

BONE REPLACEMENT GRAFT MATERIALS... WHICH, WHERE AND WHY?

There are numerous kinds of bone graft materials available and it can be very confusing. Bone grafting products are intended to act as a scaffold for new, vital bone to form in deficient areas, most often as a precursor to endosseous implant placement and to preserve the architecture of the alveolar ridge after an extraction. Success of these products is dependant on the patient, site and timing required for the secondary surgical procedure.

If a tooth is extracted and the implant can be placed immediately: Immediate implant placement is a common procedure that offers the patient a reduction in the time necessary for prosthetic reconstruction. After the tooth has been extracted, the clinician determines if there is adequate host bone to stabilize an implant in the fresh extraction site. If the size of the implant chosen leaves a gap between the neck of the implant and wall of the socket that is 2mm or larger, PepGen™ P-15 FLOW should be used to "seal" that gap and fill the void with a material that will eventually provide intimate bone contact between the implant and the socket walls. PepGen P-15 FLOW should be introduced into the socket after the osteotomy site for the implant has been prepared but immediately before the implant is actually seated in the socket. The expansion characteristic of FLOW provides a complete and accurate fill of any gap between the implant and the socket walls.

If a tooth is extracted and the implant will not be placed for 4 + months: If there is an inadequate amount of host bone or it is in the best interest of the patient and success of the case, the clinician may decide to place the implant in a secondary procedure. It is essential to maintain the dimension of the alveolar ridge and the architectural structure of the site. A bone graft material should be placed into the fresh extraction socket that will support the bony walls, eliminate unnecessary ridge resorption, and develop into a recipient site of vital bone. By combining PepGen™ P-15 FLOW with additional PepGen™ P-15 particulate, the advantage of the FLOW's expansion characteristic along with the additional density and support provided by the particulate PepGen P-15 will allow a rapid turn over to bone in the socket while maintaining the augmented dimension. Forming a "marshmallow" of these materials will allow re-entry into the socket in 4 + months for an ideal placement and angulation of the implant.

If a tooth is extracted and, for any reason the implant cannot be placed for more than 12 months or an implant is not the treatment of choice: It is well documented that after a tooth is removed 40 – 60% resorption of the alveolar ridge can occur in as little time as 3 – 6 months. This will critically effect future implant placement, the esthetics desired for crown and bridge reconstruction and / or the necessary retention essential for conventional dentures. Grafting fresh extraction sites with OsteoGraf™ LD-300 will prevent ridge collapse from disuse atrophy and maintain the necessary ridge formation for future prosthetics. OsteoGraf/LD-300 should be hydrated thoroughly with sterile saline or sterile water and placed into the clean, fresh extraction site to the height of the existing crestal bone. This synthetic material is an inexpensive method of ridge preservation that results in a more complete bone fill of the socket eliminating a compromised prosthetic treatment plan.

As with all procedures, proper preparation, choice of materials and patient compliance are of equal importance in achieving the best results possible for both you and your patient.

Alveologro offers a variety of bone regeneration products to meet the clinical needs of the dental practitioner. Please call 888 268 3286 with any questions.