

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: P971309

Luminaire Tested: **NAV-SB6D-722-U-5NQ**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P971309
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-289-18)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB6D-722-U-5NQ
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(6) 70 CRI, 2200K, 900mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE V NARROW OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 54752.4 lumens
Efficiency: N/A
Efficacy: 124.4 lumens/watt
Luminous Opening: Rectangular (W 1.5' x L: 1' x H: 0')
IES Classification: Type V - Short
BUG Rating: B5 - U0 - G4

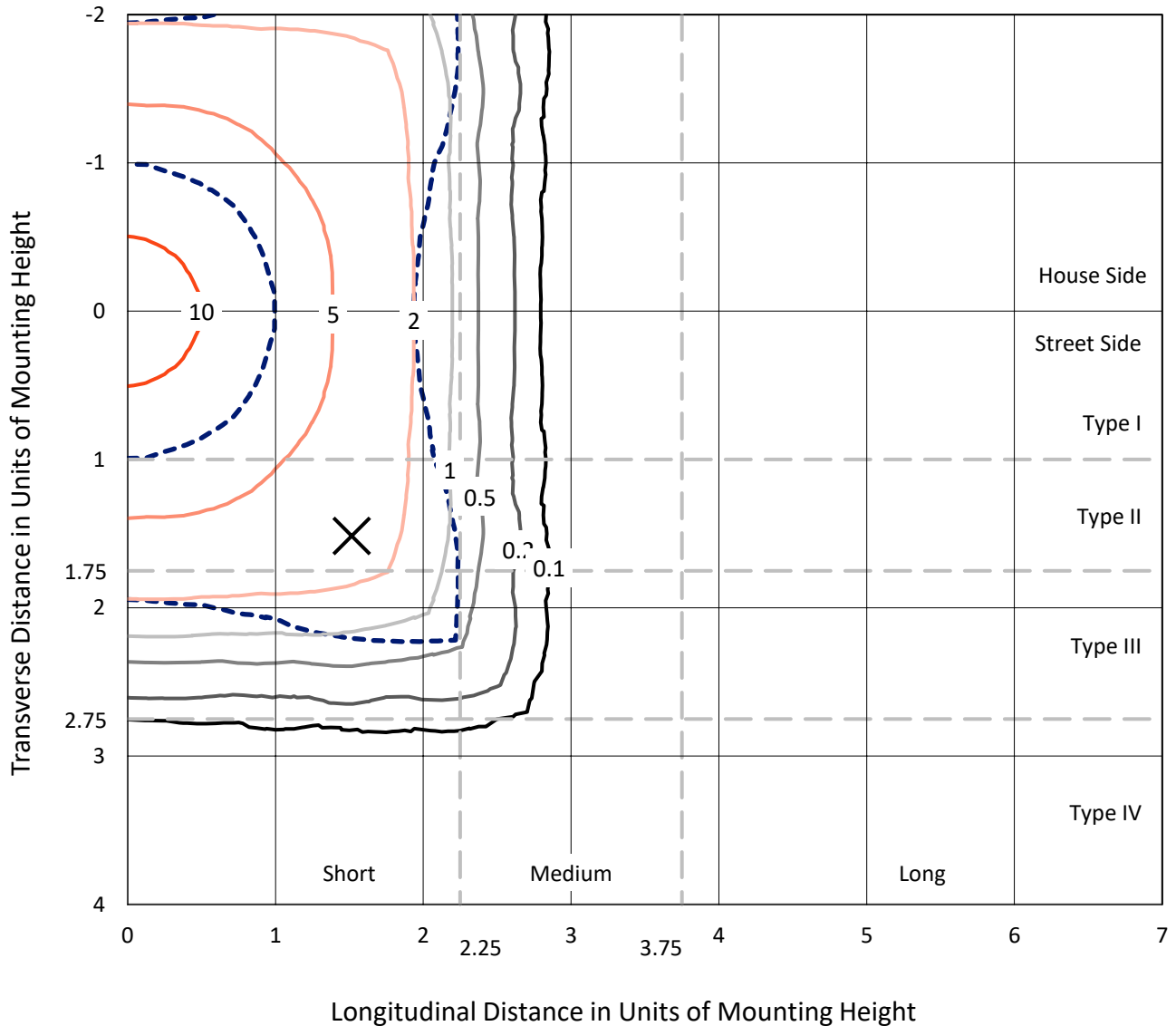
Input Watts (W): 440.1
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

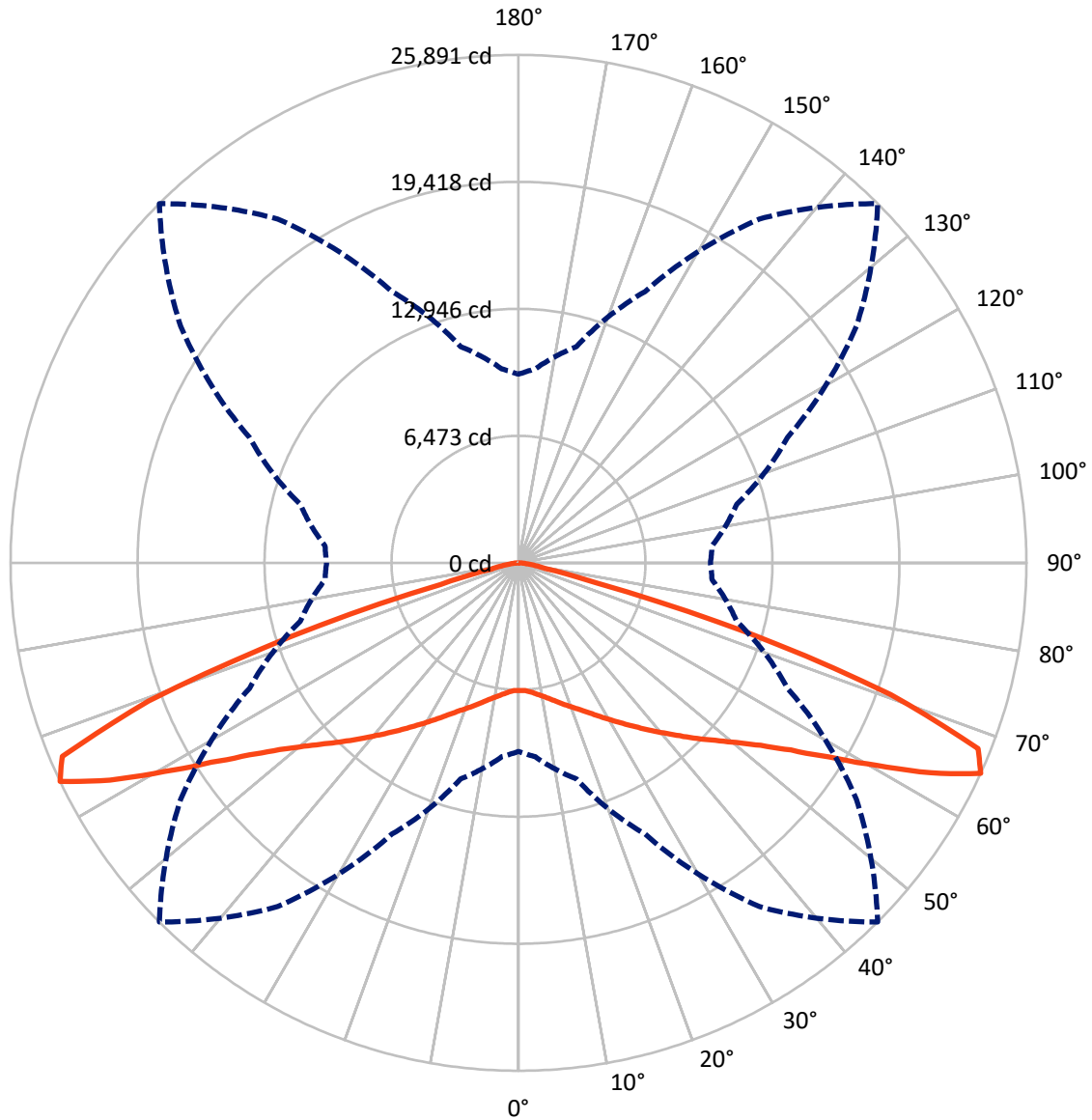
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 10.6 fc
 Type V - Short - N/A

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Luminous Intensity Polar Plot



— Vertical Plane Through 45-Deg Lateral - - - Horizontal Cone Through 65-Deg Vertical

