	803	825	851	859	497
45°	662	663	682	696	698	510
55°	499	495	498	498	495	446
65°	325	311	302	289	285	322
75°	163	151	134	116	106	174
85°	38	30	27	27	27	45
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	996.4	996.4	996.4	996.4	996.4
2.5°	997.7	997.7	995.0	997.7	999.1
5°	995.0	995.0	993.6	997.7	999.1
7.5°	989.5	990.9	990.9	996.4	999.1
10°	982.7	985.4	986.8	995.0	996.4
12.5°	974.4	977.2	981.3	990.9	992.3
15°	962.1	967.6	974.4	985.4	989.5
17.5°	949.8	955.3	963.5	978.6	982.7
20°	933.3	940.2	952.5	970.3	977.2
22.5°	916.9	922.4	937.4	959.4	966.2
25°	896.3	903.2	921.0	944.3	952.5
27.5°	873.0	882.6	901.8	926.5	934.7
30°	849.7	858.0	878.5	905.9	914.1
32.5°	822.3	830.5	853.8	879.9	889.5
35°	794.9	803.1	825.1	851.1	859.3
37.5°	764.8	770.2	793.5	815.5	823.7
40°	733.2	737.3	757.9	779.8	785.3
42.5°	699.0	701.7	720.9	740.1	741.5
45°	662.0	663.3	682.5	696.2	697.6
47.5°	625.0	623.6	640.0	649.6	651.0
50°	583.8	583.8	594.8	600.3	600.3
52.5°	542.7	540.0	545.5	549.6	545.5
55°	498.9	494.8	497.5	497.5	494.8
57.5°	455.0	446.8	448.2	445.4	438.6
60°	412.5	402.9	398.8	389.2	383.7
62.5°	368.7	357.7	349.5	338.5	337.2
65°	324.8	311.1	301.5	289.2	285.1
67.5°	282.3	270.0	256.3	242.6	234.4
70°	239.8	226.1	213.8	196.0	186.4
72.5°	201.5	189.1	174.1	153.5	146.6
75°	163.1	150.8	134.3	116.5	105.5
77.5°	126.1	116.5	98.7	83.6	82.2
80°	97.3	86.3	65.8	61.7	61.7
82.5°	63.0	56.2	46.6	43.9	43.9
85°	38.4	30.2	27.4	27.4	27.4
87.5°	15.1	13.7	13.7	13.7	13.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)