

In Office Treatment of Nasal Congestion and Obstruction (Stuffy Nose)

Persistent or frequently occurring nasal obstruction can significantly impact a patient's life. Nasal obstruction can cause diminished sense of smell and taste, nasal congestion, dry mouth, chronic sore throat, dental decay, halitosis, decreased exercise tolerance and changes in voice.

Nasal obstruction can have many causes including:

- turbinate enlargement
- septal deviation
- nasal polyps
- adenoid enlargement
- collapse of external nasal structures
- thick mucous
- tumors

Patients with nasal obstruction warrant a thorough ear, nose and throat exam including nasal endoscopy. One of the most common causes of nasal obstruction identified is turbinate enlargement. Medical treatments for turbinate enlargement, including nasal rinses, prescription sprays and/or allergy therapy, are often effective in providing patients relief. When medical treatment is not effective, or not a reasonable long-term option, a procedure to reduce the size of one or both inferior turbinates may be indicated. Many patients are candidates for a minimally-invasive, office-based procedure to reduce the inferior turbinates. This office-based option is performed under topical and local anesthesia (numbing solution placed into the nose followed by injection of lidocaine). The procedure generally takes 30 minutes and patients are able to drive home from the office. Most patients report minimal discomfort in the days following the procedure. No time away from work or school is required. A small number of patients may not have resolution of nasal obstruction with initial reduction. These patients may choose to have a repeat treatment (for additional turbinate volume reduction) or choose to have turbinate reduction surgery under general anesthesia.

What are turbinates?

The internal side wall of the nasal cavity on each side has 3 sausage shaped protuberances. These are called turbinates (inferior, middle and superior turbinates). The turbinates are bony outgrowths which are lined by a thick mucous membrane. They act as "radiators" or the "HVAC" (heating/ventilation/air-conditioning) system for the nose with the purpose of warming, humidifying and filtering air for the lungs. The turbinates have a very rich supply of blood vessels underneath the mucous membrane and this allows for heat to be transmitted to the nasally inhaled air. They are also coated with a thin, wet mucous coating which gives off water vapor and humidity to the nasally inhaled air. The mucous coating also traps foreign particles in the air (dust, pollen, mold spores, smoke particles, air pollution, carpet fibers, insects, etc) and thus filters the air before it gets to the lungs. The turbinates are necessary for normal nasal function but they can malfunction or become problematic in certain conditions (coryza, sinus infections, chemical irritation, congenital enlargement). During these conditions, the turbinates are swollen and cause congestion and obstructed nasal breathing or perhaps even blockage of the sinus drainage pathways. Medications designed to control the swelling may be effective in reversing the process. Sometimes the turbinates are irreversibly swollen and procedures are required to reduce their size.