

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: LUMARK

Report Number: P884835

Luminaire Tested: **NAV-SB5D-830-U-T1**

Issue Date: 10/7/2024

Test Information

Test Method: LM-79-08
Report Number: P884835
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2405-108-2)
Test Lab: INNOVATION CENTER
Issue Date: 10/7/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB5D-830-U-T1
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(5) 80 CRI, 3000K, 900mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE I OPTICS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 44697 lumens
Efficiency: N/A
Efficacy: 122.5 lumens/watt
Luminous Opening: Rectangular (W 1' x L: 1.5' x H: 0')
IES Classification: Type I - Short
BUG Rating: B5 - U0 - G5

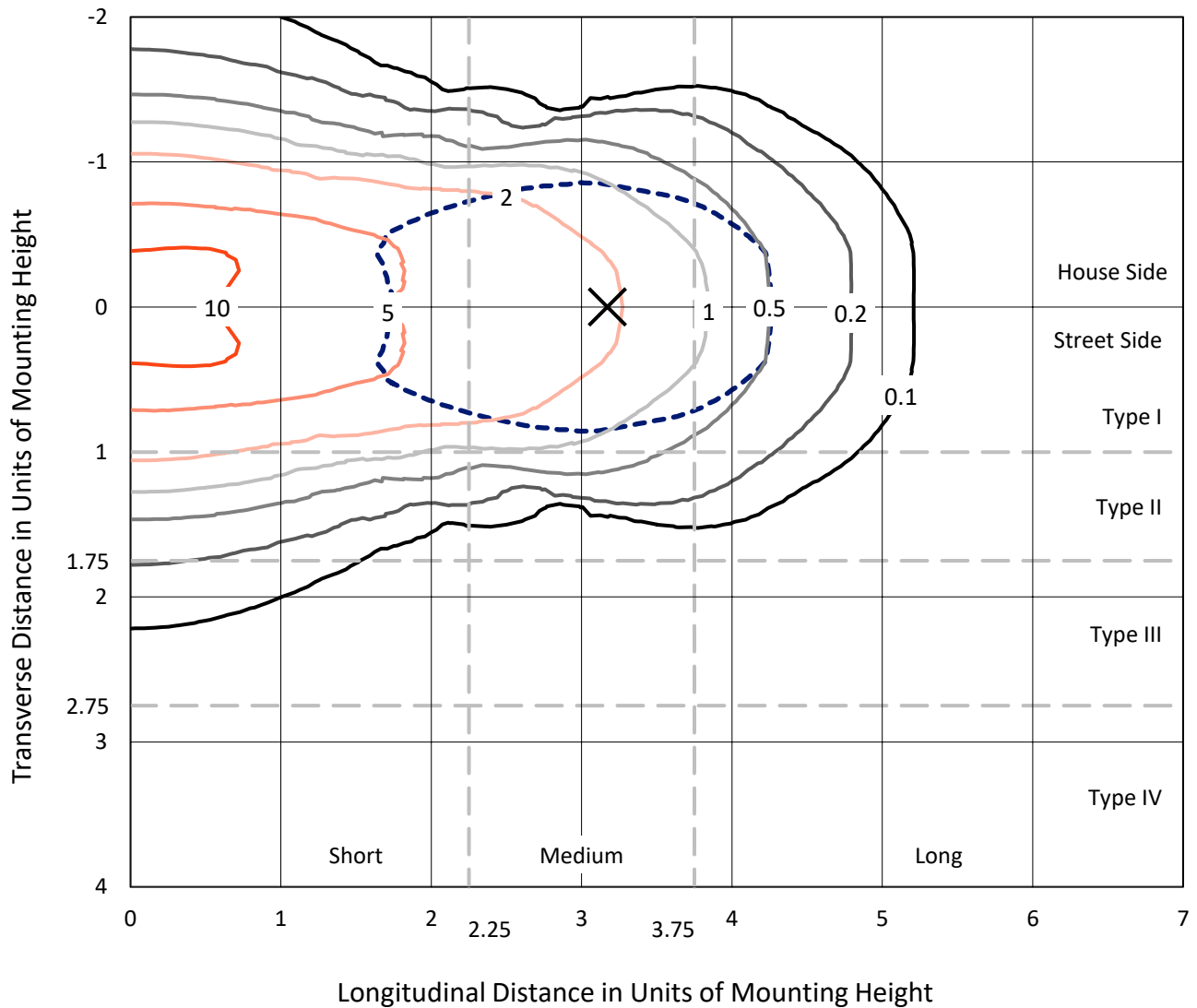
Input Watts (W): 364.9
Input Voltage (V): 120.0
Input Current (Ain): 3.094
Voltage Rise (V): NR
Power Factor: 0.998
Total Harmonic Distortion (THDi): 3.28
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

