



Plantation

Compressed Bamboo Flooring

Installation instructions

Pre-installation

FOR BOTH DIRECT STICK & FLOATING FLOORS

Prior to installation of any floor, the installer must ensure that the job site and sub-floor meet the following requirements:

- Bamboo flooring should be one of the last items installed in any new construction or renovation project
- All work involving water or moisture should be completed well before installing bamboo flooring. Room temperature and humidity of installation area should be consistent with normal, year-round living conditions for at least a week before flooring installation. Room temperature of 15-20 degrees Celsius and humidity of 40- 60% is recommended
- Unless the sub-floor and bamboo are properly sealed, bamboo flooring may not be suitable for bathrooms or laundries (due to the higher room humidity). **Please refer to the Plantation Warranty conditions when installing in a wet area.**
- During installation special precautions to seal sides and ends of cut boards should be taken where water may enter, e.g. bathroom, laundry and external doors and windows
- Don't store loose bamboo boards directly on concrete or near outside walls, long-term

Sub-floor must be:

- **Structurally sound**
- **Clean** – thoroughly swept and completely free of all debris; free of wax, grease, paint, sealers, old adhesive and other substances
- **Level** – flat to 3mm per 3 metre radius
- **Dry** (and will remain dry year-round)

It is strongly recommended that skirting boards are at least 15mm thickness (to allow for the natural expansion and contraction of the floor). Skirting boards should be fixed to the walls only after the flooring installation is complete (ie, be removed during installation).

Inspection

Bamboo is a natural product! Therefore variation in colour and structure within a batch are possible. You should always mix the components from different boxes for a random look.

Carefully examine the bamboo flooring for:

- Grade, colour and style
- Finish, quality and straightness

NOTE: Plantation cannot accept any responsibility for installation of flooring with visible defects.

Installation – tools

You will need:

- Tape measure and pencil
- Chalkline
- Hand saw (power saw also helpful)
- Tapping block (trimmed piece of flooring)
- Crow bar or pull bar
- Bamboo or plastic spacers (1/4")
- Hammer
- Drop saw and a hand saw (power saw also helpful)
- Chocking wedges

Direct stick installation

You will need:

- Plantation approved flooring adhesive (Sika T55)
- V-notched adhesive trowel
- Sikaflex 'technique' glue gun

Floating installation

- Roberts Harmony 3 in 1 Underlay



Installation requirements

Bamboo and wood are natural products which are affected by air humidity. Excessive air humidity causes bamboo materials to swell whilst low air humidity results in shrinking. It is of the utmost importance that you maintain distance (expansion gap) from walls, door frames, pipes etc. This distance should be a minimum of 8mm. If the floor is wider than approx. 8 metres or longer than approx. 12 metres, or when the floor is installed in more than one room a dilatation (expansion) gap should be placed.

The quality of your floor installation is dependent on the quality and preparation of the sub-floor. Please read the following carefully.

Acceptable sub-floor types

- Existing wood floor; or Plywood (10 mm minimum)
- Resilient tile and sheet vinyl
- Sub-floor grade particle board
- Concrete slab or Ceramic tile

For direct stick installation

Wood sub-floors

Wood sub-floors must be dry, well-secured, and checked for moisture content. They should be free from any contaminates. Wood sub-floors may require sanding to improve glue adhesion.

To install on a wood covered sub-base, bond with Sika T55 and apply with V-notched adhesive trowel.

On building upper levels, or if you chose to use an acoustic underlay for extra sound proofing, Plantation recommend acoustic underlay 'Sika Acoubond'. Bond with Sika T53, 1 x 600ml sausages per m2. Apply with a Sika glue gun to each slot in the underlay. Apply weights to flooring until dry – a minimum of 24 hours.

Ceramic/resilient tiles

Ceramic/resilient tile must be well bonded to sub-floor, in good condition, clean and level. They should be free from any contaminates. Ceramic/resilient tiles may require sanding or grinding to improve glue adhesion.

To install on ceramic/resilient tiles, bond with Sika T55 and apply with a V-notched adhesive trowel (1.25 - 1 x 600ml sausages per m2).

Concrete

Moisture found in concrete slabs has the potential to seriously damage any timber floor, including bamboo. To regulate and minimise the moisture uptake by bamboo flooring from a slab that is too wet, it's essential that procedures and installation practices as detailed below, are followed.

