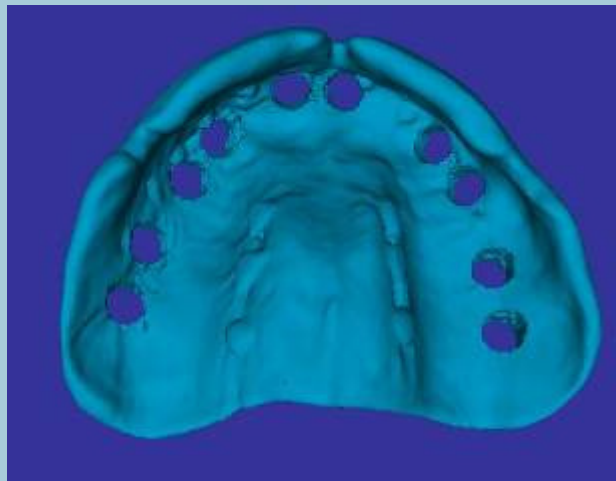


iDent CT Guide Protocol



The iDent computer planning and iGuide production starts with the **CT Guide**. This is a simple device which can be made by a dental technician, but it is essential that it is made exactly according to the protocol

The iDent software digitally copies the CT Guide after the planning to produce the surgical guide, with the addition of drilling holes in precisely the correct position and angulation

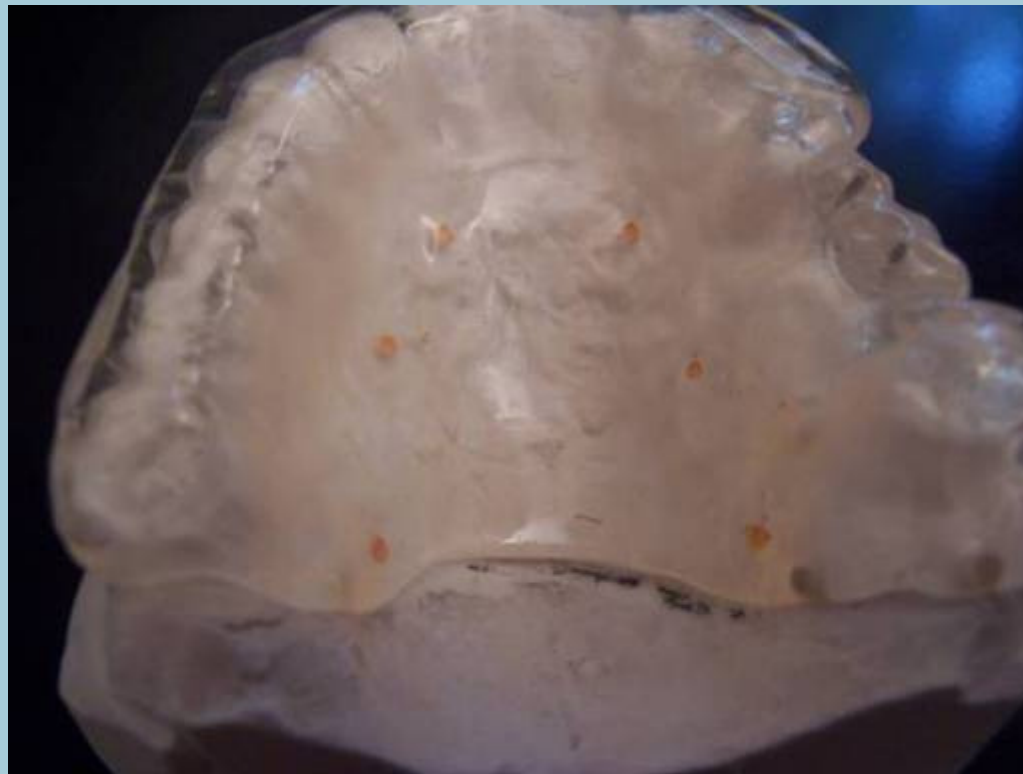


Upper and lower impressions are taken - good alginate or similar material is best

The complete arch with the sulcus areas buccally and lingually is included, and the full palate is needed where the implants are to be placed in the maxilla



Fully edentulous: The CT Guide is the shape of a complete denture, extending into the sulcus areas, and covering the palate in maxillary cases



Partially edentulous: The CT Guide extends into the sulcus area, covers the occlusal and incisal surface of all the remaining teeth, and covers the buccal and labial surface approximately 3mm



Teeth are set-up on the model in the edentulous areas, in the ideal position for the prosthetic restoration



This information can be related to in the planning, and the dental technician and restoring dentist can give input as to the final restoration, at the beginning of the process. Function and aesthetics should be considered



The CT Guide is made in the same way as a rigid bite-plate is made, from clear acrylic, about 3mm in thickness. It must **NOT** be made by vacuform, or by using a flexible material

NO BARIUM IS USED!



