

A vertical stack of various wood panels, including solid wood, veneered wood, and particleboard, shown in a perspective view.

Döscher & Döscher

Moisture measurement in wood panels

MoistureGuard 2



MoistureGuard 2 -

for Measuring the moisture content in wood panel samples



The moisture content substantially affects the product and quality characteristics of engineered wood panels. MDF panels can be accurately sanded, for example, only at a certain moisture content. HDF panels also need a narrow moisture range for optimal bonding between substrate and overlay. In wood panels, a varying moisture content affects the inherent stability and leads to cupping of the panels.

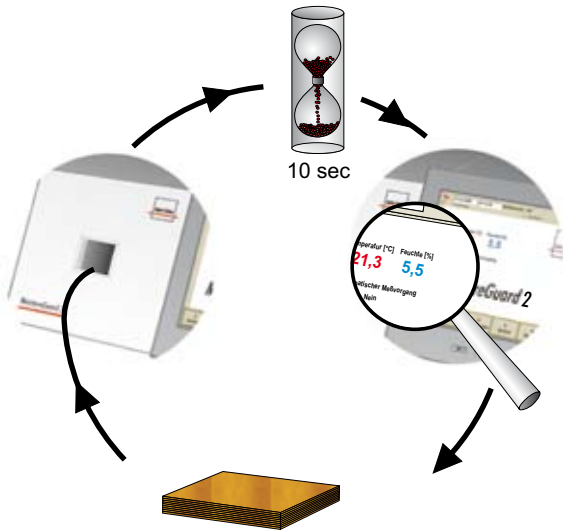
The measuring instrument MoistureGuard 2 gives a fast and reliable measurement of the moisture content at the surface and in the sample core. With only a few sample measurements the technician is informed about the moisture content of the entire panel, without special sample preparation. Wet and dry weight measurements of the panel samples are not necessary. A drying process of the panel samples, lasting several hours, is not necessary.

Measurement begins by using the TFT touch screen. The panel sample (50 mm x 50 mm) is inserted into the sensor slot of the MoistureGuard 2. Within seconds the measured value is shown and the panel sample is ejected.

The MoistureGuard 2 is easy to use and contains a multiplicity of measuring features, such as calibration and evaluation functions. Due to its solid design, the measuring instrument is suitable both for the laboratory and for application in production.

It will optimize the parameters in your production process without time delay and thus reduce costs and avoid interruptions. The amount of work and expenditure of time are minimized, which provides an important economic advantage.





Advantages summary

Microwave based measuring technique

- independent of density and weight
- exact and fast measurement
- independent of color and structure
- measures core and surface moisture

Improvement of production

- quality safety device
- more uniform panel quality
- reduction of customer complaints

Optimized operational sequence

- substantial time savings
- shortened production start-up
- fast recognition of production problems
- current information for process control

User friendly handling

- short measurement time
- no special sample preparation
- easy handling

Benefits

- product quality is achieved faster
- reject panels are minimized
- laboratory costs are reduced
- labor is optimized
- production is continuously informed in a timely manner

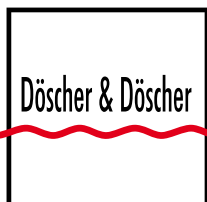
Components



Technical data

Measuring range:	0 – 20 % [dry basis]
Repeat accuracy:	1% of final value of selected measuring range [i.e. measuring range 0-10% = 0,1% accuracy]
Measuring time:	3 measurements samples per minute
Power supply:	230 VAC, 50 Hz or 115 VAC, 60 Hz
Temperature	
- product:	20 - 40°C [68 - 104°F]
- ambient:	0 - 40°C [32 - 104°F]
Different products:	up to 200 codes
Sample size:	50 mm x 50 mm [2" x 2"]
Max data set:	200.000
Data storage:	hard disk drive
Interfaces:	optional: 1 x USB [further interfaces are possible]
Housing:	rugged construction, desktop and portable
Handling:	TFT touch screen
Sensorhead:	Cavity measuring probe
Size:	620 mm x 290 mm x 380 mm [24" x 11" x 15"]
Weight:	23 kg [51 lbs]

Technical data are subject to change.



You will receive further information at:

Phone: +49 (0)40 8797677- 0 www.doescher.com

Fax: +49 (0)40 8797677-29 info@doescher.com