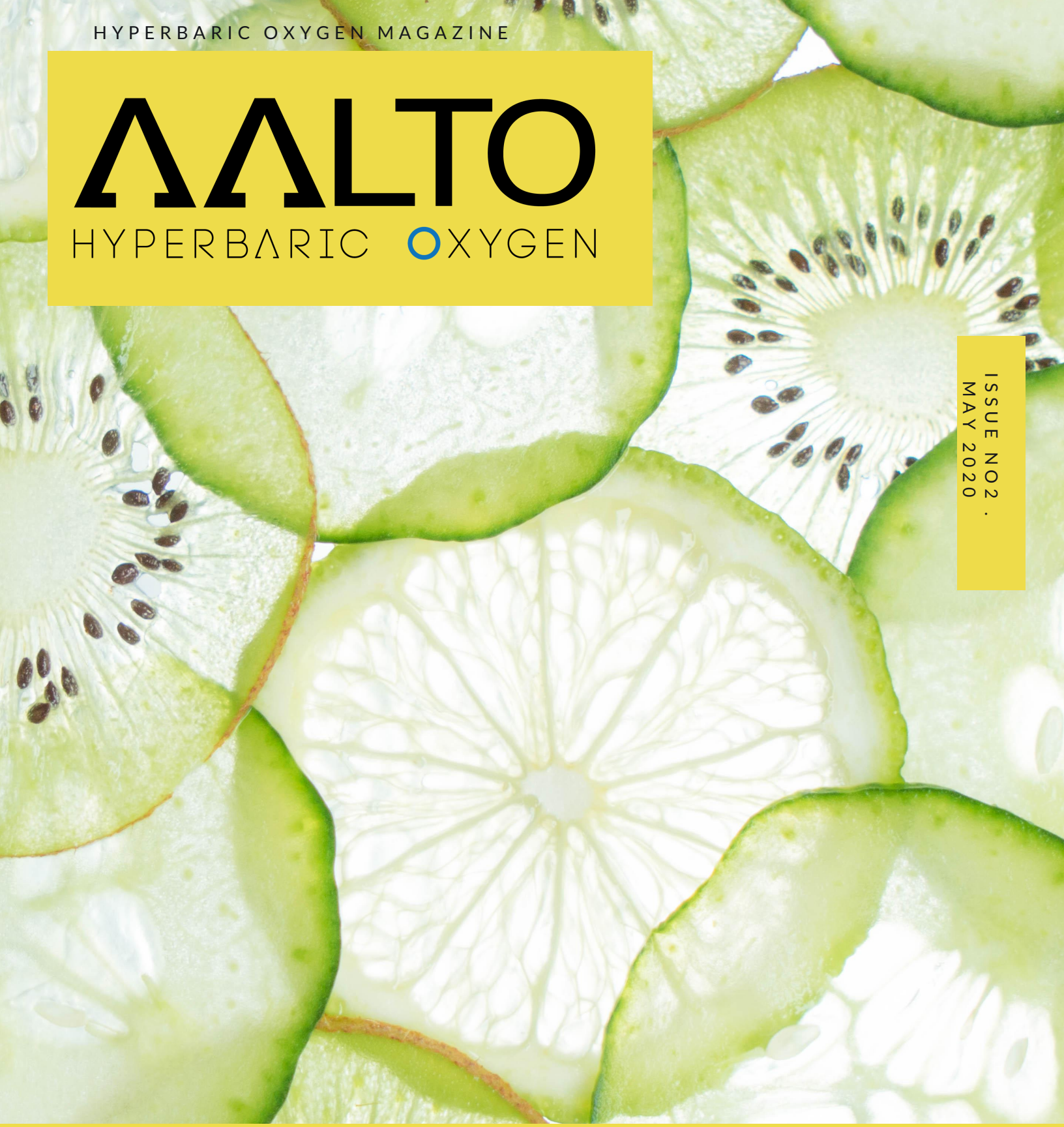
HYPERBARIC OXYGEN MAGAZINE

AALTO
HYPERBARIC OXYGEN



ISSUE NO2 .
MAY 2020

HBOT AND COVID-19

From preventive measures to boosting immunity to how HBOT helps prevent complications from clots and blood coagulation

HBOT AND OSTEOPOROSIS

What Osteoporosis is and how HBOT can be integrated into the treatment plan to strengthen your bones health

