

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: P968394

Luminaire Tested: **NAV-SB5B-830-U-5MQ**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P968394
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-SB5B-830-U-5MQ
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(5) 80 CRI, 3000K, 450mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE V MEDIUM OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 27436.2 lumens
Efficiency: N/A
Efficacy: 150.2 lumens/watt
Luminous Opening: Rectangular (W 1.5' x L: 1' x H: 0')
IES Classification: Type V - Short
BUG Rating: B5 - U0 - G3

Input Watts (W): 182.7
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

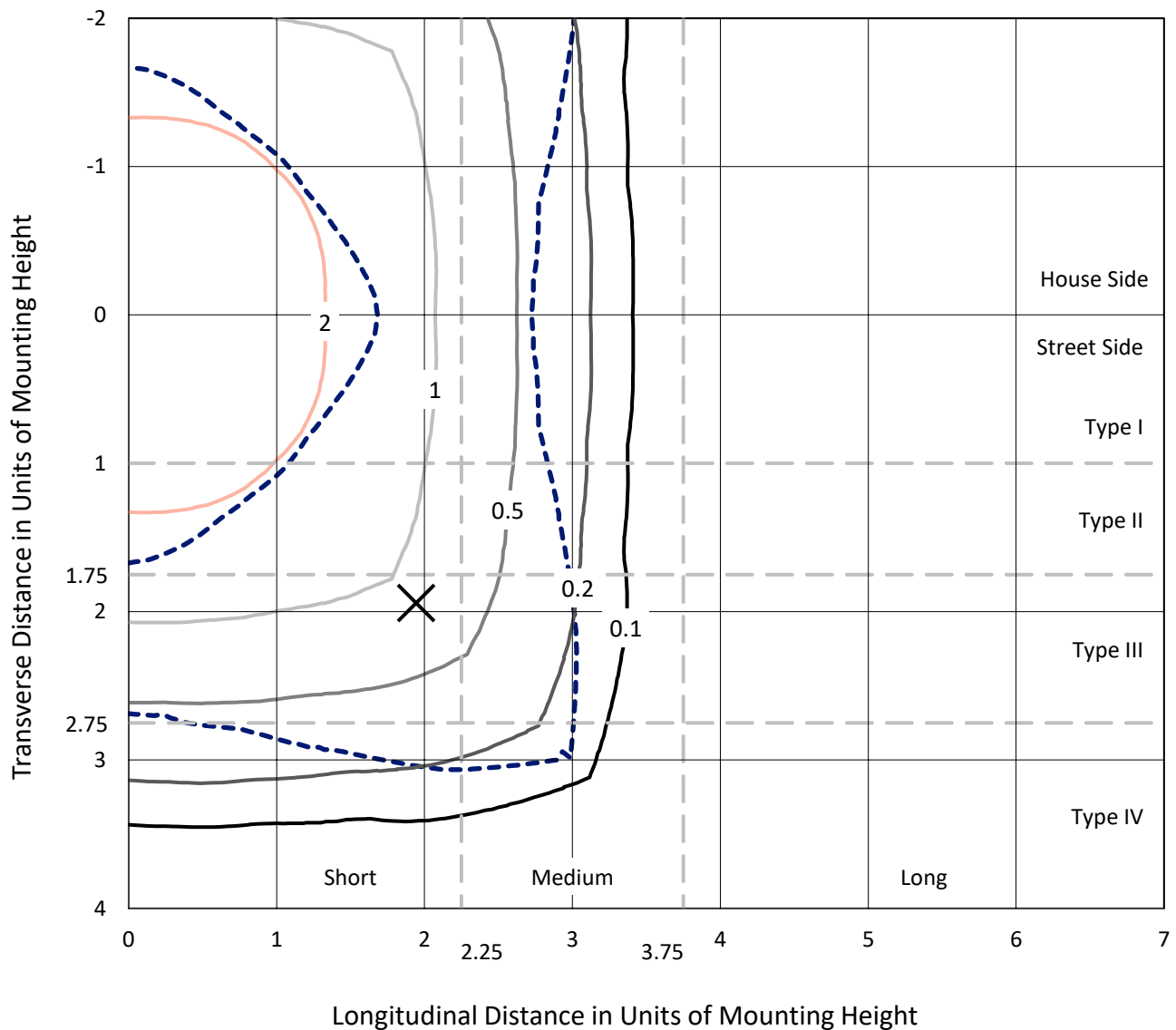


REPORT NUMBER: P968394

CATALOG NUMBER: NAV-SB5B-830-U-5MQ

