



Hue Light USA

IMMUNITY CARE SYSTEM



HYPERBARIC OXYGEN THERAPY

**ENHANCES CARDIAC
FUNCTION IN A**

NORMAL AGING HUMAN

Although we often think of heart disease as something that only affects older adults, the truth is that anyone can develop cardiac problems. Fortunately, treatments available can help improve cardiac function, even in healthy aging adults. One such treatment is hyperbaric oxygen therapy (HBOT). HBOT involves breathing 100% pure oxygen while inside a specially-designed chamber. This allows the body to absorb more oxygen than it would be able to by simply breathing room air. The increased oxygen levels help improve blood flow and reduce inflammation, both of which can improve cardiac function.

The Sagol Center for Hyperbaric Medicine and Research at the Shamir Medical Center has found that hyperbaric oxygen therapy (HBOT) can significantly improve heart functionality in healthy aging humans. Prof. Shai Efrati and Dr. Marina Leitman, the head of the Echocardiography Unit and Noninvasive Cardiology Service at Shamir Medical Center from the Sagol Center for Hyperbaric Medicine Research, brought their attention to HBOT's impact on cardiac function in a recent study conducted by them. They found that patients who had undergone this treatment were more likely than others with normal hearts (without any signs of dysfunction) to not only exhibit improvements within several months after starting therapy but also maintain those gains over time, even if they went into decompensation later downstream.

ABOUT THE STUDY

Completely healthy patients were put into a 60-session HBOT treatment course adhering to the Sagol Center's regenerative HBOT Protocols. 31 patients were assessed using high-resolution echocardiography before and after they were given a 3-week treatment of HBOT to identify the prolonged effect of the treatment. Efrati states, "Hyperbaric oxygen therapy includes inhaling 100% oxygen at more than the average atmospheric pressure at sea level, i.e., one atmosphere absolute [ATA]." Moreover, in the past, HBOT was mainly used to treat chronic, non-healing wounds. Now, with Efrati's new approach, it can also trigger regeneration in your body!

While discussing with the Jerusalem Post, Efrati further said, "In recent years, there is growing evidence on the regenerative effects of HBOT. We have now realized that the combined action of both hyperoxia (an excess of oxygen in the body) and hyperbaric pressure leads to significant improvement in tissue oxygenation while targeting both oxygen and pressure-sensitive genes, resulting in improved mitochondrial metabolism with anti-apoptotic (anti-cell death) and anti-inflammatory effects." As per Efrati, the newly designed protocols use intermittent increasing and decreasing of oxygen concentration, which causes what is known as the "Hyperoxic - Hypoxic Paradox.

This process stimulated stem cell proliferation and mobilization, developing new blood vessels and tissue regeneration in the "normal" aging heart. Previous studies at the Sagol Center have shown the effectiveness of HBOT in treating traumatic brain injury and stroke, but this marks the first time its benefits have been demonstrated in improving cardiac function. These findings suggest that hyperbaric oxygen therapy may be a promising option to enhance cardiac health in a normal aging human.



Hue Light USA

IMMUNITY CARE SYSTEM

Efrati said that for the last 12 years, his team has developed an ongoing research program "that investigates the regenerative effects of HBOT on different issues and degrees of damage. In the beginning, we were focused on non-healing peripheral wounds. Then, we turned our focus to certain types of brain injuries." In a 12-year study on the regenerative effects of HBOT, Dr. Shai Efrati and his team found that the therapy can induce crucial elements for tissue repair in not just peripheral wounds and brain injuries but also the heart and other organs affected by aging. By improving mitochondrial function in the heart, HBOT may be able to combat age-related declines in cardiac function. The study is ongoing, but these exciting findings suggest that HBOT could potentially play a role in promoting overall longevity and health in older individuals.

Energy production is carried out by the cell's powerhouse, the mitochondria. Cell regeneration and mitochondrial function can decline with age, leading to decreased heart function and various health issues. However, a recent study has shown promising results in using hyperbaric oxygen therapy (HBOT) to improve mitochondrial function and heart contractility in older adults. By exposing the mitochondria to fluctuations in oxygen levels through HBOT sessions, study participants experienced improved heart function over the course of 60 sessions. The effect of HBOT primarily impacted the left ventricle, the chamber responsible for pumping oxygenated blood throughout the body.

Efrati also confirmed that the hyperbaric oxygen treatment could be used on people with predisposed heart conditions. However, he added that more research would be needed to understand the extent to which the HBOT can help in the treatment of heart diseases since the current study was conducted on 31 asymptomatic, normal aging heart patients.

CONCLUSION

One more study shows the positive impact of hyperbaric oxygen therapy on human aging. Efrati has the best take on using HBOT to enhance the critical functions of critical organs of the human body; he said, "When you look at aging as a disease that can be measured, then it can be treated, and this is a serious area of investigation for us." You can also learn more about hyperbaric oxygen therapy by contacting us. Our experts will guide you through the process to clear your doubts.



ADDRESS

146 Rock Hill Dr
Rock Hill, NY 12775



CONTACT DETAILS

Phone: 845-796-9951
Email: info@huelightusa.com