Think Timber™

Installation Guide





CONTENTS

- 02 Introduction
- 03 Before you begin
- 03 Storage & preparation
- 04 Tools & materials you may need
- 05 Cabinet requirements
- 06 DIY Modular Timber Panels
- 07 Span & overhang support
- 07 Benchtop sizing & cutting
- 08 Sink & cooktop cutouts
- 09 Coating your benchtop
- 10 Joining & installation of benchtops



INTRODUCTION

Think Timber™ surfaces are excellent for kitchen work surfaces as timber is extremely durable and its natural beauty is enhanced with age. Timber is warm and inviting to the touch.

Think Timber™ surfaces are crafted from solid hardwood timber. Staves of kiln dried timber are finger jointed in the length, butt jointed and glued together along their width. When finely oiled, Think Timber™ creates a beautiful water repellent surface that will mellow with age. Simple maintenance is all that is required, occasionally recoating of Cabot's Benchtop Clear will help to maintain the beauty and water resistance of the wood.

As with any high quality benchtops, care should be taken against possible scoring with knives or other cutting tools and chopping boards should always be used. Although accidental damage can be sanded out and then recoating to restore it to its original condition.

Think Timber™ should not be subjected to high temperatures. **Always use a heat pad or trivet** when placing hot pots/pans on the benchtop. Please see our care and maintenance literature for more information.

Think Timber™ wood is a natural, living product and just as no two sets of fingerprints are alike, the same can be said of variations in wood graining and colouring, as no two lengths of wood benchtops will ever look exactly alike. It should be pointed out that the following can occur:

- Variations in colour & graining
- Possibility of knots
- Wood will darken with age
- Wood is water resistant it is **NOT WATER PROOF!**
- Wood grain can lift if subjected to standing water for any length of time
- Remove all spillages immediately

The information contained in this document is provided as a guide for the installation of Think Timber™. No warranty, however expressed or implied, is given in relation to the guidelines in this document.

Before you begin

PLEASE READ THIS BOOKLET BEFORE COMMENCING INSTALLATION OF YOUR BENCHTOPS. SOME OF THE INFORMATION MAY NOT BE APPLICABLE TO YOUR PARTICULAR INSTALLATION, HOWEVER CERTAIN STAGES OF PREPARATION AND ASSEMBLY ARE IMPORTANT, AND SPENDING A SHORT TIME TO REVIEW THIS BOOKLET MAY SAVE TIME LATER.

All modular timber tops are supplied with a paraffin wax coating upon dispatch. The product will need to be sanded down on all faces and edges to allow for a consistent coating and sealing effect. Failure to do this may jeopardize the timber from distortion or bowing. All custom timber tops have been prepared and coated with Cabot's Benchtop Clear finish on all faces and edges. If you choose to modify custom tops, all exposed faces and edges will need to be sealed.

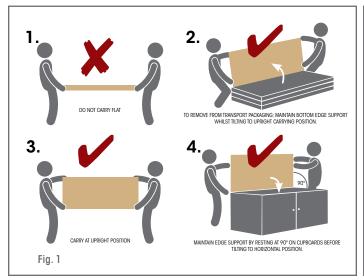
Important notes

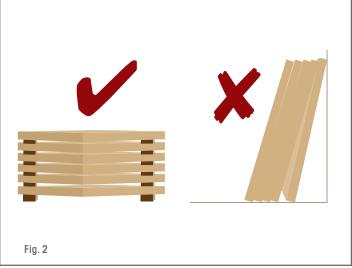
- 1. Installation of the benchtops MUST be carried out by a competent person. If in any doubt, consult an expert for any technical advice.
- 2. Always carry your benchtop on edge (never flat) (see Fig. 1).
- 3. Do not rush your installation. Take time and care during installation to achieve a professional finish.
- 4. Protect your benchtop from damage by keeping all metal tools off the surface during the installation process.
- **5.** For achieving the best installation results, DO NOT store in extremes of temperature or humidity, this may result in the material being adversely affected, causing splitting or bowing. Store in a dry weatherproof room, where the temperature is around 20°C and humidity is that of the room where it is to be fitted.
- 6. Before installing, ensure all sides and edges of the Think Timber™ surfaces are sealed (Cabot's Benchtop Clear). These instructions refer to Cabot's Benchtop Clear as a sealing product.

Storage & preparation

Installation of the benchtops should be carried out as soon as possible after delivery. If storage is necessary, benchtops MUST be laid flat and fully supported in their original packaging (see Fig. 2). Make sure the storage area is indoors, and in a completely dry area. Do not unpack the benchtops unless the room humidity is stable and all cabinets are installed with any debris cleared away.acclimate to their final room environment.

To achieve the best installation results, store your benchtops in a room temperature of around 20°C. This should be for at least 24 hours prior to installation.





Tools & materials you may need

Adhering your Think Timber™ benchtop to your cabinets

- Tape measure
- Spirit level
- Silicone gun
- Slotted angle brackets (optional 4-6 per benchtop length)
- Sanding block
- 150 & 500 grit sand paper
- Straight edge
- · Cabot's Benchtop Clear Satin Finish for any modifications on site
- Brush or roller to apply water based coating

JOINING

- Allen Key
- · Packers or wedges
- Standard benchtop joiner bolts (as required supplied with your custom made bentop order)
- Paintable Silcone Adhesive

APPLIANCE INSTALLATION

- Face mask
- Safety glasses
- Pencil & square
- Jigsaw (used for cutting template board material)
- Router (1800-2300 watts / 2.5-3 hp), (used for cut-outs in Think Timber™ benchtop)
- Sand paper (150 grit, to smooth edges of cut-outs)
- Vacuum cleaner
- Template board
- Thin moisture/heat resistant board
- Router bits
- Cabot's Benchtop Clear

Professional Tip

The operation of sanding and routing will generate dust. The use of suitable dust extraction should be fitted to power tools to remove the dust. A suitable dust mask should be worn to avoid breathing the airborne dust generated by using these tools. There will be airborne dust which can only be cleaned after routing. Sealing doorways etc. to occupied areas is advisable or alternatively do these tasks externally.

Cabinet requirements (incorporating benchtop support)

The design and construction of the cabinets as a benchtop support has a large influence on the successful installation and ongoing performance of your Think Timber™ benchtop.

A suitable benchtop support will minimise the chance of the Think Timber™ surface from warping and bowing under load during normal applications. The benchtop support must be able to hold the Think Timber™ material, which weighs approx 20kg per m2 plus any additional load the top could be subject to. Typical loads applied to benchtops can exceed 100kg per m2.

- Cabinets must be constructed from solid panels 16mm thick (minimum), ensuring the weight transfer from the benchtop to the floor is carried out through each end gable or division (Fig. 3).
- If the cabinets are fitted with plastic adjustable legs, then the base plate design must facilitate a support lug for the
 cabinet end.
- If cabinet spans are greater than 800mm then front cabinet rails should be fitted vertically or additional vertical support added at rear horizontal front rail, to ensure adequate rigid support for the benchtop. The rails can be made from moisture resistant HMR or MDF, moisture resistant plywood or timber and the rail should be at least 50mm wide x 25mm thick.
- Cabinets deeper than 700mm, will require an additional vertical support rail in the centre.
- Where a 50mm vertical front rail can not be installed inlay 25 x 25 x 3mm SHS into the gables behind the front rails.

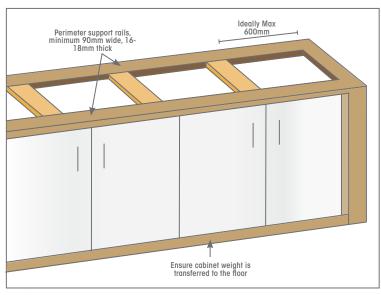


Fig. 3

DIY Modular Timber Panels

Benchtop	Technical Drawing	Description
2405x600x32 (mm) Approx. Weight 36kg	32mm 2405mm	
2400x900x32 (mm) Approx. Weight 54kg	3005mm	
3000x600x32 (mm) Approx. Weight 45kg	3000mm	All timber panels are supplied with a paraffin oil coating to protect them. Please note this coating must be removed by sanding using a 180 grit sandpaper prior to finishing the panels with your chosen coating/ sealing agent (such as Cabot's Benchtop Clear, available separately from your local bunnings store.) The panels will need to be finished on all edges
3600x600x32 (mm) Approx. Weight 54kg	3600mm 3600mm	and sides with your chosen sealant and can be used to make returns or complete benchtop runs.
3600x900x32 (mm) Approx. Weight 81kg	3600mm	

NB: Weight is approximate as there is a variance between species.

Span & overhang support

Spans

Think Timber™ requires a strong perimeter support frame that will keep it level for the useful life of the benchtop. Cabinets that are 600 - 800mm wide provide an ideal base for your Think Timber™ benchtop. If cabinet widths exceed 800mm, then additional support material will be required to strengthen these types of installations, ensuring that it provides a strong and level base for the benchtops to be installed.

Overhang Support

Some applications may require a significant benchtop overhang as a functional element or a design feature such as a breakfast bar or island top. The following chart provides guidelines for designing overhanging benchtop sections to ensure adequate support.

Note: Overhangs beyond 300mm are not recommended.

OVERHANG SIZE 32mm MATERIAL	SUGGESTED SUPPORT
Less than 150mm	No additional support required
Between 150mm & 300mm	Brackets every 500mm and extending within 100mm of the edge
Overhangs not to exceed 300mm	We recommend the overhang to be no more than one third of the
Overridings not to exceed 300mm	overall width up to a maximum of 300mm.

Benchtop sizing & cutting

Preparation

- A vertical rail must be installed between the back of the vertical front rail and the back of the cabinet to support the join.
- Ensure benchtops get an expansion clearance between walls of 2mm for every linear metre of benchtop (i.e. 6mm for 3 metre length).
- Ensure you use a router with a double flute bit to size benchtops. Follow the manufacturers instructions on how to operate this tool.
- Ensure all benchtop joins are a minimum of 150mm away from any appliance cut-out.
- Any cutting work should be done outside as machining Think Timber™ creates dust. Adequate dust controls should be utilised.

Join positioning on cabinets

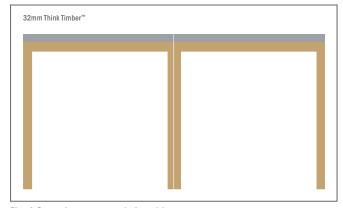


Fig. 4 Strongly recommended position

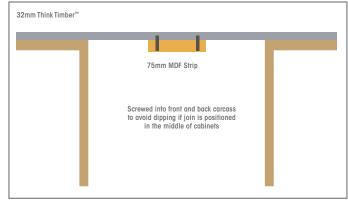


Fig. 5 (not advisable) Join in middle of unit with MDF strip (if recommended position not possible)

Benchtop sizing & cutting (continued)

Scribing Benchtops (if necessary)

The scribing process (Fig. 6) reflects the contours of the wall not the benchtop and is achieved by placing a small block of wood onto the surface and against the wall.

Always remember to add the required overhang to carcass, to take account of the door thickness, also make sure the thickness of any waterfall end (if applicable) is taken into account. Adhere a strip of 50mm masking tape flush with the back edge of the benchtop, this will enable you to see the pencil line that will be produced in the scribing process. A pencil is then placed at the front edge of the block. The block and pencil are then pushed along the length of the benchtop, marking the benchtop as you proceed. Using this method, any deviation in the wall is marked onto the benchtop.

Scribe with a straight flute router bit fitted to router (or planer if available).

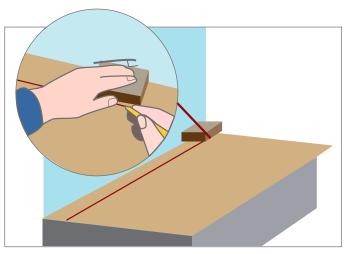


Fig. 6 Scribing to correct depth

Sink & cooktop cut-outs

Step 1 - Making cut-out templates

The use of an accurate template is one of the most essential elements to the successful completion of a cut-out in your Think Timber $^{\text{\tiny{M}}}$ benchtop.

- Ensure the appliance manufacturer's paper templates are used and trace onto the template board materials.
- Use a jigsaw to make the cut-out in the template board material.
- Sand the template board material as smooth and as perfectly shaped as possible.
- Gently position and clamp the template in the exact position of where you require the cut-out.

Step 2 - routing

CAUTION: Use a router to make a cut-out in a Think Timber $^{\text{\tiny{M}}}$ benchtop. Ensure you operate this power tool according to the manufacturer's instructions.

- Ensure the benchtop is properly supported before you commence routing the cut-out, making sure the waste part of the benchtop is supported at all times.
- Once you have the template board clamped into the correct position, plunge the router into the cut-out using a profile router bit similar to that shown in Fig. 7.
- Using the template board as your guide, route in a left to right direction around the template to complete the cut-out.
- Using a 150 grit sand paper, sand the inside edge of the cut-out to remove cutting marks.
- Remove sharp edges at the top and bottom of the cut-out by sanding the edges to an approx. 2mm radius. Apply two coats of Cabbots Benchtop Clear to exposed edges.

Coating your benchtop

Think Timber™ being a natural product will expand and contract and the amount of movement can vary depending on the conditions it has been exposed to which encompasses how the material is both stored and Installed. During storage and subsequent installation; the variables of heat and humidity are the two main factors that affect the degree of movement and steps must be taken to help minimise the effect that changes in these conditions may have.

Ensure that your Think Timber™ Benchtop is carefully stored away from moisture, airstream draughts, extremes of temperature and humidity. The timber must be laid horizontally when stored in original packaging. Do not store timber vertically or leaning against a wall of any type as this will likely result in warp.

The coating on your custom made benchtop

- 1. The Think Timber™ Benchtop components have been sanded to a 600 grit finish and then sealed with three coats of a Food Safe* water based polyurethane in Cabot's Benchtop Clear Satin Finish. Please note that this includes the underside and any cut-out that has been factory prepared which is required to maintain a balance within the timber to minimise movement.
 - *What do Cabot's mean by Food Safe? Although the coating is fully cured within 14 days, Cabot's recommend waiting a minimum 28 days (4 weeks) prior to allowing food to come in contact with coating and therefore the coating would be unlikely to leach anything that is hazardous to health.
 - Once fully cured, the coating will protect the timber against heat and liquid stains such as hot drinks and wine spills. Important: On timber surfaces always clean up spills and stains immediately after occurring to avoid prolonged exposure and damage. However, if not properly cared for and maintained, timber is prone to markings, scratches and discolouration when liquids have not been removed as per manufacturer's instructions. Please refer to the Care & Maintenance Guide
- 2. If further cut-outs or trimming takes place i.e. sink and cooktop cut-outs, check-outs or scribing along walls; the exposed edge must be fully sealed by applying several coats of Cabot's Benchtop Clear as per instruction on side of packaging.
- 3. Please refer to Instruction on side of packaging or Cabot's Benchtop Clear website for additional information for use and how to maintain the optimal finish for your Timber surface: https://cabots.com.au/product/cabots-benchtop-clear.

Cabot's Benchtop clear is available from your local Bunnings stores within the Paint Department.

Professional Tip

Keep your timber surface looking like new. As Cabot's Benchtop Clear is water based it is easy to recoat by applying by brush or roller. It is also fast drying, low odour and clean up is easy. Follow instructions on the side of container.

Joining & installation of benchtops (Custom Made)

Think Timber™ benchtops are supplied pre-machined for joins, typically these will be 90° joins (Fig. 14). All joins are supplied with benchtop bolts for ease of installation (Fig. 15)



Fig. 14 Benchtop bolts insitu



Fig. 15 Benchtop bolts

Upon installation of the benchtop, dry fit the pieces together to double check the alignment and fit. Also make sure the tops are level.

Note: Ensure the edges which are joining meet along the full length. Where benchtops are butted together they can be leveled underneath with thin packing pieces to ensure the top surfaces are level. Note: Properly leveled joins allow a better quality finish.

STEP 1 - Cleaning and preparing joins

Clean the pre-prepared edges with a lint free cloth prior to applying the silicone adhesive to ensure the join will be free of any dirt or grime. If there is contamination on the join, use a 500 grit sand paper to clean lightly.

STEP 2 - Position and fixing benchtops (Installing first top)

Because benchtops need to be allowed to move, holding the top down to its supports correctly is critical. Place 20 cent piece size dobs of silicone every 600mm along the rear & front of the carcass.

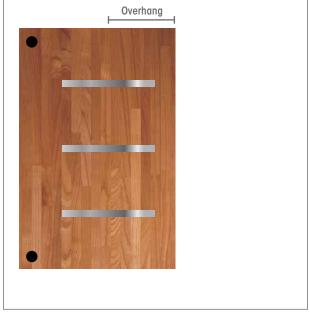


Step 3 - Installing the second/third tops

Minimal mechanical fixing is required as per images and when doing-so ensure that fixing holes are oversized or use slotted angle brackets to allow for likely expansion and contraction of the Think Timber™ benchtop. Always use washers with screws and drill small pilot holes in underside of the Think Timber™ benchtop to avoid splitting of timber. Do not add screws along rear & front of same panel.



L-Shape



Island/Galley



U-Shape



Island/Galley

If using screws through carcass, drill an oversized hole through the top rail (10 - 12mm hole for 8G screw with washer) and secure to the benchtop. Do not over tighten screw. The oversize hole allows for movement of the benchtop.

Step 4 - installing the second/third tops

Joining the benchtops together.

CAUTION: When joining benchtops, ensure the pre-prepared edges are protected from damage when being positioned together.

Join using Silicone which should be applied to the top and bottom edge of the join. Tape each side of join with masking tape to avoid sealant spreading over the benchtops.

Pencil front edge

Think Timber™ benchtops are supplied as standard with a 2-3mm pencil edge.

Insulation and venting of timber benchtops

Do not allow benchtops to touch masonry or concrete surfaces without a moisture barrier. When benchtops are installed over ovens or dishwashers, moisture barriers and/or heat insulation board may be needed. Think Timber™ Benchtops should not be installed over hot air vents from ducted heating units or similar. It is also very important where cupboards have solid tops, to cut away at least 50% of the top panel to allow underside of work surface to breathe and stay in balance with the upper surface.

Appliances

Where 2 appliances are situated side by side, the span must be supported either by a mid panel or a solid timber front rail that is at least 40mm thick.

Once you have completed the installation of all benchtops, you can have your appliances installed by a license plumber and/or electrician.



Fig. 17 Butt joint

For more information, please contact Think Benchtops 1300 366 113 thinkbenchtops@casf.com.au