A simplified technique for bend backs in lingual orthodontics

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DESCRIPTION

In lingual orthodontics, bending the distal end without lingual instruments is difficult. Lingual appliance is associated with causing discomfort to tongue at the distal end due to improper bend backs. In addition, bending becomes more difficult, in cases where, second molar are also bonded or banded due to inaccessible area distally. Bend backs for lingual appliances can be given easily by instruments specially made for lingual orthodontics (Kurz Second Order Bending Fork).¹

We present a technique with which bend backs can be given with ease in a lingual appliance with use of light wire pliers. The technique is as follows:

1. Place the mushroom-shaped NiTi wire in place.
2. Ligate the wire anteriorly to stabilise and to know the exact extension of the wire distal to molar tube (figure 1).

Figure 1 Mushroom-shaped NiTi archwire ligated anteriorly with excessive 2 mm of wire distal to molar tube.

Figure 2 Mushroom-shaped NiTi archwire outside the mouth with marking at the distal end.

3. Keep 2 mm of wire distal to the molar tube.
4. Mark it with marking pencil and remove the wire from the mouth (figure 2).
5. Anneal the distal 2 mm portion.
6. Bend the annealed part of wire outside the mouth with light wire pliers towards the tooth surface (figure 3). Unbend the wire slightly.
7. Insert the wire in the molar tube (figure 4). As NiTi has the property of superelasticity, it can be inserted into the molar tube with ease. The bent annealed portion can be easily bent further, if required, with light wire pliers.

Figure 3 Mushroom-shaped NiTi archwire with the annealed portion bent outside mouth with light wire plier.

Figure 4 Mushroom-shaped NiTi archwire in mouth with appropriate bend backs.

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Learning points

- ▶ Without instruments specifically designed for use in lingual orthodontics, it is very difficult to give bend backs in lingual orthodontics.
- ▶ With this technique, we can easily give bend backs using instruments used in labial orthodontics.
- ▶ Without proper bend backs, lingual orthodontics can be very troublesome for the patients.
- ▶ Moreover, lingual orthodontic instruments are more expensive than labial orthodontic instruments.

Competing interests None.

Patient consent Obtained.

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- 1 Romano R. *Lingual orthodontics*. Hamilton: B. C. Decker, 1998.

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