

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: P470115

Luminaire Tested: **VHB2-9-N-UNV-L735-CD-U**

Issue Date: 01/20/2021

Test Information

Test Method: LM-79-08
Report Number: P470115
Test Lab: INNOVATION CENTER(G3)
Issue Date: 01/20/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: VHB2-9-N-UNV-L735-CD-U
Description: VHB2 LED HIGH BAY LUMINAIRE WITH NARROW DISTRIBUTION LENS
Light Source: 3500K CCT, 70 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 9922.4 lumens
Efficiency: N/A
Efficacy: 154.6 lumens/watt
Spacing Criteria (0/90/45): 1.32 / 0.75 / 0.88
Luminous Opening: Rectangular (W 1.17' x L: 1.5' x H: 0')
CIE Type: Direct

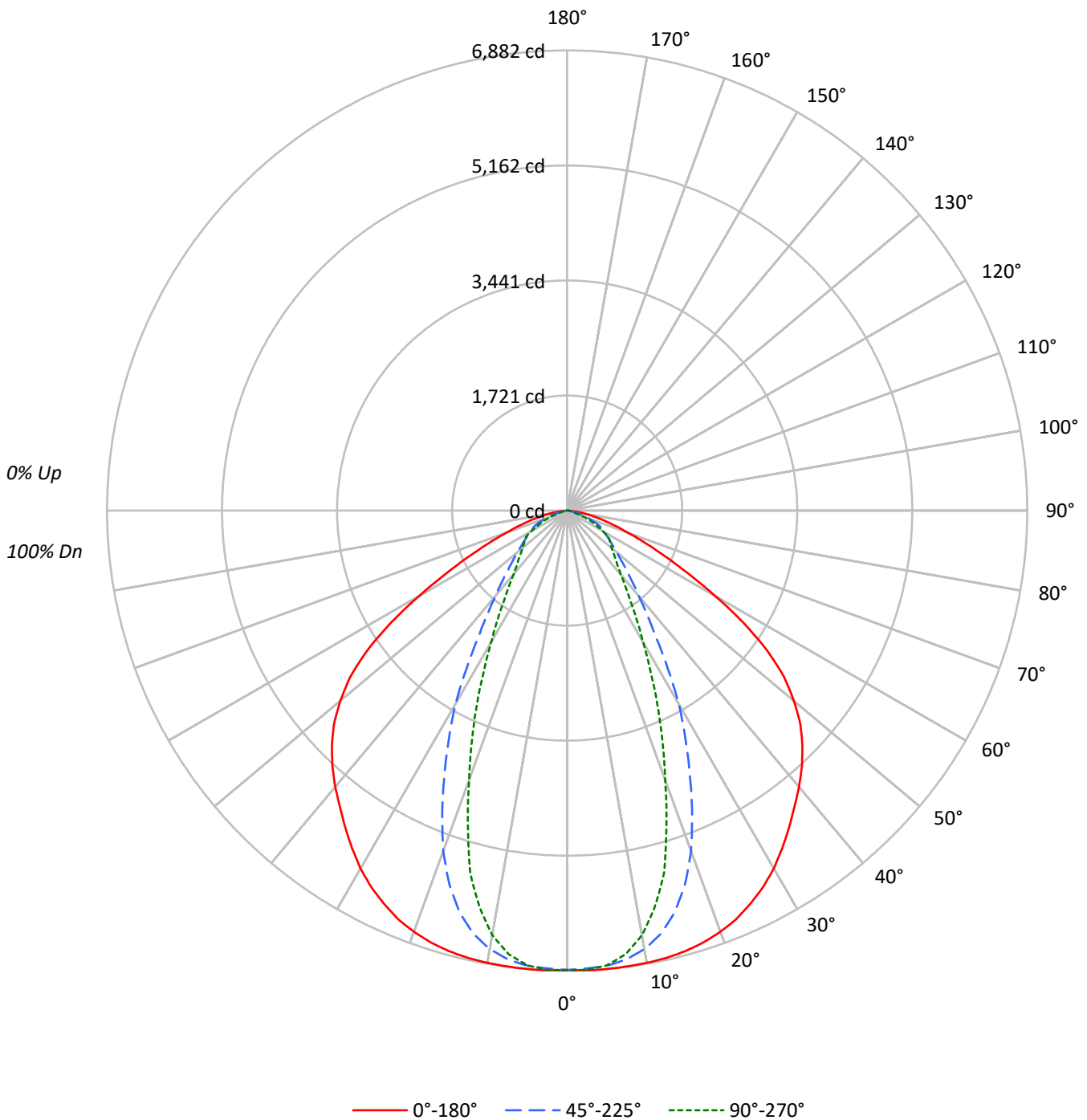
Input Watts (W): 64.2
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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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	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	65	58	53	64	57	53	62	57	52	61	56	52	50					50			
7	73	61	54	48	71	60	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°	42257	42257	42257
5°	42492	42181	42149
10°	42898	41579	40269
15°	43439	39582	35686
20°	43869	35448	28056
25°	44026	29433	21649
30°	43885	23699	16119
35°	43451	17432	12365
40°	43316	13386	10020
45°	43281	10817	8899
50°	42382	9284	8305
55°	39176	8310	8324
60°	31407	7846	7596
65°	23333	7654	6139
70°	17504	6294	4170
75°	13189	4767	2262
80°	9585	2327	1906
85°	6161	1990	1524



