



DA530L Digital Angle

Instruction Manual

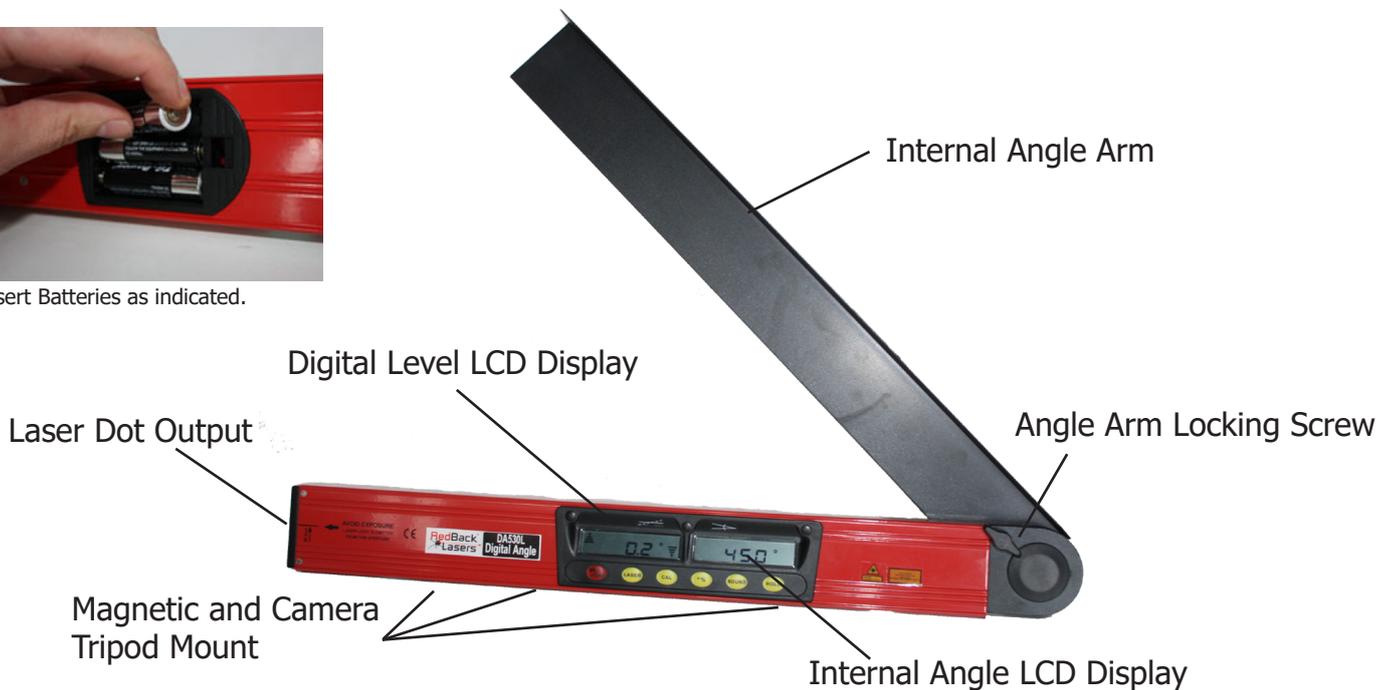
The DA530L is a dual use Digital Level and Digital Angle Measure, the DA530L also features a laser dot useful in internal fit out and levelling.

The DA530L can measure surface angles and indicate level on the left hand LCD display. On the right LCD display is indicated the internal angle between the Angle Arm and base of the unit.

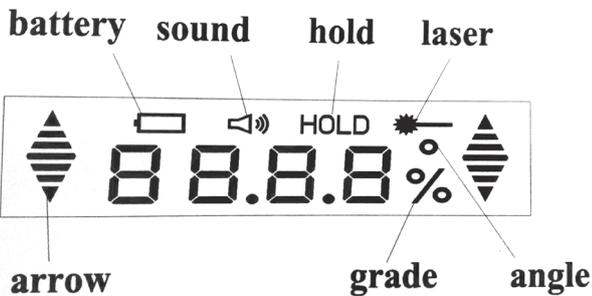
NOTE: "AA" and Button Cell Battery will need installing and then follow self-calibration methods over page.



Insert Batteries as indicated.



