

## Positioning of the knot in the steel wire in relation to the tooth and the Erich bars.

### Technical note

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### Abstract

Erich bar is a basic technique for restoring occlusal alignment in patients with facial fractures. Although this method is used worldwide, there is no description of what is the best way to stabilize the bar that should be anchored tooth to tooth with steel wire. We describe the method of stabilizing the bar of current use in our Service. We indicate the use of this technique because it stabilizes the bar and, in our opinion, it reduces the need to twist the knots during the patient's return.

**Descriptors:** Fracture Fixation; Facial Injuries; Mandible.

### INTRODUCTION

Erich bar is a basic technique for restoring occlusal alignment in patients with facial fractures. Although this method is used worldwide, there is no description of what is the best way to stabilize the bar that should be anchored tooth to tooth with steel wire. We describe the method of stabilizing the bar of current use in our Service. We indicate the use of this technique because it stabilizes the bar and, in our opinion, it reduces the need to twist the knots during the patient's return.

### TECHNIQUE

We separate the dental arches in four quadrants. The steel wire is always passed in the apical position medially, and the knot presses the bar against the tooth crown, which increases its stability and immobility (Figure 1).



**Figure 1.** Dental model showing erich bar anchored with steel wire, with the wire always passing to apical in the medial portion.

We always pull the needle holder from back to front and from coronal to apical (Figure 2).

This way we were able to install the bar in a standardized way and clinically it was detected that the steel wires loosen less, which requires less maintenance and knot tightening (Figure 3).



**Figure 2.** Patient with mandibular fracture, presenting loss of occlusion.



**Figure 3.** Occlusion restored after erich bar fixation.

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#### **CONFLICTS OF INTERESTS**

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The authors declare no conflicts of interests.

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