

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: P417717

Luminaire Tested: **VHB-1215-N-UNV-L935-CD-U-LEVEL2**

Issue Date: 11/17/2020

Test Information

Test Method: LM-79-08
Report Number: P417717
Test Lab: INNOVATION CENTER(G3)
Issue Date: 11/17/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: VHB-1215-N-UNV-L935-CD-U-LEVEL2
Description: VHB LED HIGH BAY LUMINAIRE WITH NARROW DISTRIBUTION LENS
Light Source: 3500K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 13476.2 lumens
Efficiency: N/A
Efficacy: 122.6 lumens/watt
Spacing Criteria (0/90/45): 1.32 / 0.74 / 0.88
Luminous Opening: Rectangular (W 1.17' x L: 1.5' x H: 0')
CIE Type: Direct

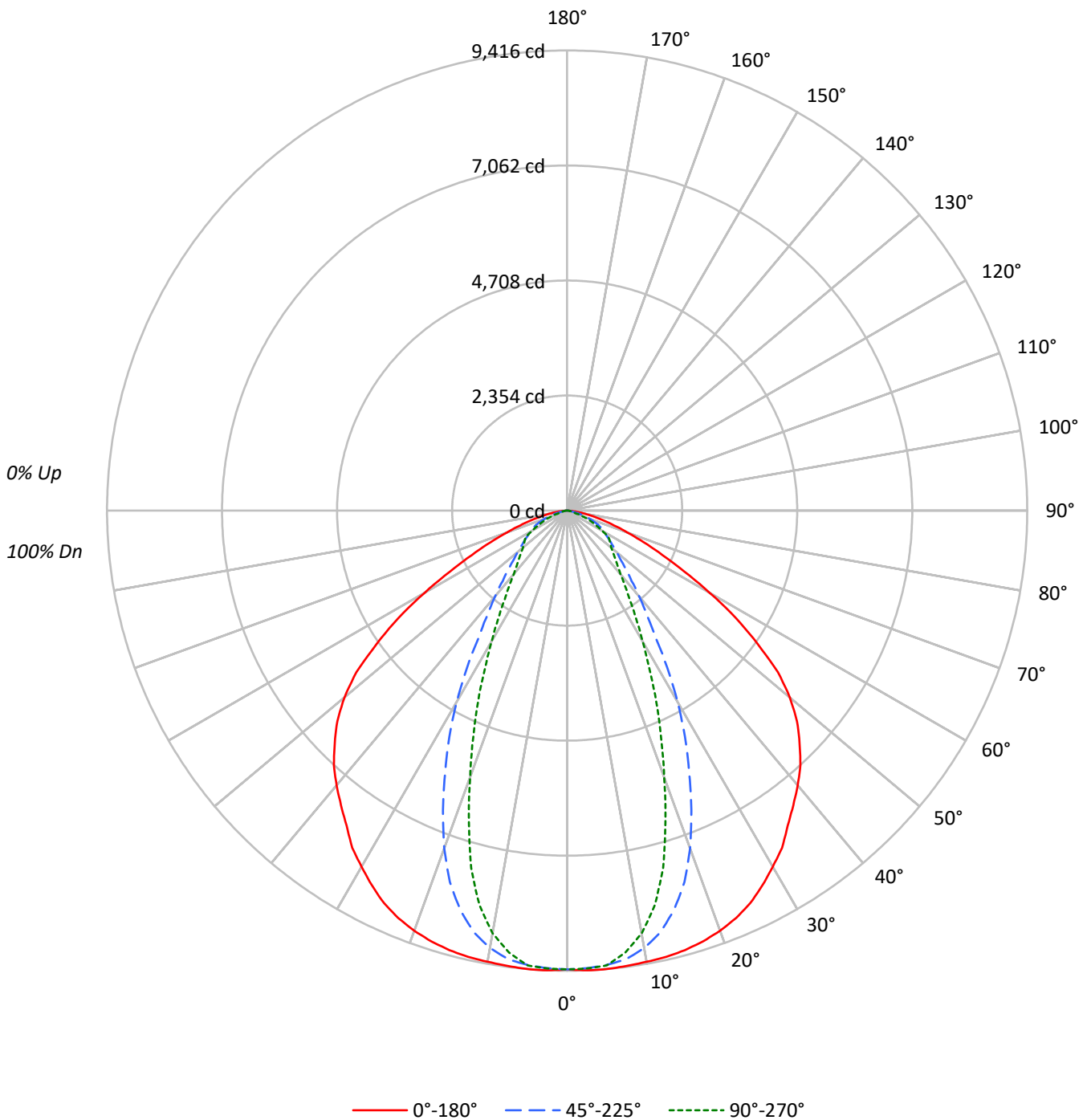
Input Watts (W): 109.9
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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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	0	
RCR																						
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100				100
1	111	107	104	101	109	105	102	99	101	99	96	97	95	93	94	92	91	89				89
2	103	97	91	87	101	95	90	86	91	87	84	88	85	82	85	83	80	78				78
3	96	87	81	75	94	86	80	75	83	78	73	80	76	72	78	74	71	69				69
4	89	79	72	66	87	78	71	66	76	70	65	73	68	64	71	67	63	62				62
5	83	72	65	59	81	71	64	59	69	63	58	67	62	58	66	61	57	55				55
6	78	66	59	53	76	66	58	53	64	57	53	62	57	52	61	56	52	50				50
7	73	61	54	48	71	61	53	48	59	53	48	58	52	48	56	51	47	46				46
8	69	57	49	44	67	56	49	44	55	48	44	54	48	44	53	47	43	42				42
9	65	53	46	41	63	52	45	41	51	45	40	50	44	40	49	44	40	38				38
10	61	49	42	38	60	49	42	38	48	42	37	47	41	37	46	41	37	36				36

