# Installation Overview Level entry on Timber Standard Shower Bases



# Supported & Fully Supported Methods

UNIVERSAL SHOWER BASE 54 – 56 Elliott Road Dandenong South, VIC 3175

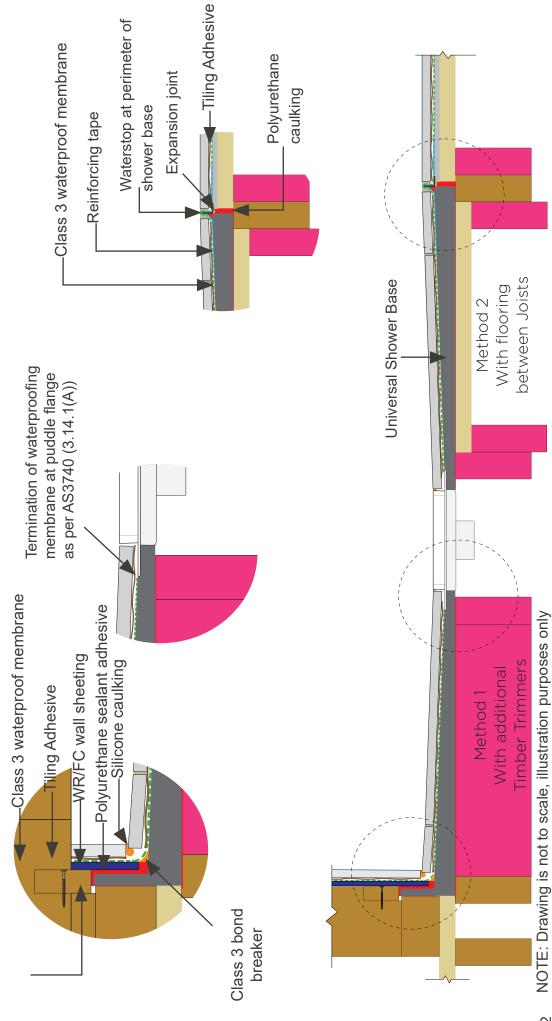
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Installation Overview. Level Entry onto Joists.





### Important Information & Simple checks before proceeding

Please read these installation instructions carefully before proceeding.

SILICONE CAN NOT BE USED TO GLUE BASE DOWN ONLY USE A POLYURETHANE ADHESIVE/SEALANT

Always wear the correct PPE (Personal Protective Equipment) for the task you are doing.

If you are unsure about any part of the installation, please contact our Technical Department on: (03) 9791 8925

All standard and custom shower bases will vary in thickness. The larger the base the thicker it will be, thicknesses range from 25mm to 45mm +/-5mm for standard bases and custom base will be as per quotation or as ordered.

The shower base thickness plus tiles and adhesives will determine your finished height. If you don't trim the lips you will need additional material to create a hob around the shower base to support a shower screen. (We can supply hob material (at additional cost) to suit your shower base, on request hobs being fully compliant with Regulation, Codes and Standards).

Ensure the shower base you have ordered is the right size and outlet type before installation.

Standard shower base guide below

- Centre Waste most shower bases are 25mm but may vary +/- 5mm
- Rear Waste most shower bases are 30mm but may vary +/- 5mm
- Channel Grate most shower bases are 35-40mm but may vary +/- 5mm
  (Please note the channel grate base side would have to stay intact with minimal or no trimming and be more likely to have additional material (hob) to enable shower screen to be placed upon).

#### PLEASE NOTE: REAR AND CHANNEL GRATE BASE ARE THICKER THAN STANDARD FLOOR THICKNESS

Please check the specification drawings which are available for all of our standard sizes on our website www.universalshowerbase.com.au.

Only use adhesives/glues in optimum conditions between 10 °C and 30°C as the product may not perform as intended. Refer to manufactures instructions prior to use.

We recommend to sand the sides of the shower base that will be exposed to the room prior to gluing down to allow better adhesion when caulking between base, hobs and finished floor prior to waterproofing.

Custom made shower bases are excluded for return/replacement if incorrectly ordered.

