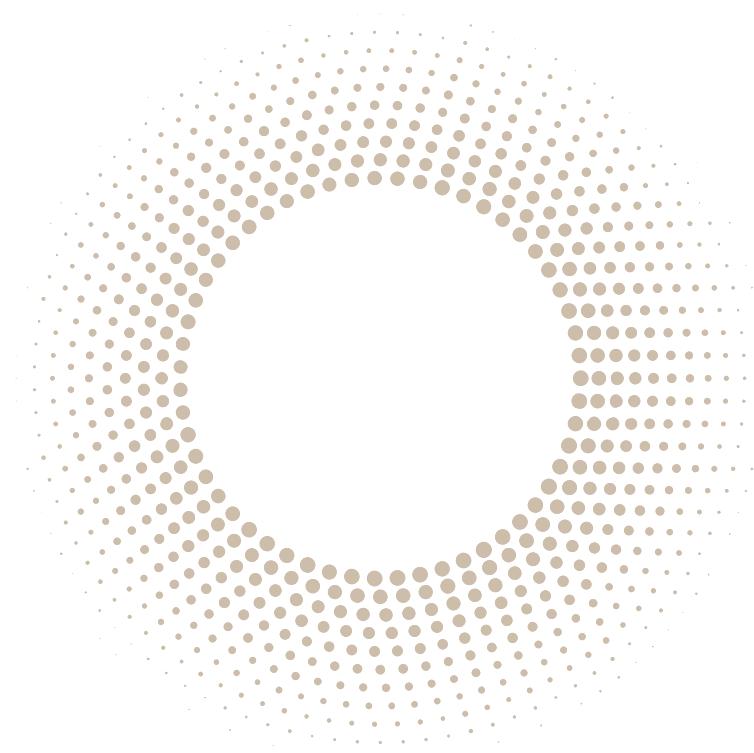




DR KRISTIAN VAN MOURIK

ORAL & MAXILLOFACIAL SURGEON



# DENTAL IMPLANTS

A COMPREHENSIVE GUIDE

# Dental implants

Dental implants	2
Why replace a missing tooth with an implant?	3
Am I a candidate for a dental implant?	4
Planning your implant procedure	5
Dental bone and soft tissue grafting	6
Implant surgery procedure	7
Recovery and care after the procedure	9
Possible complications of dental implants	10

**Dental implants look just like normal teeth and they are the most permanent and long-term solution to replace missing teeth.**

Tooth implants can replace a tooth or a number of teeth that you have lost due to injury, disease or decay.

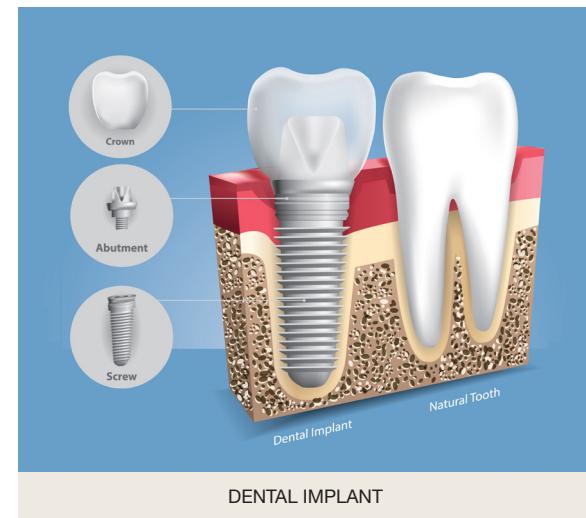
**There are 3 parts to a tooth implant**

**A titanium screw** which is implanted in the bone of your jaw and replaces the root of your missing tooth. The screw fuses (osseointegrates) with the bone, forming a strong and stable platform for the replacement tooth.

**A small metal post** (or abutment) which joins the screw to the artificial tooth.

**An artificial tooth** (or crown) that fits over the screw and is shaped like your missing tooth.

If you want to replace your denture, or you have lost several teeth in a row, you may need a bridge with a titanium implant on either end and a row of artificial teeth (attached to each other) bridging the gap.



This guide is for general information only. Dr van Mourik will assess you individually, and recommend treatment which is most appropriate for you.

# Why replace a missing tooth with an implant?

## It looks better

Dental implants look and feel like a natural tooth. Even if your missing tooth is not in the front of your mouth there is good reason to replace it. This is because bones are similar to muscles, if you don't stimulate them, they will shrink. When lost teeth are not replaced, your biting forces decrease and therefore your jaw bone diminishes. This can lead to a shrunken, prematurely-aged appearance.