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FLUX DISTRIBUTION:

| | | Downward | Upward | Total |
|--------------------|-----------|----------|--------|---------|
| House Side | Lumens | 27376.2 | 0.0 | 27376.2 |
| | % Fixture | 50.0 | 0.0 | 50.0 |
| Street Side | Lumens | 27376.2 | 0.0 | 27376.2 |
| | % Fixture | 50.0 | 0.0 | 50.0 |
| Total | Lumens | 54752.4 | 0.0 | 54752.4 |
| | % Fixture | 100.0 | 0.0 | 100.0 |

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|---------|-----------|
| 0°-10° | 643.1 | 1.2 |
| 10°-20° | 2098.4 | 3.8 |
| 20°-30° | 3962.0 | 7.2 |
| 30°-40° | 6487.7 | 11.8 |
| 40°-50° | 10059.2 | 18.4 |
| 50°-60° | 14859.5 | 27.1 |
| 60°-70° | 14144.9 | 25.8 |
| 70°-80° | 2282.5 | 4.2 |
| 80°-90° | 215.1 | 0.4 |
| 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° | 54752.4 | 100.0 |
| 0°-180° | 54752.4 | 100.0 |

Coefficient of Utilization



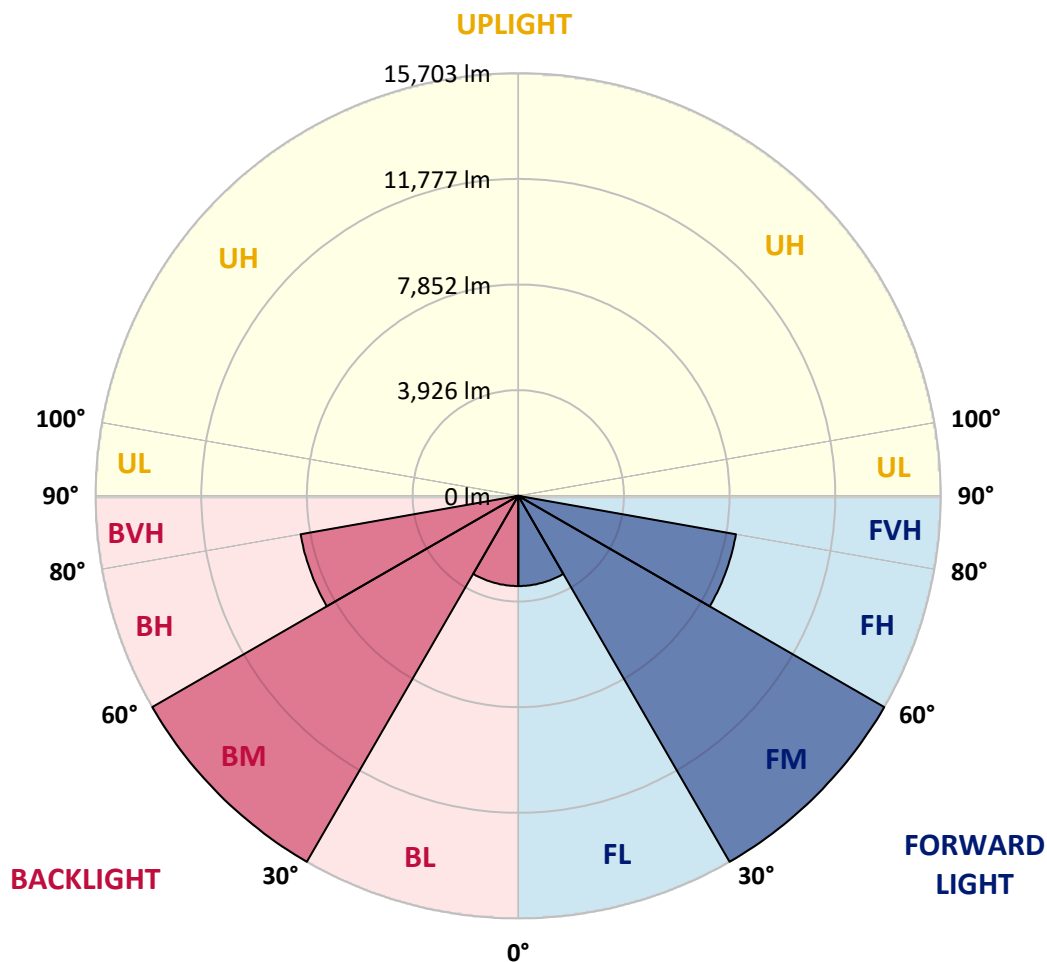
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

