



ANGELICA

Date: January 15, 2008

Proper name(s): *Angelica archangelica* L. (Apiaceae) (USDA 2007)

Common name(s): Angelica (Barnes et al. 2007; Grieve 1971 [1931]), archangel (McGuffin et al. 2000), European angelica (Hoffmann 2003; Brinker 2001; Blumenthal et al. 2000; McGuffin et al. 2000), garden angelica (Barnes et al. 2007; Brinker 2001; Felter and Lloyd 1983 [1898]; Grieve 1971 [1931]), root of the holy ghost (Wichtl 2004; Brinker 2001)

Source material(s):

- ▶ Root and rhizome (Bradley 2006; Blumenthal et al. 2000)
- ▶ Leaf (Barnes et al. 2007; Hoffmann 2003; Grieve 1971 [1931])
- ▶ Seed (fruit) (Barnes et al. 2007; Mills 1985; