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Drugs used in the treatment of asthma

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Abstract
The term "asthma" is used as a general term that includes a state of disconnection caused by intermittent constriction in the bronchial tubes or airways within the lungs.
Many factors contribute to asthma and cause crises, and these factors may vary from person to person. The most important goals in the treatment of asthma control the symptoms of the disease and prevent complications of the disease as well as maintain the function of the lungs close to normal as far as possible avoid the side effects of drugs used, and avoid irreversible obstruction and includes treatment general advice and medicines and alternative medicine. One of the most important tips we have provided through this project is to understand the patient and his family about the nature of his illness and about the treatments and everything related to it.
It is also very important to stay away from smoking, avoid all irritants and triggers of the disease as much as possible, as well as avoid medications that make the disease worse like anti-inflammatory drugs.

Keywords: asthma, Inhalation, Emergency treatment, Inhalation of asthma drugs

Introduction
Asthma, disorder of the respiratory system in which the passages that enable air to pass into and out of the lungs periodically narrow, causing coughing, wheezing, and shortness of breath. This narrowing is typically temporary and reversible, but in severe attacks, asthma may result in death. Asthma most commonly refers to bronchial asthma, an inflammation of the airways, but the term is also used to refer to cardiac asthma, which develops when fluid builds up in the lungs as a complication of heart failure. The heavily damped suspension will produce good car handling, but also will transfer much of the road input to the car body. When the car is moving at low velocity on rough road or at high velocity in a straight line, this will be caused as a harsh ride. The car operators may find a harsh ride objectionable, or the cargo may damage. The lightly damped suspension will produce more comfortable riding, but can reduce the stability of the car significantly in turns and lane change maneuver, or due to negotiating an exit ramp. The good design of the passive suspensions can to some extent stability and optimize ride, but cannot prevent this compromise.

Drugs used in the treatment of asthma
The three drug groups
The drugs used to treat asthma are divided into three groups

- Palliative care.
- Protection.
- Emergency (or reflective) drugs.

Analgesic drugs
These drugs relax the muscle in the walls of the airways, allowing the opening of the airway to enter the air and exit more easily, which means facilitating the process of breathing. These drugs are known as «bronchodilators» in the sprays are usually blue and sometimes green or gray, of sprays.
Most of the time, it is necessary to use sedative sprays when you have symptoms and not

regularly, but if you have severe asthma you may need to use them regularly, but after consulting your doctor.

Prevention drugs

These drugs reduce inflammation in airways to reduce irritation. Unlike anesthetic sprays, these drugs should be used regularly, usually twice a day. Its effect is somewhat like the effect of dental medicine. Daily use prevents problems, and some patients keep it in addition to dental medicine so as not to forget its use, if the crises they are exposed to are few.

Protective sprays are usually brown, orange, red, and yellow.

There are three basic types of prevention drugs

• Steroid inhalation.
• Sodium chromoglycate.
• Nidocromyl.

They are all available in different sprays

Steroid inhalation

The effect of the word "steroid" is frightening to some people because of the misinformation they make about it, even though they are very effective drugs.

• These drugs are not the common steroids used by bodybuilding heroes and some athletes illegally.
• The inhaled version of steroid is the same as used in tablets for the treatment of acute asthma crises, and other diseases such as arthritis.
• The dose inhaled from the drug is very small compared to that contained in steroid tablets. For example, inhaling the spray twice a day, you get between 20 and 400 micrograms of the drug, depending on the type of sprayer you have to use. In cases of severe asthma, the patient should take 6 tablets of 5 milligrams of steroid tablets daily, which means 30 thousand micrograms of the drug, ie 75 to 1500 times the dose in the sprayer.
• The side effects of inhaled steroids are low compared to the symptoms of the tablets, and these symptoms are certainly less than the risk of not treating asthma.
• 5% of patients who take steroid inhalation complain of dryness or pain in the mouth (sometimes resulting from spadiness), while 5% may complain of an ulcer, and this can cause a problem for patients who use their voices frequently (eg, teachers or phone clients) These side effects can be alleviated by using mouthwash after using the sprayer or by using a scanner that acts as a "buffer" and reduces the amount of drug entering the mouth.
• When consuming greater amounts of the drug (1500 micrograms a day or more), especially in older patients, there may be obvious side effects such as bruising, increased oral secretion and cholera. Some patients may become opaque in the eye. Steroid causes osteoporosis, but despite all the side effects, it must always be balanced against the risk of not having asthma.

Inhalation of asthma drugs

Asthma inhalation is the best way to reduce asthma or prevent crises. The sprayer distributes the drug quickly through the airways to relieve the symptoms.

