

# The essentials\*

\*This booklet is intended for patients who have been prescribed Xolair (omalizumab) for severe allergic asthma.

This medicine is used to prevent asthma from getting worse by controlling symptoms of severe allergic asthma in adults, adolescents and children (6 years of age and older) who are already receiving asthma medicine, but whose asthma symptoms are not well controlled by medicines such as high-dose steroid inhalers and beta-agonist inhalers.

This guide is not intended to take the place of your Xolair leaflet. Please read your Xolair package leaflet carefully before you start using this medicine, as it contains important information for you, such as a full list of possible side effects. If you have any further questions, speak to your doctor, pharmacist or nurse.

Adverse event reporting information can be found on the final page of this guide.



This material was created and funded by Novartis.





## Contents

About severe allergic asthma	<b>4-7</b>
In the airways	<b>8-9</b>
Inside the airway	<b>10-11</b>
Diagnosing severe allergic asthma	<b>12-13</b>
Treating severe allergic asthma	<b>14-15</b>
Xolair (omalizumab) for the treatment of severe allergic asthma	<b>16-17</b>
What can you expect from Xolair?	<b>18</b>
What you need to know before you use Xolair	<b>19-20</b>
What else can you do?	<b>21-23</b>
Sources	<b>24</b>
Reporting side effects	<b>24</b>



## About severe allergic asthma

### What is severe asthma?

Asthma is an inflammatory condition of the lungs. It narrows the airways making it difficult to breathe, and is characterised by repeated episodes or attacks.

Asthma is classed as severe if the symptoms remain uncontrolled even when you are taking your inhalers and medications correctly.

### Asthma episodes or attacks and related symptoms



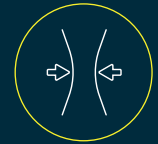
Coughing



Wheezing



Shortness of breath



Chest tightness

## What is allergic asthma?

Allergic asthma is the most common type of asthma, with an allergy being the cause of symptoms in around 3 out of 4 cases. It is caused by the immune system.

Normally, the immune system protects you from diseases – it reacts to potentially dangerous substances, like viruses or bacteria, and makes them harmless.

Allergies and allergic reactions happen when your immune system overreacts when exposed to common substances.

This can occur in response to triggers such as:



Dust mites



Animal hair



Mould spores

In allergic asthma, this causes a reaction that worsens the symptoms of asthma.

## What is severe allergic asthma?

If you have allergic asthma, and your symptoms are uncontrolled despite medication and inhalers, this will be classed as severe allergic asthma.

## In the airways

**Special proteins called immunoglobulin E (IgE) are a key part of the body's immune system, and play an important role in allergic asthma.**