Deviation from installation instructions could void manufacturers guarantee.

This product can be installed on timber, concrete or steel substrate.

## Installation Level entry onto timber joists

Measure the base thickness before installation:

If you wish to achieve a level entry shower you will need to check the thickness of the shower base before removing the lips and/or installing. Measure the shower base outside wall then the inside wall of shower base, deduct inside measurement from outside to determine thickness of shower base.

#### Please note:

All shower base thickness vary from waste location to size so the larger the base the thicker it will be, thickness range from 25mm to 45mm. If you do not check the shower base thickness you may not achieve the desired level entry, below is a guide only.

Centre Waste - shower bases are 25mm but may vary +/- 5mm Rear Waste - shower bases are 30mm but may vary +/- 5mm Channel Grate - shower bases are 35-40mm but may vary +/- 5mm

To achieve level entry on joists you may need to recess shower base into your subfloor. Floor joists in the

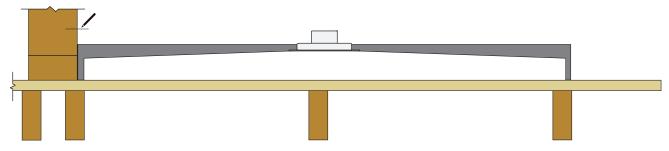
shower area will have to be restructured/configured by your carpenter/builder.

#### Preparing Shower Base Area Centre Waste

Marking floor area for shower base

Turn shower base upside down to mark out the base position on both the floor and wall studs, mark stud at a height of 90mm above the existing floor. Prior to cutting the floor, reduce the perimeter of the cut-out by 8mm

to allow for checkin and caulking gap between base and floor.

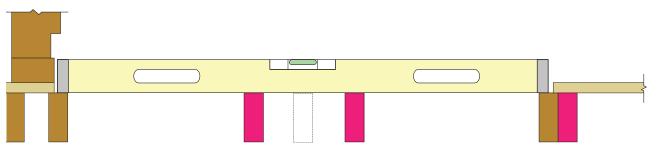


Cut out the flooring and checkout the wall studs and bottom wall plate.

Please note: In accordance with the AS1684

Wall studs to be checked/notched must not be more than 18mm and the bottom wall plate checkout must not be more than 12mm or the upstand thickness of the base.

If the waste outlet is obstructed by an existing joist, re-configuration and additional joists will be required to support the base and floor adequately. This should be completed by a licensed trade's person.



Ensure the area where the base will sit is plumb/level prior to fitting base.

If not, adjust and pack where required when completing additional support set out below. If the floor/substrate that the shower base is installed upon is not plumb and level prior to fixing the shower base it will not perform as intended. This will cause issues with water flow and could ultimately void warranty/claims due to incorrect installation.

# Supporting the shower base Centre waste

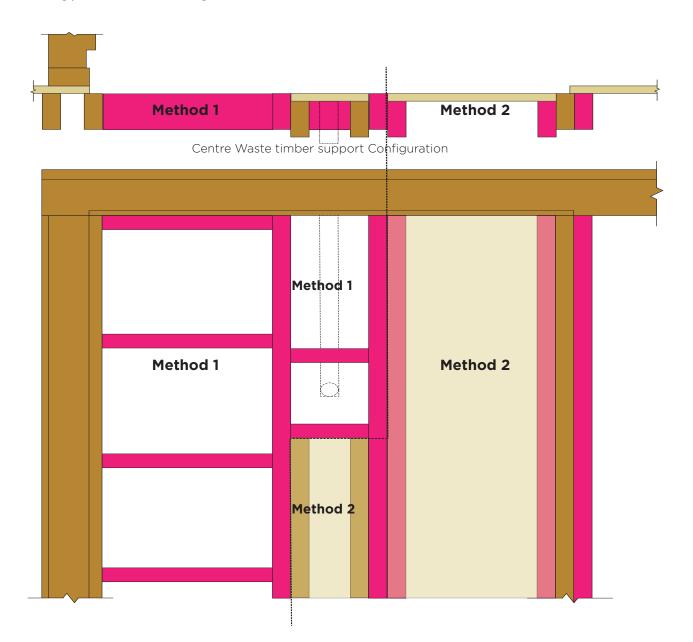
There are two methods you can use to support the shower base, choose one method that best suit you.