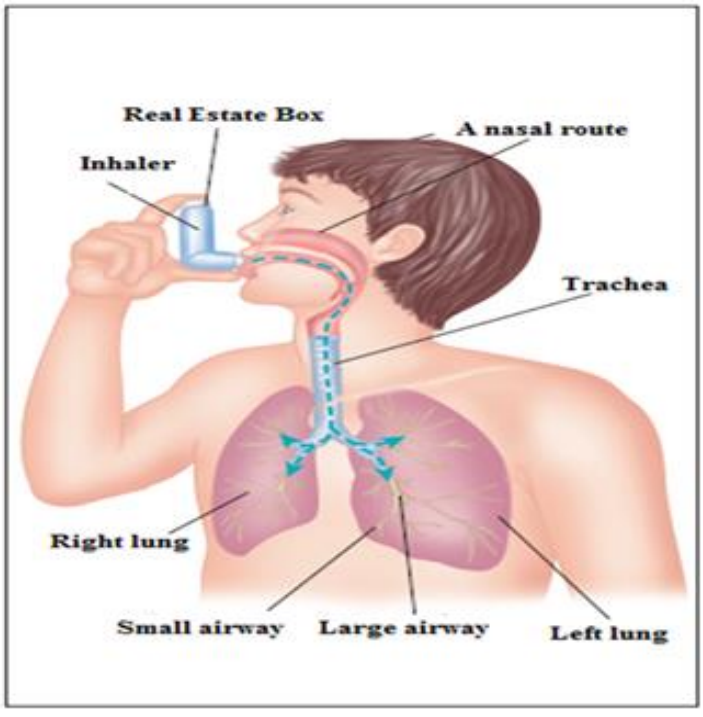

Fig.1 inhalation asthma drugs

There is some evidence that large doses of steroids may slightly hinder growth in a small proportion of children, but growth often returns to the normal length of the child by the age of majority.

Here, you should know that chronic asthma that is not treated is more likely to cause children to be stunted than to steroid. Steroid inhalation is very effective in all patients with asthma, the most common treatment.

Mixed sprays (for prevention and sedation)

There are currently three types of sprays, seritides (a combination of fluticasone and salmitrol) and a simpicur (a combination of budsonide, formoterol) and foster (a combination of biclometasone and formoterol), containing inhaled steroids and long-acting bicarbonate Sprays The patient is forced to use aerosols, and this type of mixed

sprayer is usually used on a regular basis, but it can be used at different doses depending on the symptoms.

Sodium chromoglycate

Sodium chromoglycate has been available since the availability of inhaled steroids, a good protective drug in mild asthma cases in childhood, especially in controlling symptoms of exercise. It should be used 3 to 4 times a day, more than inhaled steroids, but it can be used simply before exercise to prevent symptoms, and almost no side effects.

Nidocromyl (Tilad)

Nidocromyl sodium has a protective ability similar to that of a small dose of inhaled steroids, and is available in powdered powder powder with mint flavor.

New drugs

Omalizumab (Axolier)

This revolutionary drug aims to neutralize the effect of immunoglobulin Immunoglobulin E (IgE). It is available as an injection once every 3 weeks for patients with high sensitivity asthma. This drug gives great hope to people with severe asthma, but is not used by patients with mild disease. The use of this drug is still limited in the UK because of its high price.

Other drugs

Two other combinations of drugs are used to treat asthma:

• Theophylline.

• Leukyrene shutters.

Leucerin Envelopes

Leucerins (such as Sangolir and Acolite) are relatively new types of drugs used to treat asthma, mainly protective drugs, but also act as bronchodilators, which appear to be somewhat beneficial to people suffering from many problems, who suffer from There is information that people with cough and sputum symptoms benefit more than these drugs, although these drugs should theoretically be beneficial, especially asthma patients with aspirin sensitivity, but it appears that all people suffering from This type of asthma is not You know, but more tests are needed, and so far, their side effects appear to be few.

The basic types of inhaled asthma drugs (1)

Most asthma returns are taken by inhalation, and analgesics reduce the severity of the patient's complication when he has an asthma attack.

Table 1 the types of inhaled asthma drugs Analgesics

Name of the drug	Name of the inhaler
Salbutamol	Vantolin Salbutin Salamol Iromir Ivohaler
Terbutaline	pricanil
SALMETEROL	SERIVENT
FORMOTEROL	FORADEL oxygen
Epitropium	Atrovent
Teutropium	Spiriva

A) Long-acting bronchodilators, which may last for up to 12 hours

B) Teotropium may last between 12 and 24 hours.

The basic types of inhaled asthma drugs (2)

Protective drugs should be used regularly to control the symptoms of asthma.

Table 2 the types of inhaled asthma drugs Analgesics.

