

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: P965604

Luminaire Tested: **NAV-SB4A-735-U-5MQ**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P965604
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-289-20)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB4A-735-U-5MQ
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(4) 70 CRI, 3500K, 350mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE V MEDIUM OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 19298.7 lumens
Efficiency: N/A
Efficacy: 169.3 lumens/watt
Luminous Opening: Rectangular (W 1' x L: 1' x H: 0')
IES Classification: Type V - Short
BUG Rating: B4 - U0 - G2

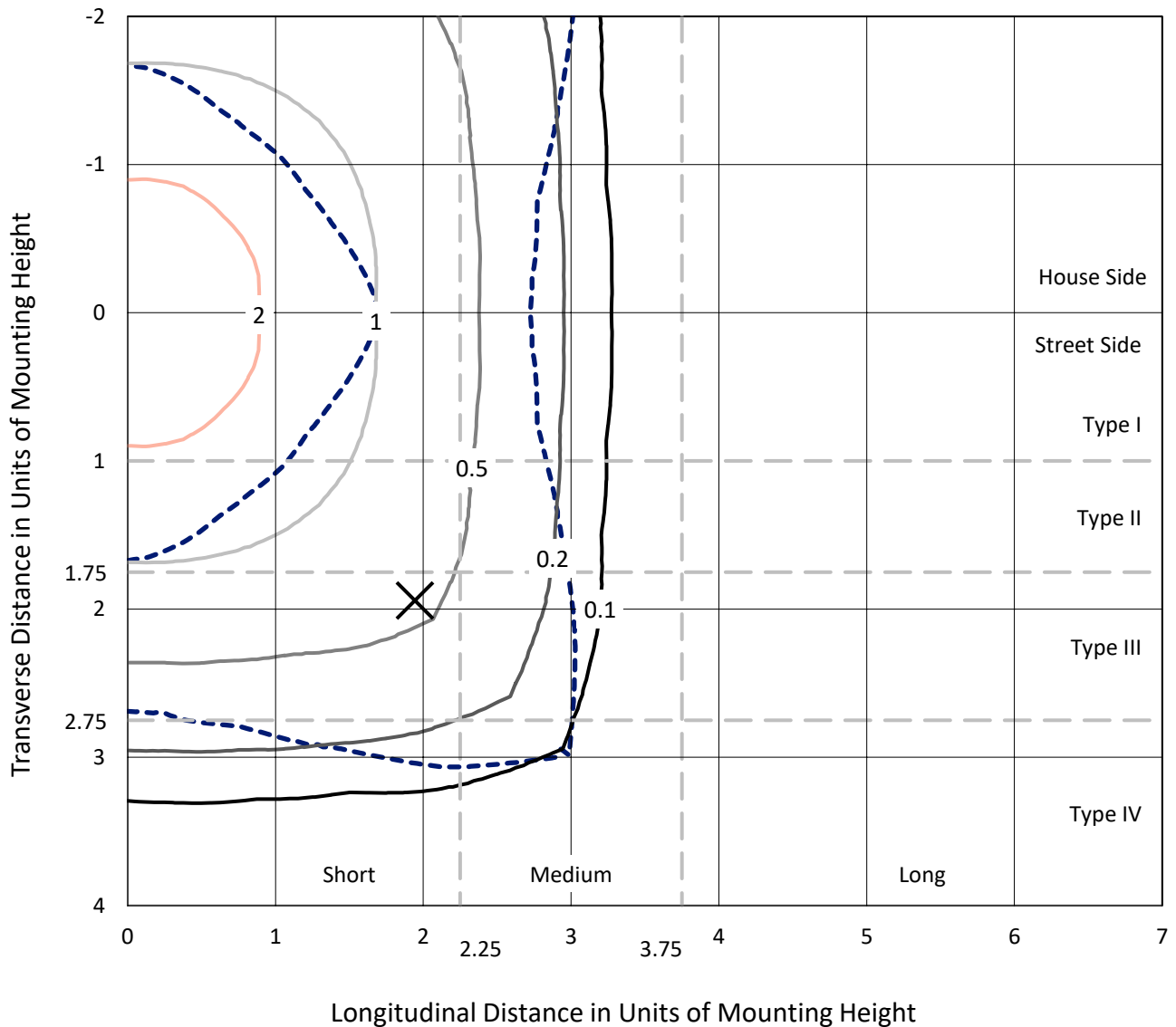
Input Watts (W): 114
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