Iso-Footcandle Lines of Horizontal Illumination

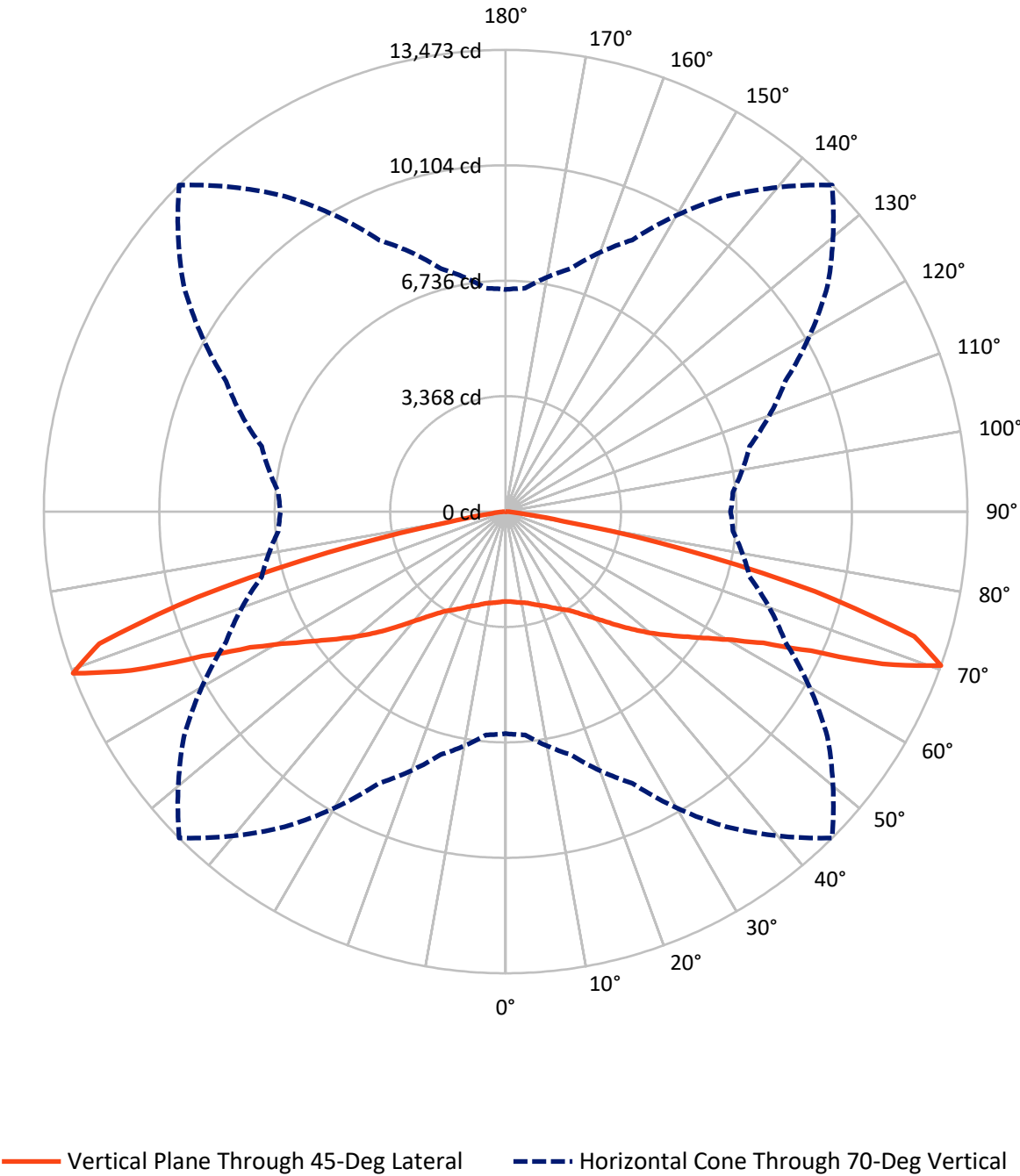
× Max cd
- - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 4.2 fc
Type V - Short - N/A

REPORT NUMBER: P968394
CATALOG NUMBER: NAV-SB5B-830-U-5MQ

Luminous Intensity Polar Plot



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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	13718.1	0.0	13718.1
	% Fixture	50.0	0.0	50.0
Street Side	Lumens	13718.1	0.0	13718.1
	% Fixture	50.0	0.0	50.0
Total	Lumens	27436.2	0.0	27436.2
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	255.3	0.9
10°-20°	791.7	2.9
20°-30°	1414.9	5.2
30°-40°	2293.5	8.4
40°-50°	3735.8	13.6
50°-60°	5695.8	20.8
60°-70°	8473.5	30.9
70°-80°	4618.3	16.8
80°-90°	157.3	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°	27436.2	100.0
0°-180°	27436.2	100.0

