

Empowering you to work smarter



12. ZERO CALIBRATION

Connect vacuum gauge to system to be evacuated when internal pressure is 0.75 Microns, then press and hold button "SAVE/CAL" for 3 seconds until the display shows "0.75 Microns" to complete the zero calibration.

13. SENSOR CLEANING

During use, it is possible that the sensor may be contaminated by foreign matter, and the sensor may need to be cleaned.

Follow these instructions:

13.1 Turn off the vacuum gauge, and remove all the batteries.

13.2 Shake to remove any foreign matter.

13.3 Using an eye dropper or a syringe, fill the sensor chamber with alcohol or isopropanol.

Tighten the cap and shake, remove cap, then rinse the sensor chamber for 3~4 times with alcohol or isopropanol.

13.4 Thoroughly dry the sensor by evacuating, or allow to air dry for at least 2 hours before storage.

13.5 Inspect the vacuum gauge and perform a Zero Calibration.

14. BATTERY INSTALLATION

Remove battery compartment cover, install three "AA" batteries and make sure they are in the correct orientation.

Note:

Remove batteries from the instrument if it will be unused for a long period of time.

15. TROUBLESHOOTING

Cannot Power On	Check the batteries and the polarity
Inaccurate ultimate vacuum	Make sure all flare connections are tight. Zero Calibration / Clean the sensor. Check seal gasket for damage, replace if necessary.

16. APPENDIX

Included with Vacuum Gauge: 3xAA Batteries, Connection accessories, Shockproof tool bag, Instructions.

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MADE IN CHINA



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User Manual

NMV1

Micron Vacuum Gauge



Failure to follow warnings could result in death or serious injury.

**SAVE THIS MANUAL
FOR FUTURE REFERENCE**

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User Manual

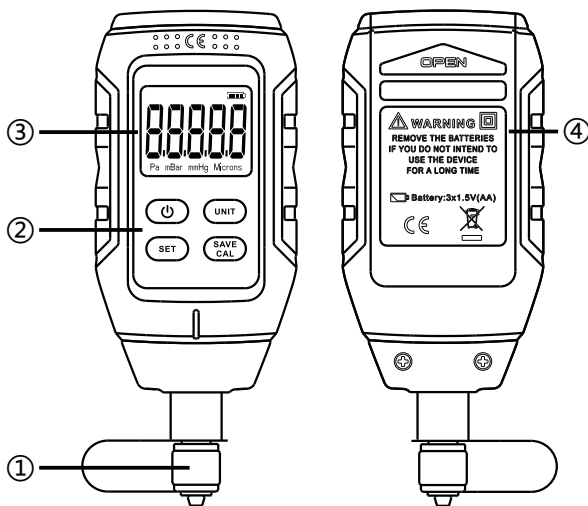
1. DESCRIPTION

The NAVAC NMV1 micron vacuum gauge uses a Pirani vacuum sensor that precisely measures the vacuum depth. Measurements will tell you about removal of air, moisture, oil, etc, letting you know when the system is leak-free, and ready to be charged. The NAVAC NMV1 is used to monitor system evacuation, system leaks, and vacuum pump performance.

2. SAFETY INSTRUCTIONS

- 2.1 Always operate the micron vacuum gauge according to this instruction manual and always within specified conditions, otherwise you may damage the instrument.
- 2.2 NEVER CONNECT MICRON VACUUM GAUGE TO A PRESSURIZED SYSTEM. This may damage the gauge rendering it inoperable.
- 2.3 Replace the batteries with new ones when the power is low, or at least once a year. Do not mix new batteries with old, and mixing different brands of batteries is not recommended. Remove batteries if not using the vacuum gauge for a long period of time to prevent damage from battery leakage.
- 2.4 Do not clean the instrument with corrosive detergents or solvents. See section 13 for sensor cleaning instructions.
- 2.5 Wear goggles and protective gloves, and follow best practices.
- 2.6 Tighten flare cap, place in storage bag, and store in a dry place.

3. INSTRUMENT OVERVIEW



①	1/4" Flare Fitting
②	⏻: Power on/Off/Backlight
③	UNIT: Unit selection/Add value in Set Mode
④	SET: Long press the button into Alarm Set Mode
	SAVE/CAL: Save alarm value/Full scale calibration/ Zero Calibration in Set Mode
	Display (Vacuum degree, Units and Battery capacity)
	Battery cover (3xAA batteries)

4. TECHNICAL SPECIFICATIONS

Maximum Overload Pressure	14 psi / 0.1 Mpa
Range	0~10000 Pa, 0~100.00 mBar, 0~75.000 mmHg, 0~75000 Micron
Resolution	0.01(<10 Pa), 0.0001(<10 mBar), 0.0001(<10 mmHg), 1(<30000 Microns)
Accuracy	15~750 Microns:± 5% of reading(at 68°F)
Operating Temperature	32~122°F(0~50°C)
Battery Life	45 hours (3xAA batteries)
Unit	Pa, mBar, mmHg, Microns
Refresh Rate	0.5 second
Connections	1/4" Flare
Sensor	Pirani sensor
Auto Off Time	10 minutes
Backlight Time	20 seconds
Buzzer Alarm	90 db, for 10 seconds
Weight	Only 4.5 oz

5. OPERATION

- 5.1 Install three "AA" batteries.
- 5.2 Press and hold the power button ⏻ for 3 seconds to turn LCD light on. The display shows " - - - - " when the unit is warming up.
- 5.3 Connect to system directly or via access tee connection.
- 5.4 Start the vacuum pump, the display will show vacuum from high to low. Once reaching the target setting, the vacuum meter alarm buzzes and the backlight will blink simultaneously for 10 seconds.
- 5.5 Press and hold power button ⏻ for 3 seconds to turn the power off.

6. UNIT SELECTION

Press the UNIT button to select the unit of measurement.

7. SET ALARMS

- 7.1 Press and hold "SET" button for 3 seconds to enter into Set Mode.
- 7.2 Press "SET" button to select digit position. The digit position will blink when it is selected.
- 7.3 Press "UNIT" button to modify the blinking value.
- 7.4 Press "SAVE / CAL" button to save the set value.

8. LEAK ALARM

The vacuum gauge will buzz (90db for 10 seconds) if the vacuum rises above the programmed setting, and the backlight will also flash.

9. BACKLIGHT

Press power button ⏻ to turn the backlight on when the instrument is in use. The backlight will automatically turn off after 20 seconds.

10. AUTO-OFF

The unit will automatically power off when there are no setting or vacuum changes within a 10 minute period.

11. FULL SCALE CALIBRATION

If the unit completes warm-up and the display does not show " - - - - ", press and hold SAVE/CAL button at atmospheric pressure (disconnected from system) for 3 seconds until the display shows " - - - - ". Then connect to system to be evacuated.