

Buteyko Breathing Technique

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ABSTRACT

Breathing exercises are often used in asthma management. A form of respiratory therapy, known as the Buteyko respiratory process has received much attention, but there is a lack of strong research evidence supporting its recommendations for asthma patients. There are only four published clinical trials and two conference themes examining BBT. Although all reported improvement in one or more outcomes, the results were consistent. This document provides the background for Buteyko Breathing Technique reviews the available evidence of its use and examines the body's view of its support. As with other therapies, it is not a standard treatment. The Buteyko Breathing Technique 'package' is complex, as it includes advice and education on medication use, nutrition and exercise, and regular rest. This makes it difficult, and perhaps inappropriate, to try to pull out one process. Buteyko's view of carbon dioxide and airway calibre levels is appealing, and it contains some evidence from experimental studies. However, it is not known whether changing the respiratory system could significantly increase carbon dioxide levels, and there is currently insufficient evidence to suggest that this is the mechanism of action any BBT can have. Further research is needed to determine beyond doubt whether Buteyko Breathing Technique works, and if so, how effective it can be.

1 Introduction

Butyko's method or Butyko's breathing procedure is a combination therapy or alternative that suggests the use of breathing exercises primarily as a treatment for asthma and other respiratory conditions. [1] In 1950, Drs. Konstantin Pavlovich Buteyko, who began organizing its principles.

Based on the assumptions of many medical conditions, including asthma, it is caused or exacerbated by chronic increased respiratory rate or hyperventilation. This technique restores the respiratory pattern by using continuous breathing tests to correct hyperventilation therapeutically or to treat any other hyperventilation-related conditions. Treatment includes a series of reduced respiratory tests that focus on nasal breathing, respiration, and relaxation.

Buteyko exercise reduces symptoms and dependence on medications for patients with asthma, chronic obstructive pulmonary disease (COPD) and chronic hyperventilation. The medical community questions whether the evidence supporting the theory of this method is based on its practical application. [2]

2 About Professor K P Buteyko



Konstantin Pavlovich Buteyko was born on January 27, 1923, in a small farming community of Ivanitsa (about 150km from Kiev). In 1946, he enrolled for medical training at First Medical Institute in Moscow. In 1953, KP Buteyko was given a practical assignment, in this he included monitoring patients' breathing, and he spent hundreds of hours recording their breath.

During this time, KP Buteyko found that bad breath causes many health problems. After that, his entire professional life was devoted to researching and refining the respiratory system that has helped thousands of people around the world overcomes many respiratory problems.

In the early 1980's, Russian authorities were impressed with Butyko's results by allowing him to be formally charged, or 'honored,' with asthma children in a Moscow hospital. Although very different from the construction of the current controlled trial in the West, the results were impressive enough to persuade the State Medical System to approve its widespread use.

In 1990, Alexander Stalmatski, Butyko Practitioner and former KP Buteyko student,

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introduced Butyko's approach to Australia and began training physicians. Butyko's first blind, controlled case was committed in 1994. The Butyko Institute of Breathing and Health and its staff continue this work. Many thousands of people around the world have benefited from the life-saving program launched by KP Butyko. [3]

3 History

Butyko's method was first developed in 1950 by physiologist Konstantin Butyko in Russia. [4] The first official study of the operation of the Butyko Method on asthma was conducted in 1968 at the Leningrad Institute of Pulmonology. Second, held at the First Moscow Institute of Paediatric Disease in April 1980, it eventually led the head of the Department of Health to issue a directive on Butyko's approach to the treatment of asthma. [5] Later, the method was introduced in Australia, New Zealand, Britain, and the United States, where it has received increasing exposure. Anecdotal reports of life-changing development given Butyko's approach abound on the Internet and in books. [6]

Butyko's method is just one of many therapies used for the treatment of lung ailments, including common techniques such as physiotherapist-led exercise and other therapies such as Butyko's breathing and yoga. [7]

In 2019, the famous Indonesian singer Andien posted pictures of herself, her husband and their two-year-old son silently posting on social media. The pictures sparked a conversation and interest in the Butyko style. [8]

