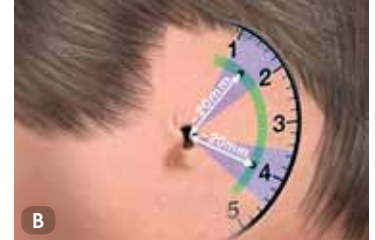


Vistafix one-stage surgery quick guide for auricular procedures

For detailed instructions, please see the Cochlear™ Vistafix® 3 System Treatment and Surgery Guide

STEP 1 Prepare the site

- A** • Carefully mark the implant sites.
 - The implants should be located directly under the anti-helix of the prosthesis.
- B** • Two implants are normally sufficient. The ideal position is approximately 20 mm from the centre of the external ear canal opening, at 4 o'clock and 1.30 (left side of the patient).
 - The distance between the implants should be at least 15 mm.



STEP 2 Make the incision

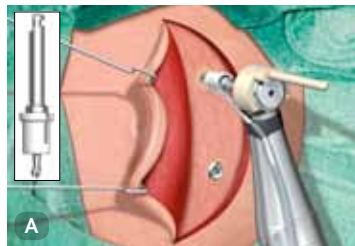
- A** • Make an incision approximately 10 mm behind the implant sites, down to the periosteum.
 - Make a cruciate incision in the periosteum at the implant site.
 - Raise the edges with skin hooks.



Step 3-5 are generally done in one sequence, for one implant at a time. Start with the inferior implant.

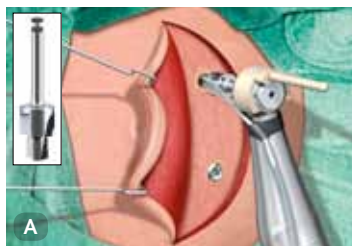
STEP 3 Drill with the guide drill

- A** • Begin drilling with the guide drill and 3 mm spacer (2000 rpm).
 - Move the burr up and down and around to ensure that coolant reaches the tip of the drill.
 - Check the bottom of the hole repeatedly for bone.
 - Use the drill indicator and abundant irrigation during all drilling procedures.
- B** • If there is adequate bone thickness, remove the spacer and continue drilling to 4 mm.



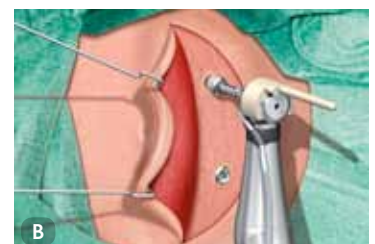
STEP 4 Drill with the widening drill

- A** • Widen the hole with the relevant widening drill (2000 rpm).
 - Move the widening drill up and down during drilling to ensure that coolant reaches the tip of the drill.
 - Remove bone chips frequently from the drill flutes with the dissector.
- B** • Create a small countersink in the bone. The widening drill is designed with a hard stop to reduce the risk of over countersinking.



STEP 5 Place the implant

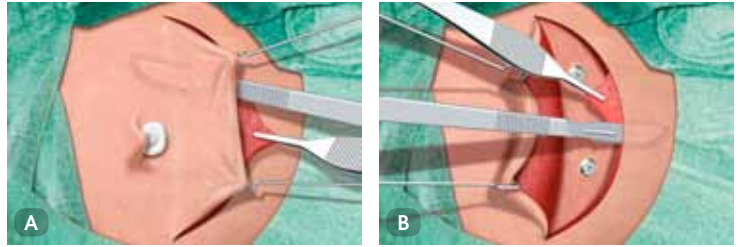
- A** • Pick up the implant with the implant inserter.
- B** • Place the implant without irrigation until the first threads of the implant are well within the bone.



