

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: P965606

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

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P965606
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2405-108-1)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB4A-735-U-5WQ
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(4) 70 CRI, 3500K, 350mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE V WIDE OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 18639.6 lumens
Efficiency: N/A
Efficacy: 163.5 lumens/watt
Luminous Opening: Rectangular (W 1' x L: 1' x H: 0')
IES Classification: Type V - Short
BUG Rating: B5 - U0 - G3

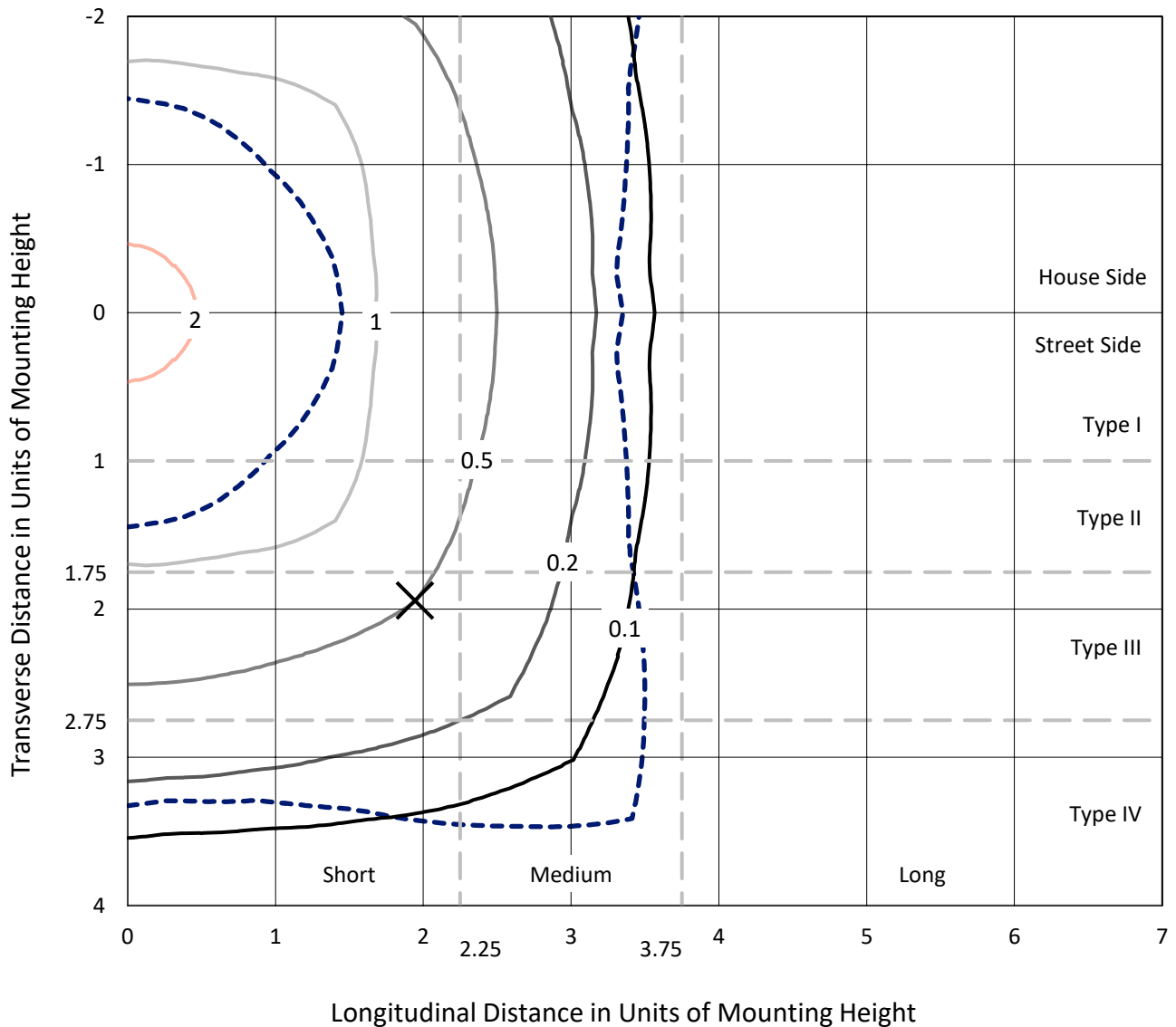
Input Watts (W): 114
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

