

[Manuals.plus](#) /

› [allsun](#) /

› ALLOSUN TS150 Underground Metal Detector User Manual

allsun TS150

ALLOSUN TS150 Underground Metal Detector User Manual

Model: TS150

INTRODUCTION

This manual provides comprehensive instructions for the proper assembly, operation, and maintenance of your ALLOSUN TS150 Underground Metal Detector. Please read this manual thoroughly before using the device to ensure safe and effective operation. The ALLOSUN TS150 is designed for detecting various metal objects underground, suitable for applications such as treasure hunting, archaeological studies, and locating underground pipes and cables.

PRODUCT OVERVIEW

The ALLOSUN TS150 metal detector is equipped with features designed for efficient metal detection. Understanding its components and controls is essential for optimal performance.

Main Components

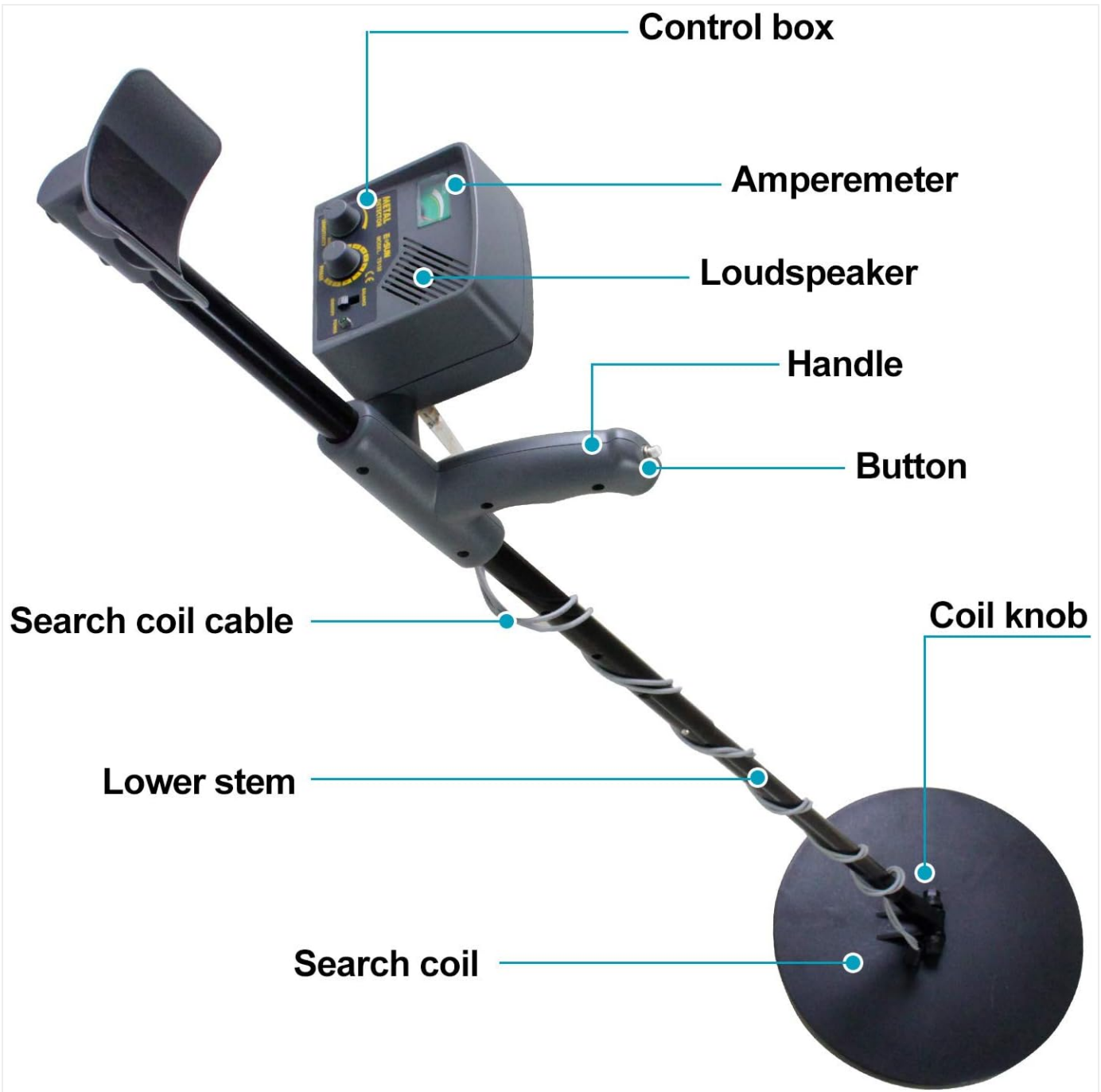


Figure 1: Main Components of the ALLOSUN TS150 Metal Detector. This image illustrates the key parts of the metal detector, including the control box, amperemeter, loudspeaker, handle, button, search coil cable, lower stem, search coil, and coil knob.

