

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: P229611

Luminaire Tested: **22RLN-LD5-35-RDP-UNV-L830-CD1-U**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P229611  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P36060)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 22RLN-LD5-35-RDP-UNV-L830-CD1-U  
Description: METALUX 2X2 RLN LED TROFFER WITH RDP LENS  
Light Source: (126)3000K CCT, 80 CRI LEDs  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 2770.0 lumens  
Efficiency: N/A  
Efficacy: 90.5 lumens/watt  
Spacing Criteria (0/90/45): 1.25 / 1.38 / 1.41  
Luminous Opening: Rectangular (W 1.83' x L: 1.83' x H: 0')  
CIE Type: Direct

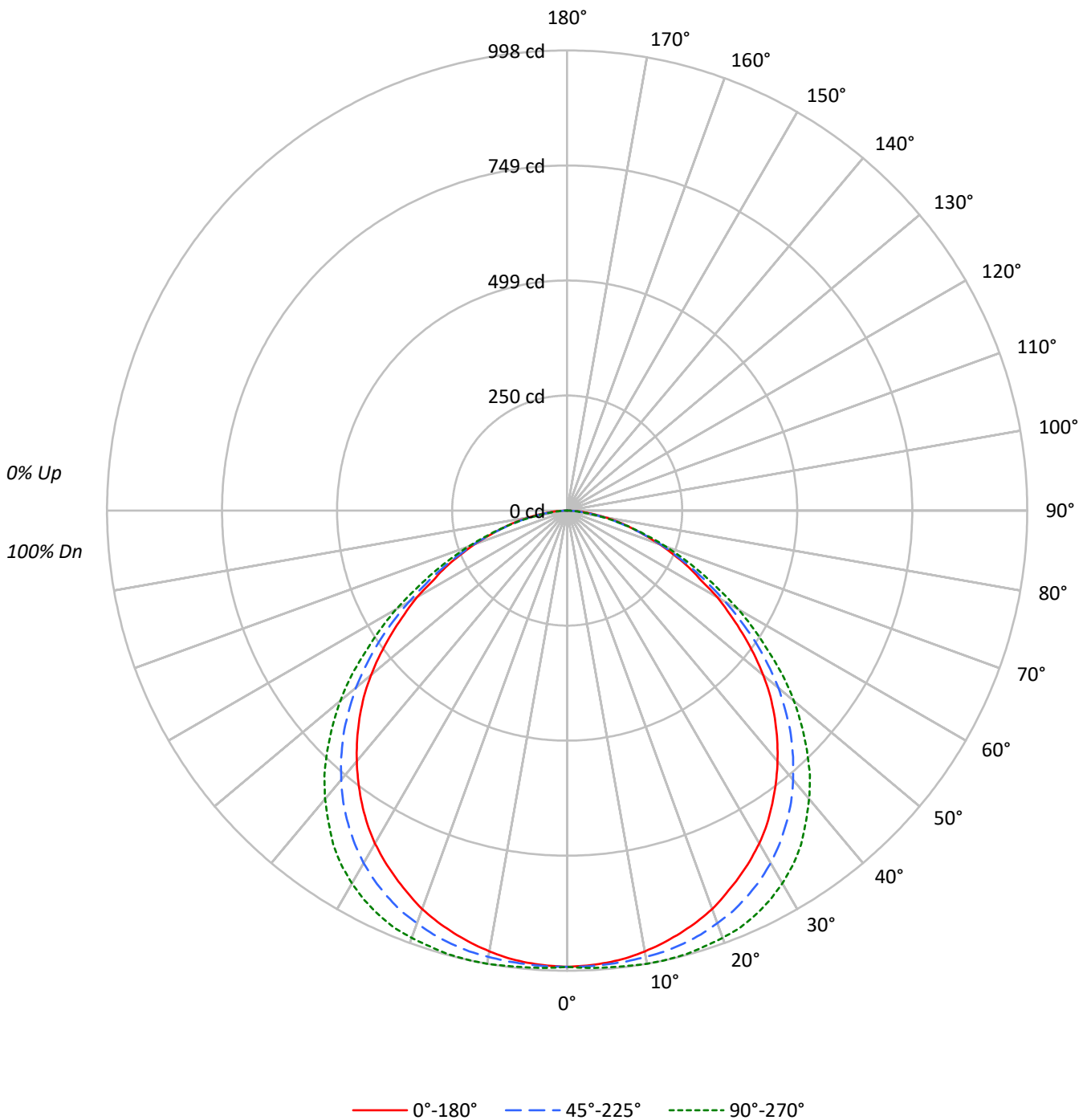
Input Watts (W): 30.6  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	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	86	81	77	83	79	75	80	77	74	72					72			
3	91	81	73	67	89	79	72	66	76	70	65	74	68	64	71	67	63	61					61			
4	84	72	63	57	81	71	63	56	68	61	56	66	60	55	64	58	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	37	49	42	37	47	41	37	35					35			
8	61	48	40	34	60	47	39	34	46	39	33	45	38	33	44	38	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	27	39	32	27	38	32	27	37	31	27	25					25			

