Gentle MIMI® Implantation with First-Class Dental Implants

... and You Cam Smile Again

- Innovative
- Has proven successful for 25 years
- Painless
- Cost reduction up to 50% compared to classical implantation procedures
- Can be immediately loaded







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1. Edition

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It is nice for all age groups to have their own teeth and to be able to eat properly – but unfortunately, few people keep all their teeth for their whole life.

In addition to purely aesthetic reasons for a prosthodontic treatment for a dental gap — as perfect teeth play a role in a well-groomed appearance in society — there are tangible medical reasons for a prosthodontic restoration. In fact, one should consider the dentition as a whole. Of course, the dentition includes the upper and lower jaws as well as the jaw joints, the muscles, and the ligaments, which support the lower jaw and enable its movements.



The teeth, the muscles and the jaw joints are connected to each other and influence each other. For instance, if several teeth are missing on one side, the muscles can get tightened, which can also lead to chronic headaches. It is known that due to dental gaps, patients can suffer from pain in the face, from Tinnitus – Tinnutus aurium lat. ("buzzing in their ears") – and also from dizziness, tensions in the back of the neck and pain in the back.

Frequently, the pains mentioned can actually be caused by the jaw joints and the jaw muscles. Of course, a dental gap does not necessarily lead to these pains. However, when you suffer from these kinds of pains or similar inexplicable ones and you also have dental gaps, you should not just consult your general practitioner but also your dentist to make sure you get the right treatment.

Furthermore, a dental gap does not just lead to several pains but also to the loss of more teeth.

Missing teeth

For dentists, a missing tooth is not just a dental gap, but dentists distinguish different types of incomplete dentitions.

An interdental gap means that there are one or more adjacent teeth missing and that there is still at least one tooth on each of the two sides. A free-end case means that one or more teeth are missing at the end of a teeth row. In addition, an edentulous jaw means that all teeth have been extracted or lost.





This is how prosthodontic restorations are provided for dental gaps

In order to provide prosthodontic restorations for dental gaps and to replace missing teeth, different methods are applied, which have proved successful for decades and even centuries.

Bridges

In many cases, interdental gaps are treated with a bridge. In this way, the chewing pressure is applied to the bone like for a natural tooth. However, the two support teeth have to sustain more force because they also have to sustain the pressure of the bridge. That is why bridges can only be fitted when the two support teeth are in a good condition and when the dental gap is not too big.

Partial and Full Prostheses

... are typically fitted when there is a free-end case. In addition, they can also be fitted when there is an interdental gap when, for example, the support teeth are affected or instable.

In order to fix the partial prosthesis, extensive constructions with brackets, lingual bars or palatal plates are necessary, which are visible from outside in the front and premolar areas. Naturally, these parts bother the patient when eating, and they also affect the sense of taste because the palate is completely or partially covered. Crumbly food such as cereal can be very uncomfortable for the prosthesis wearer.

However, the biggest disadvantage of all prostheses is that the whole chewing pressure is not applied on the teeth, their roots and the jaw but that the force is applied on the gingiva. Since the gingiva cannot sustain such pressure, there is a risk of developing inflammations and even bone atrophy in the medium and long term.

Since in general, the risk of jaw bone atrophy increases with age, prostheses start to rattle at some point and get loose in the mouth. Even if the problem can be solved temporarily by relining, the problem cannot be definitely solved.

When we get older, do we really have to cope with "rattling prostheses", with a weaker sense of taste because of the palatal plates and with further loss of teeth caused by dental caries and periodontal disease of the support teeth? No, certainly not: the alternative therapy, which is beneficial for more and more people, has been offered in dentistry for over 40 years: the treatment with dental implants.

On the following pages, we would like to give you a very simple overview of the possibilities of Dental Implantology – however, this should not and cannot replace an intensive consultation by your dental office.

Implants instead of Prostheses

Dental implants are artificial roots, usually in the shape of screws, which are inserted into the jaw bone (lat. "implantare") to replace lost teeth. The implants provide support for single crowns or



bridges, for example, or they allow removable prostheses to be securely anchored.

