

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: P236583

Luminaire Tested: **VRVT4LED-LD5-9-DR-UNV-L835-CD1-WL-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P236583
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1710-367-1)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: VRVT4LED-LD5-9-DR-UNV-L835-CD1-WL-U
Description: METALUX VRVT4 LED LUMINAIRE
4 BOARDS WITH CLEAR ACRYLIC LENS
Light Source: (224) 3500K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 8822.0 lumens
Efficiency: N/A
Efficacy: 137.0 lumens/watt
Spacing Criteria (0/90/45): 1.28 / 1.28 / 1.4
Luminous Opening: Rectangular w/ Sides (W: 1.04' x L: 4.12' x H: 0.25')
CIE Type: Direct

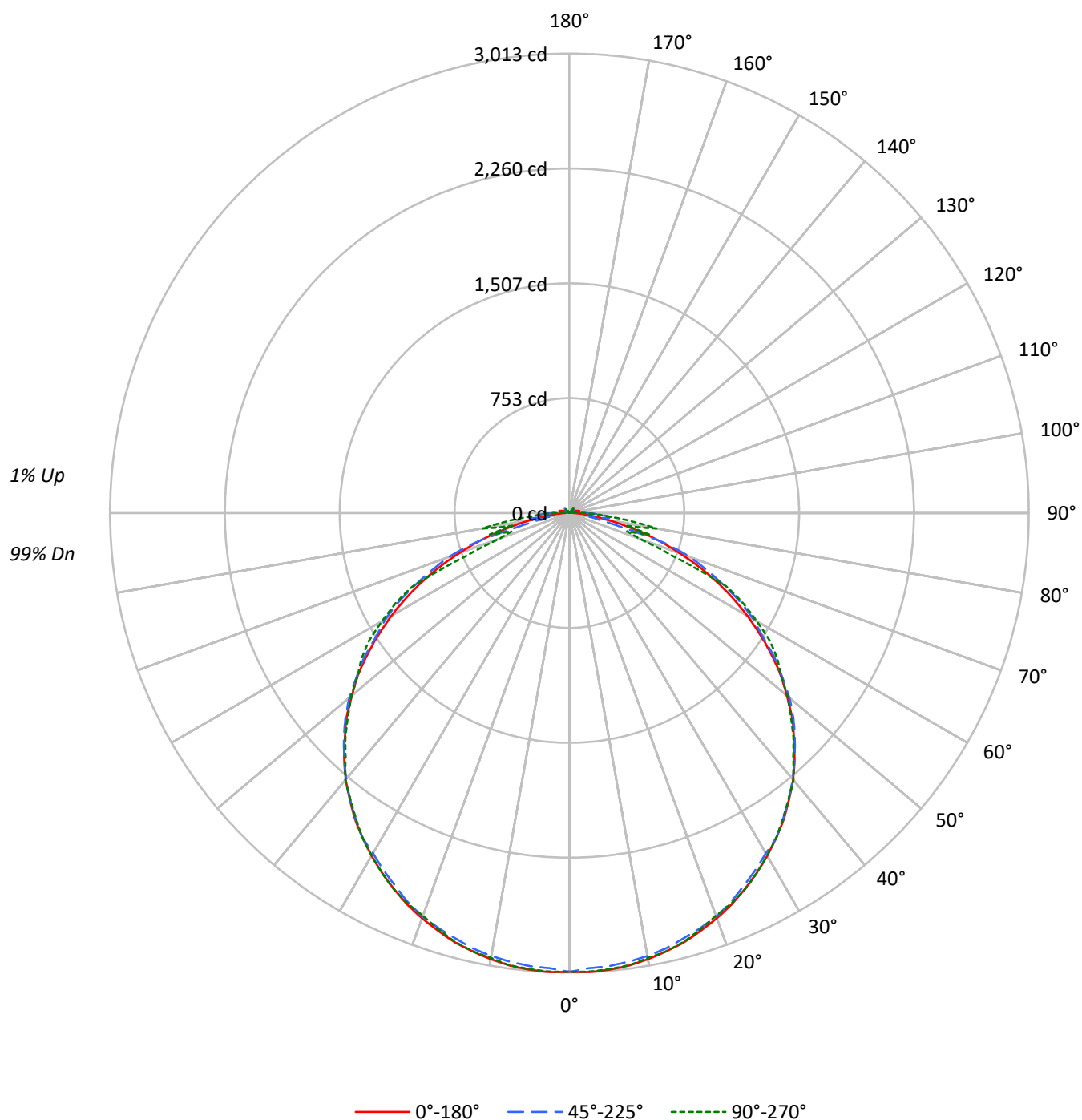
Input Watts (W): 64.4
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10
RCR																	
0	119	119	119	119	116	116	116	116	110	110	110	106	106	106	101	101	101
1	108	104	99	96	106	101	97	94	97	94	91	93	90	88	89	87	85
2	99	90	84	78	96	88	82	77	85	79	75	81	77	73	78	74	71
3	90	79	71	65	87	78	70	64	75	68	63	72	66	62	69	64	60
4	82	70	62	55	80	69	61	54	66	59	54	64	58	53	61	56	52
5	76	63	54	47	73	62	53	47	59	52	46	57	51	46	55	50	45
6	70	56	47	41	68	55	47	41	54	46	40	52	45	40	50	44	39
7	65	51	42	36	63	50	42	36	49	41	36	47	40	35	46	40	35
8	60	47	38	32	59	46	38	32	44	37	32	43	36	32	42	36	31
9	56	43	34	29	55	42	34	29	41	34	29	40	33	28	39	33	28
10	53	39	31	26	51	39	31	26	38	31	26	37	30	26	36	30	26