Method 1: Self Supporting directly onto joists

Where the shower base is to be fitted, install additional noggins/trimmers between joists at 300mm centers. As per diagram below taking into account the position of waste outlet. Install trimmers/noggins around all edges of the shower base ensuring the shower base and floor is supported.

Method 2: Fully Supported with flooring fitted between joists

Where the shower base is to be fitted, install trimmers/cleats (90mm × 35mm (F17)) parallel to the floor joists. They should be installed at a height equivalent to the thickness of flooring being used, thus being lower than the existing floor joists. Flooring is to be fixed with liquid nails and nailed on top of trimmers between the existing joists. Refer to the diagram below.

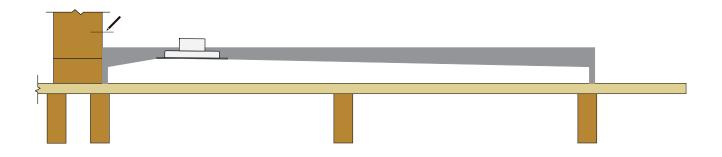


After completing all necessary timber support work for shower base and prior to gluing base into position, ensure plumbing needed to connect up your shower base is in position and ready for connection by a plumber.

#### Preparing Shower Base Area Rear Waste

Marking floor area for shower base

Turn shower base upside down to mark out the base position on both the floor and wall studs, mark stud at a height of 90mm above the existing floor. Prior to cutting the floor, reduce the perimeter of the cut-out by 8mm to allow for check-in and caulking gap between base and floor.



Cut out the flooring and checkout the wall studs and bottom wall plate.

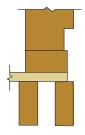
Please note: In accordance with the AS1684

Wall studs to be checked/notched must not be more than 18mm and the bottom wall plate checkout must not be more than 12mm or the upstand thickness of the base.

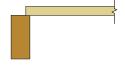
If the waste outlet is obstructed by an existing joist, re-configuration and additional joists will be required to support the base and floor adequately.

You may have to check your floor joists and add addintional supprots or do a set down to acheive level entry.

This should be completed by a licensed trade's person.

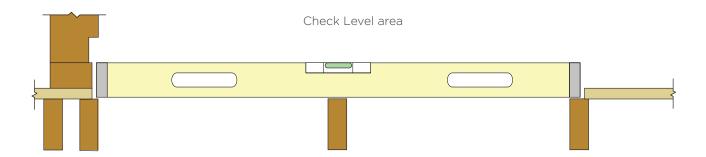






Ensure the area where the base will sit is plumb/level prior to fitting base.

If not, adjust and pack where required when completing additional support set out below. If the floor/substrate that the shower base is installed upon is not plumb and level prior to fixing the shower base it will not perform as intended. This will cause issues with water flow and could ultimately void warranty/claims due to incorrect installation.



# Supporting the shower base Rear Waste

There are two methods you can use to support the shower base, choose one method that best suit you.

Method 1: Self Supporting directly onto joists with additional noggins/trimmers.

Where the shower base is to be fitted, install additional noggins/trimmers between joists at 300mm centres. As per diagram below taking into account the position of waste outlet. Install trimmers/noggins around all edges of the shower base ensuring the shower base, waste and floor is supported.



Method 2: Fully Supported with flooring fitted between joists

Where the shower base is to be fitted, install trimmers/cleats (90mm × 35mm (F17)) parallel to the floor joists. They should be installed at a height equivalent to the thickness of flooring being used, thus being lower than the existing floor joists. Flooring is to be fixed with liquid nails and nailed on top of trimmers between the existing joists. Refer to the diagram below.



After completing all necessary timber support work for shower base and prior to gluing base into position, ensure plumbing needed to connect up your shower base is in position and ready for connection by a plumber.

