

What are Nasal Polyps^{1,2}

Nasal polyps are the result of chronic inflammation within the nasal cavity. They are benign growths and are not cancerous.

Larger nasal polyps can block your nasal passages or sinuses and cause breathing difficulties, a loss of sense of smell, frequent sinus infections and other problems.

Nasal polyps are more common in adults, particularly those with asthma, frequent sinus infections and allergies.

Symptoms^{1,2}



Runny nose



Postnasal drip



Decreased or no sense of smell



Loss of sense of taste



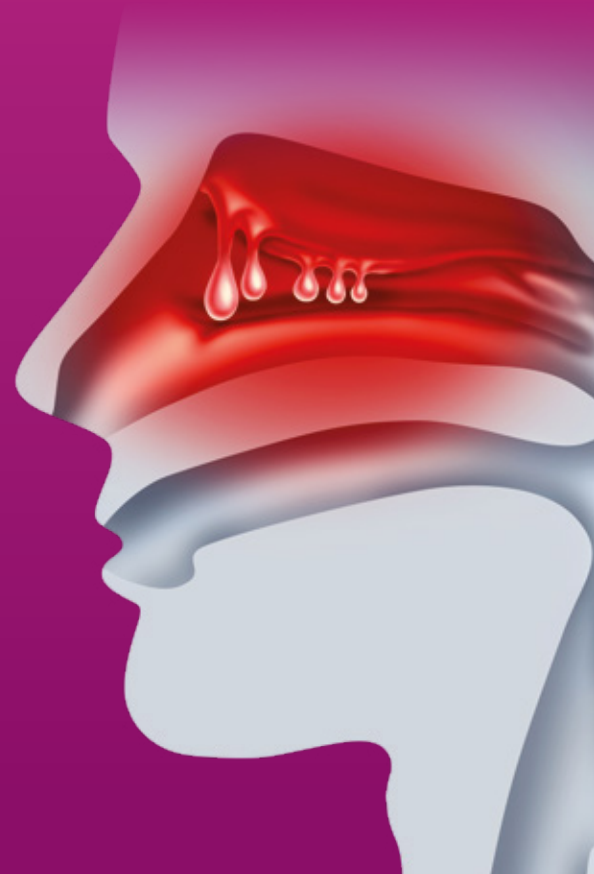
Snoring

What Causes Nasal Polyps?^{1,2}

The exact cause is not known but any condition that causes chronic inflammation in the nasal cavity or sinuses may increase the risk of nasal polyps.

There may be an allergic component to the disease as some people with nasal polyposis test positive for an environmental allergen. Examples can include pollen, dust mites, and cigarette smoke.

Asthma and aspirin sensitivity are other conditions that are often associated with nasal polyps. Nasal polyps can develop when the mucous surfaces of the nasal passages and sinuses are consistently irritated for a period more than 12 weeks.



Diagnosis of Nasal Polyps¹

A diagnosis is usually made based on your symptoms, a general physical exam and an examination of the nose. Nasal polyps may be visible with the aid of a simple lighted instrument.

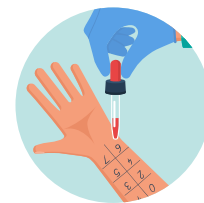
Other diagnostic tests include:



Nasal endoscopy – A narrow tube with a magnifying lens or a tiny camera, enables your doctor to look at the inside of the nose in detail. The endoscope will be inserted into a nostril and will be guided into the nasal cavity to locate nasal polyps.



Computerised tomography (CT) scan – A type of X-ray imaging that enables your doctor to locate nasal polyps. It's also important in helping to rule out the presence of other possible obstructions in the nasal cavity, such as a cancerous growth.



Allergy tests may be conducted if allergies are contributing to chronic inflammation. With a skin prick test, tiny drops of allergy-causing agents are pricked into the skin of your forearm or upper back. The drops are left on the skin for 15 minutes before your doctor or nurse observes your skin for signs of allergic reactions.

Treatment Options for Nasal Polyps

Conventional medication therapies^{1,2}

Drug treatments may include:



Corticosteroids nasal spray may be prescribed to reduce inflammation. This treatment may shrink or eliminate the polyps completely.



If the nasal corticosteroid isn't effective, an **oral corticosteroid** may be prescribed, either alone or in combination with a nasal spray. As oral corticosteroids can cause side effects, they should only be taken for a brief period. A **corticosteroid injection** may be recommended instead of an oral corticosteroid.



Studies have shown that **saline irrigation** may help provide symptoms relief caused by the nasal polyps.



Drugs to treat conditions that contribute to chronic inflammation in your sinuses or nasal passages may be prescribed. E.g. antihistamines to treat allergies, antibiotics to treat a chronic or recurring infection.

