

## Introduction

Rhinitis means inflammation of the lining of the nose and often occurs together with conjunctivitis. Rhinitis is defined clinically as symptoms of runny nose itching, sneezing and nasal blockage (congestion). Common causes of rhinitis are allergies which may be seasonal ('hayfever') or occur all-year-round (examples include allergy to house dust mite, cats, dogs and moulds). Infections which may be acute or chronic represent another common cause. Rhinitis (whether due to allergic or other causes) is a risk factor for the development of asthma. Rhinitis is also implicated in otitis media with effusion (glue ear) and in sinusitis which should rightly be termed rhinosinusitis since sinus inflammation almost always involves the nasal passages as well.

Allergic rhinoconjunctivitis is very common, affecting one in four in the UK. As with other allergic disorders (asthma, atopic dermatitis) rhinitis is much more common in westernized societies; the prevalence of rhinitis continues to rise in many countries.

People with a family history of allergy are more likely to get allergic rhinitis. No method has been found to prevent it developing. Allergic rhinitis may itself be the first manifestation of allergic disease, e.g. as hay fever in teenagers or adults. Further allergies can occur- to environmental challenges like house dust mites, pet allergens.

Rhinitis may progress to persistent symptoms with resultant nasal congestion which impacts on adjacent structures such as the sinuses, throat, middle ear and bronchial tubes.

It can be very mild, moderate or severe. Allergic rhinitis is frequently ignored or regarded as trivial by family members, doctors and even sufferers themselves, probably because recurrent colds are common, particularly in small children. This is a big mistake since not only does rhinitis reduce quality of life, it can impair sleep and reduce school performance and attendance at work. Allergic children have been shown to have more infections and more problems with those infections.

Asthmatic children who get colds are 20 times more likely to be hospitalised due to their asthma if they are allergic and if they are exposed to high levels of their provoking allergens. Adequate treatment of underlying allergic disease helps to diminish these problems.

## **Diagnosis**

An adequate detailed history following examination and, if necessary, specific allergy tests are needed. The timing of symptoms in relation to possible allergen exposure is of primary relevance.

## **Treatment of Allergic Rhinitis**

### **1. Allergen and irritant avoidance.**

Rhinitis is usually caused by inhalant allergens and very rarely by food, although some pollen-sensitive patients find that certain foods which contain the same proteins as pollen give them an itchy mouth. This is the oral allergy syndrome and is rarely dangerous, unlike primary food allergy.

Some allergens such as pets can be avoided; others such as pollens are more difficult- although a holiday abroad or by the sea at the height of the relevant season can help. House dust mites are hard to avoid sufficiently reducing symptoms but some patients do find benefit from allergen proof bed covers particularly if such measures are combined with rigorous cleaning, avoidance where possible of soft furnishings and heavy curtains and use of hard flooring. However, in controlled clinical trials, such mite avoidance measures are not of proven value at the present time. Avoidance of irritants such as smoke also helps to reduce symptoms. Simply washing out the nose with a salt water solution can be very soothing. This can be achieved with half teaspoon of salt or half teaspoon of bicarbonate of soda (baking powder) added to a pint of lukewarm water, with gentle sniffing of the solution from the palm of the hand. Also salt sprays and custom-designed salt douches are inexpensive and available from high street chemists.

### **2. Drug therapy**

Mild-moderate hay fever responds to antihistamines but it is very important to take advice from pharmacists and choose non-sedating antihistamines, otherwise driving, work and school performance is very likely to be impaired even in people who do not feel drowsy and who are not obviously sleepy. More problematic and persistent

rhinitis is better treated with a topical nasal corticosteroid administered by spray or, in the case of associated sinusitis and/or nasal polyps by use of corticosteroid nasal drops. The new nasal corticosteroid sprays are not absorbed and can be very safely be used in adults and children.

Avoidance of directing the spray towards the nasal septum (the partition in the middle of the nose) and use of the nasal device without fiercely sniffing the spray into the back of the throat provides optimal benefit.(FIGURE X)

Symptom relief is not immediate and treatment may take several days or a week or two to be fully effective.

Combinations of treatments may be needed – intranasal antihistamine plus intranasal corticosteroid is better than either alone in reducing all symptoms. Other potentially useful treatments include anti-leukotriene tablets (Singulair), chromones (Intal, Nedocromil) and ipratropium (Rhinatec).

### **3. Immunotherapy (desensitization)**

Immunotherapy involves giving graded increases of allergens to which the sufferer is sensitive in order to induce allergen tolerance, which may last for years following discontinuation. Immunotherapy is reserved for patients with one or two major problematic allergens and without chronic asthma who are not controlled by the above measures. Injection (subcutaneous) or under the tongue (sublingual) immunotherapy is usually given regularly over 3 years. This form of treatment must only be prescribed initially by specialists in allergy.

Sublingual immunotherapy once the first dose has been given under expert supervision can be administered each day in the home. Sublingual reactions are very mild- mostly involving local itching and swelling in the mouth and throat- and short term lasting 1-2 weeks or less. Local side effects are to be expected and usually apparent at the first dose which should be given under supervision. Side effects from injection immunotherapy may occasionally be more severe so injections must take place in the presence of a trained physician in a setting where immediate resuscitation facilities are available. Pre-seasonal treatment is effective for seasonal allergies, but it is not yet clear whether pre-seasonal use confers long term benefit, as observed for the injection route when used regularly all year round for 3 years.

#### **4. Surgery**

Surgery is only very rarely needed for rhinitis. Occasionally surgery with/without turbinate reduction is needed to allow access to the nose for more effective use of sprays or to open the sinuses in patients insufficiently responsive to medical treatment because of structural problems.

#### **Progress of disease**

The inhalant allergen sensitivity tends to remain in many once present but not all patients. Some individuals lose their hay fever and their allergies do not progress. It is worth making your friends and family aware of your allergies so that you do not suffer from major exposure- such as a house with cats, or a very dusty bedroom.

Further details can be obtained by contacting:

Allergy UK  
Planwell House  
LEFA Business Park  
Edgington Way  
Sidcup DA14 5BH

Helpline: 01322619898  
Website: [www.allergyuk.org](http://www.allergyuk.org)

The information contained in this leaflet has been provided by the British Society for Allergy & Clinical Immunology. Every effort has been made to ensure at the time of printing, its contents are accurate. However, this leaflet should be used in conjunction with advice from a medical professional.