The shape of the CT Guide is made in wax and a mold is made from putty impression material



A Simple Technique



The wax is removed with hot water, and fluid, cold-cure acrylic flows into the mold



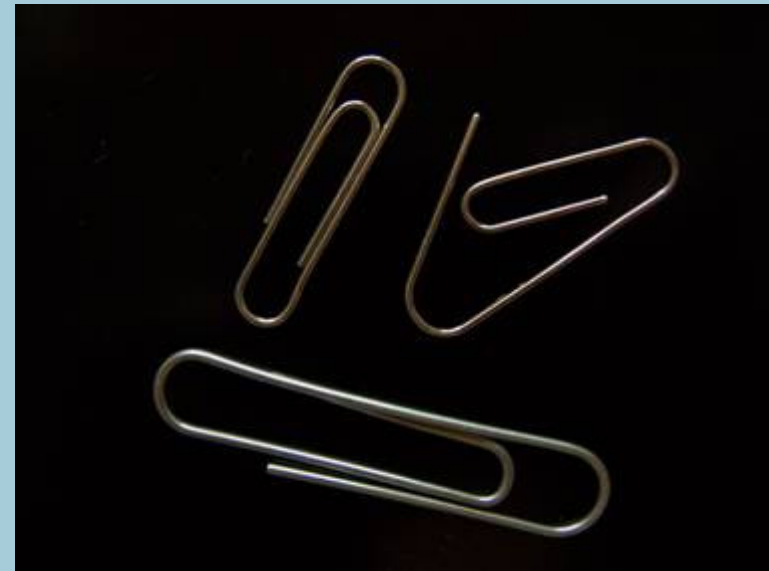
Acrylic injected into mold



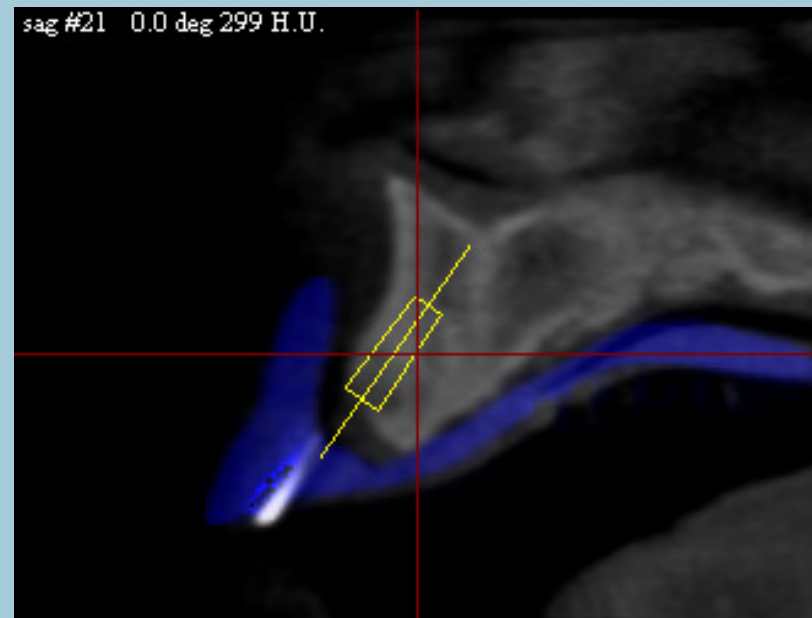
A metal pin is placed in the center of each missing tooth to be restored



