plantation.

Although Teflon membranes are commonly used in guided tissue regeneration (GTR) technique, membrane exposure was reported to be a major complication with prevalence in the range of 70%-80 %. 9-12 Exposed membranes appeared to be contaminated with oral bacteria which prevents new attachment and bone formation. 13 In the present preliminary study, we suggest that PDCM might achieve tissue integration 14 days after implantation. It can be inferred that tissue integration of PDCMs with adjacent tissue may avoid the need for suturing during surgery and early membrane exposure in the GTR technique. This facilitates new attachment and a more proper use of PDCM in periodontal clinics. Our subsequent study will focus on comparisons of surface characteristics of expanded polytetrafluoroethylene (ePTFE) and PDCM.

REFERENCEs

- Scantlebury, T.V. A decade of technology development for guided tissue regeneration. J Periodontol 1993; 64: 1129-1137.
- 2. Lu H-K, Chen C-Y. A study of biocompatibility and biodegradation of porcine dermal collagen. Chin Dent J 1996; 15(3): 150-159.
- 3. Lu H-K, Lin F-P, Wu M-F. In vitro tests of porcine dermal collagen membranes biocompatibility and enzymatic degradation rate. Chin Dent J 1998; 17:1: 15-22.
- Lu H-K, Wu K-J. The effect of porcine dermal collagen membrane on the healing of bony defects in guided bone regeneration technique. Chin Dent J 1996; 15(2): 106-118.
- 5. Wu M-F, Lu H-K, Lee C-T. Tissue integration and cellu-

- lar responses associated with porcine dermal collagen membrane. J Chin Soc Vet Sci 1999; 25(4): 290-296.
- 6. Fehlner-Gardiner C., Uniyal S., von Ballestrem C., Foughertt G.J., Chan B.M. Integrin VLA-6 mediated adhesion of mouse bone marrow-derived mast cells to laminin. Allergy 1996; 51(9): 650-656.
- 7. Jewell K., Kapron-Bras C., Jeevaratnam P., Dedhar S. Stumulation of tyrosine phosphorylation of distince proteins in response to antibody-mediated ligation and clustering of alpha 3 and alpha 6 integrins. J Cell Sci 1 1995; 08(Pt3): 1165-1174,
- 8. Davis G.E., Camarillo C.W. Regulation of endothelial cell morphogenesis by integrins, mechanical forces, and matrix guidance pathways. Exp Cell Res 1995; 216(1): 113-123.
- Becker W., Becker B.E., Berg L., Pritchard J., Caffesse R., Rosenberg E. New attachment after treatment with root isolation procedures: Report for treated class III and class II furcations and vertical osseous defects. Int J Perio Restor Dent 1988; 8: 2-16.
- Selvig K., Kersten B., Wikesjo U. Surgical treatment of intrabony periodontal defects using expanded polytetrafluoroethylene barrier membranes influence of defect configuration on healing response. J Peridontol 1993; 64: 730-733.
- Cortellini P., Pini Prato G., Baldi C., Clauser C. Guided tissue regeneration with different materials Int J Perio Restor Dent 1990; 10: 137-151.
- 12. Cortellini P., Pini Prato G., Tonetti M. Periodontal regeneration of human infrabony defects. I. Clinical measures J Periodontol 1993b: 64: 254-260.
- Sander L., Karring T.. New attachment and bone formation in periodontal defects following treatment of submerged roots with guided tissue regeneration. J Clin Periodont 1995; 22:295-299.