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7536	7536	7536
5°	7518	7362	7395
10°	7475	7232	7230
15°	7432	7086	7087
20°	7374	6969	6888
25°	7312	6787	6770
30°	7252	6638	6587
35°	7193	6508	6396
40°	7102	6323	6223
45°	6959	6110	5938
50°	6764	5857	5657
55°	6503	5486	5412
60°	6118	5103	5018
65°	5593	4528	4437
70°	4830	3874	2132
75°	3844	1835	2757
80°	2714	878	3544
85°	1698	2283	1911



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	285.1	3.2
10°-20°	820.0	9.3
20°-30°	1252.3	14.2
30°-40°	1531.8	17.4
40°-50°	1607.6	18.2
50°-60°	1465.5	16.6
60°-70°	1071.7	12.1
70°-80°	471.1	5.3
80°-90°	216.6	2.5
90°-100°	38.9	0.4
100°-110°	20.6	0.2
110°-120°	14.8	0.2
120°-130°	9.1	0.1
130°-140°	11.2	0.1
140°-150°	3.6	0.0
150°-160°	1.1	0.0
160°-170°	0.7	0.0
170°-180°	0.3	0.0
0°-30°	2357.4	26.7
0°-40°	3889.1	44.1
0°-60°	6962.2	78.9
0°-90°	8721.7	98.9
90°-120°	74.4	0.8
90°-150°	98.3	1.1
90°-180°	100.0	1.1
0°-180°	8822.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3008	3008	3008	3008	3008	
5°	3006	3002	2982	3003	3003	286
15°	2912	2908	2888	2917	2908	822
25°	2720	2717	2699	2724	2723	1255
35°	2452	2453	2445	2447	2443	1532
45°	2083	2084	2091	2085	2078	1607
55°	1618	1638	1638	1664	1664	1443
65°	1066	1080	1112	1156	1134	1052
75°	487	509	340	237	540	525
85°	100	71	272	295	249	115
90°	29	77	115	102	86	20
95°	47	26	20	17	16	43
105°	59	19	14	12	11	61
115°	27	21	11	9	9	28
125°	13	11	10	7	7	12
135°	6	4	10	20	10	5
145°	3	3	2	11	8	2
155°	2	3	3	2	1	1
165°	3	3	3	2	2	1
175°	3	3	3	3	2	0
180°	3	3	3	3	3	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3008.4	3008.4	3008.4	3008.4	3008.4
2.5°	3013.3	3009.4	2987.9	3008.4	3009.4
5°	3005.5	3001.6	2982.0	3002.6	3002.6
7.5°	2992.8	2986.9	2967.3	2991.8	2991.8
10°	2970.2	2968.3	2949.6	2966.3	2962.4
12.5°	2942.8	2938.9	2924.2	2940.8	2942.8
15°	2912.4	2908.5	2887.9	2917.3	2908.5
17.5°	2870.3	2873.2	2853.6	2873.2	2860.5
20°	2827.2	2830.1	2816.4	2810.5	2809.5
22.5°	2778.2	2776.2	2764.4	2761.5	2771.3
25°	2720.3	2717.4	2698.8	2724.3	2723.3
27.5°	2660.6	2659.6	2641.0	2672.3	2661.5
