

# INSTALLATION INSTRUCTIONS FOR DURAFENCE



## Important:

Please read all the instructions prior to starting the set out of your wall. Setting out the wall accurately and correctly will be the difference between a good and great result.

The recommendations detailed in this guide produced by DURAFENCE are formulated along the lines of good building practice. They are not intended to be an exhaustive statement of all the relevant data. Further, as the success of projects depend on factors outside the control of DURAFENCE (e.g. quality of workmanship, particular design, detail requirements, etc.), DURAFENCE accepts no responsibility for, or in connection with, the quality of the projects or their suitability when completed.

If you are in any doubt please seek independent advice or contact DURAFENCE.

We are always happy and available to answer questions regarding installation no matter how small or silly you think they may be. Technical and installation advice is available on TOLL FREE 0800 333 440

## STEP 1



Check your order is correct and begin unpack:

After checking your order is correct, start first by unpacking at least two of the posts, two of the rails and four of the fixing brackets/screws (store the unwrapped alloy components on a soft surface to prevent scratching) and one pack of the boards.

## STEP 2

Determine your posthole depths & centres:

Accurately determine the boundary line to where the wall will be installed, (in some cases a surveyor may be required) mark this with a string line at a recommended 200-300mm off the ground.

Determine your posthole centres using the table below as a guide and mark out your posthole positions on the ground with line marking paint or similar. We recommend you plan your wall set out / post position on a piece of paper first to save any unnecessary digging!

Postholes can be dug by hand or with a mechanical auger. We recommend a minimum of 500mm post hole depth.

FENCE POST 2500MM LENGTH	POST HOLE DEPTH MIMIMUM 500MM
FENCE POST 1700MM LENGTH	POST HOLE DEPTH MINIMUM 400MM

Note:

- You can cut DURAFENCE FENCEBOARDS down to a different measurement or to fit between posts that you have decided to space at different centres. Use any type of wood saw but we recommend using a bench, circular or drop saw. However, you will then also be required to cut down the aluminium top and bottom rails.
- IT IS VERY IMPORTANT to insure that when the boards are slid down the channel into position that there is at least 3mm gap between the end of boards and the channel wall. IT IS MUCH EASIER AND TIME SAVING to take this into account when considering post spacings. This is to allow for expansion/contraction of the boards. If the boards are fitted tight against the channel wall the boards may bow as they expand in different weather conditions. If the boards are fitted and for whatever reason you cannot move the boards 2-3mm to the left or to the right you will need to take out and cut the boards down individually.
- Cut the ALUMINIUM by hand with a hacksaw using a coarse toothed blade 12-10 teeth per inch and kero for lubricant. Nothing will give a better cut than a drop saw with a proper aluminium cutting blade but the blades can be expensive. Use a lanolin spray as lubricant.

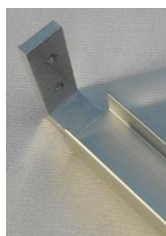
### STEP 3

#### Fix brackets to rails:

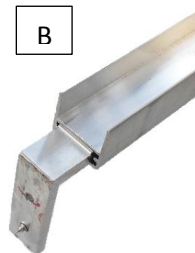
After you have determined the length of the rails it is prudent at this early stage to fix the 'FASTENING BRACKETS' to the rails. This will allow you to have the rails ready to help you when checking the spacings between posts.

Decide if you want the bottom rail closer to the ground than 60mm. If you do, then you need to reverse the bracket into the rail as per image 'A'. However we recommend installation as per image 'B' which allows a 60mm gap between ground and bottom rail. After you have determined the right way up tap the brackets into the rail with a hammer or a rubber mallet. It is important that you double check the lengths you need the rails to be before fitting the Fastening Brackets, as once tapped into the rail channel they are fitted very firmly and not designed to be pulled out.