MAY CALENDAR

May is National Osteoporosis Month
May 12th - National Fibromyalgia Awareness Day
May 25th - Memorial Day: Saluting our Military Service Heroes

Welcome to our Features

03 **HBOT and COVID-19**

06 **HBOT and Osteoporosis**

07 **HBOT and Fibromyalgia**

08 **HBOT and PTSD (Post Traumatic Stress Disorder)**

www.AaltoHyperbaric.com

1-888-303-HBOT (4268)

Photo: Mono chamber at our Century City California location.
At AALTO Hyperbaric Oxygen, our goal is to shift the percentage of dissolved oxygen in every cell in the body to levels that are 15-20 times higher than in a normal environment of 21% oxygen in the air. This can help create an internal mask of protection that will help prevent illness.

HBOT and COVID-19

Here is what we know about COVID-19 [2]: it infiltrates the respiratory system causing acute respiratory distress from complications ranging from lung mechanics failure to blood clots.

Here is what we know about Hyperbaric Oxygen [1]: it oxygenates the blood helping to inhibit pulmonary inflammation, suppress respiratory secretions and prevent coagulation or formation of blood clots.

So as we look at the novel coronavirus it seems to be an intuitive summation that HBOT would be helpful in treating this disease which seems to now be getting attention judging by recent studies[3] and clinical peer discussion[4] ranging from NYU Langone Health to Dr Caroline Fife, MD, CHI St. Luke's Hospital, The Woodlands, Texas.

However, for those who are seeking preventive measures in support of immunity and wellness the benefits of hyperbaric oxygen therapy are even more clear.

Links:
[1] https://academic.oup.com/pjmed/article/97/7/385/1605756
[2] www.hopkinsguides.com/hopkins/view/Johns_Hopkins_ABX_Guide/540747/all/Coronavirus_COVID_19__SARS_CoV_2_
[3]https://clinicaltrials.gov/ct2/show/NCT04332081
[4] https://carolinefifemd.com/2020/04/04/hyperbaric-oxygen-therapy-for-severe-covid-19-pneumonia/
[5] https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6693142/
[6] https://www.ncbi.nlm.nih.gov/pubmed/29334015

FEATURE

Our immune system is essential to our survival and keeps us healthy because it prevents our body from being attacked by bacteria, viruses, and parasites.

An example of the body's immune response system is made up of white blood cells. White blood cells circulate in the body in the blood, and are on constant patrol for bacteria, viruses and parasites. When the white blood cells find a target they begin to multiply and send signals out to the other cell types to do the same.

As we age our immune response capability becomes reduced. When your immune system is compromised it allows viruses like COVID-19 to enter your body. HBOT is "NOT A CURE" but it has been demonstrated to dramatically increase immune function.

Hyperbaric oxygen therapy boosts immunity by delivering 100% oxygen to the pulmonary system[5] (lungs) which then delivers this oxygenated blood throughout the rest of the body. HBOT kills germs, eliminates bacteria[6], and increases the number of white blood cells. It provides an aggregate positive effect on a person's overall immune system.

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COVID-19 testing included in your wellness or treatment package while supply last!

Your Health is Your Wealth

Get Peace of Mind. Get Tested.
We offer the NIRMIDAS Biotech COVID-19 antibody test to our patients, providing accurate results within 20 minutes.
Protect your wellness and boost your immunity with a hyperbaric oxygen therapy session offered as a preventive measure to inhibit:

- Pulmonary inflammation
- Kill germs
- Eliminate bacteria and
- Increase white blood cell count

Disclaimer: If you have tested positive for COVID-19, are aware that you were exposed to COVID-19 patients, or have had symptoms of COVID-19 within the last 14 days, please call us to reschedule your HBOT session.

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Protecting your health:

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If you do not have to work or go out practice self quarantine and these safety guidelines

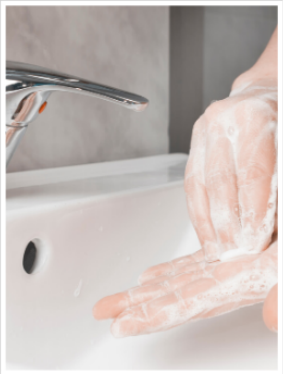
Stay at home.

Limit all your non-essential travels.

Unless you're going out for food or medicines or other essentials.

Wash your hands.