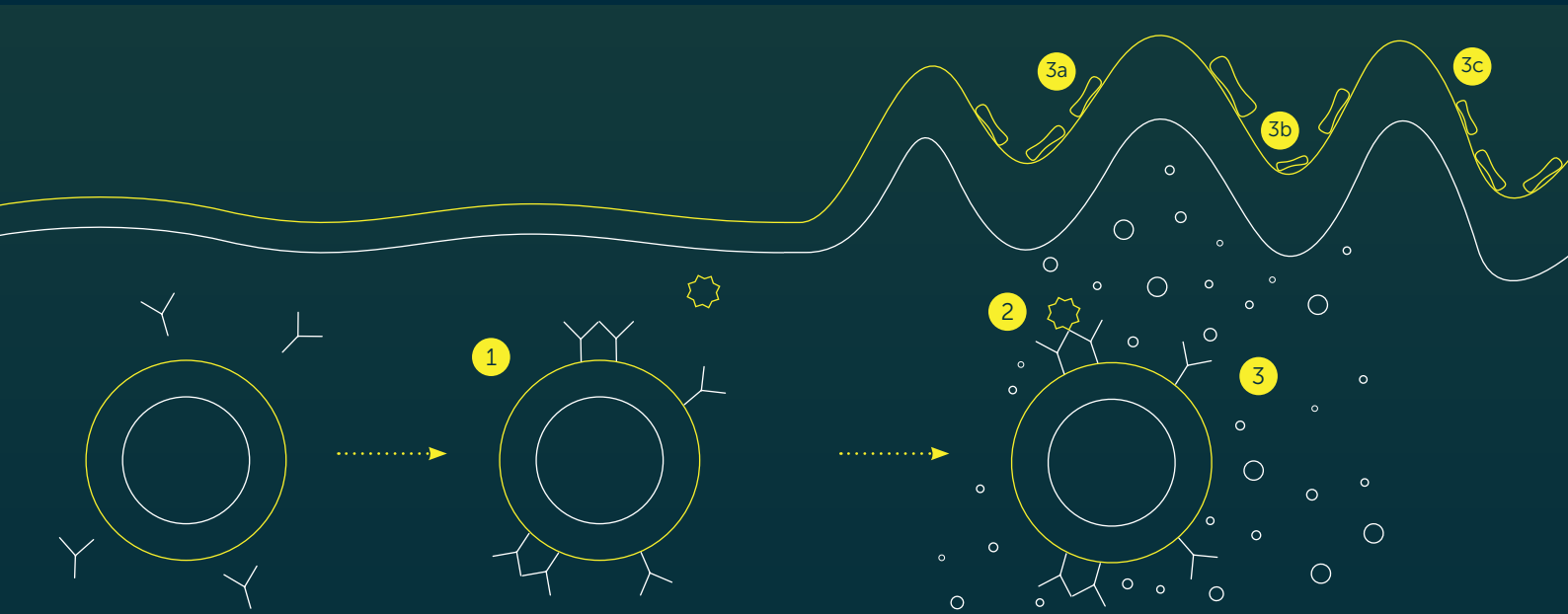
IgE acts like a "radar" for allergens: when there is an allergen present, it is detected by the IgE protein, which triggers an allergic reaction.

- IgE is activated by an allergen, driving the actions of other parts of the immune system
- Some of the activated IgE will be present on mast cells, which act as gatekeepers for the immune system and are found in large numbers in the skin, in the lining of the airways and in the gut
  - Mast cells store histamine and other powerful chemicals involved in inflammation

- When IgE on mast cells is activated by an allergen, histamine and these other chemicals are released from the mast cell
- This leads to an inflammatory reaction:
  - Airways become red, swollen and tight
  - Sticky mucus is released
  - It also creates the wheezing, coughing, and shortness of breath associated with an asthma attack

# Inside the airway

- 1 Allergens in the airways bind to IgE present on mast cells
- 2 When IgE on mast cells is activated by an allergen, histamine and other powerful inflammatory chemicals are released
- 3 This leads to an inflammatory reaction
  - 3a Airways become swollen and tight
  - 3b Sticky mucus is released
  - 3c Creates wheezing, coughing and shortness of breath



○ Mast cell

Y IgE

☆ Allergen

U Mucus

○ Histamine

## Diagnosing severe allergic asthma

Severe allergic asthma is usually diagnosed if you still have frequent asthma symptoms and exacerbations even when taking all your medications and inhalers correctly.

To help diagnose severe allergic asthma, and to check if you are suitable for Xolair (omalizumab) treatment, your doctor or nurse will usually:



Assess your medical history, including the medications you are currently taking, your symptoms and how often these affect your daily life



Perform a skin test or blood allergy test to check if you react to common allergy triggers



Measure the level of IgE antibodies in your blood



Check your weight

Your doctor or nurse may also ask you more general questions about your family's medical history, and if your symptoms appear in any particular situation or when you come into contact with a particular allergen.

## Treating severe allergic asthma

Asthma medications can be divided into long-term “controller” medications and quick-acting “reliever” medications.

Every patient with asthma should have a reliever medication, and all but those with the most mild asthma should have a controller medication to help control symptoms and reduce the risk of serious attacks.