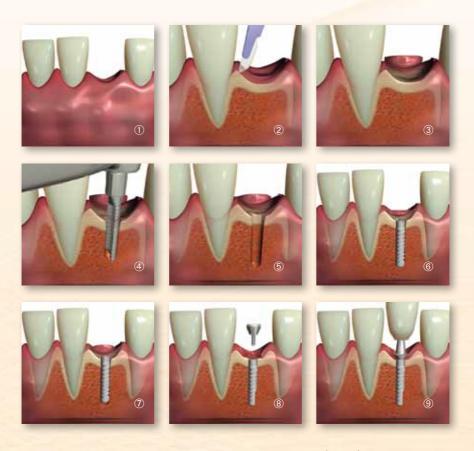
Dental implants have proven successful for approximately 40 years, and now they are mostly part of the day-to-day work in the dental office. More than 800.000 implants were inserted in Germany in 2008, and there is now a strong, upward trend.

The Classical Implantology Method ("CIM")

Expensive and Painful ...

To a patient, a dental implantation usually means that it is a long and painful procedure for which the patient has a high financial burden. In addition, there is a risk that the patient looses the implant within the first years after the insertion. The problems and disadvantages of the "Classical" Implantology Method" (in short CIM) with two-piece implants are briefly described below:

- At least two to four sessions or surgeries are needed, and usually the jaw bone has to be exposed once or several times.
- Large time frame of often several months up to one year
- High costs for the material and the dentist
- With the CIM-method, a jaw bone formation and an augmentation are often necessary, according to dentists.
- Statistical studies have shown that the "internal screwing" of 45% of all two-piece implants gets loose and fractured within the first 10 years.
- The existence of bacteria in the cavities of the two-piece implant systems and the migration of bacteria into the micro-gap of the internal screw connection (see picture on the right) are considered as one of the main reasons for bone loss and inflammation (peri-implantitis) around the implant.



Implantation according to the Classical Implantology Method ("CIM")

An implant is placed in an interdental gap (1). First, the mucosa is flapped open (2)/(3) during the first surgery session. Then, a cavity is drilled in the jaw bone (4). The diameter of the cavity is as wide as the diameter of the implant (4, 5). Then, the implant is inserted (6), and the mucosa is sutured (7). After the implant has successfully grown in, which takes 3 to 12 months, the mucosa is flapped open again in a second surgery session. Finally, the abutment (8) and then the crown (9) are set.

Why is the CIM such a complicated procedure?

Previously, it had been assumed that the implant had to grow on the bone "without being loaded" in order to be able to sustain the chewing pressure all the time. That is why the implants have been divided in two sections. According to the CIM, the diameter of the drilled bone cavity is the same as the diameter of the implant. Thus, no primary stability can be achieved, and the bone has to "grow" on the implant surface. The same goes for ceramic implants because one cannot exert compression on them.

...or MIMI®: affordable and almost painless

Only high-income earners can afford to be treated according to the CIM, and they even have to accept the disadvantages mentioned above.

About more than 25 years ago, implants systems were developed, which were reliable and affordable – with them the MIMI[®] procedure was developed in the last years.

The Minimally Invasive Method of Implantation (MIMI®) ...

...differs considerably from the CIM – regarding both the organizational and the prosthodontic concept. MIMI[®] is based on the latest findings of bone physiology, according to which the bones need certain "bone training" to ensure natural bone remodeling.

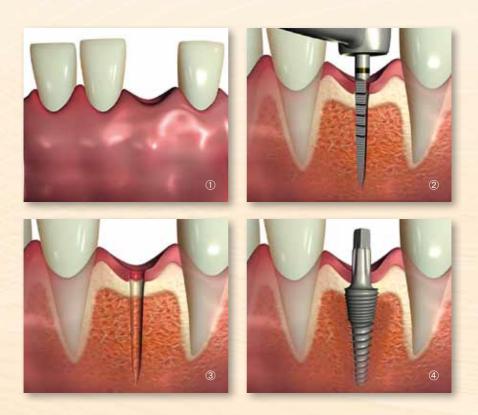
Certainly you have heard of immediate loading in other orthopedicsurgical fields? Whether knee or hip surgery: today, implants are loaded early in general, sometimes already a few days after the implantation of the knee or hip joint. Certainly you have also heard of the endoscopic (minimally invasive, no incisions) or "keyhole surgery"! This is all reflected in MIMI[®]!

Usually, no bone formation is needed for the minimally invasive implantation. It is sufficient to only have vertical bone availability (width) of 3 mm and horizontal bone availability (height) of 8 mm. In the first session the bone is drilled transgingivally through the mucosa – the drilled bone cavity has a diameter of only a maximum of 70 % of the diameter of the implant thread.

