

VEVOR DL405

VEVOR Magnetic Torpedo Level DL405 Instruction Manual

Model: DL405

1. PRODUCT OVERVIEW

The VEVOR Magnetic Torpedo Level, Model DL405, is a versatile measuring tool designed for precision in various applications, including plumbing and woodworking. It features a durable aluminum alloy construction, a high-definition LED backlit screen, and a gravity sensor for automatic screen rotation.

Key Features:

- **High-Definition LCD Backlight Digital Screen:** Provides clear measurement data even in low-light conditions.
- **Gravity Sensing:** Automatically rotates the screen for convenient viewing when the device is flipped. Includes an audible beep for vertical and horizontal positions.
- **Sturdy & Durable Aluminum Construction:** Made from high-quality, rust-resistant, and wear-resistant aluminum for long-lasting use.
- **0-360 Degree Measurement:** Offers a full range of measurement (4x90 degrees) with 0.05-degree precision for accurate horizontal and vertical positioning.
- **Memory Recording & Holding Function:** Stores the last 8 angle measurements and allows transfer of target values to other work areas.
- **Strong Magnetic Adsorption:** Integrated magnets for easy attachment to metal surfaces.



Figure 1: VEVOR Magnetic Torpedo Level DL405 with its protective carrying bag.

The VEVOR Magnetic Torpedo Level DL405 is presented with its protective carrying bag, highlighting its portability and readiness for various job sites.



Figure 2: Overview of the 24-inch high-precision digital level, emphasizing its premium aluminum construction, high accuracy, gravity sensing, and strong magnetic adsorption.

This image illustrates the core benefits of the VEVOR DL405, showcasing its robust build and advanced features for precise leveling tasks.

2. SETUP

Battery Installation:

The VEVOR DL405 requires batteries for operation. Ensure correct polarity during installation.

1. Locate the battery compartment cover on the underside of the level.
2. Use a screwdriver to loosen the screw and remove the battery cover.
3. Insert two batteries, ensuring the proper positive (+) and negative (-) polarities are aligned.
4. Replace the battery cover and tighten the screw securely.

Note: When the low battery icon appears on the display, it indicates that the battery is low and should be replaced.

Your browser does not support the video tag.

Video 1: Detailed instructions on how to install and replace batteries for a digital level. This video also covers other functions and calibration.

This video provides a comprehensive guide on battery installation and other operational aspects of a similar digital level, which can be applied to the VEVOR DL405.

3. OPERATING INSTRUCTIONS

Power On/Off:

- To turn on, short press the **ON/OFF** button. A brief buzzer sound will confirm activation.
- To turn off, press and hold the **ON/OFF** button for approximately 3 seconds.

Unit Switching:

- Short press the **MODE** button to cycle through available measurement units: degrees (°), percent (%), mm/m, in/ft (fraction), and in/ft (decimal).

Reference Measurement Mode:

- Short press the **REF** button to enter or exit the reference measurement mode.
- When in reference mode, the 'S' icon will flash on the display, and the current position will be set as 0 degrees. All subsequent measurements will be relative to this set position.

Hold Function:

- Short press the **HOLD** button to freeze the current measurement value on the display. The 'H' icon will be displayed.
- Press the **HOLD** button again to exit the hold function and resume live measurements.

Buzzer Prompt:

- Short press the buzzer button (often integrated with ON/OFF or a dedicated button) to turn the audible buzzer on or off. When active, a buzzer icon will appear on the display.
- The buzzer provides a continuous beep at 0° and 90° for precise alignment. A fast beep indicates angles between 0°-1° or 89°-90°.



Figure 3: The high-definition LCD display shows a 15.6% slope, demonstrating the gravity sensor's ability to automatically rotate the screen for easy reading.

This image highlights the clear LCD display and the automatic screen rotation feature, which enhances usability in various orientations.

