



DIYmodify Factsheet

CHOICES for GRAB RAILS

Grab rails come in a range of different shapes, colours and sizes. Your new grab rail does not have to look like one from a hospital. It also does not have to comply with Australian Standards for diameter or height if it is being installed in your home. This DIYmodify Factsheet looks at the following topics:

- Diameter of grab rails.
- Slip and texture of grab rails.
- Height for straight grab rails:
 - Toilet grab rails
 - Shower grab rails
 - Bath grab rails
 - Entry grab rails
- Heights for angled grab rails
- Heights for drop down grab rails

All the different types of grab rails are explained here in detail.

You will need to work out:

- The diameter of your grab rail,
- The direction it should go in if it is a straight grab rail or a temporary one; and
- The length it should be.

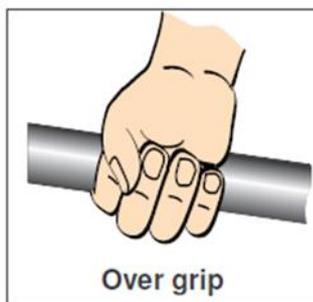
You will also need to find out what the wall you are putting your grab rail into is made of, so you can buy the most suitable fixings and know how to fix it safely.

DIAMETER OF GRAB RAILS

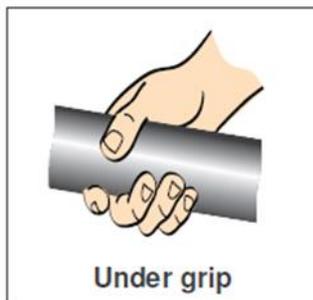
There are standard diameters for grab rails and you should choose one that fits your hand comfortably. Your hand should go right around the grab rail and be in contact with it the whole way around. Being able to hold onto the grab rail strongly and firmly is important.

The most common diameter is 32mm. This is the one used in public areas. There are grab rails in diameters ranging from 28mm to 40mm.

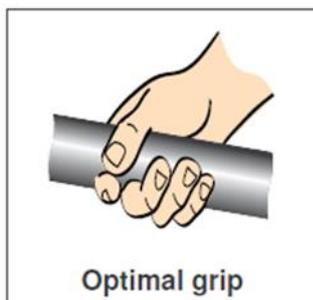
Check how the grab rail feels when you are holding it. The diagrams below show how far your hand should go around the grab rail. Your fingers should just touch each other.



The grab rail is too narrow. Your fingers go right around and overlap into your hand. It will be hard to hold onto it properly.



The grab rail is too large for your hand. Your fingers can't get around it properly and could slip off.



The grab rail fits comfortably in your hand.

The right fit diameter grab rail lets you get a good grip no matter what you are doing, without feeling too much tension in your arm or shoulders.

There are standard lengths of grab rail: 300mm, 450mm, 600mm, 750mm, 900mm and 1200mm.

Choose the length that fits the spaces between your studs if your house is stud framed. You can check where the studs are by using a stud detector.

SLIP and TEXTURE OF GRAB RAILS

Your grab rail should be:

Slip resistant – you do not want your grab rail to be too slippery because it will be harder to grip it strongly. Remember that when your grab rail is wet, it will become more slippery. Over time as well there will be a build-up of soap and natural oils from your skin and the grab rail will become more slippery. Remember to wipe your grab rail down regularly with a damp cloth to clean it.

Comfortable – choosing the right texture for your hand rail is important. As a smooth surface will be more slippery than a textured one, however, you don't want your grab rail too textured and rough because it might hurt your hand.

Grab rails come with different finishes. It is best if you can go and test out the different finishes, so that you can determine which one feels most comfortable for you. Most grab rails are in smooth chrome finish although you can get them in colours or powder coated. Grab rails can also be made out of stainless steel, aluminium, brass and plastic.

TIP: Stainless steel is best to use for your grab rail in the bathroom or anywhere else it gets wet. You can test if it is stainless steel or not by putting a magnet near it. You might have a magnet on your fridge. Stainless steel will NOT attract magnets.

TIP: For anyone with a vision problem, it can be a good idea to have the grab rail in a colour that will stand out against the colour of the wall, making it easier to see.

HEIGHT FOR STRAIGHT GRAB RAILS

The best height for your straight grab rail will depend on what type of grab rail you are installing and where you are installing it.

Your grab rail should be at a height that suits you. Install your grab rail so you can easily get hold of it. Start with the heights given below and then raise or lower them to suit you – make sure it is comfortable for you and that you can reach it easily – you don't want to have to overstretch.

Do not have the grab rail too close to the wall, so that you cannot get your whole hand in and around it. The Australian Standard says to leave between 50 - 60mm. Make sure the grab rail is clear of any other items, so that you do not grab them by mistake. The Australian Standard says to have 600mm clear around it, above it and below it as well as in front or behind it. Temporary grab rails can be installed at the same height as those explained here.