# Gluing the shower base down

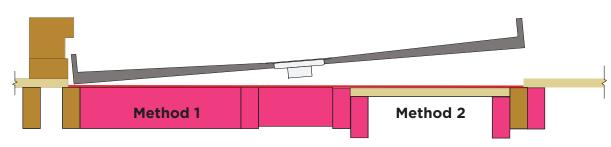
Before gluing base to prepared substrates ensure its dry, dust free and clear of any contaminants.

#### Method 1

Apply "polyurethane sealant adhesive" in a continuous snake-like bead (minimum 10 mm in diameter) to all trimmers, joists. Place base into position without sliding it across adhesive beads. Weight each corner down, using weights no heavier than 5kg per corner and no more than 30kg max, for a minimum of 24 hours.

#### Method 2

Apply "polyurethane sealant adhesive" in a continuous snake-like bead (minimum 10 mm in diameter) to top of joist and flooring at no greater than 75mm apart as illustrated below. Place base into position without sliding it across adhesive beads. Weight each corner down, using weights no heavier than 5kg per corner and no more than 30kg max, for a minimum of 24 hours.



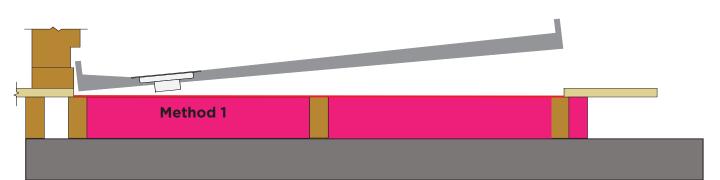
Centre Waste gluing configuration for each method

Method 1	Method 2

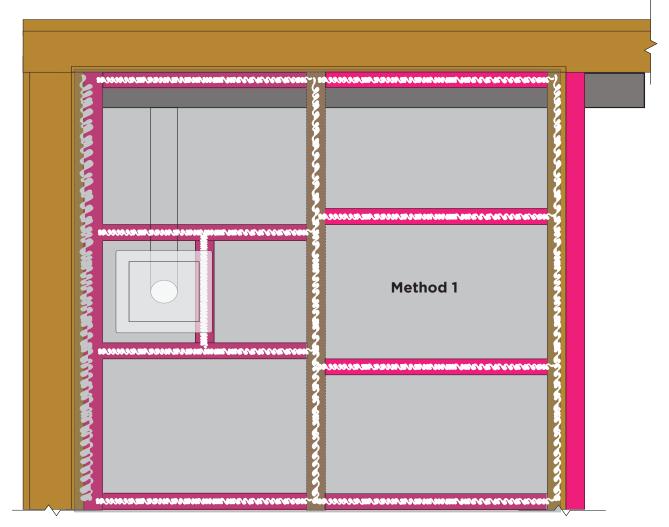
# **Rear Waste**

Rear Waste Outlet timber setout configuration:

Choosing one of the methods below to support your shower base.





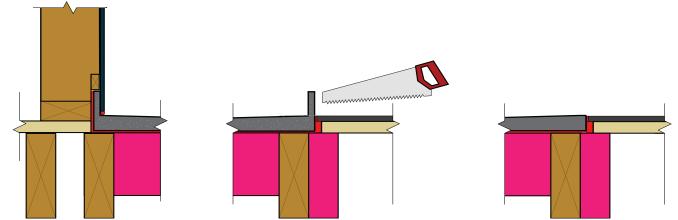


When laying flooring and tile underlay leave 5-6mm gap between base/flooring/tile underlay to caulk with polyurethane. (Do not use silicone). You should have sanded the shower base sides exposed to room as per instruction at simple checks before fitting base.

After tile underlay is fitted, the sides of base not checked into wall studs can be trimmed to achieve desired entry finish.

### Trimming the lips once tile underlay has been fitting to bathroom.

All shower bases come with four lips which can be trimmed/modified according to desired installation requirements by using a multi-tool, handsaw, hacksaw blade, etc.