Coefficient of Utilization



REPORT NUMBER: P968394

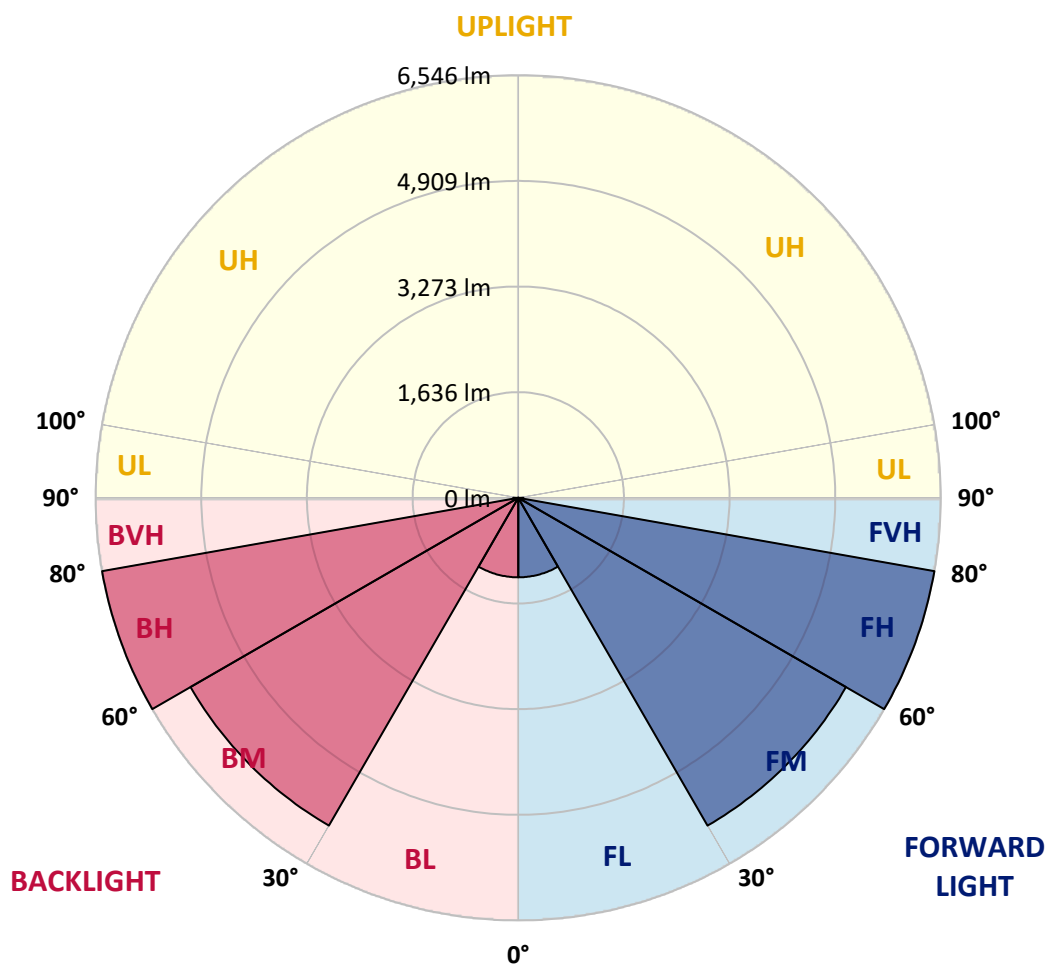
CATALOG NUMBER: NAV-SB5B-830-U-5MQ

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1231.0	4.5			
FM	(30°-60°)	5862.5	21.4			
FH	(60°-80°)	6545.9	23.9			G3/7500
FVH	(80°-90°)	78.6	0.3			G1/100
BL	(0°-30°)	1231.0	4.5	B3/2500		
BM	(30°-60°)	5862.5	21.4	B4/8500		
BH	(60°-80°)	6545.9	23.9	B5		G3/7500
BVH	(80°-90°)	78.6	0.3			G1/100
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