Champions®-Implant, made of titanium, grade 4

Then, in the same session, the one-piece implant is inserted almost "blood-lessly" into the bone, condensing the bone (compressive-condensing). A flapping open of the mucosa (gingiva) is usually not necessary.

The implantation according to the MIMI® concept only takes a few minutes in only one session. The impressions for the teeth replacements can usually be taken immediately, and the prosthodontic superstructure can often be fitted directly within two to twelve days after the implantation.



The steps of dental implantation according to the MIMI® procedure:

An implant for a single tooth is supposed to be inserted in the interdental gap. (1) First, a small cavity (3) is drilled with a special drill (2). Then, the implant is inserted in the cavity, condensing the bone. (4) Usually, this implant can be immediately loaded and does not have to grow in.

In order to apply the MIMI[®] method, your dentist team needs to take different several advanced training courses, and particular manual dexterity of the surgeon and a lot of experience with this method are necessary.

 $\mathsf{MIMI}^{\textcircled{\$}}$ differs from the classical implantation procedure in the following aspects:

- Just one date for surgery no incising, no flapping open or suturing of wounds
- Fitting of the definitive superstructure normally within a few days to two weeks (exception: implants for single teeth in the upper jaw)
- Cost reduction up to 50 % (compared to average prices published in "Zähne Spezial ", 2005 ("Teeth Special ", 2005) by the "Stiftung Warentest", the consumer safety group in Germany.

The MIMI[®] success prognoses are at least consistent with those of the conventional method as even after years, one-piece systems do not break or the internal screws do not get loose as it can happen with more-piece systems.

In addition, inflammations, swellings or wound pain have almost never been observed after the MIMI® implantation.

Moreover, thanks to the one-piece implants that are used with the MIMI[®] Method, neither do bacterial infections occur nor does the bone recede on the micro-gap as it can happen with more-piece systems.

Patients said that they just felt a slight pressure in the surgical area only on the day of the surgery. This area can be treated with an ice pack and gentle pain killers.

Comparison of the CIM Method with the MIMI® Method:

| Disadvantages | Advantages |
|--|---|
| CIM Method | |
| Many complicated surgeries. | The CIM method is applied in many dental offices and clinics. |
| Risk of a jaw bone inflammation after surgery. | The method can always be applied but often only with bone formation (augmentation). |
| Painful! | Long-term documentations of over 20 years on two-piece implants with the dental crowns, fitted some months after the implantation, showed that 95 % of these two-piece implants stayed intact since the time that the crowns were fitted on them. |
| Patients have to wear a plastic temporary restoration for up to 12 months. | |
| Only suitable to a certain extent for smokers. | |
| Very expensive. | |
| MIMI® Method | |
| The method cannot be applied for 10 % of all the cases. | Short surgery |
| | Usually, patients have very little pain after surgery. |
| | The treatment is usually finished within 2 weeks. |
| | Also suitable for smokers. |
| | Immediate loading. |
| | Very little loss rate – in a time period of 15 years: clinical long-term studies showed that 95 % of the implants stayed intact 12 years after implantation! |

The MIMI® Implantation

You are certainly interested to be informed of the MIMI[®]-implantation procedure. Briefly: a MIMI[®] implantation is unspectacular, and you will feel almost no pain after surgery.

Anamnesis and Consultation

You should have an individual consultation with the dentist prior to treatment. Your dentist will inform you in detail of implants – but also of other alternative therapies, for example bridges or partial prostheses. Then, during the anamnesis, the dentist will ask you if you have any other diseases and pains in the mouth and jaw areas in order to find out whether there are contra-indications for implantations in general or in this particular time.

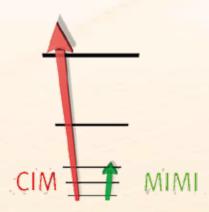
In the treatment room dentists check the adjacent teeth, the antagonists, and they will judge the condition of the jaw bones. The condition of the jaw bones is essential for the healing and later stability of the implant.

If the dentist decides that an implantation is suitable for you, he or she will implement health plans and costs, which you have to hand in to your insurance company, also as a private patient. Finally, you can agree on a date for surgery with your dentist.

Inserting the Implant

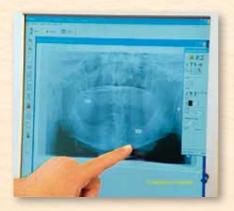
You should take one day off on the day of the surgery and eventually also the next day.

For the implantation the dentist drills with a conical, small drill transgingivally and then he or she carefully inserts the Champion implant. The primary stability is checked with a periotest device as the good primary stability is essential for the safe osseointegration. The whole procedure only lasts a few minutes for each implant.



