OsseoSpeed® Profile implants— Clinical documentation

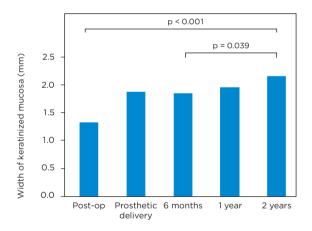
Unique implant design for sloped ridges

Following tooth extraction or tooth loss, natural bone remodeling occurs as the bone heals¹. The remodeling is more pronounced buccally than lingually, which often results in a sloped ridge $^{2-4}$. The OsseoSpeed Profile implant with its sloped shoulder, was developed to meet these demands 5 .

Clinical results

OsseoSpeed Profile implants have been evaluated in clinical multicentre studies, including over 300 implants followed up to 3 years, in both healed ridges and extraction sockets and show:

- High survival rates, ranging from 99.2% to 100% 6-9
- Preserved buccal and lingual bone levels 6-9
- Regain of keratinized mucosa in patients with compromised soft tissue (see figure)⁹



Clinical advantages with OsseoSpeed Profile implants

Scientific literature has shown several clinical advantages with the OsseoSpeed Profile implants in sloped ridge situations, such as:

- Stable soft tissue levels 6-10 and good esthetic results 8, 11, 12
- Optimized 360° bone support ^{6-9, 13}
- Possibly reduced need for bone augmentation¹⁴



References

- 1. Hansson S, Halldin A. Alveolar ridge resorption after tooth extraction: A consequence of a fundamental principle of bone physiology. J Dent Biomech 2012;3:1758736012456543. Abstract
- 2. Araujo MG, Lindhe J. Dimensional ridge alterations following tooth extraction. An experimental study in the dog. J Clin Periodontol 2005;32(2):212-8. Abstract
- 3. Sanz M, Cecchinato D, Ferrus J, et al. A prospective, randomized-controlled clinical trial to evaluate bone preservation using implants with different geometry placed into extraction sockets in the maxilla. Clin Oral Implants Res 2010;21(1):13-21. Abstract
- 4. Van der Weijden F, Dell'Acqua F, Slot DE. Alveolar bone dimensional changes of postextraction sockets in humans: a systematic review. J Clin Periodontol 2009;36(12):1048-58. Abstract
- 5. Abrahamsson I, Welander M, Linder E, et al. Healing at implants placed in an alveolar ridge with a sloped configuration: an experimental study in dogs. Clin Implant Dent Relat Res 2014;16(1):62-9. Abstract

- 6. Lee PK, Siu AS. A two-year evaluation of a sloped marginal contour implant system placed in healed sites. Int J Oral Maxillofac Implants 2016;31(6):1423-28. <u>Abstract</u>
- 7. Noelken R, Donati M, Fiorellini J, et al. Soft and hard tissue alterations around implants placed in an alveolar ridge with a sloped configuration. Clin Oral Implants Res 2014;25(1):3-9. Abstract
- 8. Noelken R, Oberhansl F, Kunkel M, et al. Immediately provisionalized OsseoSpeed Profile implants inserted into extraction sockets: 3-year results. Clin Oral Implants Res 2016;27(6):744-9. Abstract
- Schiegnitz E, Noelken R, Moergel M, et al. Survival and tissue maintenance of an implant with a sloped configurated shoulder in the posterior mandible-a prospective multicenter study.
 Clin Oral Implants Res 2017;28(6):721-26. Abstract
- 10. Noelken R, Moergel M, Pausch T, et al. Clinical and esthetic outcome with immediate insertion and provisionalization with or without connective tissue grafting in presence of mucogingival recessions: A retrospective analysis with follow-up between 1 and 8 years. Clin Implant Dent Relat Res 2018;20(3):285-93. Abstract

- 11. Noelken R, Oberhansl F, Pausch T, et al. Immediate insertion and provisionalization of OsseoSpeed Profile EV implants in the esthetic zone #PSA351. Clin Oral Implants Res 2016;27(Suppl 13):351-2.
- 12. Noelken R. Immediate implant placement in the aesthetic zone using the OsseoSpeed Profile EV implant. Australasian Dental Practice 2017;28(4):170-74. Abstract
- 13. Rojas-Vizcaya F, Zadeh HH. Minimizing the discrepancy between implant platform and alveolar bone for tilted implants with a sloped implant platform: A clinical report. J Prosthet Dent 2018;119(3):319-24. Abstract
- 14. Bornemann G, González J. Reduced need for augmentation using the OsseoSpeed Profile EV implant and patient-specific Atlantis Abutments. Australasian Dental Practice 2016;Issue March/April 1-2.

To read more Scientific Reviews please see: www.dentsplysirona.com/implants/science