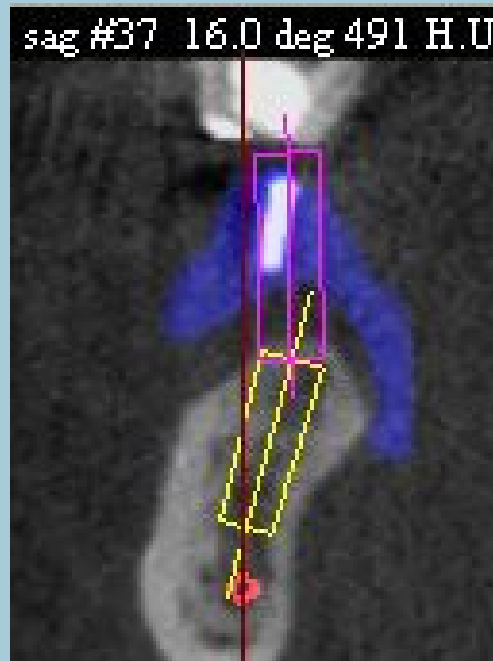
The pin can be made from paper clip or similar metal, approximately 1mm in diameter



This location can be related to in the planning



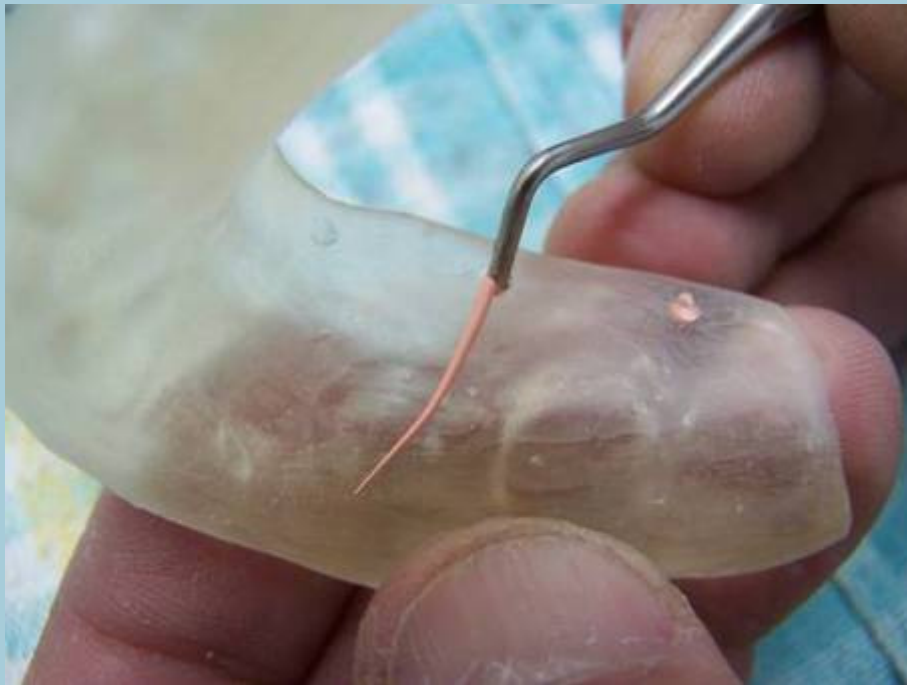
These pins are not essential, but will assist in the planning, and in many cases will enable automatic registration in ImplantMaster software. The software can also place an implant in the location of each pin automatically, as a starting place to plan the case



Alternatively it can be placed on the buccal or lingual sides of these teeth, especially where a tooth is to be extracted after the CT



A 1mm round drill is used to drill 6 holes of 1mm in diameter, approximately equally spaced in the lingual or palatal side of the CT Guide. The holes should be far from the teeth in the level of the root apex. Gutta Percha is compressed into each of the 6 holes, and covered with acrylic



There is a need to place **exactly** 6 markers, not larger than 1mm in diameter. These 6 markers are **ABSOLUTELY ESSENTIAL** to allow the software to combine the 2 scans of the CT Guide in the mouth and the CT Guide separately.



The CT Guide is tried in the mouth by the dentist to make sure that it fits well without rocking. The patient is shown how to place the CT Guide in the mouth for the CT scan



If the patient's full denture fits well, and no major changes are planned in the position of the teeth for both function and aesthetics, then the 6 gutta percha markers can be placed in the denture. Pins can also be added in the teeth where implants may be located

Immediate extractions.

