

### Long-term outcome of surgery for perianal Crohn's fistula

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**Objective:** Perianal fistulizing disease is a problem in patients with Crohn's disease (CD) because they often need repetitive surgeries. Among the various available procedures, none of them proves to be superior. In addition, the long-term outcome of fistula Seton drainage is not well described. The aims of this study were to analyze the long-term healing and recurrence rates of perianal fistulas in CD patients, stratified according to the first procedure performed.

**Methods:** Database analysis of a prospective Swiss cohort of patients with perianal CD.

**Results:** 365 patients with 576 interventions and a median follow-up of 7.5 years (0 - 12.6) were analyzed. 39.7% of patients required more than one surgery. The first surgical interventions were fistulectomies (58.4%), Seton drainage (26.9%), fistula plugs (2.2%) and combined procedures (9.9%). Fistulectomy patients required no more surgery in 67.6%, one additional surgery in 25.4% and more than one additional surgery in 7.7%. In these 3 groups of patients, after a median follow-up of 12.1 years, perianal fistula closure was achieved in 77.1%, 74.1% and 66.7%, respectively. In patients with Seton drainage as index surgery, 50.3% required no more surgery and over 75% achieved fistula closure after 10 years. 49.7% of patients with Seton required one or more surgeries. At median follow up of 7.5 years, closure rates were 64.2% and 60.5% in patients with one and more than one surgeries, respectively. There was no difference in demographics in Seton patients with closed or not closed fistulas. Non-closure patients had a higher Crohn Disease Activity Index (33 vs. 6) and more frequent anti-TNF medication (57.4% vs. 48.1%).

**Conclusion:** First line fistulectomies achieved the highest healing rates in perianal CD but 1/3 of patients require additional surgeries and 1/4 patients will remain with a fistula at 10 years. Initial seton drainage and concurrent medical therapy can achieve fistula closure in 75%. However, in 50% of patients more surgeries are performed with a seton staying in place up to 5 years and fistula closure in only 2/3 patients.