- Grind slab to remove any paint plaster or other contaminates that may be present. Grinding will also improve moisture barrier and glue adhesion. Vacuum or sweep after grinding

- Check the moisture content of the concrete slab by using surface-mounted hygrometer. The hygrometer must be sealed to the concrete for at least 16 hours. It measures the relative humidity of the air in contact with the concrete surface. If the hygrometer reads 70% or less the concrete can be considered sufficiently dry for the installation of bamboo flooring
- We recommend that a moisture barrier be applied to all concrete slabs prior to the installation of bamboo flooring, irrespective of the moisture reading. Our approved primer and barrier is Sika Primer MB. This should be applied in strict accordance with the manufacturer's specifications. A minimum of two coats should be applied to ensure that a visible continuous film is achieved. Once the moisture barrier is fully cured, recheck the surface relative humidity of the slab with the hygrometer to ensure that the desired relative humidity levels have been achieved (70% or less)
- Once the 70% or less relative humidity is achieved, secure the bamboo flooring to the slab with Sika T55 glue, spreading with a V-notched adhesive trowel at a rate of 1kg per m2

For underfloor heating

Bamboo Flooring can be installed over underfloor heating. Please ensure the following steps are followed:

- Maximum temperature not to exceed 27 degrees Celsius when operating
- Temperature should remain as constant as possible
- When installing the flooring, using the direct stick method, underfloor heating must be turned on and operated for 14 days prior to installation. It must then be turned off and cooled before installation starts

Procedure

For direct stick flooring

1. Check sub-base for moisture levels, as advised above
2. Check floor with a straight edge and mark depressions and high spots. Rectify if necessary with 'level crete' or grinder. Recheck moisture
3. Clean floor of paint, plaster, cement splashes, dust, oil, grease etc. Sweep or vacuum
4. Apply moisture barrier Sika (MB), ensuring a continuous visible film. (Refer to Sika specifications)



NOTE: If a moisture barrier has been previously applied, wipe area with a clean cloth before commencing installation. If badly soiled, cleaning with Sika Coma Cleaner is recommended. Etching of barrier may be required if the (MB) has been down for a period of time. For any further advice, please consult the technical team at Plantation

5. Confirm direction of floor to be laid
6. Installer must:
 - Inspect each board for defects and grade for use
 - Stack into colour range (light, medium, dark) for blending
 - Check tongue and groove or Uniclic joint for excess coating
 - Select the straightest boards for the first few runs of floor

NOTE: You are dealing with a finished product. Be careful not to damage the boards

- Keep work place clean and tidy
 - Wipe up excess glue immediately
 - Cover traffic areas to protect floor
7. Run a string line from room entry point or longest part of room
 8. Secure the first run of boards along the 'spine' with three anchor points of builder's bog with a coating of Sika T55 between. Leave an expansion joint of at least 8mm between flooring, walls and vertical objects
 9. To glue doorways and areas close to walls – open T55 sausage and insert in Sika 'technique' glue gun
 10. Spread T55 evenly with a V-notched adhesive trowel at the rate of 1.25 sausage per m². More glue may be required in a hollow area to avoid drumming. Trowel at right angles to boards; this will help highlight low areas in slab
 11. Spread one trowel width (equals two board widths)
 12. Gently press the boards together ensuring that the glue is adhering evenly to the board. Check for low points and apply extra glue where required
 13. Chocking or clamping must be carried out within one hour of spreading glue at 30 degrees Celsius, or two hours at 20 degrees Celsius, at 60% humidity
 14. Ensure that chock wedges are cut at roughly 15 degree angle and that tongue and grooves are matched
 15. Only lay enough flooring to be comfortably handled before glue goes off

16. Once floor is clamped up check that it's thoroughly glued down by tapping the laid section for drumming. Carefully apply weights until drumming stops

NOTE: While working, regularly clean the floor with a rag dipped in methylated spirits

17. On completion, give the floor a final clean. Clean with a damp mop with warm water and methylated spirits (approximately 20-40ml in 4.5 litres of water)
18. At the end of the day, weights (drums of sand or water and boxes of bamboo) should be used to press down the bamboo along the walls. Ensure that all the weights are placed on carpet or cardboard to avoid scratching
19. Finally, step back, admire and enjoy the completed floor!

For floating floors

1. Check Plantation bamboo flooring box on delivery to confirm colour and type
2. Check floor with a straight edge and mark depressions and high spots. Rectify if necessary with 'level crete' or grinder
3. Clean floor of paint, plaster, cement splashes, dust, oil, grease etc. Sweep or vacuum
4. Plantation recommends the use of Harmony 3 in 1 Underlay when floating the bamboo flooring. Harmony provides an excellent moisture barrier, sound reduction and cushioning required for proper installation

NOTE: It is important and best practice to install the floating bamboo floor around kitchen cabinetry (rather than under it), to allow the floor to expand and contract naturally.