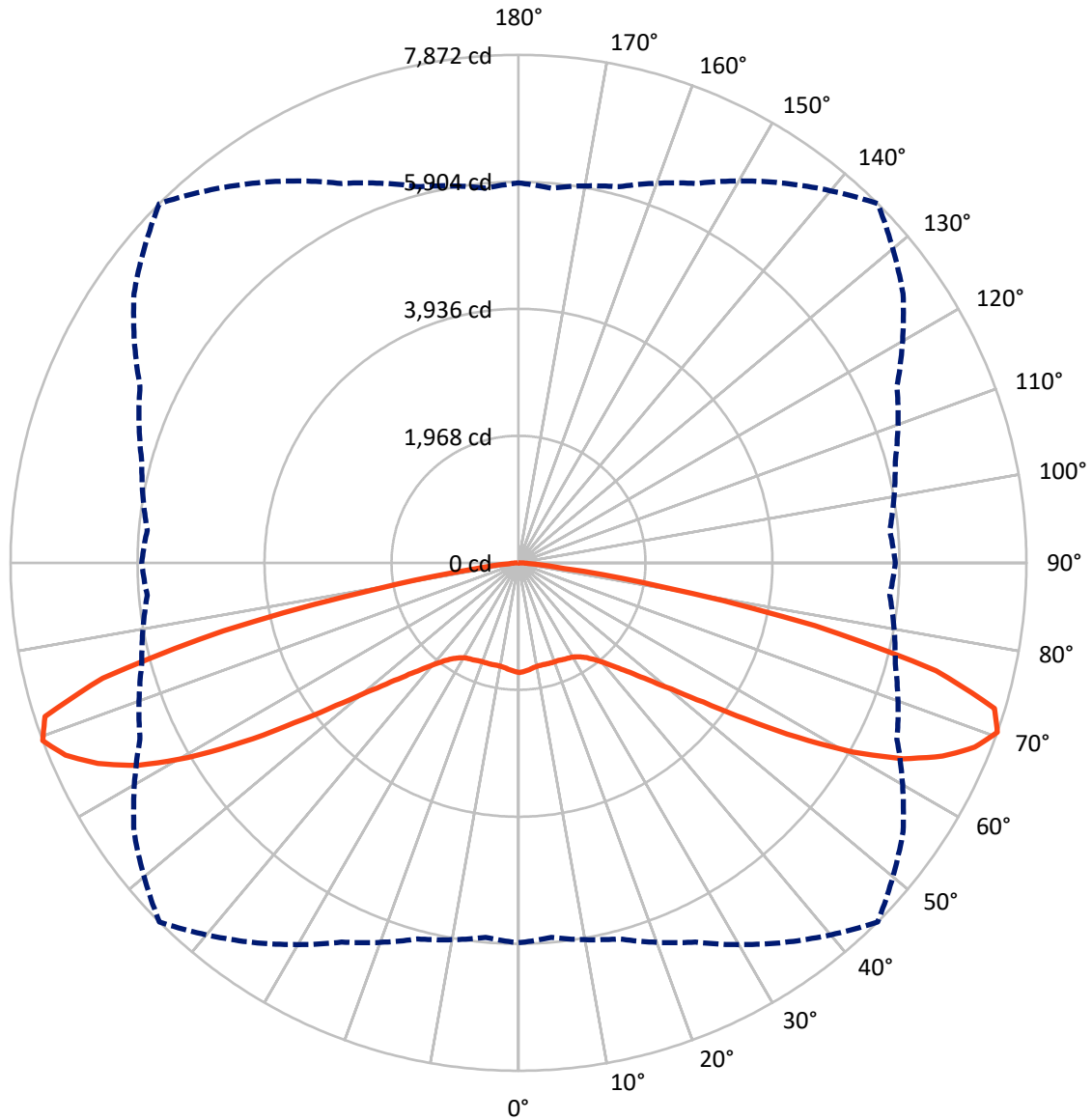
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 2.7 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	9319.8	0.0	9319.8
	% Fixture	50.0	0.0	50.0
Street Side	Lumens	9319.8	0.0	9319.8
	% Fixture	50.0	0.0	50.0
Total	Lumens	18639.6	0.0	18639.6
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	158.2	0.8
10°-20°	464.4	2.5
20°-30°	772.9	4.1
30°-40°	1168.8	6.3
40°-50°	1942.3	10.4
50°-60°	3665.0	19.7
60°-70°	6188.5	33.2
70°-80°	4066.5	21.8
80°-90°	213.0	1.1
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°	18639.6	100.0
0°-180°	18639.6	100.0

