

Bergamot Orange

Citrus bergamia



Bergamot Orange Benefits

The Bergamot (Citrus bergamia) is a surprisingly nutritious citrus fruit that has a fresh scent and a very useful essential oil which is taken from the peel. Bergamot supplements are taken for several reasons including lowering cholesterol levels, blood sugar, reducing middle obesity and arterial stiffness.

Habitat

Native to South Asia, the bergamot orange or *Citrus bergamia* was exported to Italy where it flourished and now the fruit is harvested for medicinal and commercial purposes. The fruit is the size of an orange but yellow in color. The juice is very sour and bitter, so it would be very hard to drink enough to get the benefits that can be obtained from the extract supplement.

Lowers Cholesterol

Studies showed that bergamot lowered the total cholesterol levels in participants as well as the low-density lipoprotein (LDL) levels, which

is a major factor for heart disease. It also raised the high-density lipoprotein (HDL) which is good and has protective benefits.

It is thought that bergamot works by blocking the production of cholesterol in the liver. Without cholesterol, the liver may be forced to find cholesterol that is stored in the bloodstream. Bergamot has compounds that are similar to commercial chemicals that are given to lower cholesterol.

Bergamot contains very large amounts of polyphenols. Brutelidin and Metilidin are two that directly inhibit the biosynthesis of cholesterol. Triglyceride levels were also lowered in the participants of these studies.

Other uses for bergamot are

- Along with ultra-violet (UV) light treatment for a fungal infection tumor under the skin
- Preventative for lice and other parasites
- Treatment along with UV light for psoriasis

Bergamot is used in skin care products such as creams, soaps, perfumes, lotions and suntan oils. It is used for psoriasis as well as an antiseptic against infections and to reduce inflammation. It is also used to treat Mycosis Fungoides, a rare type of skin cancer. It increases the skin's sensitivity to sunlight, so it must not be used along with other medications that increase sensitivity to sunlight. It could cause severe sunburn and rashes and blisters. For anyone using bergamot, it is necessary to wear protective clothing and sunblock if there will be time spent in direct sunlight.

Bergamot Essential Oil

The essential oil used in aromatherapy is energizing and uplifting. It is used to reduce stress and calm as well as treat depression. For this purpose, it can be used as incense, or added to an essential oil diffuser. Its fragrance is very fresh and sweet and slightly fruity. It restores the appetite if the loss of appetite is due to depression. Inhaling the fragrance of the oil has been seen to reduce anxiety in people who are having radiation treatment for cancer. The principal constituents of bergamot orange oil are-

- Linalol for the fragrant scent
- Linalyl acetate for the pleasant odor

Bergamot essential oil, extracted from the peel of the bergamot orange (*Citrus bergamia*), has a light citrus scent with floral notes that are said to have healing properties. Commonly used in [aromatherapy](#) to elevate mood and alleviate stress, bergamot oil is also said to have characteristics similar to [grapefruit essential oil](#) in that it is antiseptic, antispasmodic, and analgesic (pain-relieving), possibly offering some benefit for health issues like skin infections. It may also have some utility for high cholesterol.

Some practitioners add bergamot oil to water for use as a health tonic, while others recommend using it topically or orally. However, it's worth noting that bergamot oil is known to cause side effects and interactions—particularly when used in excess.

Health Benefits

Practitioners of aromatherapy believe that inhaling essential oils or absorbing them through the skin transmits signals to the [limbic system](#), the region of the brain that regulates emotions and memories. Doing so can induce physiological effects, including a reduction in blood pressure, heart rate, and respiration, and an increase in the "feel-good" hormone serotonin and the neurotransmitter [dopamine](#).

Bergamot oil can also be used as a nasal decongestant when inhaled and an antibacterial agent when applied to the skin.

In alternative medicine, bergamot oil is believed to treat or prevent a range of unrelated health conditions, including:

- [Acne](#)
- Anxiety
- [Chronic fatigue syndrome](#)
- Depression
- [Eczema](#)
- [Food poisoning](#)
- [Headache](#)
- [High cholesterol](#)
- [Insomnia](#)
- [Non-allergic rhinitis](#)
- Non-arthritic joint pain
- [Psoriasis](#)
- [Ringworm](#)

The evidence supporting these claims is generally weak. With that said, there have been positive findings in smaller clinical studies. Here is what some of the research says.