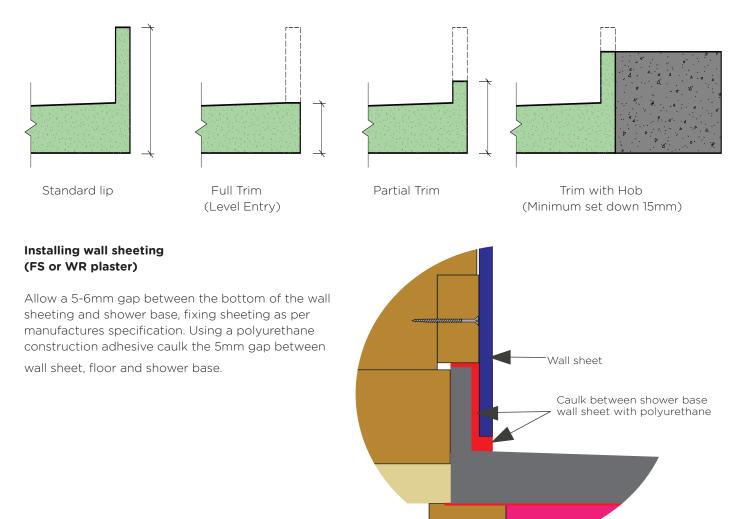


Please note the shower base is manufactured from a water repellent material, so trimming the lips will not affect the water repellent properties or structural integrity of the product.

You must provide water stops within shower/bathroom area prior to waterproofing as per BCA/NCC & AS3740. Speak to your waterproofer, builder for further advice. The use of water stops prevents water travelling any further than the shower or bathroom area.

#### **Trimming options:**

A list of trimming & modification options can be seen below.



# Waterproofing the shower base

Our shower bases are water repellent, however they must be waterproofed to comply with current Codes & Standards/(NCC/BCA & AS3740), this will also allow for better adhesion between tile adhesive and membrane. There is a list of waterproof membranes tested with our shower bases on page 12. Though most "polyurethane" waterproof membranes will be compatible. We recommend that a test patch be completed prior to the full application of your selected waterproofing to ensure adhesion. Contact our technical support for further advice if you are unsure.

#### Notes:

Waterproofing should always be completed by a Licensed Waterproofer to comply with Codes & Standards to attain a Certificate of Compliance for building permit and Insurance company compliancy.

Waterproofing membrane systems used must meet the requirements of AS3740 by complying with AS/NZ 4858.

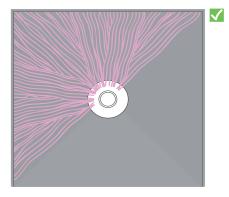
It is recommended to use adhesives, glues and waterproof membranes of the same manufacture to ensure any warranty claims if they arise.

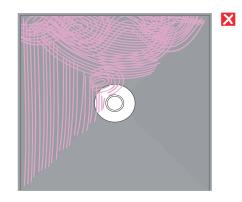
Bond breaker tapes/rods/caulking to be used in conjunction with the waterproofing membrane on all internal angles/corners where the shower base meets the wall and floor junctions to meet requirements of current NCC/BCA /AS3740.

Do not block the leak control/puddle flange outlet with waterproofing. The waterproofing can be stopped at the edge of puddle flange meeting AS3740 requirement.

#### Tiling:

Cut your tiles according to the fall of the shower base. Always trowel glues towards the waste, using the correct tile adhesive that corresponds with the waterproofing system that you have used. By not using the same manufacturer's recommended product they may not honor their warranties if a claim arises. For information on tiling, please contact a professional tiler.





When troweling tiling adhesive, trowel towards the waste outlet to allow the water to drain away. Do no rake across the base.

Ensure you use the correct size notched trowel for your selected tile.

# **Important Information**

#### Very Important Information about leak control/puddle flanges

When tiling a common occurrence throughout the industry is that puddle flanges are blocked with tiling material and/or adhesives. This reduces the ability of the flange to drain water from beneath the tile bed, water forms a reservoir under the tiles (called damming) and constant use sees water travel to any point of exit it may find, so the use of water stops prevents water travelling any further than the shower area.

Tiling and waterproofing must be done in accordance with the BCA/NCC and other relevant standards.

#### Adhesive and grouts

Most cement based products including grouts and adhesives are porous to some extent. This allows a minimal amount of water to penetrate the grout and below the tiles, which is normal and allows the puddle flange to perform as intended to drain water.

