

2. Technical data

Range	2%-30% moist. cont.
Thickness of layer measured	about 50 mm
Display type	LCD
Resolution	0.1
Power	9V (1 battery 6F22)
Battery life	about 5000 measurements
Low power indication	yes
Size	
device	165 * 80 * 33 mm
case	270 * 180 * 55 mm

3. Preparing the instrument

Before conducting any measurements you should do the following:

- set the WOOD TYPE switch to CALIBRATION,
- while holding the device in the air press the POWER ON button and use the CALIBRATION knob to set 00.0 (± max. 0.2),
- set the WOOD TYPE switch to the appropriate wood type (the display should indicate a negative value).

4. Measurements

The measurements should be conducted in at least several places. These places should be as flat, smooth and clean as possible. The actual result of the measurements is the arithmetic average of all the measurements. A line drawn between the electrodes should be perpendicular to the fibres. If the timber is too thin, place the electrodes parallel to the fibres.

Hold the device as shown on fig. 1. Use your right thumb to press the POWER ON button. Press the electrodes hard against the wood. Read the result. If the result is out of range (below 2% or above 30%) it should be considered approximate. The result out of range is indicated on the left side of the display by two dots (:).

If the timber is thinner than 25 mm, place several pieces on top of each other so that the whole pile is at least 40 mm thick.

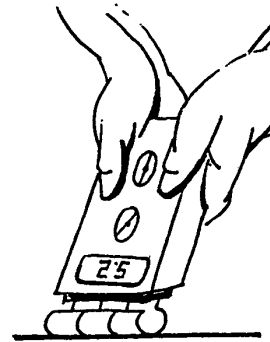


Fig. 1

There should not be any metal elements, wet wood or concrete etc under the timber. It's best if the timber is supported only by its ends or placed on a layer of Styrofoam several centimetres thick.

5. Remarks

Besides the moisture contents, the result is also influenced by:

- smoothness of the surface:
the rougher the surface the lower the result,
- thickness:
the thinner than 40 mm the timber the lower the result,
- wood temperature:
the higher than 20°C the temperature the higher the result,
- a measurement parallel to the fibres (instead of perpendicular as it should be) – higher result,
- defects in wood:
knots – higher result,
cracks – lower result.

The influence of each of the factors is very small and will not change the final result substantially. However if several of the factors coincide the result might be changed considerably.

6. Changing the battery and storage

The device is equipped with a power level control circuit. When the power drops below acceptable level a sign "LO BAT" appears on the left side of the LCD. This indicates that the battery has expired and should be replaced with a new one.

To replace the battery unscrew the screw on the back of the instrument and carefully remove the back panel.

Store the device in a dry place.

6. Service

The Wood Moisture Meter WIP-20D has a 12 months guarantee.

- all repairs during the guarantee period will be done within 10 days from the date of delivery,
- all other repairs will be done within 14 days from the date of delivery.

7. Manufacturer



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GUARANTEE

The manufacturer guarantees the correct functioning of the Wood Moisture Meter WIP-20D under normal use for a period of 12 months:

Serial number

Production date

USERS MANUAL DIGITAL WOOD MOISTURE METER WIP – 20D

1. Description and applications

WIP-20D is an electronic instrument for measuring wood moisture. It is widely used in wood industry, furniture industry, modelling and others, and is particularly useful for measuring moisture levels in finished products.

The final reading provided by this device is the average moisture level in a layer of timber 50 mm thick. WIP-20D measures the dielectric constant (SIC).