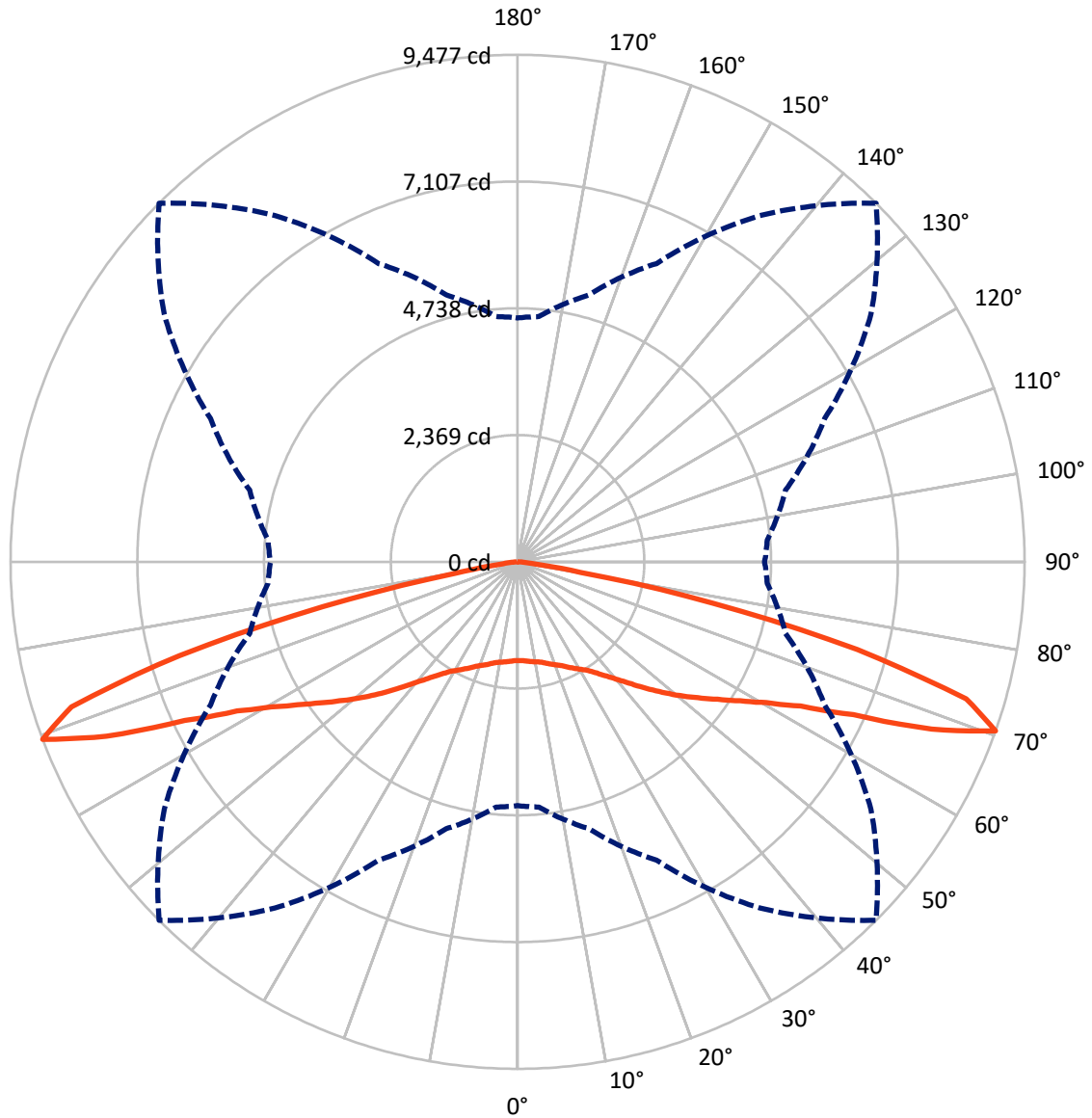
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 3 fc
 Type V - Short - N/A

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Luminous Intensity Polar Plot



— Vertical Plane Through 45-Deg Lateral - - - Horizontal Cone Through 70-Deg Vertical

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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	9649.3	0.0	9649.3
	% Fixture	50.0	0.0	50.0
Street Side	Lumens	9649.3	0.0	9649.3
	% Fixture	50.0	0.0	50.0
Total	Lumens	19298.7	0.0	19298.7
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	179.6	0.9
10°-20°	556.9	2.9
20°-30°	995.2	5.2
30°-40°	1613.3	8.4
40°-50°	2627.8	13.6
50°-60°	4006.4	20.8
60°-70°	5960.3	30.9
70°-80°	3248.6	16.8
80°-90°	110.6	0.6
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°	19298.7	100.0
0°-180°	19298.7	100.0