GRAB RAILS FOR SITTING AND STANDING OR STEADYING YOURSELF AT THE TOILET

Grab rails can help you sit or stand at the toilet and can be fixed horizontally, vertically or at an angle. If you are unsure as to what might suit you best, ask an Occupational Therapist or someone who knows about grab rails.

Always make sure the grab rail has been fixed firmly into the wall or studs and that it will not move or pull out as you use it.

Regularly check that it is still firmly in place.

Horizontal grab rails

Horizontal grab rails help you to stand up from sitting, for example from the toilet or from a chair. They help you balance while you are standing, for example in the shower or drying yourself after your shower. The height and position you put it in will depend on the length of the grab rail. A 600mm long horizontal grab rail should be at about 680mm above the ground. Test it out if you can. You might want to have it a little lower or higher than this. The grab rail should start about 400mm from the wall behind the toilet.

Vertical grab rails

Vertical grab rails can help you pull up from sitting to standing if you have strong arms. A vertical grab rail can help with climbing a single step. If you are a man, it might help you steady yourself while standing at the toilet.

A vertical rail should be placed about 300mm in front of the front of the toilet, so that you can reach it easily when you are sitting down. If you have your arm bent by your side as though you were resting on a railing, the grab rail should start about 50 – 70mm above this height.

Before fixing the rail(s), sit on the toilet and check you will be able to reach it easily. You should not have to lean sideways or forwards too far to reach the rail.

Inclined grab rails

You can also fix a straight grab rail at an angle. A 15 degree angle sloping up and away from the toilet might be best for you. This way you can rest your arm on the grab rail as you move to stand up.

GRAB RAILS FOR HELPING YOU STAY STEADY AND BALANCED IN THE SHOWER

A grab rail can help you get up and sit down on a shower chair in the shower.

A grab rail can also keep you steady and balanced while you are showering or give you something to grab onto if you need it.

Horizontal grab rail

A horizontal grab rail can be fixed next to where your shower chair will be. It should be fixed about 200mm above the height of the chair you are using. You can hold onto the rail while you are showering and it will help to make sure you don't fall off.

A horizontal grab rail could also be fixed on the wall opposite your shower chair to help you get up or down into the chair. This grab rail should be a height of about 1000mm above the floor of the shower.

Vertical grab rail

A vertical grab rail can be fixed at the shower entry to help you get in and out of the shower and so you won't trip. It can help you steady yourself.

BATH GRAB RAIL

Grab rails can help you get into and out of a bath. You will usually need to have both a horizontal grab rail and a vertical rail to help you get in and then out of the bath.

A horizontal rail will need to leave enough space for you to get your fingers around it. Fix it about 75 – 100mm above the top edge of the bath. You also need to leave space around the bath taps about 200mm.

Check what feels most comfortable for you and test where you should fix them.

ENTRY GRAB RAIL HEIGHT

You can use a straight grab rail fixed vertically to help you get up and down a single small entry step. Check where and how this will best suit you. In most cases the bottom of the grab rail will not be attached about 790mm above the floor of the higher floor. You should fix the grab rail in a place where you can keep holding onto it even once you have gone through the door.

HEIGHT FOR ANGLED GRAB RAILS

These are more difficult to locate as they are in one piece and often will need to be fixed on two walls next to each other.

HEIGHT FOR DROP DOWN GRAB RAILS

Check at which height the top of the drop down grab rail will be most comfortable for you. It should be fixed at about your waist level or your elbow level.

If the drop down grab rail has a leg that also helps steady it and will carry your weight, you will need to make sure that the grab rail is fixed so the leg is in its locked extended position.

TIP:

HMinfo has some more good information on grab rails.

Look at:

[Consumer Factsheet: Looking at Installing Your Own Grabrail? Here are some issues to consider.](#)

[Industry Factsheet: Selecting Diameters for Grabrails.](#)

[Industry Checklist: Selecting Diameters for Grabrails.](#)

[Evidence Based Research: Selecting Diameters for Grabrails.](#)

[Evidence Based Research: Effectiveness of Grabrail Orientations During the Sit-to-Stand Transfer.](#)

Once you have decided what type of grab rail you are putting in, you will need to know about the wall you are fixing the grab rail into. The wall must be strong enough to hold the grab rail and your weight so the fixings you use must also be strong enough. If your home is made with a timber stud frame, you need to find out where they are and fix the grab rail into the studs. If your home is made with steel studs, you need to strengthen the frame, with blocking or similar, so it remains strong enough to carry your weight.

You may need special fixings to make sure the grab rail is held securely and will not fail. The fixings must hold the grab rail at each stud both top and bottom, as well as if possible on each side. Look at the diameter of the flange of the grab rail, so you know how wide and high your studs should be before fixing it.

Check with your local hardware shop or handyman which are the best fixings for your grab rail in your home.

***This information was correct at time of printing.*