# PC-II-11. Guided tissue regeneration on degree II furcation defect of mandibular molar

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#### Background

Prognosis of a defect in furcation region of a multi-rooted tooth is not predictable because of its specific anatomical structure. There are several methods treating furcation defects; furcationplasty, tunnel preparation, root resection, guided tissue regeneration(GTR), tooth extraction. In GTR procedure of furcation defects, several investigations reported a reasonably predictable outcome only in degree II furcation—involved mandibular molars, where a clinical soft tissue closure or a decreased probing depth of the furcation defect was recorded(Pontoriero et al. 1988, Lekovic et al. 1989, Caffesse et al. 1990). The present case report describes GTR procedure performed on mandibular degree II furcation defects in three patients.

### Materials and methods

Three patients who shows furcation defects on mandibular molar teeth were included in this report. After crevicular incision, full thickness flap was reflected and granulation tissue was removed. Then, degree II furcation defects on buccal side of mandibular molar teeth were examined. After root planing, autologous particulate bone obtained from retromolar area and buccal shelf was applicated on furcation defects and resorbable membrane was adopted. Flap was repositioned and suture was done. Suture was removed in 1~2weeks.

## Results

Healing was unevenful. Clinical soft tissue closure and decreased probing depth of the furcation defects was recorded and bone filling was observed in radiographs.

#### Conclusion

GTR is a predictable method in treating degree II furcation defect of mandibular molar. The predictability of this treatment outcome is related to several factors; 1) interproximal bone level, 2) debridement of the exopsed root surfaces in the furcation area, 3) space between the tooth and the membrane material 4) a plaque control.