Cinnamon

*Cinnamomum verum* J. Presl

Text by Armando González Stuart, Ph.D., 2005

**Common name in Spanish:** Canela

**Botanical family:** Lauraceae

**Medicinal parts:** The outer bark, inner bark, leaves and essential oil.

**History**

Cinnamon is native to India and Sri Lanka (Ceylon). It is now cultivated in many tropical countries including Mexico. This plant has been used in Ayurvedic (Indian traditional medicine) and other medicinal traditions in Asia. In the American continent, most of the original uses are still prevalent; mainly as a treatment for diarrhea, stomach upset, against respiratory ailments and externally as a skin antiseptic and rubefacient (Aguilar, 1999; González, 1998; Linares et al., 1994).

**Active Principles**

- Volatile oil (cinnamaldehyde, eugenol, cinnamic acid, weitherhin).
- Mucilage.
- Diterpenes.
- Proanthocyanidins.
Applications in Herbal Therapy

- To treat upset stomach and diarrhea (Skidmore-Roth, 2003).
- For the treatment of gastric ulcers (Tanaka et al., 1989).
- Cinnamon bark may possess a potentiating effect on insulin (Khan et al., 1990), and can be useful in the treatment of type 2 diabetes; as well as lowering triglyceride levels and serum cholesterol (Khan et al., 2003; Broadhurst et al., 2000; Onderoglu et al., 1999).
- For the treatment of bronchitis, coughs and other respiratory ailments (Martinez, 1989).
- Against nervous disorders.
- For loss of appetite and dyspepsia (Blumenthal, 1998).
- To promote conception, cinnamon is sometimes used alternately with damiana (Turnera diffusa Wild) (Adame and Adame, 2000).
- For the treatment of hypertension (high blood pressure).
- As an invigorating tonic.
- Externally as a poultice to treat minor bacterial and fungal infections of the skin.
- The essential oil is employed in aromatherapy as a rub to promote blood circulation (Tisserand, 1995).
- Some of the plant constituents have proven value against bacteria and fungi, including the molds that produce the carcinogenic aflatoxins (Gruenwald, 2004; McCann, 2003; Juglal et al., 2002).
- Cinnamon constituents possess antioxidant action and may prove beneficial against free radical damage to cell membranes (Dragland et al., 2003; Jayaprakasha et al., 2003; Lee and Shibamoto, 2002).
- Its essential oil contains both antifungal and antibacterial principles that can be used to prevent food spoilage due to bacterial contamination (Fabio et al., 2003; Guynot
et al., 2003; Kalemba and Kunicka, 2003; Suhr and Nielsen, 2003; Valero and Salmeron, 2003; Friedman et al., 2002; Mejholm and Dalgaard, 2002; Ranasinghe et al., 2002; Smith-Palmer et al., 2002; Yuste and Fung, 2002; Mau et al., 2001).

- Cinnamon oil has proven to be particularly effective against some species of toxicogenic fungi (Juglal et al., 2002; Soliman and Badeaa, 2002; Montes-Belmont and Carvajal, 1998), as well as against respiratory tract pathogens, including species belonging to the genera *Aspergillus*, *Candida*, *Cryptococcus*, and *Histoplasma* (Viollon and Chaumont, 1994; Inouye et al., 2002).

- Even though cinnamon has antibacterial effects, clinical trials against the species *Helicobacter pylori*, associated with gastric ulcers, have shown contradictory results (Martin and Ernst, 2003; Tabek, 1999).

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**Safety / Precautions**

- Do not use in medicinal doses during pregnancy or lactation, only as a spice or food condiment.

- Do not employ teas in large amounts in patients with ulcers, due to the potential irritation.

- Cinnamon essential oil should not be ingested, due to its potential toxicity (Hoskins, 1984). Its abuse has led to intoxication, especially in children and adolescents (Perry et al., 1990).

- Some people may be hypersensitive to the essential oil used topically to treat skin infections or as a rubefacient in aromatherapy.

- Undiluted essential oil should not be applied topically (Skidmore-Roth, 2003; Tisserand and Balacs, 1995).

- Contact dermatitis in susceptible individuals has been reported after using cinnamon containing ointments (Calnan, 1976).

- Cinnamon bark should not be used during pregnancy and lactation or in small children (Skidmore-Roth, 2004).

- Cinnamon constituents may be irritating to the oral mucous membranes (Sedghizadeh and Allen, 2002; Miller et al., 1992; Allen and Blozis, 1988).

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**Potential Herb/Drug Interactions**
• Large doses of cinnamon could theoretically increase the effect of some drugs used to treat diabetes mellitus, such as streptozocin. Avoid combining cinnamon in large doses with conventional antidiabetic medication. Consult your endocrinologist.

**Literature cited**