| Zone | Lumens | % Fixture | Zone Rating/Lumen Limit | | |
|----------------|---------|-----------|-------------------------|------|----------|
| | | | B | U | G |
| FL (0°-30°) | 3351.8 | 6.1 | | | |
| FM (30°-60°) | 15703.2 | 28.7 | | | |
| FH (60°-80°) | 8213.7 | 15.0 | | | G4/12000 |
| FVH (80°-90°) | 107.6 | 0.2 | | | G2/225 |
| BL (0°-30°) | 3351.8 | 6.1 | B4/5000 | | |
| BM (30°-60°) | 15703.2 | 28.7 | B5 | | |
| BH (60°-80°) | 8213.7 | 15.0 | B5 | | G4/12000 |
| BVH (80°-90°) | 107.6 | 0.2 | | | G2/225 |
| UL (90°-100°) | 0.0 | 0.0 | | U0/0 | |
| UH (100°-180°) | 0.0 | 0.0 | | U0/0 | |

BUG Rating: B5-U0-G4

Type V Short



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CANDELA DISTRIBUTION (FULL):

| | 0° | 5° | 15° | 25° | 35° | 45° | 55° | 65° | 75° | 85° | 90° |
|-------|---------|---------|---------|---------|---------|---------|---------|---------|---------|---------|---------|
| 0° | 6516.1 | 6516.1 | 6516.1 | 6516.1 | 6516.1 | 6516.1 | 6516.1 | 6516.1 | 6516.1 | 6516.1 | 6516.1 |
| 2.5° | 6560.0 | 6538.1 | 6554.6 | 6540.8 | 6529.9 | 6518.8 | 6524.3 | 6543.6 | 6551.8 | 6554.6 | 6554.6 |
| 5° | 6647.9 | 6628.7 | 6637.0 | 6637.0 | 6617.7 | 6612.3 | 6614.9 | 6628.7 | 6645.2 | 6645.2 | 6645.2 |
| 7.5° | 6790.8 | 6771.6 | 6790.8 | 6779.8 | 6763.4 | 6757.8 | 6755.1 | 6766.0 | 6790.8 | 6790.8 | 6782.5 |
| 10° | 6963.8 | 6941.9 | 6952.9 | 6947.3 | 6928.2 | 6919.9 | 6917.1 | 6933.6 | 6955.6 | 6952.9 | 6947.3 |
| 12.5° | 7153.4 | 7128.7 | 7142.4 | 7125.9 | 7120.5 | 7112.2 | 7112.2 | 7109.5 | 7123.2 | 7112.2 | 7117.7 |
| 15° | 7364.9 | 7348.4 | 7354.0 | 7343.0 | 7351.2 | 7345.7 | 7323.7 | 7312.8 | 7318.2 | 7301.8 | 7304.5 |
| 17.5° | 7614.9 | 7576.5 | 7595.7 | 7590.2 | 7590.2 | 7601.2 | 7565.4 | 7551.7 | 7562.8 | 7546.3 | 7560.0 |
| 20° | 7903.4 | 7864.9 | 7873.1 | 7862.2 | 7848.4 | 7859.4 | 7815.4 | 7826.5 | 7834.7 | 7823.7 | 7848.4 |
| 22.5° | 8219.3 | 8169.9 | 8167.1 | 8172.5 | 8142.4 | 8145.1 | 8114.9 | 8142.4 | 8158.8 | 8128.7 | 8158.8 |
| 25° | 8543.5 | 8491.2 | 8527.0 | 8513.2 | 8474.8 | 8483.0 | 8461.1 | 8488.5 | 8502.3 | 8463.7 | 8507.7 |
| 27.5° | 8886.9 | 8851.1 | 8884.1 | 8892.3 | 8845.6 | 8878.6 | 8845.6 | 8870.3 | 8884.1 | 8826.4 | 8870.3 |
| 30° | 9287.9 | 9252.2 | 9282.4 | 9304.3 | 9249.4 | 9301.7 | 9274.2 | 9290.6 | 9293.4 | 9224.7 | 9265.9 |
| 32.5° | 9724.7 | 9669.7 | 9746.6 | 9757.7 | 9697.2 | 9760.4 | 9724.7 | 9746.6 | 9760.4 | 9667.0 | 9730.2 |