#### Water likes to travel

Please remember to always trowel glues towards the waste do not rake across the base. Do not block/fill the puddle flange with tiling adhesives, grout or silicones. Any water absorbed into the grout or that travels through the tile bed, needs to drain down the waste outlet.

#### Notable standards to consider

AS1684 Residential timber framing construction - All parts AS2870 Slabs and footings AS1860/1860.2 Particleboard flooring/installation AS2269 Plywood - Structural AS3740 Waterproofing of domestic wet areas AS3958 Ceramic tiles - All parts Standards & Tolerances 2015 http://www.vba.vic.gov.au/\_\_data/assets/pdf\_file/0020/29063/Guide-to-Standards-and-Tolerances-2015.pdf

#### **Recommended Waterproofing Products**

The following membranes have been used and tested with our shower bases.

These are all Class III Membrane, as per AS/NZS 4858 Wet Area Membranes.

Crommelin Shower Waterproofing Membrane (refer to manufacturer's instructions)

no primer require with this product.

ASA Dampfix Gold.

Davco K10 Plus used in conjunction with Sikalastic Moisture Seal.

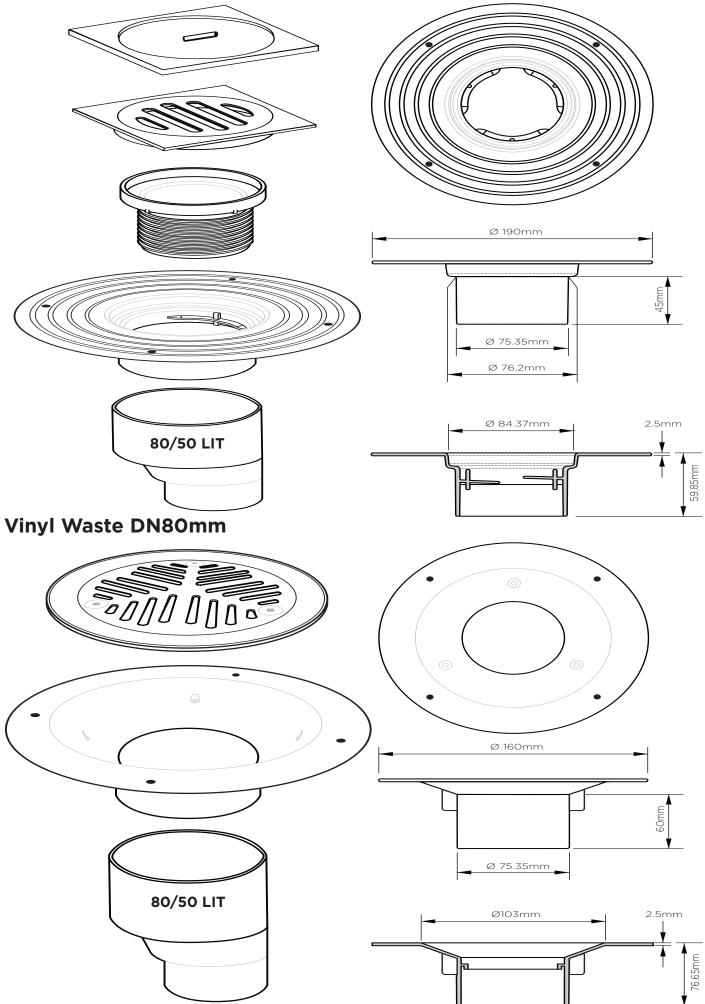
Ardex WPM 155 Rapid used in conjunction with WPM 300 Primer

Always refer to manufacturer's instructions prior to use.

#### **Recommended Polyurethane Adhesive/Sealant**

Bostic Seal "N" Flex FC Sikaflex 11FC Sikaflex 291 Sikaflex Pro will need 24hrs per 3mm cure time (72hrs before you can walk on base) Selly's Liquid Nails DIRECT STICK or HIGH STRENGTH (To be used with timber substrate only).

# Twist Top Puddle Flange DN80mm Chrome Grate (TTPF)



# **TCI Smart waste**