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	57748	57748	57748
5°	58140	57622	57685
10°	58552	56758	54858
15°	59288	53831	48252
20°	59888	48153	37979
25°	60164	40071	29265
30°	59760	32072	21908
35°	59078	23594	16770
40°	58933	18413	13639
45°	58517	14814	12093
50°	56931	12626	11279
55°	51037	11357	11381
60°	41471	10678	10237
65°	31284	10351	8322
70°	23730	8578	5694
75°	17957	6447	3051
80°	12971	3177	2508
85°	8342	2731	2110



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	883.4	6.6
10°-20°	2347.7	17.4
20°-30°	2872.0	21.3
30°-40°	2576.8	19.1
40°-50°	1997.9	14.8
50°-60°	1482.8	11.0
60°-70°	894.4	6.6
70°-80°	356.8	2.6
80°-90°	64.4	0.5
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°	6103.2	45.3
0°-40°	8679.9	64.4
0°-60°	12160.7	90.2
0°-90°	13476.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	13476.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	9389	9389	9389	9389	9389	
5°	9416	9357	9332	9306	9343	897
15°	9311	9056	8454	7825	7578	2631
25°	8865	7888	5904	4684	4312	4077
35°	7868	5783	3142	2400	2233	4938
45°	6727	3038	1703	1426	1390	5177
55°	4759	1624	1059	1023	1061	4229
65°	2150	901	711	607	572	2193
75°	756	438	271	143	128	828
85°	118	49	39	33	30	155
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	9388.7	9388.7	9388.7	9388.7	9388.7
2.5°	9415.7	9359.5	9373.4	9373.4	9376.3
5°	9416.4	9357.3	9332.5	9305.6	9342.7
7.5°	9395.3	9326.7	9258.1	9143.6	9119.6
10°	9374.8	9274.9	9087.5	8867.9	8783.3
12.5°	9354.4	9202.0	8835.1	8420.1	8274.2
15°	9310.7	9056.1	8453.6	7824.9	7577.6
17.5°	9242.8	8850.4	7973.0	7067.8	6687.8
20°	9149.5	8595.1	7356.6	6221.0	5802.3
22.5°	9026.9	8291.7	6638.2	5411.3	5023.3
25°	8865.0	7887.6	5904.4	4684.1	4312.2
27.5°	8649.8	7435.4	5215.9	4005.8	3636.0
30°	8414.2	6946.0	4515.7	3363.9	3084.6
32.5°	8183.0	6412.8	3811.8	2824.2	2624.3
35°	7867.9	5782.6	3142.2	2400.4	2233.4
37.5°	7600.2	5103.5	2663.0	2067.1	1946.7
40°	7339.8	4382.2	2293.2	1807.4	1698.7
42.5°	7065.6	3668.1	1951.1	1586.4	1522.2
45°	6727.2	3037.9	1703.1	1426.0	1390.2
47.5°	6379.2	2572.6	1477.0	1304.9	1277.2
50°	5949.6	2179.4	1319.5	1185.3	1178.7
52.5°	5434.7	1871.6	1174.3	1096.3	1110.1
55°	4759.3	1623.6	1059.1	1023.3	1061.3
57.5°	4098.4	1404.1	957.0	967.9	1000.0
60°	3371.2	1207.1	868.0	886.9	832.2
62.5°	2702.4	1048.1	790.7	736.7	691.5
65°	2149.5	900.8	711.2	606.9	571.8
67.5°	1691.5	768.0	600.3	496.7	453.0
70°	1319.5	647.7	477.0	386.6	316.6
72.5°	1006.6	541.2	377.8	234.1	187.5
75°	755.6	438.4	271.3	143.0	128.4
77.5°	541.2	329.0	158.3	104.3	98.5
80°	366.2	215.2	89.7	76.6	70.8
82.5°	228.3	118.9	61.3	54.0	50.3
85°	118.2	48.9	38.7	32.8	29.9
87.5°	41.6	21.9	17.5	13.9	10.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)