Practice good hand hygiene by washing your hands with soap and water or using alcohol or hand sanitizer.



Check your temperature.

Check your temperature at least two times a day.

Stay in a specific room.

If you're sick or suspect yourself to be sick, it's best to stay in a designated room or area away from others.

If possible, have a designated toilet and bathroom

Watch for other symptoms.

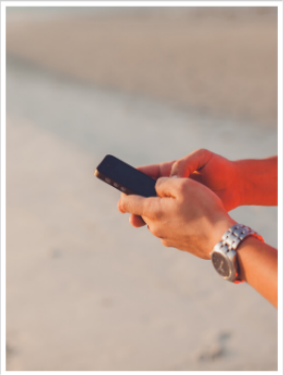
Aside from fever, Covid-19 symptoms include cough, difficulty breathing, and fatigue.

Practice social distancing.

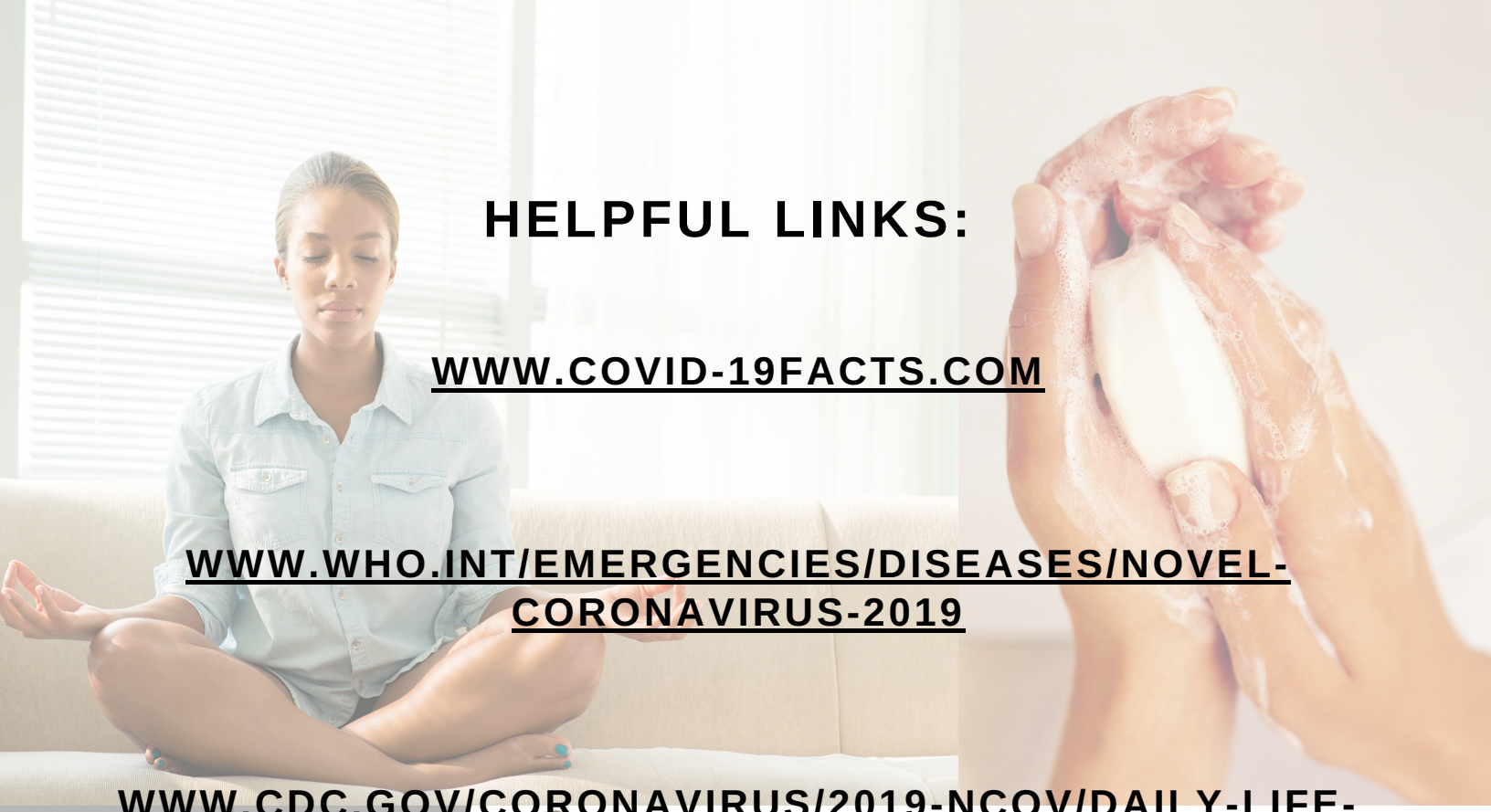
If you need to go out, maintain at least 1 meter (3 feet) distance from others.

