

Bone wax as an ideal dressing for auricle concha



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SURGICAL CHALLENGE

Postoperative dressings in the conchal bowl are challenging because of its concave irregular surface. Wound care should provide an occlusive environment and enough pressure to prevent both bleeding and infection. What would be the best dressing option for a revolving door island flap¹ after Mohs micrographic surgery of a basal cell carcinoma in the conchal bowl (Fig 1, A)?

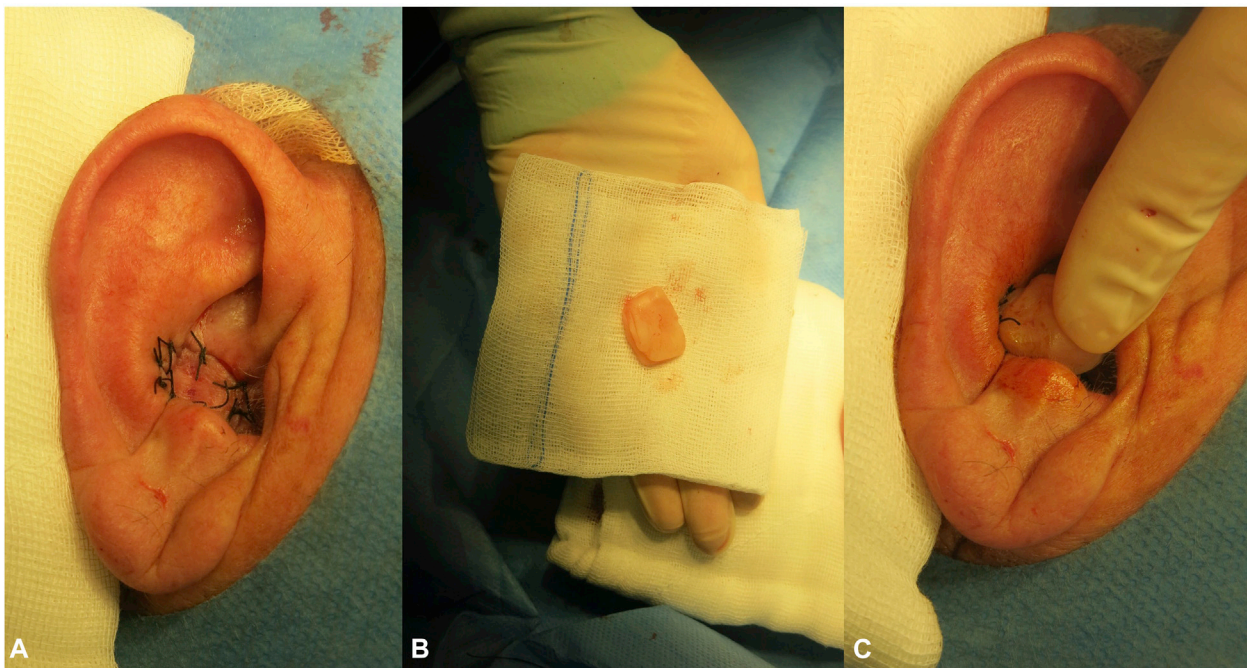


Fig 1. A, Wound immediately after revolving door island flap surgery. B, Molded bone wax. C, Placement of bone wax over the flap and gentle compression to fit it in the shape of the auricular concha.

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SOLUTION

The wound was treated with povidone iodine. Once dry, sterile bone wax was molded by hand rubbing, pressed gently into the auricular concha to fit its shape (Fig 1, B and C), and covered with a sterile gauze dressing. After 72 hours, bone wax was removed, followed by conventional wound care.

Bone wax is an artificial mixture of beeswax, isopropyl palmitate, and a stabilizing agent. It has been widely used in surgery, mainly as a mechanical tamponade in bone bleeding, but also for second-intention healing in plastic and dermatology surgery, because it promotes granulation.²

It is presented in a rectangular shape, is easily cut, and can be deformed by hand rubbing. Once molded, it retains its shape, ensuring both occlusion and deep pressure, exerting mechanical hemostasis, and preventing tenting and hematoma formation beneath the flap (Fig 2, A). Because it is not adherent, it can be easily removed without pain or underlying tissue damage. For these reasons, it may be a good dressing option for flaps or grafts in other concave anatomic areas.

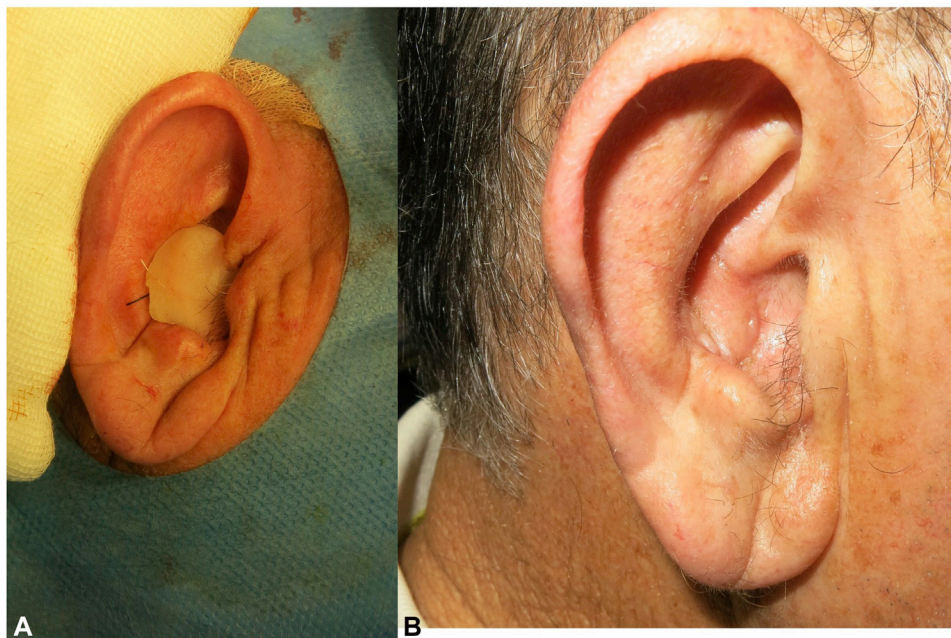


Fig 2. **A**, Bone wax in the definitive place and shape before gauze dressing. **B**, Eight-week postoperative result.

We have described a new use for bone wax, an inexpensive, simple, and useful dressing, to ensure optimal healing of flaps in the auricle concha region (Fig 2, B).

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