Coefficient of Utilization



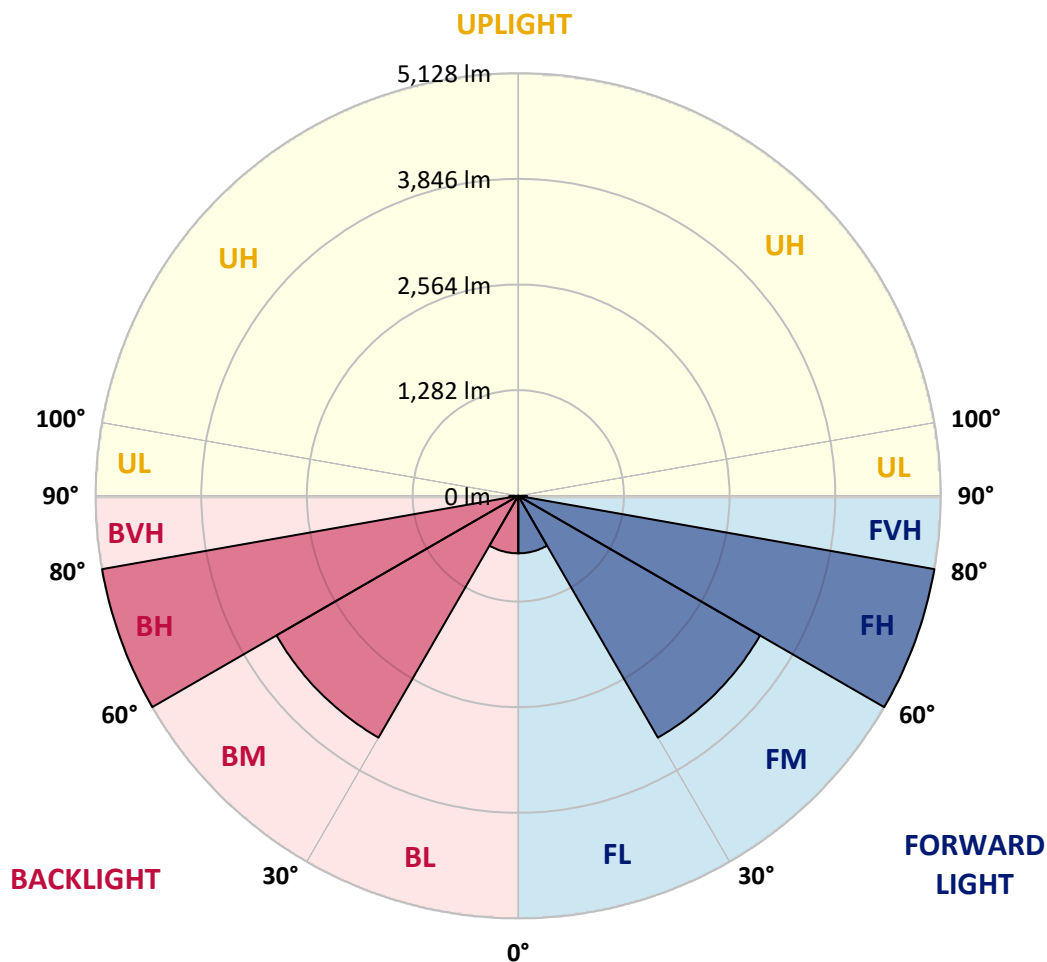
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	697.7	3.7			
FM (30°-60°)	3388.1	18.2			
FH (60°-80°)	5127.5	27.5			G3/7500
FVH (80°-90°)	106.5	0.6			G2/225
BL (0°-30°)	697.7	3.7	B2/1000		
BM (30°-60°)	3388.1	18.2	B3/5000		
BH (60°-80°)	5127.5	27.5	B5		G3/7500
BVH (80°-90°)	106.5	0.6			G2/225
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B5-U0-G3