## It is more functional

When a tooth is missing, the opposing and neighbouring teeth can start to move. This can make eating and talking difficult. It can also lead to bite problems and jaw pain.

## It protects other teeth and maintains jaw health

If a tooth is not replaced, the remaining teeth have increased wear and are more likely to have problems. Dental implant placement also prevents deterioration of your jaw bone by improving biting forces. This leads to healthier stronger jaws.



# Am I a candidate for a dental implant?

If you have lost one or more teeth and you want a long-term solution, you may be a candidate for a dental implant.

Before Dr van Mourik can recommend implants, there are several questions that need to be answered:

- Do you have adequate bone volume and density in your jawbone?
- Has your jaw stopped growing? It usually stops growing in your 20s, but until this happens you will not be able to have an implant.
- Do you have good general health? Certain chronic diseases including diabetes, haemophilia, arthritis, connective tissue disease, immune deficiencies, cancer and some heart conditions can affect the outcome of your implant surgery.
- Are you taking medicines? Some medicines can affect whether or not an implant can be placed. For example, steroids may suppress your immune system and bisphosphonates, used for osteoporosis, can slow down bone regeneration.
- Do you have good oral health? Poor oral health and active periodontal disease can increase the risk of implant failure.
- Do you chain smoke? Implants are not recommended if you smoke. Some other lifestyle factors can mean that implants are not recommended.

Because Dr van Mourik is both a dentist and a medical doctor he can assess your overall health as well as your dental health so that you get the best possible implant outcome.

# Planning your implant procedure

## For your implant to be stable, you need enough healthy bone in your jaw.

Detailed planning ensures your implant is placed in the part of your jaw with the most appropriate bone volume and density. This leads to optimal implant success.

### Cone beam x-ray and 3d modelling

As part of planning your procedure, Dr van Mourik will request you do a cone beam x-ray. He scans this into a computer to generate a precise 3D model.

If the imaging shows that there is not enough bone to hold an implant, bone grafting may be recommended to increase the amount of healthy bone in the area. If little bone remains in the upper jaw and bone grafting is not possible, zygomatic implants can be placed into your cheekbones (zygoma).

### Virtual surgical planning

Depending on your anatomy and the quality and quantity of bone, Dr van Mourik may then use virtual surgical planning. This involves making a customised computer-generated guide for the surgery.

## How long does the whole implant process take?

Getting a dental implant usually requires multiple visits over several months because the titanium implant needs time to heal and integrate with your jawbone before the artificial tooth can be attached.

# Dental bone and soft tissue grafting

## Bone grafting can make your jaw strong enough for an implant

For your dental implant to be stable, you need to have enough healthy bone in your jaw. If you lost a tooth some time ago, the bone in your jaw may already have deteriorated. Likewise, if you have had an injury, a tumour or there is a bone defect you were born with, you may not have enough healthy bone to hold the dental implant in place.

In this case, Dr van Mourik may recommend bone grafting to increase the amount of healthy bone in the area.

To add extra bone to the implant area, bone may be harvested from another part of your jaw or from your hip bone. Synthetic or animal bone graft material can also be used.

There are two types of bone grafting techniques:

- Simultaneous implant placement and bone grafting: when bone loss is moderate, grafting and implant placement can be done at the same time
- Staged bone graft: in some cases of severe bone loss, the graft is first done and after several months of healing the implant is placed.

### Soft tissue grafting corrects receding gums

If you have receding gums, you may need to have soft tissue grafting before your implant surgery. Otherwise the implant would be partly exposed. Gum tissue is grafted from the roof of your mouth or a nearby area of healthy gum. Once this has healed, usually in a couple of months, you are ready to have your dental implant.

# Implant Surgery Procedure

## Anaesthesia

Dr van Mourik will discuss the options with you and the choice of anaesthetic will depend on the number of implants being placed, the difficulty of the surgery, your general health and your personal preference. If you have had a reaction to an anaesthetic drug please advise Dr van Mourik.

### Local anaesthetic

This is an option if the surgery is simple. The local anaesthetic will numb your teeth, gums and parts of your nose and jaw. Local anaesthetic procedures are performed in Dr van Mourik's private surgery.

### Intravenous (IV) sedation

You may benefit from a sedative drug administered into a vein during local anaesthesia. It makes you feel sleepy and relaxed. If your procedure is done with IV sedation, it will be performed in Dr van Mourik's private surgery.

### General anaesthetic

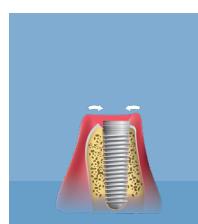
You can have your implant procedure performed in an accredited private hospital with general anaesthetic administered by a specialist anaesthetist.