Name of the drug	Name of the inhaler
Biclometasone	Asmibic Piclazon Sets Aerobic kits Vilar collections Kefar Groups Clencil Sets
Polymecourt	bodysonide
Fluticazone	flexed
Seleconside	Alfesco
Mumitasone Forot	smanics
ASodium Cromoglycate	Intal- Chromolin- Nalcrom
Nidocromile	Tillad

D - Dosage dose, fluticasone is twice as potent as beclomethasone and budesonide.

Theophylline

The group of drugs known as theophylline (such as Unifilene contenas, phyloconentin, cantinus, and Noelim SA) have been used primarily as bronchodilators, but are now used for greater prevention, but their use today is less than in the past because of the stable efficacy and safety of inhaled steroids. Head in some patients, but oral intake is one of its advantages, as some people have difficulties in the use of sprays.

Emergency treatment

It is very important when you are in a severe asthma crisis to get medical assistance. When you have this type of crisis you can undergo two basic types of emergency treatments:

• Large doses of analgesic drugs (often via aerosols).

Large doses of anti-inflammatory drugs (by injection or steroid tablets).

Some patients may be able to start emergency treatment alone using sprays or steroid tablets, but most patients, especially those who have not had a major problem, should contact the GP quickly or go to the emergency department. Any delay can cause many problems, so it is better to get treatment quickly.

Vaporizers

The drugs given in fumigants in the case of severe asthma crises are salbutamol (phantoline), terbutaline (pricanyl) and impratropium (etrovent), and the fumigant should be used only after consultation with the physician.

The vaporizer itself is simply an air pressure machine that exits the air by mixing it with the drug to produce an inhaled substance through a mask or device placed in the mouth. These devices are not always available in government health departments, so you should buy a device yourself or borrow one from a specialized charity.

How evaporators work

The vaporizer itself is simply an air pressure machine that exits the air by mixing it with the drug to produce an inhaled substance through a mask or device placed in the mouth.

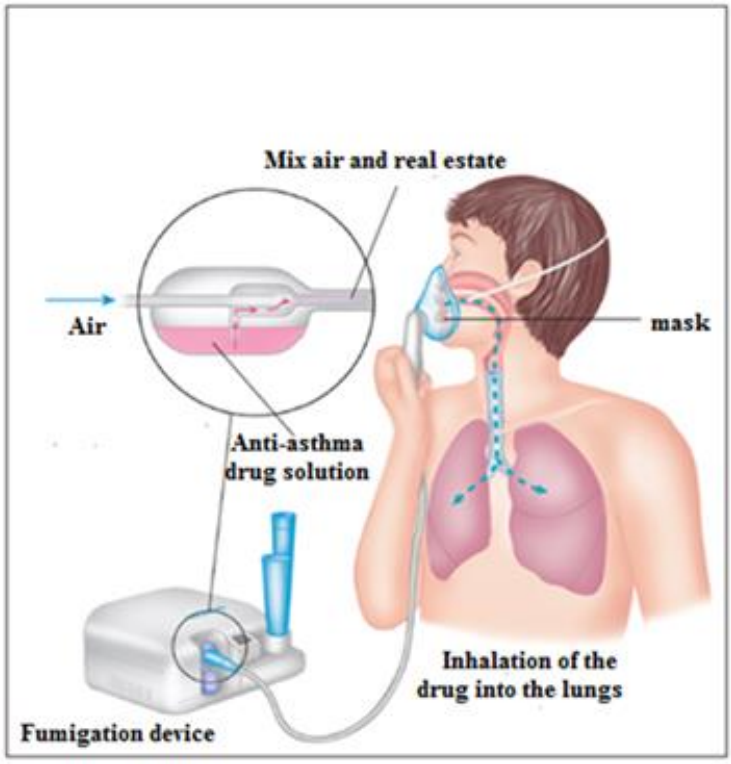

Fig. 2 vaporizers work.

There is increasing evidence that large bronchodilator doses that pass through large open ventilators are as effective as fumigants in the treatment of asthma. It is important for children, especially because their use is simple and cheap.

Sometimes, the doctor may prescribe the drug to be used by fumigation for patients with severe asthma when large doses of other drugs fail. Drugs should not be used by fumigation as an alternative to inhaled protective drugs.

Devices used for drugs

Some patients are unable to use single-dose aerosols effectively. Using this technology may cause the drug to leak into the air. The patient may think the sprayer is damaged. If you are one of these patients, you can use another type of respirator that depends on your breathing to attach the property to the lung, unlike the normal sprays.