Digital Level Display (left)



Power On/Off

Laser On/Off / Angle Self Calibration

Level Self Calibration

Sound On/Off

Degrees or % Display / Back Light

Measurement Hold

Power up the DA530L with the red On/Off button, the left LCD display will show the angle of a surface when placed on it, 0.0, all four arrows and a sound will indicate level. When not level the arrows will indicate which direction the unit needs moving to reach level.

The "Laser" button (short press) turns on and off the laser dot which runs parallel to the flat surfaces of the unit, this can be used for levelling and other alignment needs. A long Press enables internal angle calibration (see reverse)

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The Calibration button (CAL) is used to re-calibrate the digital level if required instructions on this can be found at the end of this page. Calibration can be checked by simply placing the DA530L on a horizontal surface with the display facing to you, make a note of the measurement then rotate the unit 180 degrees so still upright but battery compartment is now facing you and again note the measurement. Tolerance is 0.1° so if the difference between the two measurements is greater than this then it would be worth re-calibrating the unit.

The Mode button (° %) switches the left LCD display between degrees and percentage, select you desired unit of measurement.

The "Sound" button turns on and off a sound alarm when the unit is level on a surface or a vertical 90° surface.

The "Hold" button allows you to freeze the left LCD display when pressed. This is useful when holding the level on a surface in such a position that you cannot see the display simply press the hold button the measurement will be frozen until you press the hold button again.

To use the Internal Angle arm first unlock the Locking Screw and open up the arm. The display on the right indicates the angle of the arm to the body of the unit in degrees. You can use the Angle arm to extend the length of the level by opening it out until it shows 180° and tightening the locking screw, so making the complete level just over 1m long in total.

Low Battery is indicated by a flashing battery symbol appearing on the left hand LCD display.

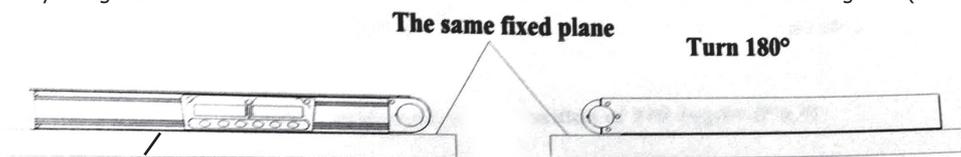
The DA530L will auto power off if no movement has been detected within 6 minutes to save batteries.

Calibration Instructions

Calibration may be required after sustained vibrations, large temperature variations or any knocks or drops. First check digital level calibration then the Internal Angle calibration.

To calibrate the digital level.

1. Place level on horizontal surface and press "CAL" button "-0-" will be displayed, wait 10 seconds. (surface does NOT need to be perfectly level)
2. Press "CAL" button again and "-1-" will be displayed, next turn the level 180° on the same levelling surface and wait another 10 seconds.
3. Press "CAL" again "-2-" will display for a moment and a single beep will sound to indicate the calibration is set, if three beeps are sounded calibration has failed and the above process needs to be repeated.
4. Check the calibration by doing a 180 reverse test on another surface to make sure the level is within 0.2 degrees. (tolerance +/-0.1 degrees)



Calibrating to the bottom surface (make sure the base of the level is on the surface each time)

To Calibrate Internal Angle (right display)

1. Place the level on a table, press and hold the "LASER/<CAL" button "-1-" will be displayed.
2. Open the internal angle arm so it is completely flat on the table i.e. 180 degrees.
3. Press "LASER/<CAL" once more "-2-" will be briefly displayed and calibration is successful, open and close angle arm to check (closed should read "0.0" open flat on table "180" etc).
4. Test and repeat process if not consistent.

Trouble shooting

- No Display? - Check "AA" batteries are new and inserted correctly
- ERROR message on both LED Displays - Replace Button Cell Battery Behind cover CR2450
- Incorrect level or angle displayed? - RE-calibrate DA530L as above
- Cannot open Angle Arm - Untighten locking screw to open

Notes & Safety

- Do not Stare into laser beam as this could damage your eyes
- Remove "AA" batteries when not in use for an extended time (leave button Cell inserted unless not being used for many month then remove it note re-calibration will be required)
- Do not pack away damp, dry first

Specifications

Angle Range 0° to 360°
Included Angle: 0° - 182.5°
Accuracy: +/-0.1°
Power: 3x "AA" Batteries
Temperature: -10°C - +45°C
Laser: Class II 635nm 1mW
Size: 530mm x 63mm x 40mm