Type V Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
0°	1700.3	1700.3	1700.3	1700.3	1700.3	1700.3	1700.3	1700.3	1700.3	1700.3	1700.3
2.5°	1689.6	1694.5	1692.6	1688.7	1688.7	1685.8	1688.7	1690.6	1693.5	1695.5	1694.5
5°	1667.4	1671.3	1670.2	1667.4	1668.3	1665.4	1667.4	1670.2	1672.2	1673.2	1673.2
7.5°	1648.0	1651.9	1649.9	1645.1	1645.1	1642.2	1643.2	1646.0	1648.9	1649.9	1649.9
10°	1643.2	1647.1	1641.2	1633.4	1630.6	1626.7	1627.6	1630.6	1636.4	1639.3	1639.3
12.5°	1645.1	1648.0	1642.2	1630.6	1627.6	1623.8	1623.8	1626.7	1634.5	1638.3	1639.3
15°	1650.9	1653.8	1645.1	1632.5	1629.5	1626.7	1625.8	1629.5	1638.3	1645.1	1646.0
17.5°	1661.5	1664.5	1650.9	1633.4	1629.5	1630.6	1629.5	1632.5	1646.0	1658.7	1658.7
20°	1671.3	1673.2	1654.8	1633.4	1629.5	1630.6	1629.5	1635.4	1652.8	1670.2	1671.3
22.5°	1674.1	1676.1	1658.7	1640.2	1637.3	1638.3	1637.3	1643.2	1659.6	1677.1	1677.1
25°	1675.2	1678.0	1664.5	1649.9	1654.8	1656.7	1654.8	1655.8	1668.3	1683.9	1682.8
27.5°	1689.6	1693.5	1680.9	1668.3	1671.3	1670.2	1673.2	1676.1	1685.8	1701.3	1697.4
30°	1719.6	1722.6	1712.0	1699.3	1697.4	1690.6	1699.3	1709.0	1719.6	1733.3	1730.3
32.5°	1769.0	1774.9	1761.4	1747.8	1739.0	1735.2	1742.0	1758.5	1772.9	1787.5	1781.7
35°	1851.5	1855.4	1842.7	1817.5	1802.1	1802.1	1807.9	1829.2	1852.4	1870.8	1864.1
37.5°	1967.7	1972.5	1950.3	1920.2	1897.0	1897.0	1904.8	1927.0	1961.8	1988.1	1978.4
40°	2109.1	2115.9	2087.8	2056.9	2034.5	2030.7	2040.4	2065.6	2098.5	2131.5	2120.8
42.5°	2279.7	2287.4	2250.6	2223.4	2206.0	2206.0	2210.9	2234.1	2264.1	2304.8	2301.9
45°	2497.6	2511.2	2460.8	2433.8	2417.3	2421.2	2424.0	2444.4	2471.5	2518.0	2516.1
47.5°	2757.4	2770.9	2717.6	2689.5	2686.6	2705.0	2693.4	2707.9	2722.4	2775.7	2760.2
50°	3051.8	3075.1	3038.3	3036.4	3042.1	3076.0	3049.0	3056.7	3040.3	3074.1	3053.8
52.5°	3412.2	3446.2	3439.4	3451.0	3516.0	3585.7	3523.6	3496.6	3434.6	3445.2	3409.4
55°	3849.2	3900.5	3910.3	3980.0	4127.3	4269.6	4137.9	4028.5	3896.6	3872.4	3834.6
57.5°	4346.2	4386.9	4433.4	4575.8	4851.0	5103.9	4851.0	4608.7	4401.5	4352.0	4317.1
60°	4881.0	4931.4	4976.0	5186.2	5595.1	5950.6	5587.3	5202.7	4928.5	4861.6	4803.5
62.5°	5455.6	5520.4	5551.4	5784.9	6261.6	6686.0	6268.4	5802.3	5498.1	5426.5	5368.3
65°	6006.8	6060.1	6095.0	6343.9	6799.3	7224.6	6830.3	6371.1	6058.2	5964.2	5917.6
67.5°	6263.6	6292.6	6377.9	6659.8	7140.4	7625.7	7221.7	6689.9	6340.0	6175.3	6177.3
70°	5887.6	5828.6	6033.9	6485.4	7181.0	7871.8	7274.0	6471.8	6043.6	5776.2	5840.1
72.5°	4549.7	4447.9	4804.5	5576.6	6716.0	7714.9	6762.4	5620.2	5026.3	4483.8	4618.4
75°	2475.4	2360.1	2852.3	3828.9	5355.7	6686.9	5478.7	3938.4	3175.9	2456.9	2616.8
77.5°	698.5	655.0	1052.2	1852.4	3221.4	4695.0	3345.4	1893.1	1247.8	740.2	822.6
80°	214.1	207.4	281.0	558.0	1368.0	2248.6	1314.7	564.9	357.5	225.7	238.3
82.5°	126.9	116.2	139.5	203.5	348.8	706.3	339.1	212.2	170.6	114.3	124.0
85°	72.7	67.9	82.3	98.8	117.3	150.2	97.9	100.8	91.0	61.0	64.0
87.5°	30.0	27.2	32.0	31.0	27.2	34.8	26.1	31.0	36.8	24.2	22.2
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)