The click-locking system can be assembled in two ways

- The boards can be rotated to fit into one another, either tongue into groove or vice versa. Position the board to be installed at an angle of 20-30 degrees to the board already installed. Move the board to be fitted slightly up and down at the same time as exerting pressure. The boards will then click into place
- In some cases, the boards can't be rotated into one another, for example under a door frame. In this case, the boards can also be fitted lying flat. Don't attempt to knock boards into place with one hit
- For the short edge, use a number of smaller taps until the boards click together completely
- For the long edge, tap boards together gradually. Begin tapping lightly at the corner of the board until a join is made, then repeat the process 300mm along until the entire long edge of the board has clicked in with the other board

Step by step installation

Roll out and overlap the Harmony 3 in 1 Underlay using the adhesive strips. Ensure that the underlay wraps over the exposed edges of the flooring by 20mm. This will be covered over when skirting boards are installed. Please refer to the Manufacturer Roberts for further information.

First row

1. To ensure a perfect expansion joint, saw off the tongue along the edge that will go against the wall
2. Start in a corner of the room with the locking strip (groove end) facing the room
3. Using wedges as required, maintain an expansion gap of at least 8-10mm between the wall and the boards being installed and/or any fixed/solid objects (eg. Cabinetry)
4. Install the first board followed by the second board pressing the end of the second floor board in at an angle to the first one and then laying it flat on the ground to engage the tongue and groove on the ends of the board
5. Continue with this method until you are ready to install the last board (of the first row). Cut the last board to size using a saw. Install like the previous boards, leaving a minimum 8mm gap at the end for expansion
6. After the first row is complete, ensure that all the wedges are even and parallel

NOTE: It's more practical to fine tune the gap between the long sides and the wall later, after the first 3 rows have been laid

Second row

1. Start the second row beginning with (if available) the piece left over from the first row. It should be at least 50cm long. If it's too short or there is no piece left over, start with a new board cut in half
2. Insert the long edge of the board into the adjacent board of the first row
3. Push forward and press down at the same time to engage the locking mechanism
4. With the board resting on the floor, ensure there is no gapping on any of the joints
5. Lift the end of the board and rest it on an installation wedge so it's not lying flat on the floor
6. Insert the end of the next board into the end of the previously installed board, lowering the board until it is parallel to the ground with the long edge of the board resting on the edge of the first row's locking mechanism
7. Rest the end of this board on an installation wedge so that the entire edge of the board is at the same angle as the end of the first board

8. Slowly and evenly push the entire length (the long end) of the second board into place using a tapping block
9. Once completely inserted, remove all wedges and press the entire board down to lock in place
10. Use a rubber hammer and a tapping block to ensure that all edges fit tightly and are perfectly mated
11. Lift up to the very end of the newly installed board and place an installation wedge underneath it in preparation for the installation of the next board
12. Continue to install the whole row
13. When the entire row is completed, remove all the wedges and review the row to ensure that there is no gapping and that all locking mechanisms are fully engaged (all boards are perfectly flat)

NOTE: Never hammer boards without using a tapping block as damage to the boards may occur

Finishing

After installing the floor you can immediately walk on it and begin the finishing process. Please allow the floor to settle for 24 hours before heavy objects and excessive foot traffic are placed on it.

1. Remove all the spacer blocks/wedges
 2. Fix the skirting boards over the underlay sticking up from the floor
- NOTE: Never fix the skirting boards to the floor itself – allow for the floor to expand and contract underneath the skirting board**
3. Finish any radiator/floor pipes with silicone
 4. In places where profiles or skirting boards can't be used, fill the expansion with silicone or preferably scotia, to hide the gaps.
 5. Silicone should also be inserted into the expansion at the perimeter where the flooring may be exposed to excess moisture, e.g. dishwashers, sinks, entrance to bathrooms, laundries

Finishing trim

Where the bamboo flooring transitions to another floor type (i.e. carpet, lino, tiles), or meets an outside door or window, use of a 'U-Channel' is recommended. These can be purchased from most flooring wholesalers or hardware stores.

NOTE: A U-Channel allows both the underlay and bamboo flooring to slide into the bar, securing the loose (floated edge) and allowing for expansion and contraction of the bamboo flooring.



Cleaning and care of bamboo flooring

Look after your bamboo flooring in the same manner you would a regular timber hardwood floor.