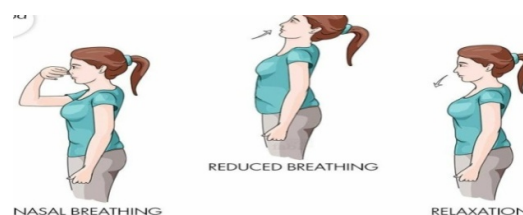
4 Method

Butyko's method is based on the concept of "hidden or undetectable secretions" which are the cause of many medical conditions, including asthma. It is known that hyperventilation can lead to low levels of carbon dioxide in the blood (or hypocapnea), which can lead to disruption of acid-base balance in the blood and low oxygen levels. Proponents of this practice believe that the effects of chronic hyperventilation may have far more serious consequences than those widely accepted. These effects include bronchospasm, disruption of cell production by the Krebs cycle, and disruption of the body's many vital chemicals. [9] Butyko's method is the so-called "re-education" of the respiratory pattern to correct chronic hyperventilation and hypocapnia, and thus treat or treat the body for these medical problems.

Butyko's method is not widely supported in the medical community, partly because research has not supported the notion that hyperventilation and hypocapnia cause diseases, with one review saying there is no convincing evidence that attempts to reverse asthmatics carbon dioxide levels are "desirable or achievable". [10] Studies

looking for evidence to support this view, such as carbon dioxide levels by Butyko experts; have not found this evidence, which has led some to suggest alternative methods of study in this way to improve symptoms.

Although there are differences among teachers of this procedure in different countries, the main purpose of "getting used to" breathing and Butyko's three main principles remain the same: **nasal breathing, shortness of breath and rest.**



5 Nasal breathing

Sniffing through the nose Butyko's method emphasizes the importance of nasal breathing, which protects the airways by relaxing the air, heating and purifying the air that enters the lungs. Most asthmatics have trouble sleeping at night, and this Butyko staff is thought to be linked to improper posture or unconscious mouth breathing. By keeping the nose clear and promoting nasal breathing during the day, night-time symptoms can also improve. Excessive nasal breathing during exercise is another important aspect of Butyko's approach.

6 Reducing breathing tests

Butyko's main exercises include airway management: with a reduction in respiratory rate or respiratory capacity. Many teachers refer to Butyko as 'breathing training' and compare how to learn to ride a bicycle. Once time is used to practice, the techniques become natural and the tests gradually fade as the situation improves.

Butyko uses a measure called Control Pause (CP), a period between breathing that one can hold properly. According to Butyko teachers, people with asthma who are accustomed to breathing Butyko will experience an increase in Control Pause and a decrease in heart rate associated with reduced asthma symptoms.

7 Rest

Coping with asthma attacks is an important part of Butyko's actions. The first sensation of asthma attacks is disturbing and can lead to shortness of breath. By controlling this initial stage of respiratory failure, asthmatics can prevent the "vicious circle of over-breathing" from developing and entering asthma attacks. This theory ensures

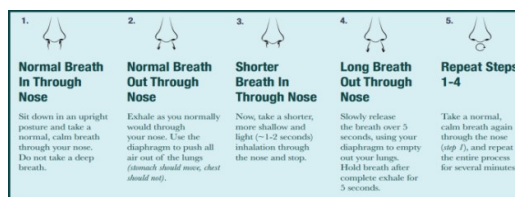
that asthma attacks can be prevented by simply breathing slowly. [11]

8 Benefits/Uses of Buteyko breathing technique for patient

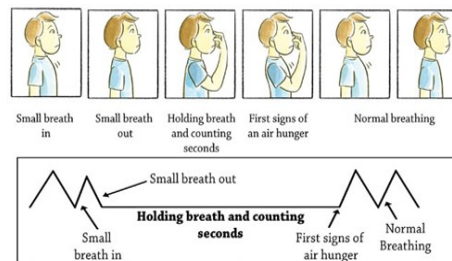
When taught by an experienced physiotherapist, Buteyko's procedure is a safe and effective method that offers many benefits:

- **Advanced Exercise Tolerance** - This benefits all Buteyko practitioners, but it is also very beneficial for athletes as it allows them to train more which can lead to improved performance.
- **Improved quality of life** Decreased mucus production - This reduces the impact on the airway –e.g reducing, and reducing the need for coughing.
- **Coughing is easy** - Coughing is easier because the airways are kept open. For people with asthma - it reduces the frequency and severity of asthma; this reduces the reliance on medication.
- **Independent procedure** - if this method is used it does not require monitoring or equipment, this will allow the patient to become more independent in managing their condition.
- **It is safe.** The respiratory system is safe when performed as instructed by Buteyko's trained specialist.
- **It helps to save money.** Once a patient has learned Buteyko's approach from a specialist, audio CD tutorial, webinar or weekend workshop, the patient spends less on medical expenses and little or no use of medication.
- **Helps the patient to reduce drugs.** Once patients are well versed in breathing tests, many of them can reduce or completely eliminate their asthma medications, including steroids, which have side effects if taken for a long time.
- **It changes the way of hearing.** Asthmatics that learn Buteyko's method naturally begin to eat less, feel healthier and need less sleep. They wake up feeling energetic, more relaxed and experience a few episodes of coughing, sneezing and breathing problems.
- **Provides patient control.** Buteyko's method allows the patient to fully control the cough, get into asthma attacks so that the patient can regain his breath and avoid panic when he is in a place other than his own.
- **It contributes to perfect health.** Because Buteyko's respiratory system restores Carbon dioxide levels in the lungs to normal, they have a positive effect on the immune system and metabolism. People find that they feel better, have fewer fevers and colds and find relief from symptoms they were unaware of and are related to, such as fatigue, low depression, joint pain and eczema. [12]

How to do it



OR



Buteyko's breathing teaches the patient to breathe more slowly and faster. The patient will learn to breathe slowly and deeply, which measures the breathing rhythms.

Includes exercises that teach holding of patient breath and avoiding breathing. It is said that over time the respiratory system will become a natural part of our daily lives.

Preparation

1. Should be sit down or in a chair.
2. Join the spine to stay upright.
3. Relax the respiratory muscles.
4. Breathe normally for a few minutes.

The Control Pause

1. After taking a deep breath, should be hold the breath.
2. After that should be used the index finger and thumb to connect the nose.
3. Hold the breath until feeling the urge to breathe, which may involve the non-engaging movement of the diaphragm, and then exhale.
4. Should be breathing normally for at least 10 seconds.
5. Should be repeat several times.

Maximum pause

1. After taking a deep breath, should be hold the breath.
2. After that should be Use of index finger and thumb to connect the nose.
3. Keep the air as long as possible, usually twice the length of the Control Period.
4. Until reached the level of moderate discomfort, should be pull.
5. Should be breathing normally for at least 10 seconds.
6. Should be repeat several times.

While Buteyko's Drawbacks

Breathing has many benefits, it may not be good for everyone and it is not a place for a doctor's treatment program. Always should be talk to the health care provider before starting breathing tests.

Buteyko's breathing process should be avoided, if the patient is having any problem of the following:

- High blood pressure
- Heart disease
- Epilepsy
- Serious medical concerns [13]

9 Role of nurse

Nurses are said to play a key role in the clinic and serve as a full-time volunteer in her field. In asthma patients the nurse plays a major role in buteyko's respiratory technology. There are certain important roles for nurses that follow such as

- **Daily practice is important:** The nurse should explain to the patient how to practice buteyko exercise daily. The nurse should teach the patient that breathing style has improved over the years and is a big part of walking.
- **Teach Buteyko's breathing steps:** The nurse should teach all the steps of the buteyko breathing system to the patient.
- **Prevention of colds and flu:** The flu and flu can make asthma symptoms worse for a while. The nurse teaches the patient that the main way to get the flu is not from people sneezing on the face but from hands that come in contact with germs. Hands should be washed regularly or using alcohol can help prevent colds and flu attacks.
- **Nose breathing during the night:** A nurse who has taught a patient that nasal breathing is very important that helps breathe through the nose or while asleep. This is a procedure that Buteyko can choose that many people, especially those with asthma, have found to be helpful in reducing symptoms when they wake up.
- **Exercise regularly:** The nurse advises the patient to choose an activity such as walking or swimming when the patient has full control over the pace of the activity. Breathe through the nose all the time - if the patient is breathing so hard that they feel the urge to open their mouth and stop, control the air by breathing through the nose, and then move slowly.
- **Lower those pounds and eat well:** The nurse should teach the patient to eat properly. Eat in moderation, but drink plenty of water. Concentrate on eating a variety of vegetables and grains in the diet, as well as certain fruits, as well as small pieces of meat and fatty foods.

- **Avoid physical contact:** The nurse should teach the patient to be aware of the factors that cause its symptoms. Common examples are household dust, pets, pollen, smoke, fungi, fragrances and certain foods.
- **Hygiene of the mouth and feet:** Doctors also believed that the same was true of other chronic illnesses such as athlete's foot, which is why the nurse should teach the patient proper oral hygiene and warfare.
- **Improve the stress management:** Other emotions such as sudden fatigue, tension, palpitations and even breathing may be symptoms of anxiety, rather than asthma, so avoid stress. [14]

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