Coefficient of Utilization



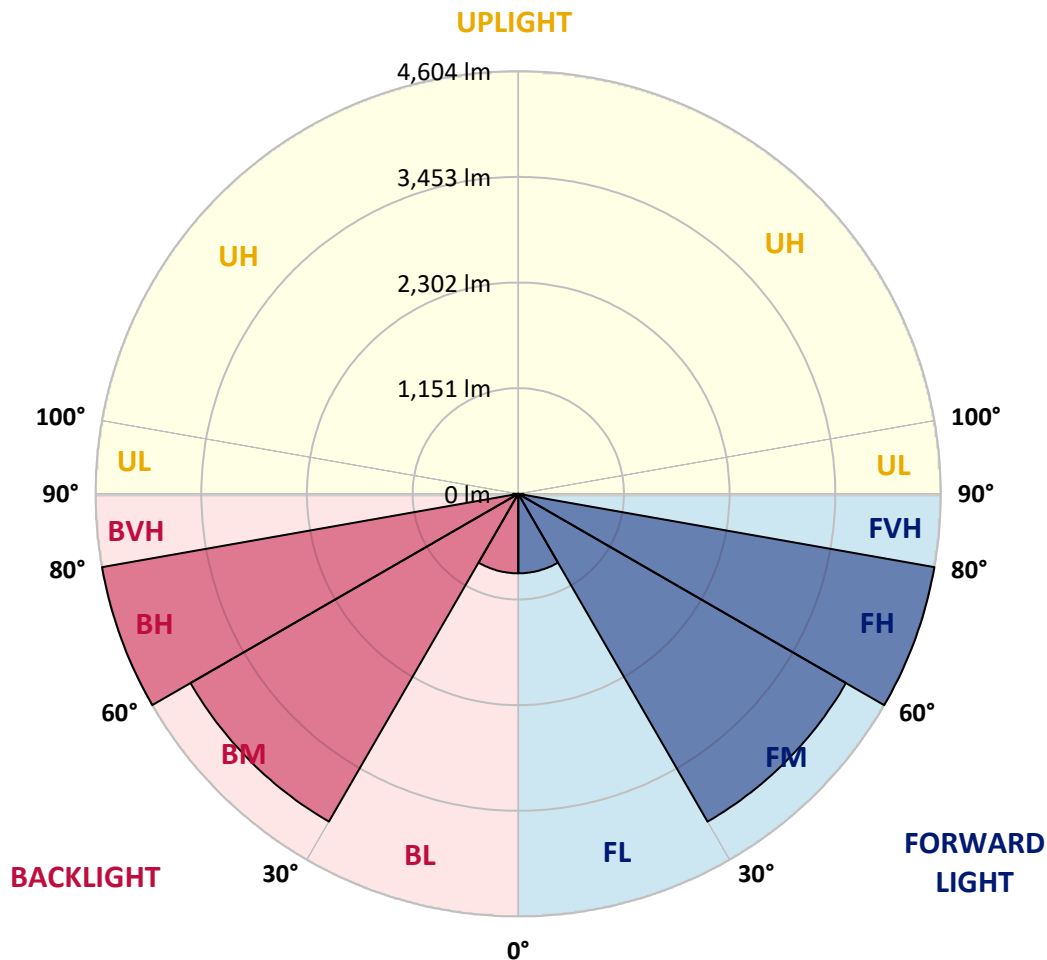
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	865.9	4.5			
FM (30°-60°)	4123.7	21.4			
FH (60°-80°)	4604.4	23.9			G2/5000
FVH (80°-90°)	55.3	0.3			G1/100
BL (0°-30°)	865.9	4.5	B2/1000		
BM (30°-60°)	4123.7	21.4	B3/5000		
BH (60°-80°)	4604.4	23.9	B4/5000		G2/5000
BVH (80°-90°)	55.3	0.3			G1/100
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B4-U0-G2