The comparison between the time patterns of the CIM method and the MIMI® method.

While the treatment according to the MIMI® method is already completely finished 2 weeks after the implantation, the CIM treatment with two-piece implants can take up to 12 months – provided that no augmentation is necessary.





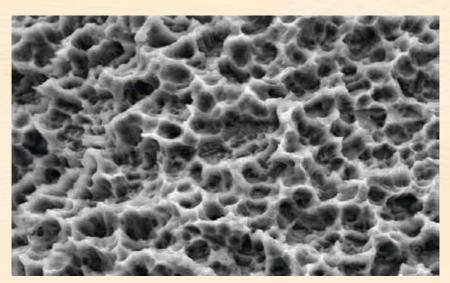
A Champions® Implant can be inserted in just a few minutes – you can see a detailed implantation procedure on the DVD "... And You Can Smile Again". You will read more about it at the end of this leaflet.

What does Immediate Loading Mean?

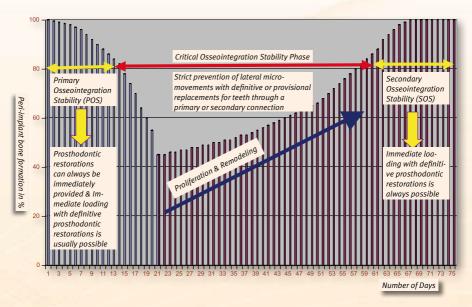
Apart from the financial advantage, the advantage of the Champions®- Implants for the patient is that they can be loaded immediately. Unlike other implants, the Champions®-Implant is not inserted in a bone cavity that is as big as the diameter of the implant. Instead, this type of implant is inserted so that the bone can be condensed. In this way, the implant can be connected well to the surrounding bone. Even if the primary stability is getting slightly weaker in the following two weeks, the primary stability can be completely achieved with the osseointegration after approximately eight weeks. That is why especially single implants in the upper jaw can be finally loaded only then. Implants in the other areas of the jaw that can be connected can usually be finally loaded after 2 weeks.

By the way: the extracting and pressure forces do not cause problems for the implants. Only the side movements should be avoided within the first 8 weeks after the insertion.

The special surface of the Champions[®]-Implants promotes the osseointegration. With an electron microscope, you can see the surface increased to 1600 times its size.



Surface of the Champions®-Implant increased to 1600 times its size



This figure shows the relation between the primary stability and the osseointegration In the first 2 weeks after the implantation (POS phase,) good primary stability can be achieved.

In this phase, a prosthodontic restoration can be fitted on a Champions®-Implant, provided that the crown can be connected.

The primary stability is getting weaker in the next weeks. Side (lateral) forces on the implant should be avoided from the 15th to the 63th day after the implantation. From the 21st day, the implant is osseointegrated and stabilized so that from the 8th week after the implantation, prosthodontic restorations can also be fitted on implants for single teeth in the upper jaw.

In the following pages, we will show you four cases of patients who were treated with Champions®-Implants according to the MIMI® procedure:

1. Patient case:

Three implants with two natural teeth 14, 15





2. Patient case: Two implants for an all-ceramic crown 36

Like the roots for natural teeth, two "roots", i.e. implants, are inserted for one molar to support the dental crown optimally..



Service-phone number: 0 700 / 64 64 46 36 (12 cents/minute in Germany) · www.mimi-info.de

3. Patient case: Four tulips to fix a full prosthesis in the lower jaw

View of the teeth in the mouth (with a loose telescope tooth 33, which could not be maintained) after the implantation and then after having fitted the prosthodontic restoration.

The troughs of the inner surface of the old prosthesis are shaped in the first session (Figure 3), and a temporary soft relining is done in the time period of two to three weeks (until the new prosthesis is ready). With the O-rings, which are replaceable, the prosthesis can be stabilized evenly and securely. (Figure 4)









4. Patient case 12 implants and fixed full ceramic crowns 17 – 27 in only 10 days.







Dreams come true ...

A dream that can come true for many patients thanks to MIMI[®] and Champions[®]! Patients do not need a dental prosthesis anymore, enjoy life more, enjoy eating, look attractive, and feel more self-confident!

All this at affordable prices ...

With MIMI®, patients suffer much less from pain, complications and other restrictive measures. In addition, the average costs of a total treatment only amount to approximately 50 % of the costs of a conventional treatment with more-piece implant systems.