Caring for your bamboo floor

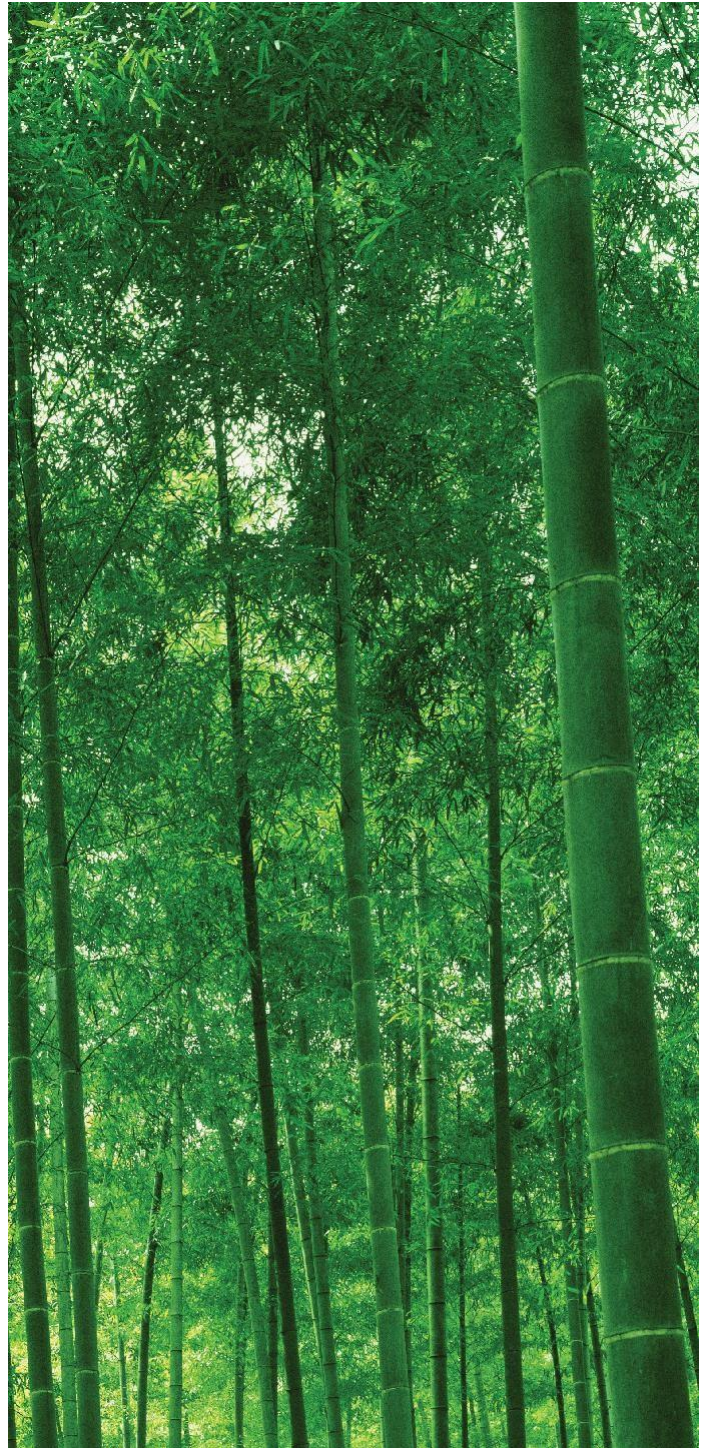
- Vacuum or sweep regularly
- Remove spills promptly
- Place mats at exterior doors to trap sand and grit from incoming traffic
- Install padded felt on furniture feet
- When moving heavy furniture or appliances, always pick up the furniture rather than sliding it across the floor
- Keep pet's claws trimmed to avoid excess scratches and gouges

Cleaning of your bamboo floor

- Sweep up dust with a clean static mop or micro-fibre mop (e.g. Bona Wood Floor spray mop)
- Use undiluted methylated spirits to remove any stubborn stains (red wine, coffee etc)
- Use diluted methylated spirits or Briwax to remove any light marks or scrapes. Put your cleaning products into a spray bottle so that you can control the amount you use

What NOT to do

- Do not let sand, dirt or grit build up
- Do not wet mop or use abrasive pads to clean/scrub floor
- Do not use wax, oil soap, or other household cleaners on your floor. The use of these products can dull the floor finish and make refinishing difficult
- Do not roll or slide heavy furniture or appliances across your floor
- When vacuuming the floor never use a solid head. Always use a brush head on bamboo flooring
- Do not use a steamer on your bamboo floor



Whilst all due care is taken to ensure the accuracy of these installation instructions, individual circumstances (location, subfloor and installation procedures) may vary and are beyond the manufacturer's control