Acrylic is added to the CT Guide in place of the teeth extracted on the model



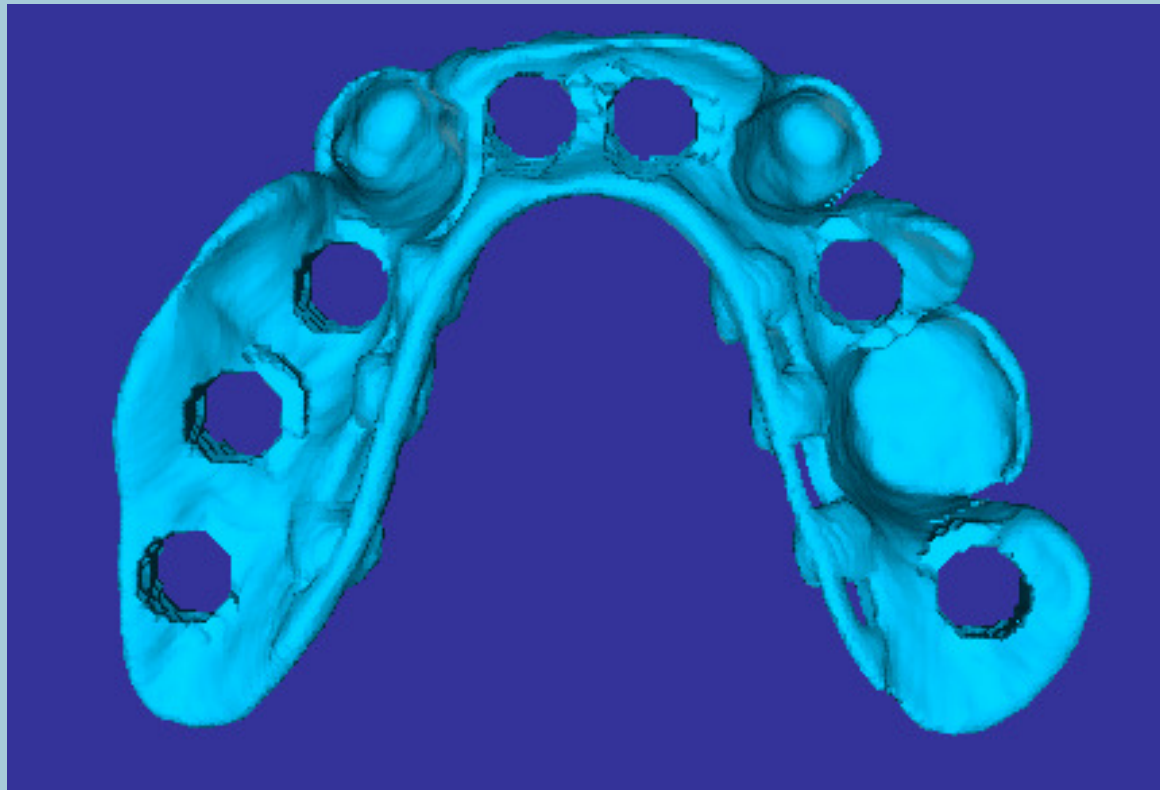
Immediate extractions.

- ✦ **In cases where teeth are to be extracted at the time of implant placement**
- ✦ **Work Flow:**
- ✦ The CT Guide is made as if no extractions are planned, and the patient is sent for CT
- ✦ The scanning center is instructed to scan the patient with the CT Guide according to iDent protocol, but NOT to scan the CT Guide by itself
- ✦ The CT Guide is returned to the dental technician, who removes the teeth to be extracted from the model. Care should be taken to estimate as closely as possible the situation in the mouth after the extractions

Immediate extractions.

- 👉 In other words, the CT Guide is made to sit on the gingival tissue, in the extraction sites.
- 👉 **Important! Do not change the gutta percha markers in any way.**
- 👉 The adjusted CT Guide is sent to the scanning center to be scanned by itself. The patient is not involved.
- 👉 The case is planned as usual using the 2 sets of scan

It is very useful to leave at least 1 or 2 teeth to help stabilize the surgical guide, even if these teeth will be extracted after implant placement



The iDent software digitally copies the CT Guide

Get from this . . .



**Handmade CT Guide –
made by lab (or dentist)**

. . . to this



**Digitally manufactured
surgical guide**