Call your doctor or hospital before visiting.

If you need to seek medical attention whether for viral symptoms or other medical care reasons, contact your doctor or hospital ahead of time so they can prepare and take precautions for your arrival.



Source • Centers for Disease Control and Prevention (cdc.gov)



HELPFUL LINKS:

WWW.COVID-19FACTS.COM

WWW.WHO.INT/EMERGENCIES/DISEASES/NOVEL-CORONAVIRUS-2019

WWW.CDC.GOV/CORONAVIRUS/2019-NCOV/DAILY-LIFE-COPING/MANAGING-STRESS-ANXIETY.HTML

WWW.MINDBODYGREEN.COM/ARTICLES/WHAT-IS-AUTOPHAGY

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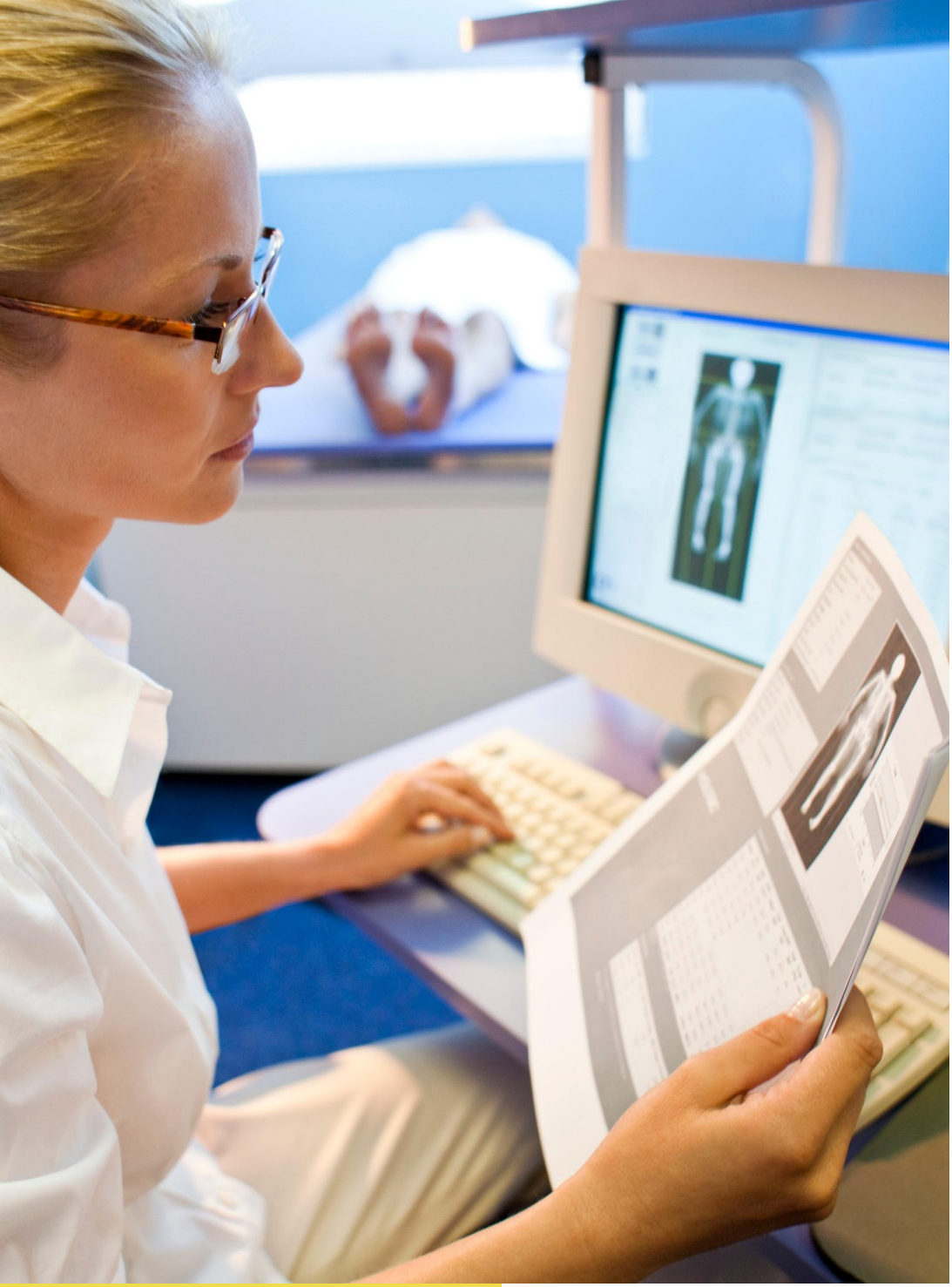
FEATURE