References:

1. Nuh.com.sg. 2021. Nasal Polyps. [online] Available at: <<https://www.nuh.com.sg/Health-Information/Diseases-Conditions/Pages/Nasal-Polyps.aspx>> [Accessed 26 April 2021].
2. Singhealth.com.sg. 2021. Nasal Polyps. [online] Available at: <<https://www.singhealth.com.sg/patient-care/conditions-treatments/nasal-polyps>> [Accessed 26 April 2021].
3. Singhealth.com.sg. 2021. Faqs on biologics-biosimilars. [online] Available at: <<https://www.singhealth.com.sg/patient-care/medicine/faqs-on-biologics-biosimilars/treats>> [Accessed 26 April 2021].
4. Singapore approved PI, Xolair Dec 2019.SINv1.
5. DeJaco, D et al., 2019. The SNOT-22 factorial structure in European patients with chronic rhinosinusitis: new clinical insights. *European Archives of Oto-Rhino-Laryngology*, 276(5), pp.1355-1365.



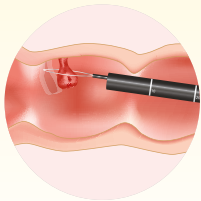
For use by registered medical practitioner only.
Please visit <https://www.novartis.com.sg/product-list/xolair> to access or download the Package Insert. Alternatively, please scan this code for more information about this medicine.



Novartis (Singapore) Pte Ltd
20 Pasir Panjang Road, #10-25/28
Mapletree Business City, Singapore 117439
Phone: +65 6722 6010 | Fax: +65 6323 4335

Surgery^{1,2}

If the conventional drug treatment doesn't shrink or eliminate nasal polyps, surgery may be recommended. Surgery options for nasal polyps include:



Polypectomy can be performed to completely remove small or isolated polyps using a small mechanical suction device or a microdebrider – an instrument that cuts and extracts soft tissue.



Endoscopic sinus surgery aim to correct problems with the sinuses which make them prone to inflammation and the development of polyps. The surgeon inserts an endoscope, into the nostrils and guides it into the sinus cavities. A tiny instrument will be used to remove polyps or other obstructions that prevent the flow of fluids from your sinuses.

Biologics³

Biologic drugs refers to medicine semi-synthesized from biological sources, instead of the conventional chemical reactions. They generally work to reduce uncontrolled immune reaction and inflammation by tapping on the body's immune system. In turn, they may lessen symptoms, improve outcomes and quality of life in the context of Nasal Polyps.

What is Xolair and what is it used for?⁴

Xolair (Omalizumab) is a humanised monoclonal antibody.

Xolair is a biologic treatment and it is indicated as an add-on therapy to intranasal corticosteroids for the treatment of Chronic rhinosinusitis with nasal polyps (CRSwNP) in adults (18 years of age and above) with inadequate response to intranasal corticosteroids.



Why am i prescribed Xolair?

It is for the treatment of your long-term condition, chronic rhinosinusitis with nasal polyps. It is an add-on to the other conventional therapies like antihistamines and corticosteroid nasal spray.

How is Xolair administered?

Xolair is administered by a healthcare professional only in the form of an injection usually under the skin on the upper region of the arm.

How can Xolair improve my quality of life and symptom severity?

Patients initiated on Xolair have reported improvements in SNOT-22 (Sino-Nasal Outcome Test) in Clinical Trials, which combines measures of sino-nasal symptoms with psychological and sleep dysfunction measures, as early as first assessment at Week 4.⁴ SNOT-22 is a patient reported outcomes measure used to assess the impact of nasal polyps on the patient quality of life.⁵

Symptoms and social/emotional impact measured include:

- Need to blow nose
- Sneezing
- Nasal obstruction
- Loss of smell or taste
- Runny nose
- Sleeping difficulties
- Reduced concentration
- Sadness
- Embarrassment

Are there any side effects associated with Xolair?

As with all treatments, side effects can occur with Xolair, although not everybody gets them. It is important that you understand what can occur and when to seek medical attention.

If you think you are experiencing side effects, including any that are not listed here, consult your doctors immediately.

The most common side effects of Xolair that may affect up to 1 in 10 people are: ⁴



Headache and Dizziness



Joint pain



Respiratory tract infection



Feeling of pressure or pain in the cheeks (sinusitis, sinus headache)



Upper abdominal pain



Injection site reactions (swelling, pain, redness and itching)



Speak to your doctors about any questions or concerns you may have about the possible side effects.

Education Material for Nasal Polyps

This material is meant for doctors to educate patients newly prescribed with Xolair.