REPORT NUMBER: P968394

CATALOG NUMBER: NAV-SB5B-830-U-5MQ

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
0°	2628.1	2628.1	2628.1	2628.1	2628.1	2628.1	2628.1	2628.1	2628.1	2628.1	2628.1
2.5°	2640.5	2643.3	2637.7	2635.0	2632.2	2628.1	2629.4	2636.4	2641.8	2640.5	2641.8
5°	2662.5	2665.3	2661.2	2659.8	2654.2	2652.9	2652.9	2659.8	2663.9	2661.2	2662.5
7.5°	2687.3	2691.4	2684.6	2683.2	2680.5	2677.7	2676.3	2683.2	2687.3	2687.3	2687.3
10°	2710.7	2714.9	2709.4	2705.3	2702.5	2702.5	2699.7	2705.3	2712.1	2710.7	2710.7
12.5°	2735.5	2738.3	2732.8	2730.0	2730.0	2734.2	2730.0	2732.8	2738.3	2735.5	2734.2
15°	2765.9	2767.2	2765.9	2770.0	2776.8	2790.7	2778.3	2775.5	2778.3	2771.4	2771.4
17.5°	2807.2	2809.9	2815.5	2825.1	2834.7	2859.5	2837.5	2830.5	2830.5	2816.8	2816.8
20°	2858.1	2862.3	2870.5	2887.0	2899.4	2922.9	2900.9	2891.2	2887.0	2869.2	2869.2
22.5°	2911.8	2918.7	2931.1	2953.1	2975.2	2997.2	2975.2	2958.7	2946.3	2922.9	2921.5
25°	2973.8	2982.1	3001.4	3037.2	3067.5	3099.2	3073.1	3039.9	3015.1	2982.1	2980.7
27.5°	3062.0	3071.6	3095.1	3139.2	3177.7	3205.3	3180.5	3137.7	3103.3	3063.3	3062.0
30°	3185.9	3195.6	3223.1	3270.0	3296.2	3314.0	3297.5	3264.4	3223.1	3177.7	3177.7
32.5°	3345.7	3358.1	3388.4	3432.5	3438.1	3440.8	3435.3	3418.8	3388.4	3333.3	3334.7
35°	3548.2	3562.0	3596.4	3632.2	3626.8	3632.2	3624.0	3618.5	3596.4	3533.1	3533.1
37.5°	3796.2	3812.7	3848.5	3876.0	3862.3	3855.3	3856.8	3858.1	3845.7	3775.5	3775.5
40°	4084.0	4106.0	4132.2	4161.2	4137.7	4117.1	4130.9	4141.9	4130.9	4059.2	4059.2
42.5°	4380.1	4411.8	4439.4	4480.7	4461.4	4435.3	4454.5	4467.0	4443.6	4366.4	4371.9
45°	4709.4	4739.7	4775.5	4837.5	4823.6	4796.2	4823.6	4826.4	4786.5	4695.6	4705.3
47.5°	5049.6	5081.2	5134.9	5217.7	5212.1	5181.8	5217.7	5198.4	5147.3	5038.6	5031.7
50°	5371.9	5416.0	5498.6	5614.3	5625.3	5588.2	5636.4	5599.2	5513.8	5377.5	5374.7
52.5°	5674.9	5721.8	5852.6	6009.7	6049.5	6001.4	6066.2	6001.4	5873.2	5698.4	5681.8
55°	5993.1	6045.4	6201.1	6406.4	6486.2	6450.4	6511.0	6413.2	6231.4	6019.3	5990.4
57.5°	6367.8	6399.5	6585.4	6829.2	6964.2	6972.5	7000.0	6834.7	6614.3	6373.2	6340.2
60°	6774.1	6818.2	7020.6	7312.7	7526.2	7595.0	7566.1	7321.0	7064.7	6787.9	6743.8
62.5°	7294.8	7343.0	7585.4	7935.2	8272.8	8443.5	8330.6	7975.2	7658.4	7326.5	7268.6
65°	7725.9	7779.6	8217.6	8841.6	9455.9	9798.9	9515.2	8860.9	8290.6	7822.3	7745.2
67.5°	7413.2	7479.3	8166.7	9312.6	10840.2	11863.7	10892.6	9453.2	8336.1	7701.1	7606.1
70°	6479.3	6541.3	7343.0	8743.8	11230.0	13472.5	11464.2	9001.3	7369.1	6658.4	6563.4
72.5°	4301.6	4501.4	5312.7	6993.2	10027.6	12467.0	10126.7	6851.2	4928.4	4292.0	4152.9
75°	1427.0	1586.8	2140.5	3625.3	6716.2	9323.7	6394.0	3207.9	1695.6	1220.4	1154.3
77.5°	359.5	414.6	571.6	1037.2	2679.0	5308.6	2411.8	847.1	461.5	322.4	287.9
80°	175.0	192.8	275.5	345.7	670.8	1687.4	629.5	325.0	217.6	168.0	154.3
82.5°	96.5	97.8	155.7	195.6	249.3	436.6	258.9	190.0	125.4	101.9	101.9
85°	59.2	57.8	82.6	104.7	104.7	155.7	123.9	104.7	71.6	63.3	66.1
87.5°	23.4	23.4	30.3	33.1	28.9	40.0	31.7	34.4	27.6	26.1	27.6
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)