

# THE PINPOINTER

AN UNSHIELDED SECONDARY  
CABLE FAULT LOCATOR

- ▲ Quickly pinpoints all secondary faults in direct buried unshielded cables
- ▲ Accurate earth gradient method ignores ghost images



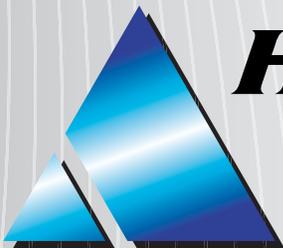
**Accurate. Affordable. Fast.  
Get Right to the Point!**

Don't beat around the bush. The Pinpointer locates secondary cable faults in direct buried unshielded cables to within inches of the fault, even under snow or frozen ground, at street light circuits, at the meter riser, across driveways, sidewalks or streets. You don't even have to know the exact route of the cable.

For over 35 years, The Pinpointer has saved users time and money. No costly, unnecessary digging. You get right to the point.

High accuracy, low cost, reliable and easy to use.

That says it all.



**H.J. Arnett  
Industries, L.L.C.**

*Electrical testing & products  
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## First, De-energize & Disconnect Service...

**CAUTION:** Always use approved personal protection equipment when working with energized conductors. **ELECTRICAL SHOCK** or instrument damage can result if Transmitter is connected to live power cable. Never connect The Pinpointer to a live primary cable. Use qualified utility personnel to disconnect primary and secondary cables when required.

1. Whether the cable from the transformer serves one or more residences, pull all meters affected by the faulted cable. Connect The Pinpointer to the first meter affected by the fault.
2. Disconnect the faulted cable from the transformer if the voltage on the cable is 80 volts or more.
3. Disconnect the neutral at the transformer and house.
4. Disconnect any temporary service from house.

## Connect Transmitter

**CAUTION:** The 2500 VDC Transmitter pulses can cause **ELECTRIC SHOCK**. Do not touch the output leads of the Transmitter while it is on. Wear rubber insulating gloves at all times when connecting the Transmitter.

1. With Transmitter power switch OFF, connect line cord to 120 VAC at a wall outlet or at the meter base using the 120 VAC adapter cord. If using the adapter, observe:  
Always connect wire with green insulator to neutral (ground); The black wire is clipped to the hot leg, the other wires to neutral.
2. AC power is not available, connect the Pinpointer 12 VDC input to a 12 volt truck battery using the battery cable (supplied) or to an optional rechargeable battery. Always observe proper polarity.
3. Connect red Transmitter lead to the faulted cable at meter base.
4. Push the ground probe provided into the ground at right angle to the lay of the faulted cable. The ground probe should be placed as far away from the faulted cable as possible.
5. Connect the black Transmitter lead to the ground probe.
6. After making the above connections, turn ON Transmitter high-voltage output. The unit will emit a 2500 VDC pulse every 3 to 4 seconds.

## Connect Detector...

**CAUTION:** **ELECTRICAL SHOCK** may result from touching bare probes on the Detector. Use electrically insulating rubber gloves. The Detector is not insulated against direct contact with high voltage power lines.

1. Pull the "Balance" control on the back panel to power the Detector. With "Sensitivity" control at minimum, adjust Balance control to move meter needle to center of scale.

## Specifications

Weight: Net 18 lbs., shipping, 21 lbs.  
Size: Height 9" x Width 18" x Depth 8"  
Operating Voltage: 120 VAC @ 60 Hz.  
Fuse Protection: AC ½ amp slo-blo, panel mount, DC 4 amp board mount  
Output Voltage: Approx. 2300-2500 VDC across 10 megohm load  
Warranty: One year parts/labor under ordinary use. Not responsible for misuse.

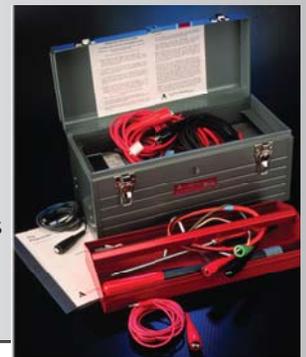
2. Push Battery Test button to check battery status.
3. Plug red and black detector probe wires into respective jacks on back detector panel. With right hand, insert red probe into ground near meter riser or the ground stake, depending on what you've chosen for local ground. Insert black probe 5 feet down route of faulted cable. Maintain orientation as you proceed down cable route.

## Locating Faults...

1. Operator stands behind probes, so that red probe is toward the transmitter. When the transmitter pulses (audible), the detector's needle moves in direction of the fault on buried cable.
2. Close to the meter riser or location of established ground rod, the detector shows every transmitter pulse. Proceed down the route of the buried cable "football chain" fashion, taking readings every 20 to 30 feet.
3. As you move down the cable the meter deflections may decrease. This is the "silent detector" feature which prevents locating phantom faults caused by "noise" from adjacent lines. The needle's movement increases again near the area of the fault. Continue probing.
4. When you've passed the fault, the meter deflections suddenly reverse and move to the right. Bring the probes close together, about 2 feet apart, and probe again. Follow the direction the needle is deflecting until you observe a null reading (no deflections). Mark the spot directly between the two probes.
5. Turn the probes 90 degrees and repeat the process, watching for needle deflections until another null is observed. Mark the spot directly between the probes. This is the fault location.
6. If fault cannot be found, reconnect the Transmitter at the other end of the faulted cable and repeat the process from that end.

## The Pinpointer - Transmitter

All an operator needs to find secondary faults within inches! Transmitter's fault impedance indicator acts as a 2500 VDC megger, telling you the type of fault (break, short, etc.). You know instantly whether the cable is good or bad, and the amount of the impedance.



## Options...

A-Frame Detector #HJA-470-200  
Battery power source kit #HJA-470-109  
Includes rechargeable battery, recharger, cables, mounting bracket, and instructions.