

# HerbalFactors<sup>®</sup> HAWTHORN EXTRACT

# Feature summary

HerbalFactors Hawthorn Extract contains hawthorn leaf, flower, and berry used in herbal medicine to help maintain cardiovascular health in adults. Hawthorn is the oldest known medicinal plant in European medicine and has been consumed for thousands of years throughout Europe as both a food and remedy for heart and circulatory function. It is also a popular cardiotonic used by German adults as part of their preventative health care.

Many of hawthorn's benefits are due to its antioxidant profile. By combining the three medicinal plant parts, it provides a full spectrum of hawthorn flavonoids, including quercetin, rutin, hyperoside, and vitexin. Although the whole plant exerts a therapeutic effect, this supplement is standardized to 2.2% flavonoids for consistent dosing.

Each vegetarian capsule contains 300 mg of hawthorn leaf and flower extract plus 165 mg of hawthorn berry to be taken two to three times daily for a minimum of two months. This is within the range of doses supported by clinical studies using hawthorn to strengthen heart function. Hawthorn Extract contains no preservatives, sweeteners, gluten, or GMOs, and is suitable for vegetarians and vegans. Hawthorn's confirmed safety and long history of use makes it the herbal remedy of choice for people who want to support their cardiovascular health naturally. If you suspect that you have heart disease or are currently taking heart medication, talk to your health care practitioner before taking hawthorn products.

# How it works

Oxidative stress and uncontrolled inflammation are underlying factors in the development of heart conditions (Steven et al., 2019). Hawthorn leaf, flower, and berry are recognized for their chemical profile of flavonoids and proanthocyanidins. These compounds are potent antioxidants that work by scavenging free radicals and reactive oxygen species that may otherwise cause damage to heart and vascular tissue (Koch et al., 2011). The antioxidant flavonoids in hawthorn have also been shown through laboratory assays to inhibit the oxidation of LDL ("bad") cholesterol, which plays a role in the buildup of plaque on blood vessel walls (Quettier-Deleu et al., 2003).

Hawthorn helps strengthen the heart muscle and the force of its contractions (Degenring et al., 2003). It increases the heart's tolerance for physical stress and improves its efficiency for using oxygen during exercise (Koch et al., 2011). This helps improve symptoms of heart function, such as shortness of breath and fatigue in heart patients (Engels et al., 2012).

Although the underlying mechanism is not completely understood, pre-clinical studies show that hawthorn helps dilate the blood vessels and increases coronary blood flow (Koch et al., 2011; Degenring et al., 2003). It also helps lower diastolic blood pressure (Degenring et al., 2003; Walker et al., 2006).



# Research

Hawthorn has been consumed as a food and herbal medicine for over 2,000 years. Europeans began using it as a therapy for heart conditions in the 17<sup>th</sup> century and it is now approved by the German Commission E for strengthening heart function. Preparations made from the leaf, flower, and berry of *Crataegus monogyna* and similar hawthorn varieties are supported by a number of studies conducted since the 1980s (Engels et al., 2012).

The majority of clinical studies conducted on hawthorn extract have focused on its efficacy in patients suffering from cardiac failure. A review of double-blind, placebo-controlled clinical trials concluded that supplementation with hawthorn leaf and flower extract in doses between 160 mg to 1800 mg per day significantly improved heart function in patients with class I to III cardiac failure. Compared to a placebo, and when used in addition to conventional heart treatments, ergonomic cycling tests showed that hawthorn supplementation improved maximal workload by 9%, improved cardiac oxygen use, and increased patient exercise tolerance. Supplementation was also found to improve symptoms of fatigue and shortness of breath, two key symptoms of heart failure (Pittler et al., 2008).

Fatigue and shortness of breath during heart failure are caused by a reduced ability of the heart to circulate blood throughout the body (Degenring et al., 2003). Through a multicenter placebo-controlled study, 143 patients with class II cardiac failure were supplemented with a hawthorn berry extract standardized to 6.4 mg oligomeric procyanidines per day. After eight weeks, patients supplemented with hawthorn experienced significantly improved exercise tolerance on cycling tests, including reduced levels of fatigue and shortness of breath (Degenring et al., 2003).

In a randomized double-blind trial, female patients with class II coronary insufficiency were supplemented with either 600 mg of hawthorn leaf and flower extract standardized to contain 2.2% flavonoids or a placebo for eight weeks. Compared to the placebo group, patients taking hawthorn improved significantly in their working capacity during ergometer cycling tests. They also improved in measurements of "tiring easily" and "general decrease in physical ability", while the placebo group deteriorated (Schmidt et al., 1994).

As part of its cardiovascular benefits, hawthorn helps support healthy blood pressure levels. This effect was observed by Schmidt et al. Patients taking hawthorn had reduced measures of systolic blood pressure, while there were no significant changes in the placebo group (Schmidt et al., 1994). An additional placebo-controlled clinical study examined the effect of hawthorn on the blood pressure of patients with type 2 diabetes. After 16 weeks of taking 1200 mg of hawthorn leaf and flower extract per day, in addition to their regular hypotensive drugs, patients showed a mild, but significant, reduction in diastolic blood pressure (Walker et al., 2006). These results followed up the author's earlier pilot study that observed a hypotensive effect in mildly hypertensive participants after taking 500 mg of hawthorn extract per day for 10 weeks (Walker et al., 2002).

The majority of clinical studies on hawthorn confirm that it has minimal side effects, supporting its safety and ease of use for long periods (Pittler et al., 2008).

### Ingredients

#### Each vegetarian capsule contains:

Hawthorn extract (Crataegus monogyna) (leaf and flower)
(standardized to 2.2% flavonoids, as hyperoside)
Hawthorn (Crataegus monogyna) (berry)165 mg

#### Dosage

**Recommended adult dose:** 1 capsule 2–3 times daily or as directed by a health care practitioner. Use for a minimum of two months to see beneficial effects.

#### Cautions

Consult a health care practitioner if symptoms persist or worsen. Consult a health care practitioner prior to use if you are taking cardiac glycosides, such as digitalis/digoxin, or blood pressure medication. Keep out of the reach of children.

### References

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