

Processing instructions for HDF panels

Perforated panels are made entirely out of wood and comply to E1 quality.

Due to timber as base material, we recommend to use our perforated panels within standard climatic conditions. (For details please view datasheet technical facts).

Due to the perforations the cross-section of the panel is enlarged. This makes the panels highly susceptible to moisture (hygroscopic).

Basically all conventional paints and coating systems are suitable for our HDF-perforated panels. It is always recommended to run a test with the provided material to determine the suitability.

Processing the untreated surface

1. Grinding

- Basically it's recommended to sand the untreated wooden panels to prepare the surface for the following procedures
- All common methods and machines are suitable

2. Paint application

- Pre-treatment with a primer
- Apply varnish or paint thinly
- The paint should not be too wet
- The color should not be applied with a brush - risk of clogging the perforations
- Best suited are roll coating or a spray technique

Processing the white lacquered surface

3. Grinding

- The white lacquered surface serves as a primer. It is sufficient to slightly roughen the surface.
- Suitable are all processing methods and machines matched to the material

4. Paint application

- Apply varnish or paint thinly
- The paint should not be too wet
- The color should not be applied with a brush - risk of clogging the perforations
- Best suited are roll coating or a spray technique
- Acrylic paints are suited best

If the paint is applied too wet or too thick, the edges of the perforations can swell - in extreme cases a deformation of the pattern may occur. Fibres within the holes may raise up.

Please follow the instructions and safety recommendations of the varnish / paint manufacturer.

Drying should be carried out under standard atmospheric conditions according to manufacturer's specifications.

Basic environmental conditions for processing

For processing and assembly of our HDFperforated panels made out of wood, standards and conditions of the wood industry for such products are applicable (always latest version). In particular the following standards are valid:

- DIN EN 318
- DIN EN 324-1,324-2
- DIN EN 622

According to these standards, a value for material moisture of 7% (plus/minus 2%) at 20°C to + 25°C outside temperature is stipulated.

For processing, a standard atmospheric condition is determined and defined in standard DIN EN-318. Under standard atmospheric condition a temperature of 20°C - 25°C at 50 to 65% relative humidity is understood. Any change in standard climate results in a change of material properties. This also applies to built-in panels during use.

Please bear in mind, that these changes can have an even stronger effect on our perforated panels (depending on $A_o = \%$), as the surface is enlarged due to the perforation. Therefore such changes have a direct influence. Any variation of this standard climate has consequences to the flatness and the durability of the panels.

Also the dimensions of the patterns (radius, edge length, pitch) can change.

Based on the above-mentioned DIN-EN standards we have determined the following tolerances for perforated wooden panels:

	Minimum	Maximum	Angle
Length / m	± 3 mm	± 5 mm	± 2 mm
Width / m	± 3 mm	± 5 mm	± 2 mm
Thickness / mm	± 0,4 mm	± 0,4 mm	—

Generally we only use E1 substrates in accordance with DIN EN 120.

The information contained in our data sheet are to the best of our knowledge, based on the results of practical applications and performed tests. However, they are not binding and should not be construed as warranted characteristics in the sense of the German law (BGH).

We recommend, due to the versatile application possibilities of our products, to conduct thorough suitability tests on original material before each use of the product. Our engineering department will be please to asisst. All of our products are subject to a strict quality control.