Over the course of treatment, your doctor or nurse will regularly review and adjust your medications to manage your symptoms as effectively as possible.

If you have severe allergic asthma your doctor or nurse may add in other medications to help control your symptoms. This is often referred to as a stepwise approach to asthma treatment and Xolair can be prescribed as part of this process.

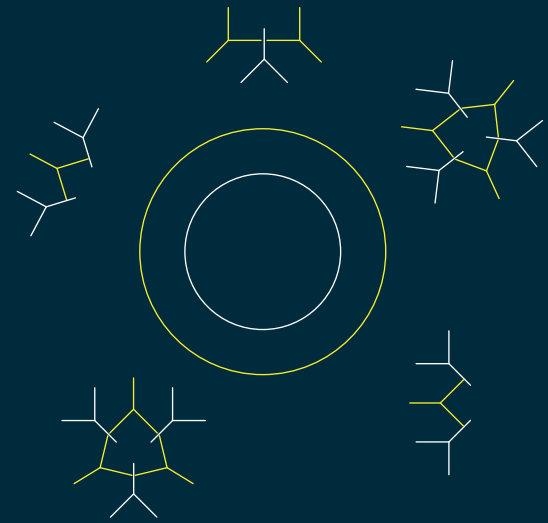
**The successful treatment of severe asthma relies on your commitment to taking ALL your medications as directed by your doctor or nurse. If your asthma is managed well, you may only experience symptoms occasionally. If you are taking your medication as directed and still have symptoms, make an appointment with your doctor or nurse to review and possibly adjust other medications.**



## Xolair for the treatment of severe allergic asthma

The active substance in Xolair is called omalizumab. Omalizumab is a man-made protein that is similar to natural proteins produced by the body. It belongs to a class of medicines called monoclonal antibodies.

Xolair works by blocking IgE, which is produced by the body. IgE plays a key role in causing allergic asthma.



Mast cell



IgE



Xolair

## What can you expect from Xolair?

Xolair does not treat acute asthma symptoms, such as a sudden asthma attack. Therefore Xolair should not be used to treat such symptoms.

You can keep track of your asthma symptoms, and any impact they have on your life, in booklet 3.

**To help get results from your Xolair treatment, it is important to take it exactly as your doctor or nurse has told you. Keep in mind that it may take up to 16 weeks to see an effect.**

## What you need to know before you use Xolair

Like all medicines, Xolair can cause side effects, although not everybody gets them. The side effects caused by Xolair are usually mild to moderate, but can occasionally be serious.

The patient information leaflet included in the box with your injection lists all the side effects that might occur, so make sure to read that in addition to this booklet.

Side effects seen most frequently include:

- Fever
- Reactions where the injection was given, including pain, swelling, itching and redness
- Pain in the upper part of the tummy
- Headache
- Upper respiratory tract infection (such as a cold)
- Feeling of pressure or pain in the cheeks and forehead (sinusitis or sinus headache)
- Pain in joints
- Feeling dizzy

## **Look out for signs of allergic reactions and other serious side effects**

Xolair can potentially cause serious side effects. Seek medical attention immediately if you notice any signs of a serious side effect, as described within the Xolair patient information leaflet.

## **Do not use Xolair if you are allergic to omalizumab or any of the other ingredients of this medicine**

If you think you may be allergic to any of the ingredients, then tell your doctor, as you should not use Xolair.

Talk to your doctor about any other medical conditions you may have that might affect whether you can take Xolair, or if you are travelling to a region where infections caused by parasites are common, as Xolair may weaken your resistance to such infections. Refer to the Xolair patient information leaflet for the full list of considerations.

## **What else can you do?**

Many people with asthma avoid physical exercise because they are worried it might bring on an attack. However, done properly, exercise can help to improve your quality of life so ask your doctor if they can recommend a suitable exercise regimen for you.

### **Breathing exercises**

Breathing exercises should be a core component of every workout. They help you to co-ordinate your breathing and develop a sense of your normal breathing movements before you move on to more strenuous exercise. Here are some suggestions, but do not attempt any of these without talking to your doctor or nurse first.