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

	0°	45°	90°
0°	3169	3169	3169
5°	3165	3176	3197
10°	3157	3196	3245
15°	3146	3224	3303
20°	3135	3245	3361
25°	3107	3263	3418
30°	3083	3264	3452
35°	3034	3239	3458
40°	2968	3187	3414
45°	2885	3108	3330
50°	2769	2980	3199
55°	2592	2791	2980
60°	2409	2540	2746
65°	2208	2286	2439
70°	1999	2031	2126
75°	1761	1719	1782
80°	1531	1405	1344
85°	1246	933	808



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	94.2	3.4
10°-20°	274.7	9.9
20°-30°	425.6	15.4
30°-40°	518.0	18.7
40°-50°	527.6	19.0
50°-60°	444.9	16.1
60°-70°	301.0	10.9
70°-80°	150.4	5.4
80°-90°	33.5	1.2
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°	794.6	28.7
0°-40°	1312.6	47.4
0°-60°	2285.2	82.5
0°-90°	2770.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2770.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	990	990	990	990	990	
5°	984	986	988	993	994	94
15°	949	956	972	990	996	268
25°	879	893	923	954	967	405
35°	776	793	828	868	884	485
45°	637	649	686	722	735	491
55°	464	471	500	524	534	415
65°	291	286	302	315	322	288
75°	142	137	139	141	144	153
85°	34	29	25	22	22	39
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	989.5	989.5	989.5	989.5	989.5
2.5°	987.8	987.8	989.5	991.1	992.8
5°	984.4	986.1	987.8	992.8	994.5
7.5°	979.3	981.0	986.1	992.8	996.2
10°	970.8	974.2	982.7	992.8	997.9
12.5°	960.7	965.7	979.3	991.1	997.9
15°	948.8	955.6	972.5	989.5	996.2
17.5°	935.2	943.7	964.0	982.7	991.1
20°	920.0	930.2	952.2	975.9	986.1
22.5°	899.7	913.2	940.3	967.4	979.3
25°	879.3	892.9	923.4	953.9	967.4
27.5°	857.3	872.5	904.7	938.6	952.2
30°	833.6	847.1	882.7	918.3	933.5
32.5°	806.5	820.0	857.3	894.6	911.5
35°	776.0	792.9	828.5	867.5	884.4
37.5°	743.8	759.0	798.0	835.3	850.5
40°	709.9	725.1	762.4	801.4	816.6
42.5°	674.3	689.6	725.1	762.4	779.4
45°	637.0	648.9	686.2	721.8	735.3
47.5°	598.1	606.5	642.1	676.0	689.6
50°	555.7	564.2	598.1	628.6	642.1
52.5°	510.0	516.8	548.9	576.1	591.3
55°	464.2	471.0	499.8	523.5	533.7
57.5°	418.5	421.9	447.3	471.0	481.2
60°	376.1	376.1	396.5	415.1	428.7
62.5°	327.0	332.1	347.3	366.0	371.0
65°	291.4	286.3	301.6	315.1	321.9
67.5°	250.8	247.4	257.5	269.4	272.8
70°	213.5	208.4	216.9	223.6	227.0
72.5°	174.5	172.8	176.2	181.3	183.0
75°	142.3	137.2	138.9	140.6	144.0
77.5°	113.5	105.0	106.7	105.0	106.7
80°	83.0	76.2	76.2	74.5	72.9
82.5°	55.9	52.5	49.1	45.7	44.1
85°	33.9	28.8	25.4	22.0	22.0
87.5°	13.6	10.2	8.5	8.5	8.5
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)