

SMILE ART ORTHODONTICS

Palatal Expander

What is it?

A palatal expander (Hyrax appliance) is a device used to widen the upper jaw when it is narrow. This makes room for the teeth and helps develop a broader, more esthetic smile.

How does it work?

The expander fits on the upper back teeth and goes across the roof of the mouth. It is activated using a “key” that fits in a “key hole” in the center of the appliance. Activating the appliance pushes the two halves of the upper jaw apart and widens it. It takes about 2-6 weeks to achieve the desired amount of expansion, after which the expander remains in the mouth for 6 more months, giving time for the new bone to form and stabilize. A retainer is usually inserted when the expander is removed to maintain the result.

What does it feel like?

Expansion is usually not painful, but some mild discomfort may be felt. Immediately after insertion of the appliance, there will be some difficulty in speaking and swallowing; this lasts for only a day or two. It is normal for a gap to open up between the two upper front teeth. This gap may or may not close on it's own after active expansion is complete.

Instructions for use:

- The day the expander is inserted, you will be given detailed instructions on how to turn the key to activate the appliance.
- Unless otherwise directed by your orthodontist, the expander should be activated at a rate of **one turn/day**. It is desirable to activate it at approximately the same time every day. The time of the day does not matter, but most patients are comfortable activating it at night before retiring to bed.
- If you miss a turn, *do not* do two turns at a time to compensate.
- Insert the key gently, do not try to force it in as it may slip and cause injury to the palate.
- Make sure that the key is turned fully, and that the next hole is fully visible before you remove the key.
- If the expander gets loose, stop activating it and please inform the doctor immediately.
- Frequent monitoring is essential during the active phase of expansion, during which you will have a series of weekly or biweekly appointments. **If you miss an appointment, please stop turning till you see the doctor, do not continue the expansion unsupervised.**

Maintenance and care:

- Brush the expander when you brush your teeth (at least 3 times/day or every time after you eat). Use a water-pik/ proxy brush/ flushing syringe to clean under the expander.
- Use a fluoride mouth rinse to prevent cavities under the bands. Rinse with it 3 times/day, do not eat, drink or rinse your mouth for at least half hour after rinsing with the fluoride.
- Keep in between meal snacks to a minimum. If you have foods/drinks high in sugar content, it is very important to brush/rinse after you have them.
- Avoid hard and sticky foods; these may pull your expander off the teeth.