It is the most common device used, a plastic "balloon" serves as a reservoir for the property to get the patient during the inhalation at the right moment. The windshield wipers are made of fragile plastic, and there is evidence that they require a large amount of static electrical charge, to attach the drug inside the cleaver, which reduces the amount that reaches the lungs. It is advisable to clean the dispenser once a week and leave it to dry. Expanded friction with volatile clothing such as those in stores that sell high-tech devices can help alleviate this problem.

Other types of respiratory aids include Rotaheller, Turbohiler, Disc Heller, Axhoiler, Hailer and Autohiler.

Sprayer-type sprays and sprays have different features,

which may be better suited to some patients than others. In many cases, it appears that a patient may be comfortable with some type of sprayer more than others.

So it is very important that the patient get the device that suits him, because he will use it when needed more than other devices. With the exception of bypass devices, breathing aids are expensive, although a "expensive" device may become cheaper in the long term if we compare the extent of the patient's suffering to a "cheap" device that does not help.

Disconnectors

He was able to focus on the patient's inhalation of the drug rather than having to sniff between the inhaler and pressing the sprayer button at the same time.

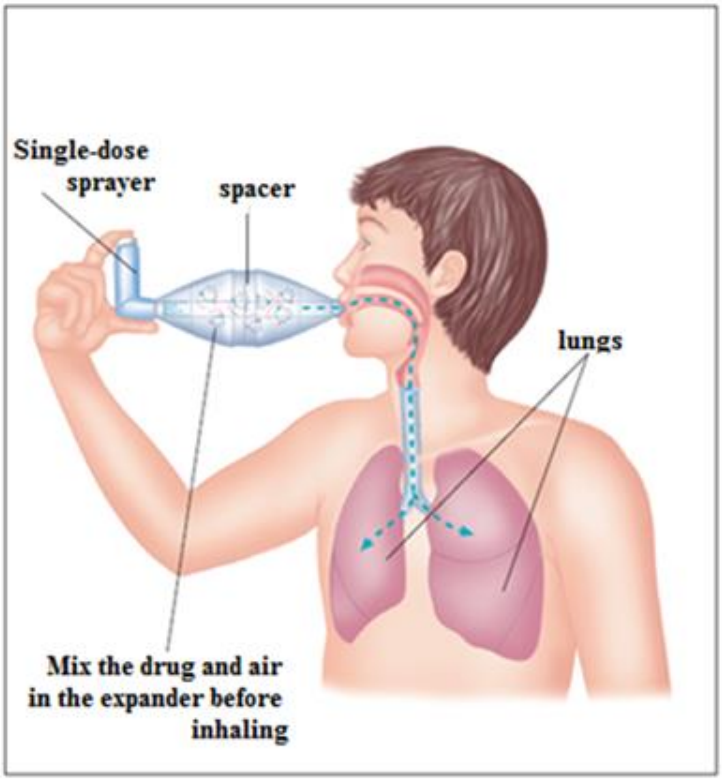

Fig. 3 the cloning devices

Disposal of chlorofluorocarbons

In the past, most single-dose aerosols contained chlorofluorocarbons (CFCs), which we now know to be harmful to the ozone layer. But today all the sprays used are free of this organic compound.

Conclusion

Asthma will certainly not disappear from the world. It is a common disease and will probably remain at its current levels in the near future. We will be in better health if we can control the exposure to allergens, and this will be important in the first five years of the child's life, as the sensitivity of dust mites increases. Asthma is a chronic disease that affects the lungs, where airways that carry air from the lungs and lungs are narrowed and therefore difficult to breathe.

References

1. Global initiative for asthma. 2018 Gina Report, Global Strategy for Asthma management and Prevention. En: Global Iniciative for Asthma [en línea] [consultado el 28/04/2017]. Disponible en http://ginasthma. org/2018-gina-report-global-strategy-for-asthmamanagement-and-prevention/
2. Grupo de trabajo de la Guía de Práctica Clínica sobre Asma Infantil. Guía de Práctica Clínica sobre Asma Infantil. En: Respirar [en línea] [consultado el 11/05/ 2018]. Disponible
3. British Guideline on the Management of Asthma. En: British Thoracic Society, Scottish Intercollegiate Guidelines Network [en línea] [consultado el 11/05/ 2018]
4. Diagnóstico y tratamiento del asma infantil. Información Farmacoterapeútica de la Comarca. Infac. 2016; 24(1).
5. Callén Blecua M, Praena Crespo M; Grupo de Vías Respiratorias. Normas de calidad para el tratamiento de Fondo del Asma en el Niño y Adolescente. Documentos técnicos del GVR. En: Respirar [en línea] [consultado el 11/05/2018].
6. Grupo de trabajo de la Guía Española para el Manejo del Asma. GEMA 4.1. En: Gemasma [en línea] [consultado el 11/05/2018]. Disponible en gemasma.com