4 x 90-DEGREE MULTI-DIRECTIONAL MEASUREMENT

Meets Various Measurement Needs

Horizontal/Vertical Measurement
Accuracy: **0.05-Degree**

Measurement Range:
0-360°

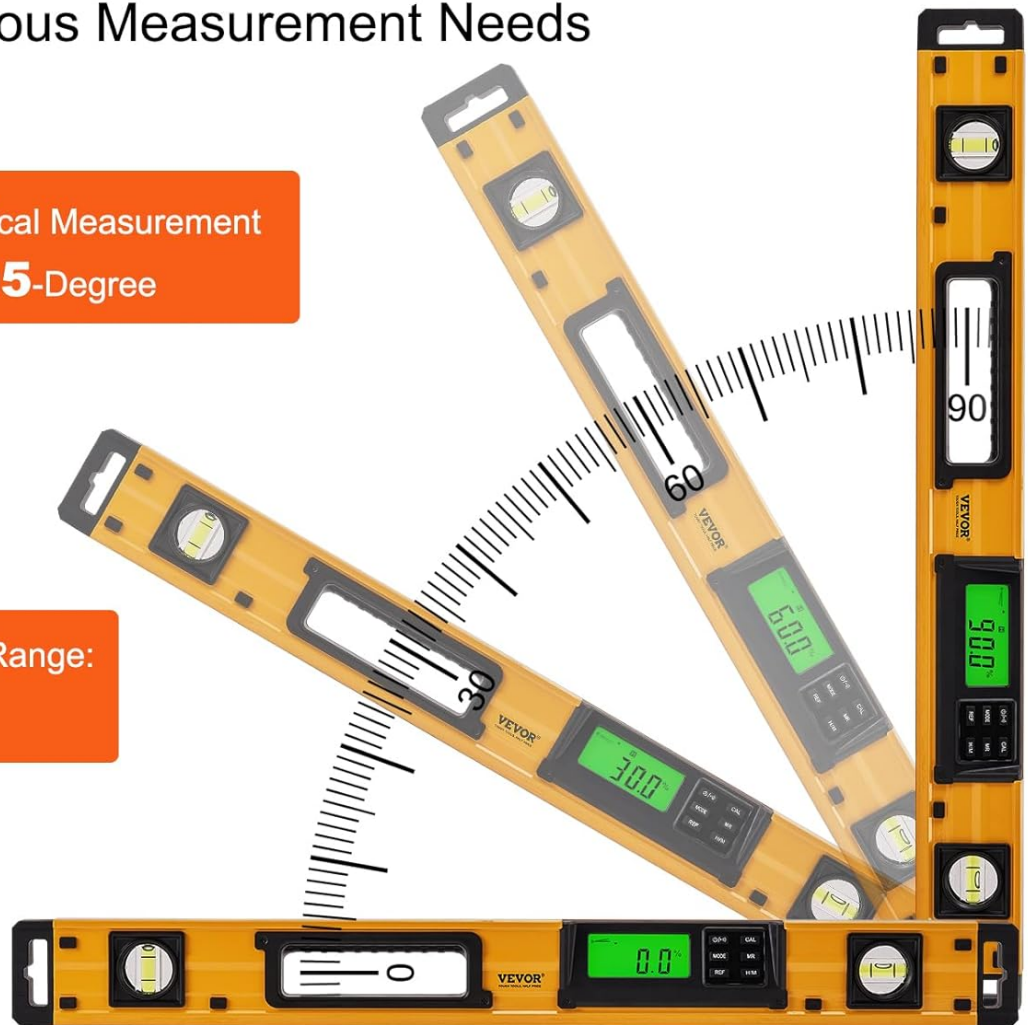


Figure 4: The level is shown measuring angles in multiple directions, illustrating its 0-360 degree range and 0.05-degree accuracy for horizontal and vertical measurements.

This visual demonstrates the level's capability for comprehensive angle measurement, crucial for diverse construction and DIY projects.

DUAL-AXIS PRECISE BUBBLES

Clear Visual, Convenient Observation



◀ Vertical

Horizontal ▶



0.0005-inch/ft (0.5mm/M)
Bubble Accuracy

Figure 5: A detailed view of the vertical and horizontal bubble vials, indicating their precision of 0.0005 inches/foot (0.5mm/M).

The image emphasizes the traditional bubble vials, providing a clear visual reference for leveling alongside the digital display.

Your browser does not support the video tag.

Video 2: This video demonstrates the basic functions of a digital torpedo level, including power on/off, unit switching, relative angle measurement, magnetic base, and display features.

This video provides a visual guide to the core functionalities of a digital level, offering practical insights into its use for various tasks.

4. CALIBRATION

If you notice a significant deviation in accuracy, calibrate the level using the following steps:

1. Turn off the digital level.
2. Place the level on a flat and smooth surface.

3. While the device is off, press and hold the **HOLD** button.
4. While still holding **HOLD**, press the **ON/OFF** button until the LCD display shows "CAL".
5. The screen will then display the current measured angle. Keep the level still for a short period, then press the **HOLD** button. "CAL1" will briefly display.
6. In the same location, rotate the level 180 degrees.
7. Press the **HOLD** button again. "CAL2" will briefly display.
8. Once "CAL2" disappears, the calibration is complete.

Note: To cancel calibration at any point, turn off the digital level.

5. MAINTENANCE

General Care:

- Keep the device clean and dry. Wipe with a soft, damp cloth.
- Avoid exposing the level to extreme temperatures or direct sunlight for prolonged periods.
- Store the level in its provided carrying bag when not in use to protect it from dust and damage.

Battery Replacement:

Refer to the "Setup" section for detailed instructions on battery installation and replacement. It is recommended to remove batteries for long-term storage to prevent leakage.

IP54 PROTECTION

Protection against daily splashes and rain



Figure 6: The level is shown in a rainy environment, illustrating its IP54 rating for dust-proof, waterproof, and weather-resistant protection.

This image demonstrates the level's durability and resistance to environmental factors, emphasizing its suitability for outdoor use.

6. TROUBLESHOOTING

- **Display not turning on:** Check battery installation and ensure batteries are not depleted. Replace if necessary.
- **Inaccurate readings:** Perform a calibration as described in the "Calibration" section. Ensure the surface is stable and free from vibrations.
- **"ERR" message on display:** This may occur if the level is lying flat at approximately 30 degrees. Adjust the level to a different angle or re-calibrate if the error persists.
- **Buzzer not working:** Check if the buzzer function is enabled (refer to "Buzzer Prompt" in Operating Instructions).

7. SPECIFICATIONS

Feature	Specification
Item Model Number	DL405
Material	Aluminum
Item Length	24 inches / 600 mm
Measurement Range	0-360 degrees (4x90°)
Number of Bubbles	2
Level Bubble Color	Green
Level Bubble Accuracy	0° & 90°: ±0.1°; Other Angles: ±0.2°
Resolution	0.05°
Storage Bag	600D Fabric
Handle	ABS + TPE
Net Weight	1.11 lbs / 505 g
Product Dimensions	59.94 x 2.79 x 0.25 cm
UPC	840349935614



Figure 7: A visual representation of the VEVOR DL405's key specifications and dimensions, including item model number, material, length, measurement range, and accuracy.

This image provides a quick reference for the physical and technical attributes of the level.

8. WARRANTY AND SUPPORT

For warranty information, technical support, or service inquiries, please contact VEVOR customer service through their official website or the retailer where the product was purchased. Keep your purchase receipt and product model number (DL405) handy for faster assistance.



