Important considerations when choosing a timber floor.

Purchasing an Australian Hardwood timber floor is an important investment. Like any quality product they should be installed and finished by only experienced contractors to ensure years of excellent service. Like the floors found in 150 year old churches and heritage buildings, little has changed. This guide has been put together to help you through the process of the installation of your new timber floor.

Colour of timber, or the species

When looking at timber floors perhaps the most important decision to be made is the colour of your timber floor. Species of timber can usually be broken down into blonds, red and brown coloured timber.

Once a colour is determined, how hard the floor is important. That is the Janka rating of the floor. Even though we only do Australian hardwood, they are not all the same, and some are significantly harder than others. This will determine how well they will perform during their service life.

Timber flooring grades

Once you have chosen a species of timber, you need to consider what grade you are after. This will affect the look of the floor in terms of whether you are after a floor that has no natural gums veins, borer marking, or other imperfections, or you prefer a more natural floor. The mills are governed by Australian Standards for the amount of gum vein, borer markings and other features that are allowed within the boards.

There are three main grades for timber floors. Select, standard and feature grade. Select grade is your more perfect floors, with very few gum veins or natural imperfections. Standard grade will have a certain amount of feature on every board in the pack, with feature grade having bigger features on every board in the floor.

The most popular floor we find is the standard grade. There are lower grades that are produced by mills, but are generally not suitable for domestic residences.

Board widths

Board width is the next thing you need to consider. With most floors either 80 x 19 Secret nailed profile, or 130 or 180mm face nail profile. Secret nail 80mm floors are the most popular, accounting for over 90% of our installations. Top or face nailed 130mm floors look good, but you do see a nail in the face of the boards. And wider boards are more prone to cupping, where the outside edges of the board lift up higher than the centre of the board.

This gets us on to different installation methods.

Installation

Real timber floors in their own right are structural at 19mm over bearers and joists. However, most timber floors these days are laid over existing particle board or concrete slab surfaces. When they are laid over particle board, they are nailed and glued directly to the particle board. If the particle board has been affected by water during construction, it may need to be sanded prior to the flooring being installed.

When we lay over concrete slab, we have to put something down to attach the timber to. This is either battens or ply. This ply or battens is then pinned to the slab. Ply is the best option, as is does not create a cavity, so there is not as much noise from your floor. All floors over slab need a physical barrier to stop moisture coming out of the slab into the floor, so we use builders plastic under the ply.

Depending on the situation it may be necessary or advisable to acclimatise the flooring to its proposed location prior to installation. Timber floors are hydroscopic and are “alive”, and must be laid to ensure future possible expansion.

This means expansion gaps must be left between the edge of the boards and any vertical barriers, such as walls, steps, tiles, kitchen kickboards, doorsills and the like. Where there are no skirtings, we will have to put trims or angles to cover this expansion.

For continuous floor widths over 6m, intermediate cork expansion joints will need to be installed in addition to the perimeter expansion allowances, which are under skirting boards.

When we lay a floor, we need to remove skirting boards if they are fitted. At this time, if it is a renovation, it may be advisable to consider buying new skirtings, or alternatively we can refit the same skirtings. They will need repainting once we have refitted them.

Finishing the timber floor

Once all other trades and works are finished, it is time to sand and coat the timber floor. The most popular coating we use is a modified oil finish, usually in a satin finish. Oil finishes allow new timber floors to expand and contract evenly in its service life, unlike polyurethane finishes.

Oil finishes tend to bring out the natural colours and character of timber floors. Other coating systems do not tend to bring out all the life in timber floors.

They can also be “touched up” should they get scratched or have minor damage. While gloss finishes can look impressive on first inspection, they are very hard to maintain, and show scratches a lot quicker than satin finishes.

An alternative to oil finishes on new floors is a water based finish. This is an acrylic finish, and while good in that it puts off a low odour, compared to traditional solvent based polyurethanes, it cannot be repaired if damaged.

When we coat a timber floor it is wet to touch for up to 8 hours. Due to this, it is nearly impossible to have a timber floor finish without some minor dust contamination from the air.

The advantage of real timber floor finishing on site over factory prefinished flooring is that you do not see every individual board in the floor. However on site finishing means site dust control is nearly impossible, and some dust will be present in all timber floor finishes.

The advantage of modified oil is that the majority of this will “walk out” as it is usually sitting on top of the coat.

Traditional solvent polyurethane finishes, while harder than oil, are not appropriate for new timber floors as it can lead to edge bonding or clumping of the boards, where the coating goes between the board, and doesn’t let the floor move.

Maintenance

Timber floors are found in most churches, halls and shopping centres. They are chosen for their durability and ease of maintenance.

All that is required to keep a timber floor clean is a light vacuum, or an electro static mop. Enjo mops are very good for timber floor cleaning. They have a wet and dry head.

Light water mopping is all that is required for timber floors. The old wives tales of the addition of turps or methylated spirits in a bucket will only lead to the coating being broken down and stripped eventually. You can purchase products that are added to mop buckets that help clean floors, but are not really that important day to day.

Do not steam mop timber floors, or over mop a floor as moisture in timber floors will cause “cupping” and uneven timber movement in your floor.

Timber flooring is designed to have a service life for as long as your house stands. It is a one off purchase, unlike many other types of floor coverings. And if installed by an experienced licensed installer, it should be a part of your home for a life time.