

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: P236597

Luminaire Tested: **VRVT4LED-LD5-9-PC-UNV-L850-CD1-WL-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P236597
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1710-367-3)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: VRVT4LED-LD5-9-PC-UNV-L850-CD1-WL-U
Description: METALUX VRVT4 LED LUMINAIRE
4 BOARDS WITH CLEAR POLY CARBONATE LENS
Light Source: (224) 5000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 9132.0 lumens
Efficiency: N/A
Efficacy: 142.2 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

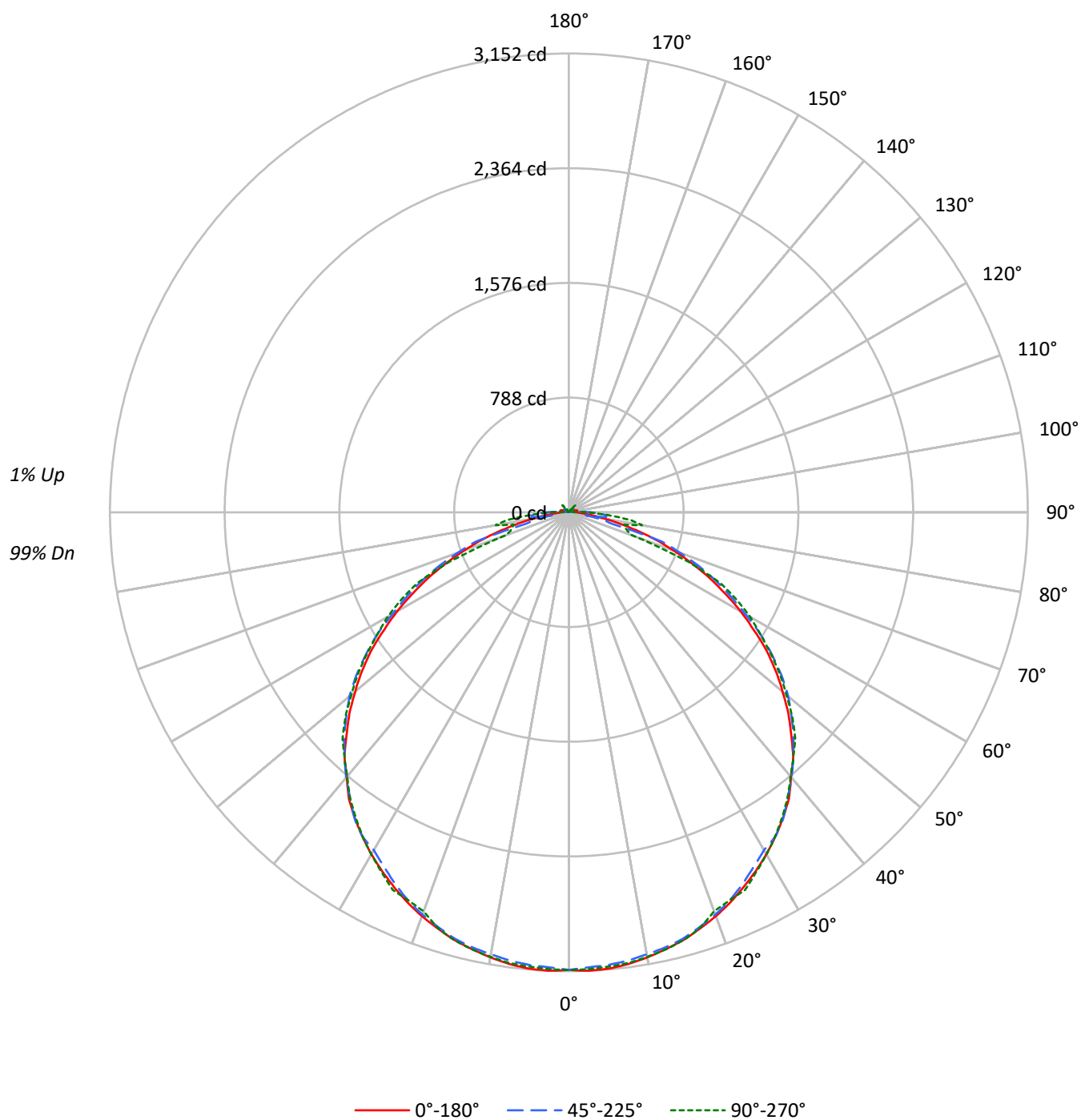
Input Watts (W): 64.2
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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					0
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		105	105	105		101	101	101
1	108	104	99	96	106	101	97	94		97	94	91		93	90	88		89	87	85
2	99	91	84	78	96	89	82	77		85	80	75		81	77	73		78	75	71
3	90	80	72	65	88	78	70	64		75	68	63		72	66	62		69	65	61
4	83	71	62	55	80	69	61	55		66	59	54		64	58	53		62	56	52
5	76	63	54	47	74	62	53	47		60	52	46		57	51	46		55	50	45
6	70	57	48	41	68	56	47	41		54	46	41		52	45	40		50	44	40
7	65	51	43	36	63	50	42	36		49	41	36		47	41	36		46	40	35
8	60	47	38	32	59	46	38	32		45	37	32		43	37	32		42	36	31
9	56	43	35	29	55	42	34	29		41	34	29		40	33	29		39	33	28
10	53	40	32	26	51	39	31	26		38	31	26		37	30	26		36	30	26