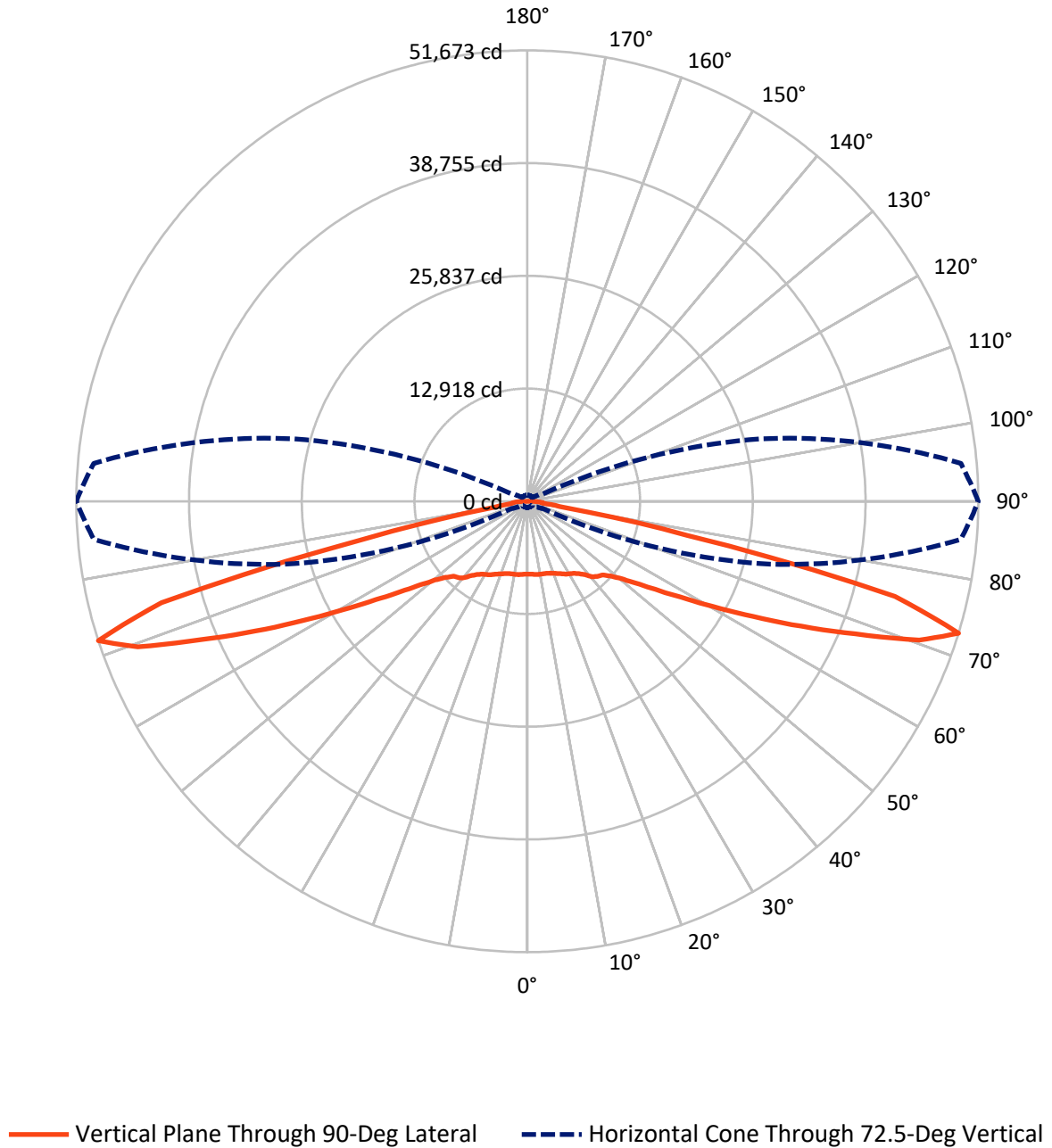
✕ Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 13.4 fc
 Type I - Short - N/A

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Luminous Intensity Polar Plot



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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	22348.5	0.0	22348.5
	% Fixture	50.0	0.0	50.0
Street Side	Lumens	22348.5	0.0	22348.5
	% Fixture	50.0	0.0	50.0
Total	Lumens	44697.0	0.0	44697.0
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	809.8	1.8
10°-20°	2476.2	5.5
20°-30°	4128.8	9.2
30°-40°	5678.4	12.7
40°-50°	6934.8	15.5
50°-60°	8020.8	17.9
60°-70°	9563.5	21.4
70°-80°	6674.7	14.9
80°-90°	410.0	0.9
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°-90°	44697.0	100.0
0°-180°	44697.0	100.0



