



While there are multiple methods that would make you feel relaxed from stress, *The Pioneer* came across box breathing, which rapidly removes oneself from stressful situations. This week, for the column of Health Talk, *The Pioneer's* Shikha Duggal connects with experts, bringing a detailed analysis of the same.

SHIKHA DUGGAL

We were astounded by a potent yet straightforward relaxation method that attempts to restore breathing to its regular pattern following a stressful event! It appears to entail inhaling and exhaling while holding your breath, which could aid with mental clarity, physical relaxation, and enhanced attention — “Box-breathing” is a useful method for rapidly removing oneself from stressful situations. One other important observation we made that motivated us to learn more about this health issue was that individuals in high-stress occupations, including law enforcement and the military, frequently use box breathing while their bodies are in fight-or-flight mode! In this week’s health discussion, let’s learn more about this breathing method.

The demands of daily life and the constant exposure to stimuli put us on overdrive all the time. People’s enduring sense of being ‘on edge’ is a factor in the rising prevalence of anxiety and stress-related disorders! According to a research published by the Indian Psychiatry Society, anxiety disorders rank among the most prevalent mental health conditions in India. On the other hand, a number of easy-to-use methods can help bring anxiety under control fast. One of these instruments, the box-breathing method, is based on the essential act of breathing. Box breathing is a very powerful method that has become more and more well-liked in recent years as a way to reduce stress, sharpen attention, and foster calm.

Dr. G. Uday Kiran, Consultant - Pulmonary Medicine, Respiratory sciences, at Manipal Hospitals, Vijayawada says, “Sama vritti, also known as box/square breathing, is a type of controlled breathing that consists of inhaling, holding your breath, expelling, and holding again, all for equal counts. It is essentially a ‘pranayama’ method. Breathing slowly and deliberately lowers

BOX-BREATHING: A quick fix for serenity and clarity

blood pressure in hypertensive individuals and alleviates asthma symptoms. Breath-focused exercises reduce anxiety and intrusive thoughts, improve problem-solving skills, and heighten emotions of tranquility. Intentional regulation of breathing also activates the vagal nerve, which facilitates relaxation, and lowers sympathetic tone, which is the portion of our neurological system responsible for the fight-or-flight reaction.”

Numerous studies show that the controlled breathing techniques used in yoga have numerous psychological and physical advantages. Long-term exhale encourages relaxation while focused inhalation raises attentiveness! In addition, it controls blood pressure, digestion, and heart rate. The breathing pattern used in box breathing is similar to a box with four even portions breathing. It is easy to do and requires the following actions:

- 1) Take a straight seat, either on a chair or the floor with your legs crossed
- 2) To clear your lungs, fully exhale
- 3) Breathe in for four counts
- 4) Hold the breath you just inhaled for four counts
- 5) Let out your breath for four counts
- 6) Hold for four counts

“Many professionals, including elite athletes, military personnel, mental health practitioners, and corporate executives, use the box breathing technique due to its simplicity and immediate calming effects,” says Dr. Uday, the pulmonary expert. The focus of box breathing is on deliberate, slow exhalations that trigger the parasympathetic nervous system, which is a component of the nervous system in charge of the body’s ‘rest and digest’ processes. This transition from the sympathetic to the parasympathetic states aids in lowering blood pressure, heart rate, and tense muscles while fostering feelings of peace and relaxation. The brain and other organs receive more oxygen when we breathe. Box breathing maximises the quantity of oxygen that the lungs absorb by encouraging deep, diaphragmatic breathing. The brain’s better blood flow and higher oxygen delivery both boost concentration and cognitive performance. When we are under stress or anxiety, we frequently become engrossed in our own worried thoughts. This is where turning our attention to our breathing and observing each inhalation and exhalation helps us to bring our attention into the here and now. It reduces tension and provides a break from point-

Box breathing can also help improve attention

CASE STUDY

34-year-old athlete Shweta Joshi (name changed) juggled rigorous training with obligations to her family. She experienced deteriorated confidence and respiratory health after giving birth and after COVID-19. Shweta’s performance and recuperation attempts were hampered by her inability to concentrate and her anxiety during competitions when she returned to sports. After learning about box breathing from sports psychology, she used it to increase her mental acuity and respiratory strength during her warm-up and pre-competition exercises. Her performance, endurance, and focus all improved dramatically with this practice, which was essential to her competitive success.

and concentration because it increases the intake of oxygen, improves blood flow to the brain, and fosters awareness. It increases productivity and sharpens mental clarity. It is a method that has been studied extensively and even used by experts as a possible treatment for psychosomatic and chronic pain. This breathing method can ease some of the physical discomfort linked to a number of chronic illnesses, including fibromyalgia, arthritis, and migraines, by lowering muscular tension and encouraging relaxation. Box breathing has relaxing properties that can be especially helpful for people who have trouble falling asleep. Box breathing helps people fall asleep and have better-quality sleep, which further supports good physical and mental health, by concentrating on relaxation and lowering racing thoughts or worry.

A lesser known fact is that breathing involves more than just the lungs. It has further effects on the cardiovascular and neurological systems. Not only does changing our inhalation volume impact our oxygen intake. The amount of blood that is actually expelled from our hearts is affected by the way we breathe. Dr. Malini Saba, a psychologist shares exclusively, “Athletes, Navy SEALs, cops, and nurses all favour the approach because it works well for stress management and improving performance under duress. While Navy SEALs and officers maintain composure in stressful situations, athletes enhance their focus and stamina, and nurses handle stress while maintaining patient attention! It is indispensable in difficult and high-pressure situations due to its ease of use, versatility, and immediate soothing effects.”