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7875	7875	7875
5°	7871	7704	7715
10°	7813	7560	7565
15°	7763	7438	7415
20°	7701	7277	7149
25°	7634	7090	7114
30°	7580	6902	6896
35°	7520	6835	6687
40°	7385	6606	6445
45°	7211	6377	6281
50°	6963	6115	5909
55°	6663	5700	5503
60°	6186	5118	5086
65°	5581	4535	4481
70°	4779	3746	2029
75°	3784	1661	2044
80°	2646	769	3114
85°	1766	2170	2380



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	297.8	3.3
10°-20°	856.8	9.4
20°-30°	1307.4	14.3
30°-40°	1601.0	17.5
40°-50°	1676.9	18.4
50°-60°	1507.6	16.5
60°-70°	1077.2	11.8
70°-80°	456.9	5.0
80°-90°	232.5	2.5
90°-100°	48.7	0.5
100°-110°	21.0	0.2
110°-120°	14.9	0.2
120°-130°	10.2	0.1
130°-140°	15.7	0.2
140°-150°	5.3	0.1
150°-160°	1.0	0.0
160°-170°	0.7	0.0
170°-180°	0.3	0.0
0°-30°	2462.0	27.0
0°-40°	4063.0	44.5
0°-60°	7247.6	79.4
0°-90°	9014.1	98.7
90°-120°	84.7	0.9
90°-150°	115.9	1.3
90°-180°	118.0	1.3
0°-180°	9132.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3144	3144	3144	3144	3144	
5°	3147	3133	3121	3135	3132	299
15°	3042	3034	3031	3045	3043	858
25°	2840	2846	2819	2845	2862	1310
35°	2563	2566	2568	2562	2554	1602
45°	2159	2165	2183	2182	2198	1665
55°	1658	1676	1701	1699	1692	1474
65°	1064	1083	1114	1150	1145	1051
75°	479	489	308	200	400	516
85°	104	75	259	331	310	116
90°	43	64	150	126	131	26
95°	42	41	31	21	18	39
105°	54	24	14	11	10	56
115°	30	23	11	7	6	30
125°	15	12	11	5	5	14
135°	7	5	18	61	25	6
145°	3	3	2	19	14	2
155°	2	2	2	1	1	1
165°	3	3	3	2	1	1
175°	3	3	3	2	2	0
180°	2	2	2	2	2	



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CATALOG NUMBER: VRVT4LED-LD5-9-PC-UNV-L850-CD1-WL-U