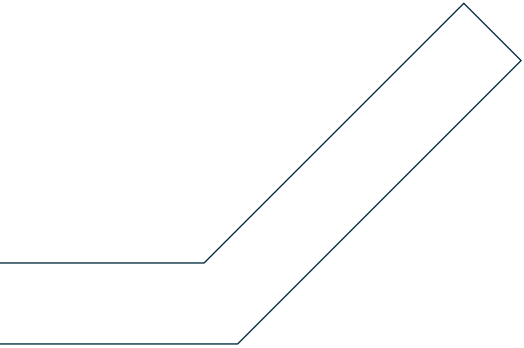
### **Basal respiration**

Take a slow, deep breath in through your nose then breathe out through your mouth.



## Pursed lips breathing

You can slow down your out breath by pursing your lips in a relaxed way. This reduces the number of breaths you take and keeps your airways open for longer.

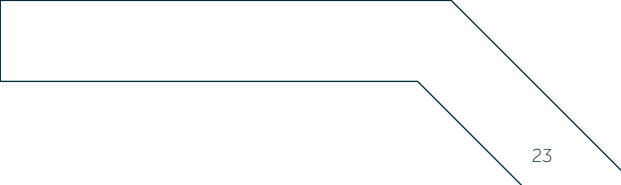


## Stomach and chest breathing

Sit towards the front of a chair and then lean back. Put one hand on your stomach and one on your chest and watch how they rise and fall with your breathing. Try to increase your stomach breathing by placing both hands round your belly button.

If you find yourself in a situation where breathing is difficult try to ease it by leaning forward in your chair or, if you are standing, resting your hands on the front of your thighs or the back of a chair to support yourself.

Mental relaxation exercises can also help as fear and anxiety about your condition can cause you to feel breathless for no apparent reason.



## Sources:

Asthma Symptoms. Available at: <https://www.lung.ca/symptoms-2>. Accessed: September 2023.

Asthma Triggers. Available at: [www.aafa.org/allergic-asthma/](http://www.aafa.org/allergic-asthma/). Accessed: September 2023.

D'Amato G et al. *Multidiscip Respir Med* 2014; 9: 23.

Galli S et al. *Nature* 2008; 454: 445-454.

Global Initiative for Asthma 2021. Pocket guide for asthma management and prevention (for adults and children older than 5 years). Available at: <https://ginasthma.org/pocket-guide-for-asthma-management-and-prevention/>. Accessed: September 2023.

Immunoglobulin E (IgE) Definition. Available at: [https://www.aaaai.org/tools-for-the-public/allergy,-asthma-immunology-glossary/immunoglobulin-e-\(ige\)-defined](https://www.aaaai.org/tools-for-the-public/allergy,-asthma-immunology-glossary/immunoglobulin-e-(ige)-defined). Accessed: September 2023.

Niven R et al. *BMJ Open* 2016; 6: e011857.

Tests to Diagnose and Monitor Asthma. Available at: <https://www.asthma.org.uk/advice/diagnosis/tests/>. Accessed: September 2023.

What Is Asthma? Available at: <https://www.asthma.org.uk/advice/understanding-asthma/what-is-asthma/>. Accessed: September 2023.

What Is Severe Asthma? Available at: <https://www.asthma.org.uk/advice/severe-asthma/what-is-severe-asthma/>. Accessed: September 2023.

Xolair® Patient Information Leaflet.

Xolair® Summary of Product Characteristics.

## Reporting side effects

If you get any side effects, talk to your doctor, pharmacist or nurse. This includes any possible side effects not listed on the package leaflet. You can also report side effects directly via the Yellow Card Scheme at <https://yellowcard.mhra.gov.uk/>. By reporting side effects you can help to provide more information on the safety of this medicine.

For full details about Xolair, please refer to your patient information leaflet.

Date of preparation: September 2023  
303427

 **NOVARTIS**

  
**omalizumab**