- **Control Box:** Houses the electronic circuitry, display, and controls.
- **Amperemeter:** Visual indicator for signal strength.
- **Loudspeaker:** Provides audible alerts for detected metals.
- **Handle:** Ergonomic grip for comfortable operation.
- **Button:** (Specific function not detailed, likely for pinpointing or mode selection).
- **Search Coil Cable:** Connects the search coil to the control box.
- **Lower Stem:** Adjustable rod connecting the search coil to the main shaft.
- **Search Coil:** The primary component for detecting metal objects.
- **Coil Knob:** Secures the search coil to the lower stem.

Control Panel and Back View

PANEL OF THE CONTROL BOX

Amperemeter

Loudspeaker

Power lamp

Sensitivity knob

Phase knob

Operating mode switch



Figure 2: Control Panel of the ALLOSUN TS150. This image highlights the various controls on the detector's panel, including the amperemeter, loudspeaker, sensitivity knob, phase knob, operating mode switch, and power lamp.

- **Sensitivity Knob:** Adjusts the detector's sensitivity to metal objects. Turning it to "MAX" increases detection depth and responsiveness.
- **Phase Knob:** Used for ground balancing and fine-tuning the detector's response to different metals.
- **Operating Mode Switch:** Selects between "BALANCE" (ground balance) and "IDENTIFY" (discrimination) modes.
- **Power Lamp:** Indicates the power status of the device.
- **Power Switch:** Integrated with the Sensitivity knob (OFF/MIN/MAX).

THE BACK OF THE CONTROL BOX



Figure 3: Back of the Control Box. This image shows the rear of the control box, detailing the battery compartment cover, the socket for the search coil cable, and the earphone jack.

- **Battery Compartment:** Located on the back, houses the 6 AA batteries.
- **Earphone Jack:** 3.5mm jack for connecting headphones.
- **Socket for Search Coil Cable:** Connection point for the search coil.

SETUP

Assembly

Assemble the metal detector by connecting the search coil to the lower stem, then attaching the lower stem to the main shaft and control box. Ensure all connections are secure. The search coil cable should be wrapped around the stem to prevent tangling and interference.



Figure 4: Assembled Metal Detector. This image displays the fully assembled ALLOSUN TS150, ready for use.

Battery Installation

The ALLOSUN TS150 requires 6 pieces of 1.5V AA batteries for operation. Ensure batteries are installed correctly according to polarity markings.

1. Locate the battery compartment cover on the back of the control box (refer to Figure 3).
2. Open the cover.
3. Insert 6 AA batteries, observing the correct polarity (+/-) as indicated inside the compartment.
4. Close the battery compartment cover securely.



Figure 5: Battery Compartment. This image shows the open battery compartment, ready for the insertion of 6 AA batteries.

OPERATING INSTRUCTIONS

Getting Started

1. **Power On:** Turn the Sensitivity knob clockwise from "OFF" to the desired sensitivity level. The power lamp will illuminate.
2. **Ground Balance (BALANCE Mode):** For stable operation and to reduce false signals from mineralized ground, set the operating mode switch to "BALANCE". Adjust the Phase knob until the detector operates smoothly with minimal false signals when sweeping the coil over the ground. This step is crucial for accurate detection.
3. **Target Identification (IDENTIFY Mode):** After ground balancing, switch the operating mode to "IDENTIFY" to distinguish between ferrous (iron) and non-ferrous (e.g., gold, silver, copper) metals. The detector will respond differently to various metal types.
4. **Sensitivity Adjustment:** Adjust the Sensitivity knob to control the detection depth and stability. Higher sensitivity settings increase detection depth but may also increase susceptibility to electrical interference or ground noise. Start with a moderate setting and increase as needed.
5. **Sweeping the Search Coil:** Hold the detector with the search coil parallel to the ground, about 1-2 inches above the

surface. Sweep the coil slowly from side to side in overlapping motions. Maintain a consistent height and speed for best results.