Type V Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
0°	1848.6	1848.6	1848.6	1848.6	1848.6	1848.6	1848.6	1848.6	1848.6	1848.6	1848.6
2.5°	1857.3	1859.2	1855.4	1853.5	1851.6	1848.6	1849.6	1854.4	1858.3	1857.3	1858.3
5°	1872.9	1874.7	1871.9	1870.9	1867.0	1866.0	1866.0	1870.9	1873.8	1871.9	1872.9
7.5°	1890.3	1893.2	1888.4	1887.3	1885.4	1883.5	1882.5	1887.3	1890.3	1890.3	1890.3
10°	1906.7	1909.7	1905.8	1902.9	1901.0	1901.0	1899.0	1902.9	1907.7	1906.7	1906.7
12.5°	1924.2	1926.1	1922.3	1920.3	1920.3	1923.2	1920.3	1922.3	1926.1	1924.2	1923.2
15°	1945.6	1946.5	1945.6	1948.4	1953.2	1963.0	1954.3	1952.3	1954.3	1949.3	1949.3
17.5°	1974.6	1976.5	1980.4	1987.2	1993.9	2011.4	1995.9	1991.1	1991.1	1981.3	1981.3
20°	2010.4	2013.3	2019.1	2030.7	2039.4	2055.9	2040.5	2033.7	2030.7	2018.1	2018.1
22.5°	2048.2	2053.1	2061.8	2077.3	2092.7	2108.3	2092.7	2081.2	2072.4	2055.9	2055.0
25°	2091.8	2097.7	2111.2	2136.4	2157.7	2180.0	2161.5	2138.4	2120.8	2097.7	2096.6
27.5°	2153.8	2160.6	2177.1	2208.1	2235.2	2254.6	2237.2	2207.1	2182.8	2154.8	2153.8
30°	2241.1	2247.8	2267.2	2300.1	2318.5	2331.2	2319.5	2296.2	2267.2	2235.2	2235.2
32.5°	2353.4	2362.1	2383.4	2414.5	2418.3	2420.2	2416.3	2404.8	2383.4	2344.7	2345.6
35°	2495.9	2505.5	2529.7	2554.9	2551.0	2554.9	2549.1	2545.3	2529.7	2485.2	2485.2
37.5°	2670.2	2681.8	2707.0	2726.4	2716.8	2711.8	2712.9	2713.8	2705.1	2655.7	2655.7
40°	2872.8	2888.2	2906.6	2927.0	2910.5	2895.9	2905.7	2913.5	2905.7	2855.2	2855.2
42.5°	3081.0	3103.3	3122.7	3151.8	3138.1	3119.8	3133.3	3142.0	3125.6	3071.3	3075.2
45°	3312.6	3333.9	3359.1	3402.7	3393.0	3373.6	3393.0	3394.9	3366.8	3302.9	3309.7
47.5°	3551.9	3574.2	3612.0	3670.1	3666.2	3644.9	3670.1	3656.6	3620.7	3544.1	3539.3
50°	3778.7	3809.6	3867.7	3949.1	3956.9	3930.8	3964.6	3938.5	3878.4	3782.5	3780.5
52.5°	3991.8	4024.7	4116.7	4227.2	4255.3	4221.4	4267.0	4221.4	4131.3	4008.3	3996.6
55°	4215.6	4252.4	4361.9	4506.2	4562.5	4537.3	4579.9	4511.1	4383.2	4234.0	4213.7
57.5°	4479.1	4501.4	4632.2	4803.7	4898.7	4904.4	4923.8	4807.6	4652.6	4482.9	4459.8
60°	4764.9	4796.0	4938.3	5143.8	5293.9	5342.4	5322.0	5149.6	4969.4	4774.7	4743.6
62.5°	5131.2	5165.1	5335.6	5581.7	5819.0	5939.3	5859.7	5609.8	5387.0	5153.5	5112.8
65°	5434.4	5472.2	5780.3	6219.2	6651.3	6892.6	6693.0	6232.8	5831.6	5502.2	5448.0
67.5°	5214.5	5261.0	5744.5	6550.6	7625.1	8344.9	7661.9	6649.4	5863.6	5417.0	5350.1
70°	4557.6	4601.2	5165.1	6150.4	7899.3	9476.5	8064.0	6331.6	5183.5	4683.5	4616.7
72.5°	3025.8	3166.3	3736.9	4919.0	7053.4	8769.3	7123.1	4819.1	3466.7	3019.0	2921.1
75°	1003.8	1116.1	1505.6	2550.1	4724.2	6558.4	4497.5	2256.5	1192.7	858.4	811.9
77.5°	252.9	291.6	402.1	729.6	1884.5	3734.1	1696.5	595.8	324.6	226.7	202.5
80°	123.0	135.6	193.7	243.2	471.8	1186.8	442.8	228.7	153.0	118.2	108.5
82.5°	67.9	68.8	109.5	137.6	175.4	307.1	182.1	133.7	88.1	71.6	71.6
85°	41.6	40.7	58.1	73.6	73.6	109.5	87.2	73.6	50.4	44.6	46.5
87.5°	16.5	16.5	21.3	23.3	20.4	28.1	22.2	24.2	19.4	18.4	19.4
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)