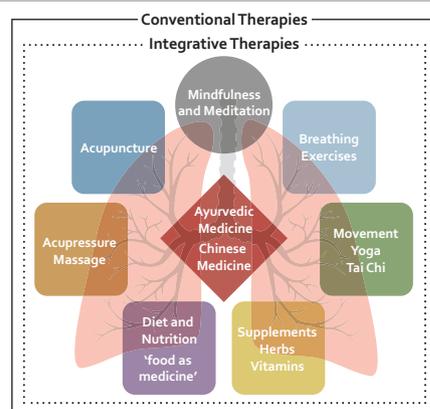


Integrative Medicine (Complementary and Alternative Medicine) for the Lungs

The National Center for Complementary and Integrative Health defines integrative medicine as bringing together conventional (usual or mainstream care or “Western” medicine) with complementary traditional/ancient medical treatments in a coordinated way. In the United States, an estimated 38 percent of adults (about 4 in 10) and 12 percent of children (about 1 in 9) are using some form of complementary and/or alternative medicine. Sixty percent of people with cancer take two or more dietary supplements daily.



Definitions:

- Complementary-non-mainstream therapies used together with conventional medicine
- Alternative- use of non-mainstream practice(s) in place of conventional medicine

Types of complementary health approaches:

- Natural products such as herbs, vitamins, minerals, probiotics, usually sold as dietary supplements
- Mind and body practices such as yoga, chiropractic and osteopathic manipulation, meditation and massage therapy, acupuncture, tai chi, qi gong, healing touch, prayer, hyponotherapy, other movement therapies, and relaxation techniques
- Complementary health approaches such as Ayurveda (ancient medicine from India), Chinese medicine, naturopathy, and traditional Native American healers

Overall, data from research studies is limited on the use of complementary therapies that have helped people with lung conditions, and is largely limited to those with chronic obstructive pulmonary disease (COPD), or asthma. Also, many of the studies are small, not conducted in the U.S., or similar enough to be able to be compared from study to study. This limits their widespread use to those with lung diseases. The following are some of the therapies for which limited data suggest that some benefit exists:

Mind and body practices (Yoga, Tai-Chi, Qigong, breathing exercises)

Yoga can improve quality of life in patients with asthma and COPD. In those with COPD, there is some research

to suggest that it may increase a person’s lung function and exercise capacity. How long these benefits can last is unknown. Tai Chi and Qigong in patients with COPD can also improve exercise capacity and quality of life just as is seen with other types of exercise.

Breathing exercises appear to be safe for people with COPD. Yoga breathing, pursed lip breathing and diaphragmatic breathing have been shown to improve the distance walked in six minutes by an average of 35 to 50 meters in research studies. Effects of breathing exercises on shortness of breath and well-being vary from person to person. They do not add much benefit to a person who is already taking part in a regular exercise program.

Mindfulness (paying attention, on purpose to the present moment) and Meditation

People with asthma who practice mindfulness may have improvement in quality of life and reduction in stress.

Mind-body interventions (mindfulness-based therapy, yoga, and relaxation) can reduce anxiety and depression and can improve fatigue in those with COPD and psychological problems.

Acupressure/Acupoint-TENS/Acupuncture

These treatments are from Chinese medicine involving pressure (acupressure) or electrical stimulation (Acupoint-TENS) or needles that puncture the skin (acupuncture) applied at energy channels of the body, called meridians.

Acupressure and Acupoint-TENS can help relieve shortness of breath in some people with COPD or cancer.

Acupressure can improve lung function, some markers of inflammation and/or symptom control in people with asthma. How long the benefit lasts is not known. When acupuncture needles are inserted too deeply into a person's chest, there is a risk of pneumothorax (lung collapse). If you are on blood thinner medications, please discuss the risks and benefits of acupuncture treatment with your healthcare provider due to the risk of bleeding from needle sites. Acupuncture can improve quality of life and lessen shortness of breath in those with COPD.

Natural Supplements

Limited data exists on the benefits of natural products for those with pulmonary conditions. Low serum levels of *vitamin D* are associated with abnormal immune function. Babies of pregnant women who are given extra vitamin D had less wheezing than babies who are breastfed and not given extra vitamin D. *Probiotic* use has been found to have several potential benefits in lung-related conditions. Probiotics have been associated with fewer cases of pneumonia while on a mechanical ventilator. Probiotics may help reduce lung infections in healthy and hospitalized children, as well as shorten the length of time a person suffers from the common cold. Probiotics can also strengthen an important part of the immune system that helps a person who has COPD and smokes fight off viral lung infections. *N-acetylcysteine*, an antioxidant that helps thin airway mucus, reduces the rate of bronchitis in some people with COPD. A diet rich in fruits, vegetables, and fish intake can be associated with a lower risk of death from COPD. Some *herbs* reduce inflammation and are used to help with cough (such as ginger, cumin, peppercorns, turmeric). The spices are added with honey, basil, and/or almonds in lukewarm water. **Before taking any natural supplements or herbs, please consult with your primary care provider, lung specialist, or integrative medicine clinician to ensure that these supplements are appropriate for you to take.**

Other mind body practices such as osteopathic and chiropractic manipulation lack strong data to support their regular use among those with lung conditions.

For therapies lacking strong research evidence, it's important to weigh any risks and costs with the expected benefits to decide if it is worth taking it. For instance, those on blood thinners may have adverse reactions with natural supplements and acupuncture. Natural products can contain similar active ingredients as medicines prescribed by your doctor, nurse practitioner, or physician assistant. Therefore, it is important to discuss complementary therapies with your primary care provider. Having providers of both complementary and

conventional approaches who talk with one another and with you and who can work together on putting together a personalized, safe, and effective approach for you is important. Health insurance plans do not always cover all complementary therapies so it is important to find out whether something you are considering is covered and to weigh its potential benefits with its risks and costs.

Always consult with your primary care provider first before adding or starting complementary therapies into your care plan, and consider consulting with an integrative medicine physician to ensure that a safe and effective personalized integrative health program can be developed for you.

These are some resources to help you choose an integrative health provider:

American Board of Integrative Holistic Medicine
<http://www.abihm.org/search-doctors>

Integrative Medicine Provider that has taken the Fellowship program from the University of Arizona Center for Integrative Medicine
<https://integrativemedicine.arizona.edu/alumni.html>

National Certification Commission for Acupuncture and Oriental Medicine:
<http://www.nccaom.org/find-a-practitioner-directory/>

Osteopathic physicians: <http://doctorsthatdo.org>

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Acknowledgements: DorAnne Donesky, RN, PhD, NP, Marilyn Moy, MD, Tania Von Visger, MSN, CNS, CCNS, PCCN, Anna Breiburg, FNP, Joshua Benditt, MD

Other Resources:

The National Center for Complementary and Integrative Health
<https://nccih.nih.gov>

National Institutes of Health, Office of Dietary Supplements
<https://ods.od.nih.gov>

Complementary and Alternative Medicine on PubMed (search engine developed by the National Center for Complementary and Integrative Health and the National Library of Medicine)
<https://nccih.nih.gov/research/camonpubmed>

The Nutrition Source
<https://www.hsph.harvard.edu/nutritionsource/>

Herb Dictionary
<https://www.mskcc.org/cancer-care/diagnosis-treatment/symptom-management/integrative-medicine/herbs/search>

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