30°	2594.9	2594.9	2576.3	2602.7	2592.9
32.5°	2525.3	2529.2	2524.3	2529.2	2525.3
35°	2451.8	2452.8	2445.0	2446.9	2443.0
37.5°	2365.6	2371.5	2363.6	2366.6	2361.7
40°	2282.3	2279.4	2278.4	2283.3	2286.2
42.5°	2186.3	2167.6	2185.3	2189.2	2172.5
45°	2083.4	2084.4	2091.2	2085.3	2078.5
47.5°	1982.4	1978.5	1992.2	1979.5	1967.7
50°	1860.9	1889.3	1883.5	1861.9	1866.8
52.5°	1747.2	1768.8	1757.0	1761.9	1748.2
55°	1617.9	1638.5	1637.5	1664.0	1664.0
57.5°	1483.6	1505.2	1500.3	1535.6	1559.1
60°	1349.4	1370.9	1393.5	1416.0	1418.0
62.5°	1207.3	1228.9	1264.1	1283.7	1287.7
65°	1066.2	1079.9	1112.2	1156.3	1133.8
67.5°	919.2	929.0	974.1	980.9	729.1
70°	769.3	782.0	837.9	517.4	483.1
72.5°	633.0	637.9	658.5	432.2	395.9
75°	487.0	508.6	340.0	237.1	540.0
77.5°	362.6	379.2	196.0	392.0	382.2
80°	252.8	272.4	134.3	349.8	580.1
82.5°	164.6	127.4	253.8	394.9	410.6
85°	100.0	70.6	272.4	295.0	248.9
87.5°	61.7	53.9	183.3	187.2	173.5
90°	29.4	77.4	114.7	101.9	86.2
92.5°	27.4	54.9	51.0	41.2	38.2
95°	47.0	25.5	19.6	16.7	15.7
97.5°	65.7	16.7	13.7	11.8	11.8
100°	66.6	15.7	13.7	11.8	10.8
102.5°	66.6	16.7	13.7	11.8	10.8
105°	58.8	18.6	13.7	11.8	10.8
107.5°	50.0	20.6	12.7	11.8	10.8
110°	42.1	23.5	12.7	10.8	10.8



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	33.3	22.5	11.8	9.8	9.8
115°	27.4	20.6	10.8	8.8	8.8
117.5°	22.5	18.6	10.8	8.8	7.8
120°	18.6	16.7	10.8	7.8	7.8
122.5°	15.7	14.7	10.8	6.9	6.9
125°	12.7	10.8	9.8	6.9	6.9
127.5°	10.8	7.8	11.8	6.9	5.9
130°	8.8	6.9	20.6	6.9	6.9
132.5°	6.9	4.9	42.1	8.8	6.9
135°	5.9	3.9	9.8	19.6	9.8
137.5°	4.9	3.9	6.9	60.8	27.4
140°	3.9	2.9	6.9	9.8	38.2
142.5°	2.9	2.9	4.9	6.9	6.9
145°	2.9	2.9	2.0	10.8	7.8
147.5°	2.9	2.0	2.0	11.8	12.7
150°	2.0	2.0	2.0	3.9	6.9
152.5°	2.0	2.0	2.0	2.0	2.0
155°	2.0	2.9	2.9	2.0	1.0
157.5°	2.0	2.9	2.9	2.0	1.0
160°	2.9	2.9	2.9	2.0	1.0
162.5°	2.9	2.9	2.9	2.0	2.0
165°	2.9	2.9	2.9	2.0	2.0
167.5°	2.9	2.9	2.9	2.0	2.0
170°	2.9	2.9	2.9	2.0	2.0
172.5°	2.9	2.9	2.9	2.0	2.0
175°	2.9	2.9	2.9	2.9	2.0
177.5°	2.9	2.9	2.9	2.9	2.0
180°	2.9	2.9	2.9	2.9	2.9

(END OF REPORT)