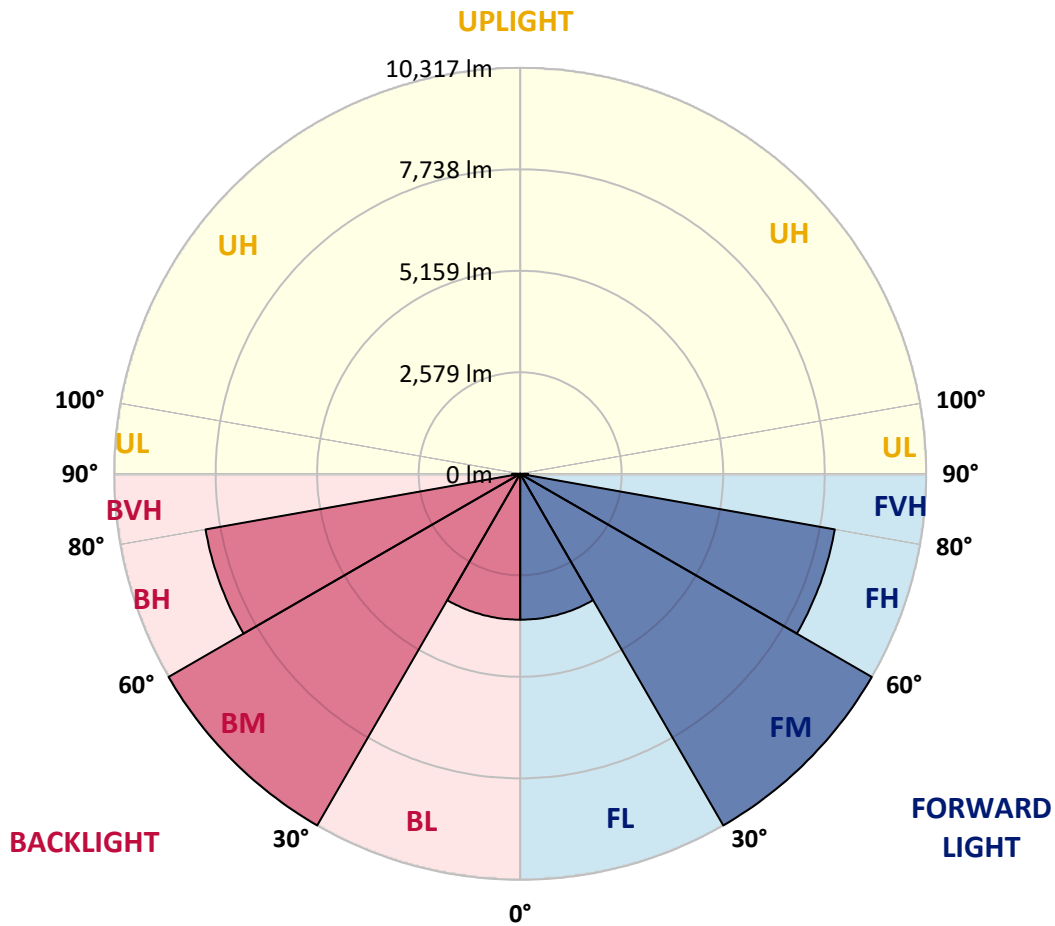
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	3707.4	8.3			
FM (30°-60°)	10317.0	23.1			
FH (60°-80°)	8119.1	18.2			G4/12000
FVH (80°-90°)	205.0	0.5			G2/225
BL (0°-30°)	3707.4	8.3	B4/5000		
BM (30°-60°)	10317.0	23.1	B5		
BH (60°-80°)	8119.1	18.2	B5		G5
BVH (80°-90°)	205.0	0.5			G2/225
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B5-U0-G5

