

# Medium Density Fibreboard

## Material Guide

MDF stands for Medium Density Fibreboard. It is a synthetic wood product that is available in large sheet form. The density refers to the structure inside the material. Something like chipboard is made using larger wood fibres and as a result, isn't as strong. High-density fibreboard is also available which has a greater strength but is more expensive.

## How it's made...

It's made by breaking down natural hard and softwood fibres into a very fine sawdust. Often the wood fibres used to make MDF are a waste product from the production of softwood timber. This means MDF is made from recycled material. The wood fibre is then combined with resins and wax which causes the material to bind and harden when compressed under high temperatures.



### PROS

- It's a great choice for building. It's solid, dense, flat, and stiff.
- Unlike natural timber MDF does not have knots or kinks which disturb the smooth surface.
- It's available in large consistent panel sizes.
- MDF has good economic value. It is cheaper than most other woods per m<sup>2</sup>.
- MDF saves trees as it is produced using a recycling process making boards from wood chippings and sawdust.



### CONS

- MDF absorbs moisture quicker than wood which can cause it to swell if not treated.
- MDF is comparatively weaker than natural timber but is a lot cheaper.
- It is not as aesthetically pleasing as natural timber. Laminates can be used to give it a more desirable finish.



### DisplayMode Sustainability Rating



**Start-of-Life (SOL)**  
Is it made from recycled material?

**Yes it has Recycled Content**

**End-of-Life (EOL)**  
Can it be recycled?

**Non-Recyclable**

### Economic Value

Compared with similar products



Low Price

High Price

## When should I consider MDF?

When a strong lasting unit is required MDF may be your best bet. It is easy to work with and comes in a range of thicknesses. MDF is not the most sustainable option but is cheaper than its more sustainable competitors.

## MDF End-of-Life



MDF itself cannot be broken down and re-made into new MDF at the end of its life. The resins used to create it do not allow it to be turned back into sawdust. It is often burnt as fuel or put into landfill where it breaks down over time, this process can take many years.