A



B



## STEP 4

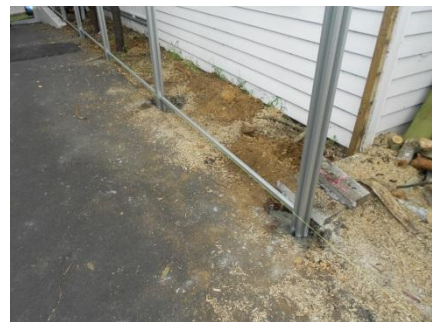
### Cut Post Infills to length:

The aluminium Post Infills come in the same lengths as the posts that you will have bought. So if you are using 2500mm posts you will have 2500mm lengths of the Post Infills. If you are putting the 2500mm posts into the ground 500mm deep then you should cut 500mm off the Post Infills. You only need the Post Infills to cover post channel that is above the ground. You will use those offcuts in STEP 8

## STEP 5

### Post fitment and alignment:

Fit the 'brackets' to both the top and bottom rails unless you have already completed as in STEP 3. You can use one of the rails with the brackets fitted as a spacer to determine the next post position. Once the post is in the hole fit the 'bottom rail' between the two posts following directions in STEP 6. This will then give you the correct post spacings plus a surface to get a level from that will determine the next posts height. Repeat this for all posts. The last panel may be trimmed to suit a specific post centre. *TIP: From our experience we have found that temporarily fitting the rails top and bottom keeps the posts correctly spaced and aligned while concreting the posts into position. Note – You are not necessarily fitting the rails to their final position at this point – they are just acting as spacers and they can be moved to their correct position once concrete has set off.*



Working to a string line on the face of the post, insert the first post into the hole. Once satisfied with the post alignment using a spirit level, pour concrete into the hole gradually. Be careful that the post does not move with the force of the concrete entering the hole. Check the post alignment with a spirit level constantly while the concrete is being poured in. Make sure you keep the posts parallel while setting the posts and before the concrete sets off.

We recommend using bagged quick set / post hole concrete mix or similar unless you are quite capable of working with wet concrete. Wet concrete makes vertical height adjustments very hard as the post will keep wanting to sink and has the potential to be bumped and easily moved while the wet concrete is setting.



## STEP 6

### Attaching the Rails:

Once you have determined the correct height for the 'bottom rail' position the brackets inside the post channel and drive in a (one) self-tapping screw as supplied. *Note: We supply Hex Head size 12-14 x 30mm Self Tapping screws. You will need a 5/16" Hex Socket for driving. Although these screws are 'self-tapping' we recommend making a pilot hole into the post first. You will only require one screw per fixing bracket and make sure you alternate upper or lower hole in the bracket when fixing to insure your screw does not collide with screw from other side bracket. Do not use high tension on the clutch of the power drill...use just enough to insure the screws drive up without the clutch slipping. This is to insure you do not weaken/sheer the head off the screw.*

It is important to insure that the bottom rail is level and at right angles to the posts so that the fence boards will fit flat into the bottom of the rail. Attach the brackets into the posts with the screws supplied (caution should be taken not to over tighten and strip the screws). Use the same process to attach the 'top rail' once the fence panels are in place.

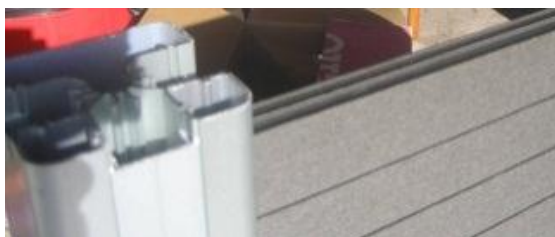
## STEP 7

### Inserting the fence boards:

The boards have a 'tongue and groove' profile. Make sure the 'tongue' is facing up before sliding the boards down the post channels. Choose which side you want facing in (pin-stripe as per image 'A' or smooth as per image 'B').



The boards must be guided down at an even rate or they might jam (remember there should be a 3mm clearance at each end and if you have installed the bottom rail with the bracket facing up the post you will need to trim the bottom board down enough to clear the bracket and screws).



## STEP 8

### Finishing:

Once all the boards are in place fit the top rail snugly over the top fence board. Drill and screw the brackets to the post.



Now you will have an exposed section of post channel from where the 'top rail' meets the post to the top of the post. Cut pieces of the 'post infill' to size to fill that space. Clip it into place and that will also cover the where the bracket was fitted.

Last but not least – fit the Post Caps. The aluminium caps can be tapped on with a rubber mallet or carefully with a hammer. The plastic caps should be glued on (if unsure of type of glue please call us on the toll free number).