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	647.3	6.5
10°-20°	1724.9	17.4
20°-30°	2113.0	21.3
30°-40°	1897.6	19.1
40°-50°	1470.2	14.8
50°-60°	1100.1	11.1
60°-70°	660.1	6.7
70°-80°	261.7	2.6
80°-90°	47.5	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°	4485.2	45.2
0°-40°	6382.8	64.3
0°-60°	8953.1	90.2
0°-90°	9922.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	9922.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	6870	6870	6870	6870	6870	
5°	6882	6852	6832	6830	6826	656
15°	6822	6643	6216	5756	5604	1928
25°	6487	5808	4337	3468	3190	2988
35°	5787	4279	2322	1780	1647	3625
45°	4976	2230	1244	1048	1023	3826
55°	3653	1183	775	751	776	3206
65°	1603	657	526	446	422	1642
75°	555	321	201	105	95	612
85°	87	35	28	24	22	116
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	6870.2	6870.2	6870.2	6870.2	6870.2
2.5°	6882.5	6857.4	6853.9	6871.1	6875.9
5°	6882.1	6851.7	6831.8	6830.1	6826.5
7.5°	6876.3	6836.2	6772.3	6721.6	6691.7
10°	6868.4	6797.9	6657.3	6511.4	6447.5
12.5°	6853.4	6737.9	6481.4	6200.6	6065.7
15°	6821.7	6642.7	6216.0	5756.3	5604.2
17.5°	6772.8	6499.9	5859.4	5194.7	4939.5
20°	6702.2	6319.6	5415.6	4605.4	4286.3
22.5°	6611.4	6087.3	4880.9	3975.1	3716.8
25°	6487.1	5807.9	4336.9	3467.7	3190.0
27.5°	6348.3	5493.6	3823.9	2936.1	2693.2
30°	6179.0	5111.4	3336.8	2470.6	2269.6
32.5°	5986.4	4717.8	2800.8	2074.8	1935.5
35°	5786.7	4279.2	2321.6	1779.5	1646.8
37.5°	5582.2	3781.6	1960.2	1526.0	1430.4
40°	5394.8	3226.6	1667.1	1324.1	1247.9
42.5°	5193.8	2705.6	1441.4	1162.8	1116.1
45°	4975.7	2229.5	1243.5	1048.2	1023.1
47.5°	4729.3	1880.9	1089.2	960.5	937.1
50°	4429.1	1597.4	970.2	869.2	867.9
52.5°	4091.9	1374.8	864.4	803.1	814.6
55°	3653.3	1183.1	774.9	750.7	776.2
57.5°	3131.8	1026.6	701.7	710.1	730.4
60°	2553.1	885.6	637.8	644.9	617.5
62.5°	2041.3	762.1	580.1	543.1	508.2
65°	1603.2	656.8	525.9	446.5	421.8
67.5°	1250.1	559.4	440.4	366.3	335.4
70°	973.3	475.2	350.0	280.8	231.9
72.5°	743.6	395.4	275.9	172.3	130.9
75°	555.0	320.9	200.6	105.3	95.2
77.5°	402.9	240.2	112.0	77.1	71.8
80°	270.6	162.2	65.7	56.4	53.8
82.5°	172.3	85.1	45.4	39.7	36.6
85°	87.3	34.8	28.2	24.2	21.6
87.5°	30.4	16.8	12.8	10.1	7.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)