| 35° | 10257.6 | 10188.9 | 10276.9 | 10263.1 | 10210.9 | 10263.1 | 10230.1 | 10263.1 | 10296.1 | 10183.5 | 10252.2 |
| 37.5° | 10831.8 | 10760.3 | 10853.7 | 10829.0 | 10779.5 | 10815.3 | 10796.0 | 10818.1 | 10870.2 | 10749.4 | 10823.5 |
| 40° | 11463.6 | 11375.7 | 11502.0 | 11458.1 | 11411.4 | 11405.9 | 11416.9 | 11430.6 | 11499.3 | 11364.7 | 11408.7 |
| 42.5° | 12139.4 | 12046.0 | 12235.5 | 12166.9 | 12100.9 | 12057.0 | 12092.6 | 12120.1 | 12186.0 | 12034.9 | 12114.7 |
| 45° | 12911.3 | 12804.2 | 13051.4 | 12969.0 | 12864.6 | 12774.0 | 12831.7 | 12872.9 | 12969.0 | 12787.7 | 12881.1 |
| 47.5° | 13762.9 | 13642.0 | 13905.8 | 13881.1 | 13710.7 | 13512.9 | 13644.8 | 13762.9 | 13834.3 | 13614.6 | 13688.8 |
| 50° | 14595.3 | 14501.9 | 14847.9 | 14878.2 | 14669.4 | 14392.0 | 14576.0 | 14754.6 | 14773.8 | 14485.4 | 14521.1 |
| 52.5° | 15375.4 | 15282.0 | 15784.8 | 15974.3 | 15787.5 | 15457.8 | 15652.9 | 15834.2 | 15688.6 | 15315.0 | 15326.0 |
| 55° | 15999.0 | 15922.1 | 16562.2 | 17051.2 | 17114.3 | 16842.4 | 16957.8 | 16952.3 | 16474.3 | 15900.1 | 15919.4 |
| 57.5° | 16150.1 | 16139.1 | 16946.7 | 17982.4 | 18641.7 | 18674.7 | 18446.7 | 17864.3 | 16834.1 | 16062.2 | 16012.8 |
| 60° | 15463.4 | 15532.0 | 16641.8 | 18468.7 | 20226.8 | 20957.6 | 19971.3 | 18309.4 | 16424.8 | 15353.5 | 15227.1 |
| 62.5° | 13408.5 | 13589.9 | 14927.7 | 17875.3 | 21507.0 | 23583.7 | 21193.7 | 17633.6 | 14743.6 | 13345.3 | 13262.9 |
| 65° | 9609.3 | 9925.2 | 11403.1 | 15254.6 | 21391.5 | 25891.3 | 21017.9 | 15130.9 | 11513.0 | 9900.5 | 9782.4 |
| 67.5° | 4359.6 | 4681.1 | 5936.5 | 10444.4 | 18595.0 | 25264.9 | 18551.1 | 10554.3 | 6233.1 | 4697.5 | 4628.8 |
| 70° | 1579.5 | 1634.5 | 2038.3 | 4181.1 | 11883.8 | 20130.6 | 12392.1 | 4211.3 | 2167.5 | 1741.7 | 1719.6 |
| 72.5° | 956.0 | 964.2 | 1049.4 | 1497.1 | 4128.9 | 12221.8 | 4304.7 | 1546.6 | 1071.3 | 950.5 | 967.0 |
| 75° | 607.1 | 601.6 | 747.2 | 914.8 | 1464.2 | 4123.4 | 1535.7 | 914.8 | 744.5 | 678.6 | 684.0 |
| 77.5° | 436.8 | 450.5 | 535.7 | 684.0 | 923.0 | 1398.3 | 906.5 | 653.8 | 535.7 | 439.5 | 447.8 |
| 80° | 326.9 | 335.2 | 390.1 | 532.9 | 648.3 | 870.8 | 576.9 | 483.5 | 403.8 | 274.7 | 282.9 |
| 82.5° | 236.3 | 236.3 | 255.4 | 387.3 | 395.5 | 469.8 | 313.1 | 340.6 | 266.5 | 195.1 | 195.1 |
| 85° | 140.1 | 137.4 | 159.3 | 230.7 | 206.0 | 173.0 | 142.9 | 208.8 | 167.6 | 120.8 | 118.1 |
| 87.5° | 49.4 | 52.2 | 49.4 | 65.9 | 54.9 | 46.7 | 44.0 | 57.7 | 46.7 | 41.2 | 38.4 |
| 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)