### **USING THE DETECTOR**

- When the Detector nears the Metal, the Metal light comes on and the buzzer sounds, scan in two different directions and make two marks. The metal is in the middle of the two marks. (Refer Dia 6).
- 3. Scanning for wood in Stud Mode
- Push the Mode switch in Stud mode position.
- Put the Detector on the wall and press the Power button to turn on power. Power LED then comes on. Stud LED lights for about 30 seconds and turns off.
- Move the unit horizontally across the wall when the Detector nears the wood on the back of the wall, the Stud light comes on and the buzzer sounds.
   Scan in two different directions, then make two marks. The wood is in the middle of the two marks

Note: Always keep detector flat to the surface being detected for best detection sensitivity.

### HINTS:

- Stud detection can be carried out on wallpapers but some sensitivity will be lost depending on the thickness of the paper and in some case these can be foil backed thus giving false reading, please confirm wallpaper types when detecting!
- It is advisable to take several readings along the vertical baton or stud as a nail may change the apparent center position.
  - **THIS IS VERY IMPORTANT.** Because the unit will show baton or stud findings when it is moving from thin layers to thick layers, on the contrary, the unit would not show any signal when it is moving from thick layers to thin layers.
- When the battery is low below 7V, the LowBat LED will light. Change the battery, note the correct type, as soon as possible.

If faults cannot be remedied, contact the **Helpline** on **020 83916767**. Helpline@hilka.co.uk

### **GUARANTEE**

This product is guaranteed for domestic use for a period of 12 months against faulty manufacture or materials. This guarantee does not affect the statutory rights of the consumer. If in the event of any problem occurring please contact our Helpline at the number above for advice. This product is not guaranteed for HIRE purpose.

### CHALLENGE TOOLS (UK) LTD.

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Issue1 J.W. 10/04

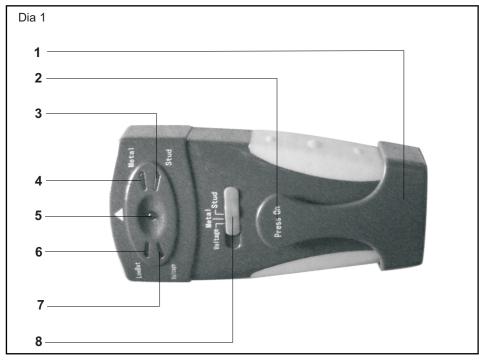


# 3 in 1 Detector



## **Component List**

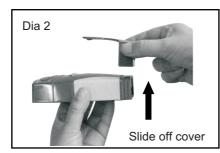
# PLEASE READ THE INSTRUCTION MANUAL PRIOR TO OPERATING THIS PRODUCT AND KEEP FOR FUTURE USE.



Component	USE
1. Battery cover	To shield the battery from external environment
2. Power button	Power can be turned on when the button is pressed
3. Stud LED	It lights when the Detector detects wood
4. Metal LED	It lights when the Detector detects metal
5. Power LED	It lights when powered on
6. LowBat LED	It lights when the capacity of the battery is over
7. Voltage LED	It lights when the Detector detects AC voltage
8. Mode switch	Slide left or right for the intended detection purpose

### PREPARING THE DETECTOR FOR USE

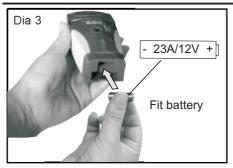
- Slide off the battery cover on the back of unit and connect a fresh 12V battery, see Dia 2 & 3. Ensure battery is fitted in the correct manner, note positive (+) and negative (-) connections.
- Restore the cover and securely snap in place, now the detector is ready for use. See Dia 4.



### NOTE:

Be sure to use a **DURACELL MN21/23 12Volt Battery** or its equivalent (available in most hardware stores) with this detector.

### **USING THE DETECTOR**



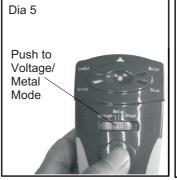


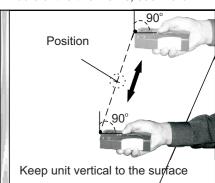
### **USING THE DETECTOR**

### NOTE:

- The unit will not detect items that are shielded in some way or are in excess of 30mm from the surface.
- Because the unit is sensitive at detection you should repeat the process to confirm position of wire, metal or wood.
- For best detection sensitivity, always scan with the unit vertical to the surface when detecting AC voltage and metal. Lie the unit flat on the surface when detecting wood.
- 1. Scanning for AC voltage (50Hz 230V or 60Hz 110V) in Voltage Mode.
  - Push the Mode switch in Voltage mode position, see Dia 5.
  - Press the Power button to turn on Power.
  - Voltage LED keeps on lighting if AC voltage is around the detector, otherwise the Voltage LED turns off automatically after flickering for about 30 seconds.
  - To scan for AC voltage, move the detector in one direction. The Voltage LED will flicker and buzzers will be heard when it detects AC voltage. Keep scanning in this case until the Voltage LED goes off. Then move the detector in reverse direction. Repeat the scanning for several times to ascertain the wire position. When the detector moves closer to the wire, the Voltage LED flashes (emitting green light) faster and buzzer sounds faster until the Voltage LED emits red light. Make a mark from different directions. The wire is in the middle of the two marks, see Dia 6.

Dia 6





- 2. Scanning for metal in Metal Mode
  - Push the Mode switch in Metal mode position.(Refer to Dia 5)
  - Put the Detector far away from metals, then press the Power button to turn on power.
    The Power LED comes on and Metal LED lights for about 30 seconds then turns off automatically.