6. **Signal Indication:** When a metal object is detected, the amperemeter will show a reading, and an audible tone will be emitted from the loudspeaker or connected earphones. The nature of the tone and the amperemeter reading can help in identifying the type of metal.
7. **Earphone Use:** Connect earphones to the earphone jack for private listening and to better hear subtle signals, especially in noisy environments.



Figure 6: Detector in Use. This image shows the ALLOSUN TS150 being used in different outdoor environments, demonstrating typical operating posture and coil sweeping.

Detection Depth Considerations

The maximum detection depth of the ALLOSUN TS150 can be up to approximately 59 inches (150 cm). This depth is achievable under ideal conditions and depends on several factors:

- **Size of Metal:** Larger objects are detected at greater depths.
- **Metal Purity:** Highly conductive metals are generally easier to detect.

- **Solid Quality:** Solid, compact objects provide stronger signals.
- **Ground Mineralization:** Highly mineralized ground can reduce detection depth.
- **Operator Skill:** Proper ground balancing and consistent sweeping techniques are crucial.

Note: The 59-inch depth is based on tests with large metal objects, such as a sheet iron or objects with a cross-sectional area over 23.5" x 23.5". Smaller objects will have a shallower detection range.

MAINTENANCE

- **Cleaning:** Wipe down the detector with a damp cloth after each use. Avoid using abrasive cleaners or solvents.
- **Storage:** Store the detector in a dry, cool place when not in use. Remove batteries if storing for extended periods to prevent leakage.
- **Search Coil Care:** The search coil is waterproof (IP55 rated), but the control box is not. Avoid submerging the control box in water.
- **Cable Management:** Ensure the search coil cable is not kinked or damaged.

TROUBLESHOOTING

- **No Power:**
 - Check if batteries are installed correctly and have sufficient charge.
 - Ensure the Sensitivity knob is turned clockwise from "OFF".
- **False Signals / Unstable Operation:**
 - Perform ground balance procedure in "BALANCE" mode.
 - Reduce sensitivity if operating in highly mineralized ground or near electrical interference.
 - Ensure the search coil cable is tightly wrapped around the stem and connections are secure.
- **Poor Detection Depth:**
 - Increase sensitivity if conditions allow.
 - Ensure proper ground balance.
 - Verify battery charge.
 - Sweep the coil slowly and consistently.
- **Difficulty Understanding Controls:**
 - Refer to the "Product Overview" and "Operating Instructions" sections of this manual.
 - Practice in a known area with various metal objects to familiarize yourself with the detector's responses.

SPECIFICATIONS

Feature	Specification
Brand	allsun
Model Number	TS150
Color	Black
Material	Metal
Power Source	Battery Powered

Feature	Specification
Batteries Required	Yes (6 x 1.5V AA batteries)
Item Weight	2.2 Pounds (approximately 1 kg)
Extended Length	118 Centimeters (approximately 46.5 inches)
Adjustable Length	Yes
International Protection Rating	IP55 (Search coil is waterproof, control box is not)
Recommended Uses	Metal Detection, Treasure Hunting
Product Dimensions	27.9 x 13 x 27.9 inches (packaged)
Display Style	LED (for power lamp) / Amperemeter
Included Components	Underground Metal Detector TS150, English Manual, Earphone, Carrying bag (Batteries not included)

WARRANTY AND SUPPORT

For warranty information, technical support, or service inquiries regarding your ALLOSUN TS150 Metal Detector, please contact the seller or manufacturer directly. Retain your purchase receipt as proof of purchase for any warranty claims.
Manufacturer: Zhangzhou Eastern Intelligent Meter Co., Ltd

ASK A QUESTION ABOUT THIS MANUAL

Ask about setup, troubleshooting, compatibility, parts, safety, or missing instructions. Manuals+ will review the question and use this page’s manual context to help answer it.

Name

Anonymous

Email

you@example.com

After a successful submission, we securely hash the supplied account or form email before sending it to Microsoft Advertising for conversion attribution. [Privacy details](#).

Question

Example: How do I reset this device or fix this error?

Details

Model number, symptoms, what you tried, or the section of the manual you are using.

Submit question