Anxiety and Stress

Bergamot essential oil may help alleviate anxiety and stress at the biochemical level, suggests a 2011 [study](#) published in *Phytotherapy Research*.

According to the research, mice injected with the anti-anxiety drug Valium (diazepam) had lower biomarkers for stress if exposed to the scent of bergamot oil. These changes were seen not only in the animals' behavior but in the steep decreases in the stress hormone corticosterone (the animal version of cortisol).

The researchers attributed these effects to increases in a neurotransmitter called gamma-aminobutyric acid (GABA), which the body produces to temper nerve excitability.

There have been few qualitative studies investigating these effects in humans. Among them, a 2017 [study](#) in *Phytotherapy Research* aimed to assess the effect of bergamot oil in women, ages 23 to 70, prior to a doctor's visit at a mental health clinic.

After eight weekly visits, women exposed to 15 minutes of aerosolized bergamot oil per visit achieved 17% higher positivity scores on a Positive and Negative Affect Scale (PNAS) than women exposed to a placebo vapor.

Infections

Bergamot oil has long been touted for its antibacterial and antifungal effects, with some proponents suggesting that not only treats skin infections but those affecting the mouth and digestive tract. There is little evidence to support such claims.

With that being said, a 2019 [study](#) in the *Open Food Source Journal* reported that bergamot oil is able to neutralize *Staphylococcus aureus* (a common bacteria associated with everything from pimples to life-threatening sepsis) at concentrations of 27 micrograms per milliliters ($\mu\text{g}/\text{mL}$). At this concentration, bergamot oil is likely safe and possibly effective in preventing minor skin infections.

By comparison, it would take concentrations of 500 $\mu\text{g}/\text{mL}$ to neutralize [Escherichia coli](#), a bacteria commonly associated with food poisoning. At this level, bergamot oil would be unsuitable for skin application and an unlikely candidate for oral use (given that

the dose needed to eradicate *E. coli* would likely be intolerable and hazardous).

Similar contradictions have been reported in studies involving the antifungal effects of bergamot oil.

High Cholesterol

A 2019 review of [studies](#) published in *Integrative Food, Nutrition, and Metabolism* concluded that certain compounds in bergamot oranges, called brutieridin and melitidin, exert potent cholesterol-lowering effects. When taken by mouth, these flavonoids have been shown to reduce [total cholesterol](#) and "bad" [LDL cholesterol](#) in multiple studies that ran between 30 days and 12 weeks.

Brutieridin and melitidin work similarly to [statin drugs](#) in that they activate proteins that regulate blood sugar and fats—namely, AMP-activated protein kinase (AMPK). While the effect is not robust enough to treat diabetes, it may help lower cholesterol in some people.

Interestingly, bergamot orange juice may be more effective as it contains higher concentrations of brutieridin and melitidin than bergamot oil.

Possible Side Effects

Bergamot essential oil should never be applied to the skin at full strength. Doing so can cause extreme skin inflammation, stinging, and [photosensitivity](#). It should instead be diluted with a neutral [carrier oil](#) (such as sweet almond or jojoba oil) before applying it to the skin.

Bergamot contains a substance known as bergapten which is highly phototoxic. If skin exposed to bergamot oil is then exposed to UV radiation from the sun (or a tanning bed), a potentially serious skin condition called photodermatitis may occur. Symptoms include redness, pain, swelling, blistering, and rash.

Bergamot oil has the highest concentration of bergapten of any essential oil. So phototoxic is the oil that even soaking in a bath with a few drops can trigger photosensitivity.

Internal Use

Bergamot oil is generally regarded as safe (GRAS) by the U.S. Food and Drug Administration (FDA) when used as a food flavoring. However, the excessive consumption of the oil can cause nausea, stomach pain, and adverse neurological effects, including muscle cramps, [fasciculations](#) (muscle twitches), and [peripheral paresthesia](#) (pins-and-needles sensations in the limbs).

If taken internally, bergamot oil should only be used occasionally and in minute amounts, ideally under the care of a qualified physician. The internal use of bergamot oil in children is not recommended.