May is National Osteoporosis Month

www.nof.org/

Because bones and muscles closely interconnected by anatomy, metabolic profile, and chemical components, which can be treated with optimal therapeutic interventions such as HBO. Exercise training is recommended with the proper therapeutic strategy to encounter the loss of bone and muscle mass due to osteosarcopenia.

HBO can stimulate and support the regeneration[2] of tissues. The osteogenic effects for bone mass accretion, bone tissues must be exposed to the mechanical load exceeding those experienced during daily living activities. Of the several exercise training programs, resistance exercise (RE) is known to be highly beneficial for the preservation of bone and muscle mass.

HBOT is used as an adjunct treatment [3]to the addition of resistance training and other treatment plans.

HBOT & OSTEOPOROSIS

Osteoporosis [1] is a bone disease in which the density and quality of bone are reduced.

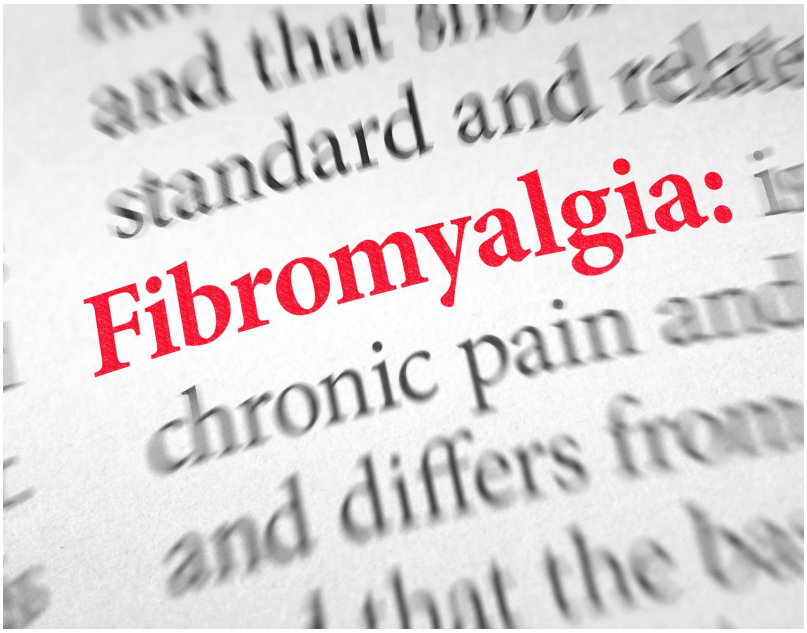
The prevalence of osteoporosis (bone loss) and sarcopenia (loss of muscle tissue) increases as the population ages. Osteoporosis and sarcopenia are commonly associated with genetics, mechanical factors, and hormonal factors and primarily associated with aging.

Links:
[1] https://www.nof.org/patients/what-is-osteoporosis/
[2] https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4599941/
[3] https://www.fhi.no/en/publ/2019/Hyperbaric-oxygen-therapy-for-osteonecrosis/

FEATURE

Fibromyalgia Awareness Day 05/12

Fibromyalgia is a condition that causes musculoskeletal pain all over the body, sleep disturbances, and emotional/physical stress. The pain, often described as “tender”, comes and goes and moves throughout the body to different points. It is a condition that most often affects middle aged females that have other health problems affecting the joints, muscles, and bones (rheumatic disease). The most common symptoms of fibromyalgia include widespread pain, tiredness, and forgetfulness, also known as “fibro fog”. While there is no known cause of fibromyalgia, scientists believe it is a mix of genetics, infection, and physical or emotional trauma.