BONE QUALITY	SUGGESTED TORQUE
Compact bone	40-50 Ncm
Compromised or soft bone	20-30 Ncm

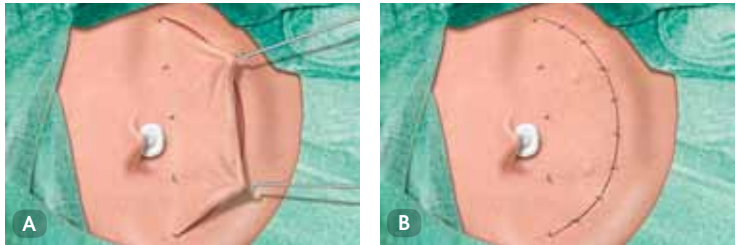
STEP 6 Reduce subcutaneous tissue

- A** • If there is hair, scrape hair from the flap using the blade.
 - Use skin hooks to raise the edges of the flap.
 - Remove all subcutaneous tissue with hair follicles under the skin flap.
- B** • Remove subcutaneous tissue at the periphery of the flap holding the blade parallel to the skin.
 - Trim the periosteum down to the innermost layer and suture the base of the skin flap down to the periosteum.



STEP 7 Close and suture

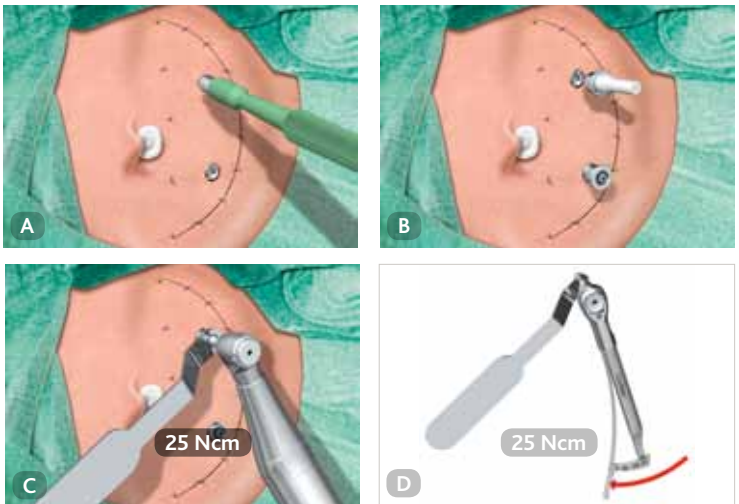
- A** • Suture the edges around the flap down to the periosteum in order to hold the tissue in place.
- B** • Lay the flap back, stretch it out and suture it down.



STEP 8 Connect healing abutments or abutments

Permanent abutments **or** healing abutments may be placed at this stage.

- A** • Punch holes over the implant area with a 4 mm biopsy punch.
- B** • Pick up the healing abutment or abutment with the abutment holder and place it into the implant.
 - Hand-tighten the screw partially with the abutment holder.
 - Snap the abutment holder off the abutment.
- C** • Finalise the tightening of the abutment screw to **25 Ncm** with the machine screwdriver abutment and the counter torque wrench (low speed setting).
- D** • In case of manual tightening, tighten the abutment screw to **25 Ncm** using the multi wrench ("**IN**" facing upwards) with the machine screwdriver abutment. Use the counter torque wrench to counter torque.



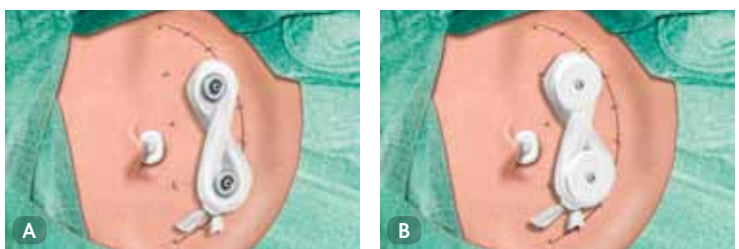
STEP 9 Place the dressing and healing caps

Healing abutments

- A** • Place a dressing around the healing abutments. Place a mastoid dressing.

Abutments

- B** • Place the healing cap on the abutment and hand-tighten the screw using the Unigrip screwdriver.
 - Place the healing cap either before or after the dressing. Place a mastoid dressing.



*The Vistafix 3 System consists of:
Cochlear Vistafix VXi300 Implant (Vistafix 3 Implant)
Cochlear Vistafix VXA300 Abutment (Vistafix 3 Abutment)