Type I Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
0°	8352.1	8352.1	8352.1	8352.1	8352.1	8352.1	8352.1	8352.1	8352.1	8352.1	8352.1
2.5°	8359.2	8368.7	8368.7	8361.6	8378.2	8364.0	8364.0	8356.9	8364.0	8356.9	8356.9
5°	8402.0	8413.9	8418.6	8416.2	8437.6	8425.7	8425.7	8416.2	8418.6	8411.5	8411.5
7.5°	8482.8	8499.4	8508.9	8520.8	8551.6	8537.4	8527.9	8499.4	8487.5	8468.5	8468.5
10°	8508.9	8527.9	8558.8	8620.5	8691.8	8694.2	8665.7	8594.4	8539.8	8497.0	8489.9
12.5°	8428.1	8454.3	8518.4	8644.3	8803.4	8867.6	8822.4	8703.7	8596.8	8520.8	8508.9
15°	8326.0	8354.5	8451.9	8641.9	8877.1	9026.7	9022.0	8865.2	8694.2	8575.4	8556.4
17.5°	8166.8	8195.3	8335.5	8601.5	8934.1	9181.1	9247.7	9086.1	8846.2	8687.0	8660.9
20°	7879.4	7905.5	8100.3	8473.3	8953.1	9345.0	9518.5	9375.9	9076.6	8860.5	8820.1
22.5°	7506.4	7546.8	7774.9	8252.3	8908.0	9516.1	9827.3	9729.9	9345.0	9045.7	8991.1
25°	7107.4	7150.1	7416.2	7981.5	8791.6	9639.6	10193.1	10131.3	9649.1	9276.2	9200.1
27.5°	6762.9	6808.1	7097.9	7713.1	8611.0	9687.1	10554.2	10585.0	10017.3	9530.3	9449.6
30°	6492.1	6534.9	6843.7	7496.9	8378.2	9639.6	10870.1	11083.9	10392.6	9751.3	9634.9
32.5°	6195.2	6249.8	6575.3	7233.3	8102.7	9525.6	11145.6	11623.1	10827.3	9988.8	9841.5
35°	5819.9	5869.8	6211.8	6872.2	7741.6	9342.7	11376.1	12221.7	11449.7	10349.9	10186.0
37.5°	5363.8	5411.3	5751.0	6420.9	7382.9	9086.1	11551.8	12896.4	12190.8	10870.1	10651.5
40°	4905.3	4950.5	5268.8	5917.3	6953.0	8758.3	11613.6	13556.7	13041.3	11585.1	11352.3
42.5°	4484.9	4525.2	4817.4	5420.8	6470.7	8340.2	11532.8	14131.6	13803.8	12083.9	11784.6
45°	4097.7	4133.3	4392.2	4955.2	5969.5	7831.9	11290.5	14749.2	14711.2	12440.3	12036.4
47.5°	3655.8	3691.5	3959.9	4503.9	5468.3	7235.6	10879.6	15357.3	15972.6	13247.9	12782.3
50°	3116.6	3147.5	3423.0	3983.6	4948.1	6601.4	10309.5	15834.8	17564.1	14471.3	13886.9
52.5°	2477.6	2510.9	2779.3	3339.9	4330.5	5919.6	9558.8	16146.0	19402.7	16257.6	15537.9
55°	1843.4	1867.1	2099.9	2603.5	3565.6	5142.9	8618.2	16233.9	21488.4	18699.6	17799.3
57.5°	1337.4	1351.6	1501.3	1876.6	2703.3	4171.3	7475.6	16005.8	23970.7	21830.4	20697.4
60°	1083.2	1088.0	1133.1	1299.4	1879.0	3073.8	6095.4	15221.9	26664.5	25866.3	24438.7
62.5°	983.4	983.4	995.3	1040.5	1270.9	2028.6	4425.5	13597.1	29553.1	30966.5	29054.2
65°	914.6	914.6	919.3	940.7	1002.4	1292.2	2793.5	10950.9	31987.9	36940.7	34522.5
67.5°	852.8	855.2	852.8	859.9	895.5	954.9	1620.1	7563.5	33299.2	43131.2	40520.5
70°	788.7	793.4	781.5	781.5	810.0	812.4	1014.3	4147.5	32211.2	48319.2	47632.7
72.5°	712.6	719.8	700.8	696.0	717.4	707.9	762.5	1990.6	27655.1	49868.0	51673.3
75°	646.1	655.6	612.9	601.0	601.0	593.9	620.0	1021.4	17949.0	40679.7	43511.2
77.5°	586.7	605.7	536.9	498.8	489.3	468.0	506.0	624.7	7850.9	19098.7	18702.0
80°	484.6	510.7	441.8	396.7	380.1	356.3	399.1	437.1	2335.1	4435.0	4247.3
82.5°	361.1	372.9	313.6	282.7	268.4	251.8	299.3	304.1	760.1	1570.2	1774.5
85°	230.4	235.2	192.4	166.3	159.2	152.0	190.0	166.3	289.8	1154.5	1677.1
87.5°	80.8	92.6	73.6	66.5	71.3	59.4	87.9	49.9	80.8	814.8	1009.6
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)