# Fibrin sealant as an alternative for sutures in periodontal surgery.

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## Abstract:

The trial compared wound healing clinically, histologically and morphometrically after the use of fibrin sealant and sutures for periodontal flap closure. Ten patients were selected for this split-mouth randomized controlled clinical trial. On the test site fibrin sealant (F) was applied for flap closure after periodontal flap surgery (n = 10) and on the control site sutures (S) were used (n = 10). Clinically wound healing was observed at 7, 14 and 21 days and biopsy was taken on the 8th day. At seventh day better healing was observed in fibrin sealant site. Histologically mature epithelium and connective tissue formation was seen in fibrin sealant site with increased density of fibroblasts (F = 70.45 +/- 7.22; S = 42.95 +/- 4.34, $p < 0.001$) and mature collagen fibers. The suture site had more number of inflammatory cells (S = 32.58 +/- 4.29; F = 20.91 +/- 4.46, $p < 0.001$) and more number of blood vessels (S = 11.89 +/- 3.64; F = 5.74 +/- 2.41, $p = 0.005$). Fibrin sealant can form a better alternative to sutures for periodontal flap surgery.