Fortunately, since 01.01.2005, even the German statutory health insurance provides subsidies for implant-supported teeth replacements.

For financial reasons, it is therefore not necessary to abrade healthy teeth to close, for example, a dental gap with a fixed "bridge".

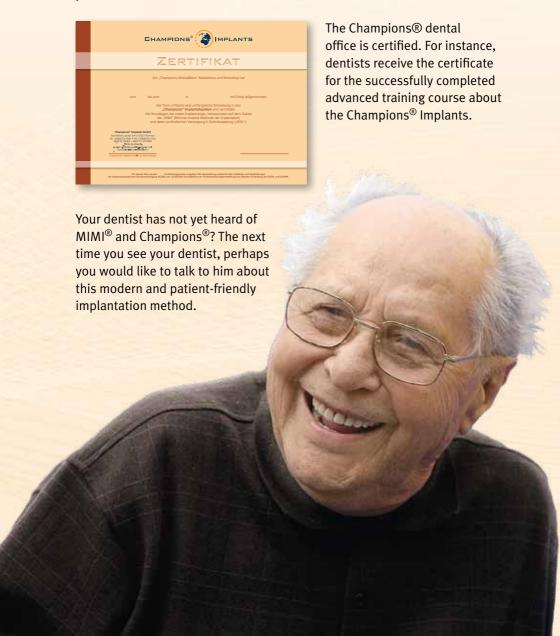
You have your own future and your health in your hands.

Implants are a great help for all patients who for years have had trouble eating and who have not enjoyed laughing because of an uncomfortable prosthesis. With implants even a palatal plate, which has been uncomfortable for the patients for years, may no longer be necessary. Patients can enjoy a tasteful meal like in the past.

Many patients find that implants are the right solution to protect healthy neighboring teeth or the bone. Even if perhaps expenditures are higher (interest-free payments are guaranteed), with implants life is more enjoyable, health can be improved, and expensive repair costs can be prevented.

Please do not hesitate to contact the Champions®-dentist team if you require any further assistance.

Of more than 100 different implant systems that are approved by the German Department of Health, there is a wide range of one-piece implants of other manufacturers that are also inserted according to the minimally invasive method of implantation. It would be in your interest to make sure that your dentist inserts an original Champions®-Implant according to the MIMI® procedure.



Finally, we would like to summarize the advantages and disadvantages of one-piece and two-piece implants:

| Advantages | Disadvantages |
|---|--|
| Improved chewing force | Surgery is necessary |
| Improved speech/phonetics | Nerve can get injured (especially the Nervus alveolaris inferior in the lower jaw) |
| Improved aesthetic aspect | Expensive |
| The bone loss can be reduced or even completely stopped in the edentulous jaw ridge area | |
| Longer retention time of prosthodontic restorations | |
| Reduced pressure on the mucosa when wearing a partial prosthesis | |
| The adjacent teeth do not have to be abraded, which means the remaining teeth are protected (especially important for adjacent teeth that do not yet have fillings or just very small fillings) | |
| Better retaining of a prosthesis | |
| Fixing full prostheses | |

Although basically, implants have more advantages than disadvantages, your dentist team and you should discuss possible disadvantages as well.



If you are interested in more information about the MIMI $^{\otimes}$ -method, we would suggest our Info-DVD "... und Ihr Lächeln kehrt zurück" ("And You Can Smile Again"), which is available in your bookshop. Otherwise, you can also order directly by calling the following phone number: 0 700 / 64 64 46 36 (12 cents/minute)



ISBN 978-3-937708-81-2

Price: € 19,80

Running time: about 40 minutes

The DVD includes useful information about the Champions[®], MIMI[®], patient voices and views of MIMI[®]-implantations.

Please take a look on our website for further information and addresses of dentists using the Champions[®] Implants.

www.mimi-info.de

You Can Smile Again...

... thanks to the Champions®-Implants, inserted according to the MIMI® procedure

The advantages of the first-class dental implants, inserted according to the gentle MIMI® procedure, are the following:

- Innovative the system has proven successful for 25 years
- Almost painless
- On average, the treatment according to the MIMI® method costs 50 % less than the one according to the classical method
- Immediate loading is often possible
- There is a dentist in your area who also inserts the implants according to the MIMI® method



Sylvio M.: "I did not feel any pain after surgery. I did not even feel a pressure or a twinge. It was absolutely painless."

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3,80€

Your certified Champions®-Implants-dentist team