



Buffered Hypertonic (3%) Saline Nasal Irrigation / Lavage

The Benefits

When you irrigate your nose, the hypertonic saline (salt water) acts as a solvent and washes the mucous crusts and other debris from your nose.

1. The higher salt concentration pulls fluid out of the swollen membranes and shrinks them. This decongests and improves the air flow into your nose. The sinus passages begin to open.
2. Studies have also shown that high concentration salt water and an alkaline (baking soda) improves nasal membrane cell function (mucocilliary flow of mucous debris).

How to create the mix - 2:1 - 2 parts salt to 1 part bicarbonate

1. Use a one-quart *covered* glass jar that is thoroughly cleansed. Fill with tap water. You do not need to boil water, but you may. You may use filtered or bottled water.
2. Add 2 teaspoons (measuring teaspoons) of pickling/canning salt or refined sea salt. **Do not** use table salt, as it contains iodine and may contain a number of other additives.
3. Add 1 teaspoon (measuring teaspoon) Arm & Hammer Baking Soda (pure bicarbonate).
4. Mix ingredients together and store at room temperature. **Discard after one week.** If you find this solution too strong, you may *decrease the amount of salt added* to 1-1/2 teaspoons. With children, it is often best to start with a milder solution and advance slowly.
5. To "rest" the sinuses every 2 months, some literature suggests using a 1:1 solution (rather than the 2:1 solution above) for two weeks and then returning to the 2:1 solution.

Instructions

You should plan to irrigate your nose with buffered hypertonic saline 2-3 times per day. I find it easiest to incorporate this into

daily hygiene sessions morning and evening when bathing and/or brushing teeth. Do not use immediately prior to activities or bedtime as some solution may drain from your nose for a few minutes after the lavage session.

You may use a *bulb/ear syringe*, large medical syringe (30cc) or Water Pic with irrigation tip. Always pour the amount of fluid you plan to use into a clean container. **DO NOT** put your used irrigation instrument back into the storage container because it contaminates your solution. Most people prefer to warm the solution slightly to body temperature prior to use. Place your working solution container in a pan with hot water from the tap for a few minutes. Test carefully on your hand or forearm prior to use to make sure solution is not too hot!

Stand over the sink (some people do this in the shower) and squirt the solution into each side of your nose aiming the stream toward the back of your head, **NOT** the top of your head. Seal your throat with your tongue as if you were gargling. The solution should rinse out of the other nostril. Some of the solution will run down your throat - it will not harm you if you swallow a little. Repeat for the other nostril. When finished gently blow your nose.

For younger children you may want to place the solution into a pump spray container such as an empty nasal spray or a nasal steroid container and squirt several times into each side of the nose. **DO NOT FORCE** your child to lay down - it is much easier to do in a seated or standing position, just as for the adult.

If you use a nasal steroid such as *Rhinocort Aqua*, *Flonase*, *Vancenase*, *NasacortAQ*, you should always use the hypertonic saline solution **first** and then use your nasal steroid product. The nasal steroid is much more effective when sprayed onto clean nasal membranes and the steroid medicine will reach deeper into the nose.

Most people experience a *slight burning sensation* the first few times they use the hypertonic saline solution, but this usually goes away in a few days. You may need to start with 1 1/2 teaspoons of salt in the mixture for the first week if the burning sensation persists. You can then increase to the 2:1 solution.

Going on a trip or want the convenience of a pre-mixed solution? There is a complete line of pre-packaged products by: ENTsol™ Hypertonic Nasal Wash.