Fibromyalgia causes tissues in the body to become hypoxic, or lack oxygen, which can intensify pain and tenderness. HBOT increases the amount of oxygen your red blood cells can carry therefore correcting the hypoxia and fixing damaged tissue. Studies have shown that patients experiencing symptoms from Fibromyalgia have a significant reduction in pain, better quality of sleep and improved mood with HBOT treatments.

Additional Resources:

www.ncbi.nlm.nih.gov/pmc/articles/PMC4444341

www.journals.plos.org/plosone/article?id=10.1371/journal.pone.0127012

www.futurity.org/pain-of-fibromyalgia-women-hyperbaric-oxygen-therapy-933962

www.rheumatology.org/I-Am-A/Patient-Caregiver/Diseases-Conditions/Fibromyalgia

PTSD & HBOT

MAY 25TH IS MEMORIAL DAY

Associated Articles:

www.stripes.com/news/us/lawmakers-want-to-expand-use-of-hyperbaric-oxygen-therapy-for-vets-with-ptsd-brain-injury-1.599415

www.sideeffectspublicmedia.org/post/va-offer-hyperbaric-oxygen-therapy-some-veterans-ptsd

www.militarytimes.com/veterans/2017/11/29/va-to-offer-hyperbaric-oxygen-treatments-for-ptsd-despite-doubts/

FEATURE

Post-traumatic stress disorder (PTSD) is a condition that occurs to people who have witnessed or experienced a trauma. While PTSD has traditionally been associated with combat veterans, anyone at any age can develop PTSD. This includes but is not limited to war/combat, sexual or physical assault, serious accidents, natural disasters and losing a loved one unexpectedly.

The most common symptoms of PTSD can include intense flashbacks, nightmares, depression, and isolation. These symptoms may start within a month of the incident but sometimes symptoms are delayed by years. A person experiencing PTSD may estrange themselves from people they love and have feelings of sadness, fear or anger. While antidepressants and talk therapy may help to treat the symptoms of the condition, more is needed to heal the brain and body.

Hypoxia, or low oxygen, is a common condition associated with PTSD. When the brain is hypoxic it gets inflamed, or swells, and it struggles to heal itself. This inflammation of the brain can intensify symptoms of PTSD.

HBOT decreases inflammation and swelling while promoting blood flow to the damaged areas of the brain and body. Specifically, red blood cells are better able to oxygenate the brain and body to promote healing. Studies from military veterans have shown a decrease in mental health conditions after HBOT

AALTO
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AALTO Hyperbaric Oxygen uses hyperbaric oxygen therapy to help our patients find relief and/or resolution from conditions that were not efficiently treated through the use of other traditional medical plans. As one of the biggest HBOT providers, we make sure that our hyperbaric chambers follow the latest guidelines governing hyperbaric chamber manufacturing and installation. Our hyperbaric techs are highly knowledgable and participate in continuous trainings. We offer onsite clearing for our patients' convenience.

Our mission is to provide the most updated practice of Hyperbaric Oxygen Therapy in all of our facilities. We recognize each patient has unique healthcare needs. Therefore, we offer personalized, professional and compassionate care to everyone. We strive to create a friendly and safe environment to ensure you are comfortable and relaxed while you are receiving therapy. Above all, Aalto's vision is to provide the highest quality of health and wellness services to all of our patients experience for all of our patients.

Hyperbaric Oxygen Therapy (HBOT) treatment is used to treat a variety of conditions in addition to those featured in our Hyperbaric Oxygen Magazine.

Other areas of use include:

- Chronic Wounds
- Skincare
- Cosmetic Surgery
- Anti-Aging
- Sports Injury
- Crush Injury
- Diabetic Foot Ulcer
- Compartment Sysdrome
- Radiation Injury
- Concussion Recovery
- Traumatic Brain Injury
- Neurological Disorder
- Autism
- Stroke
- Alzheimer
- Vascular Dementia
- Exceptional blood loss (anemia)
- Intracranial abscess
- Osteomyelitis
- Skin grafts and flaps
- Thermal burns
- Necrotizing soft tissue infections
- Arthritis
- Cerebral Palsy
- Lyme Disease
- Chronic Fatigue Syndrome
- Idiopathic sudden sensorineural hearing loss

And more.

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