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3143.7	3143.7	3143.7	3143.7	3143.7
2.5°	3152.0	3142.7	3128.1	3141.6	3140.6
5°	3146.8	3133.3	3120.8	3135.4	3132.3
7.5°	3130.2	3115.6	3105.2	3120.8	3122.9
10°	3104.2	3095.9	3083.4	3102.1	3100.0
12.5°	3074.0	3070.9	3060.5	3075.1	3075.1
15°	3041.8	3034.5	3031.4	3044.9	3042.9
17.5°	2997.1	2997.1	2986.7	3005.4	2994.0
20°	2952.4	2948.2	2940.9	2930.5	2916.0
22.5°	2899.3	2900.4	2886.9	2865.0	2883.7
25°	2840.1	2846.3	2819.3	2845.3	2861.9
27.5°	2778.7	2782.9	2746.5	2796.4	2786.0
30°	2712.2	2711.1	2678.9	2715.3	2714.2
32.5°	2639.4	2645.6	2640.4	2640.4	2638.3
35°	2563.4	2565.5	2567.6	2562.4	2554.1
37.5°	2481.3	2474.0	2468.8	2474.0	2468.8
40°	2373.1	2382.5	2380.4	2383.5	2367.9
42.5°	2280.6	2258.7	2278.5	2281.6	2281.6
45°	2158.9	2165.1	2182.8	2181.8	2198.4
47.5°	2043.5	2042.4	2072.6	2087.2	2082.0
50°	1915.6	1949.9	1966.5	1962.4	1949.9
52.5°	1791.8	1820.9	1839.6	1836.5	1826.1
55°	1657.7	1676.4	1701.3	1699.3	1692.0
57.5°	1505.8	1544.3	1560.9	1567.2	1558.9
60°	1364.4	1384.2	1397.7	1422.6	1437.2
62.5°	1210.5	1236.5	1254.2	1293.7	1296.8
65°	1063.9	1082.6	1113.8	1150.2	1145.0
67.5°	912.0	931.8	966.1	1005.6	888.1
70°	761.2	776.8	810.1	479.4	459.7
72.5°	624.0	620.8	669.7	406.6	420.1
75°	479.4	488.8	307.8	199.7	400.4
77.5°	351.5	369.2	239.2	396.2	388.9
80°	246.5	267.3	117.5	368.1	509.6
82.5°	163.3	134.2	256.9	437.8	436.8
85°	104.0	74.9	258.9	330.7	309.9
87.5°	69.7	57.2	223.6	218.4	198.6
90°	42.6	64.5	149.8	125.8	131.0
92.5°	33.3	67.6	79.0	61.4	55.1
95°	41.6	40.6	31.2	20.8	17.7
97.5°	55.1	21.8	16.6	13.5	11.4
100°	59.3	19.8	14.6	11.4	10.4
102.5°	59.3	21.8	14.6	11.4	10.4
105°	54.1	23.9	13.5	11.4	10.4
107.5°	47.8	25.0	13.5	10.4	9.4
110°	41.6	26.0	12.5	9.4	9.4



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	35.4	25.0	11.4	8.3	7.3
115°	30.2	22.9	11.4	7.3	6.2
117.5°	25.0	20.8	10.4	6.2	6.2
120°	20.8	18.7	10.4	6.2	5.2
122.5°	17.7	16.6	10.4	5.2	5.2
125°	14.6	12.5	11.4	5.2	5.2
127.5°	12.5	9.4	18.7	6.2	5.2
130°	10.4	7.3	41.6	8.3	6.2
132.5°	8.3	6.2	36.4	16.6	9.4
135°	7.3	5.2	17.7	61.4	25.0
137.5°	5.2	4.2	10.4	43.7	66.6
140°	4.2	3.1	11.4	25.0	39.5
142.5°	4.2	3.1	6.2	11.4	16.6
145°	3.1	3.1	2.1	18.7	13.5
147.5°	3.1	2.1	2.1	13.5	22.9
150°	2.1	2.1	2.1	4.2	10.4
152.5°	2.1	2.1	2.1	1.0	2.1
155°	2.1	2.1	2.1	1.0	1.0
157.5°	2.1	2.1	3.1	1.0	1.0
160°	2.1	3.1	3.1	1.0	1.0
162.5°	2.1	3.1	3.1	1.0	1.0
165°	3.1	3.1	3.1	2.1	1.0
167.5°	3.1	3.1	3.1	2.1	1.0
170°	3.1	3.1	3.1	2.1	1.0
172.5°	3.1	3.1	3.1	2.1	2.1
175°	3.1	3.1	3.1	2.1	2.1
177.5°	3.1	3.1	3.1	2.1	2.1
180°	2.1	2.1	2.1	2.1	2.1

(END OF REPORT)