## Implant Surgery Procedure



### Damaged tooth removal

The damaged tooth is atraumatically removed to minimise damage to surrounding bone. This can be done at the same time as implant screw placement or beforehand. Gum is opened, jawbone is prepared and if necessary, bone grafting is done.



### Implant screw inserted

The implant screw is inserted into jawbone. A healing cap is then placed on the screw, and gums are closed with sutures.



### Abutment attached to the implant screw

Approximately 3 to 6 months after the implant screw has been inserted and has fused with the bone, a metal post (abutment) is attached to the screw. This procedure is quite quick, done under local anaesthetic in Dr van Mourik's private surgery and involves little discomfort. This post will be used to support your artificial tooth.



### Artificial tooth attached to the abutment

Once the abutment has been placed, the artificial tooth is attached by your referring dentist.

## Single stage procedure

If you have adequate bone in your jaw, a single-stage procedure may be possible. This is when the abutment and artificial tooth are placed at the same time as the implant screw. The advantage is that you may get a temporary crown right away and the final implant procedure will be completed faster.

# Recovery after the procedure

If you have had general anaesthetic or intravenous sedation for your tooth implant surgery, you should not drive, operate machinery or make important decisions for at least 24 hours. If done under local anaesthetic, you can drive home yourself.

Dr van Mourik will give you detailed post-operative instructions during your initial consultation. To maximise your chance of making a quick recovery without complications, please pay careful attention to these instructions.

## Work/School

Most people return to work one day after their implant surgery, while a few have to take more than a day or two off.

## Pain management

Normal painkillers such as Nurofen® and Panadol® are usually all you will need. An icepack can help reduce any swelling or pain.

## Diet

A soft food diet is recommended for 1 to 2 days after surgery. By 1 to 2 weeks you will most likely be eating and drinking normally.

## Oral hygiene

Cleanliness is crucial to the success of your implant procedure. Your implants, artificial tooth, gums and teeth must be thoroughly brushed and flossed every day so they stay free of dental plaque. Attention to cleanliness will improve the chances of long-term success.

# Possible complications and side effects of a dental implant

It is unusual to have complications if a skilled oral and maxillofacial surgeon performs your dental implant operation. However, all surgeries have some potential risks and complications. The risks are higher if you:

- Have poor general health including diabetes and/or immunosuppression
- Smoke
- Have poor oral hygiene or periodontal disease
- Have had radiotherapy to your jaw
- Are taking particular medications such as steroids or medication affecting bone generation

**Dr van Mourik makes every effort to minimise risk. Most people having surgery will not have any complications.** He will discuss the risks with you to make sure you are well informed before any surgery is performed.

If you are concerned about any potential risk or complications, please discuss your concerns with Dr van Mourik. The risks of dental implant surgery include:

**Pain and swelling.** Can be present for 1 to 2 weeks after the surgery.

**Inflamed gums (gingivitis).** Is usually caused by poor oral hygiene.

**Infection.** Is generally treated with antibiotics and improved oral hygiene.

**A loose screw.** If the implant screw does not fuse with your jaw or bone resorbs over time, the screw can fail and you will need to have the procedure redone after the bone has healed.

**A loose post (abutment).** Sometimes the metal post that fits into the screw comes loose. If this happens it can be tightened or replaced.

**The artificial tooth (crown) fractures or chips.** If this happens, the artificial tooth may need to be replaced.

**Injury to a nerve.** It is possible for a nerve to be bruised or injured during the procedure, resulting in numbness, pain or tingling in your mouth and face. It usually heals by itself but occasionally it can be permanent.

**Perforation of nasal sinus.** Occasionally the tip of an implant may reach into the nasal sinus floor. This may cause an infection which can usually be controlled by antibiotics.

**Gum overgrowth (hyperplasia).** This can occur along the gum line of the implant crown. It can be unsightly, tender and may require surgery.

**Damage to nearby teeth.** There is a small chance that a tooth next to the implant can be affected and may require a root canal, filling or extraction.

**Speech difficulties.** A few people report speech difficulties after an artificial tooth is placed. If this persists, speech therapy may be recommended.

**Fracture of the jaw bone.** Occasionally implant surgery can cause a jaw bone to fracture. This may require further treatment.

**Swallowing an implant component.** Inhaling or swallowing a small implant component may occur. To recover the item surgery may be needed.



## CONTACT US

---

DR KRISTIAN VAN MOURIK  
(02) 9416 4809  
SUITE 5, 12-18 TRYON ROAD LINDFIELD NSW 2070.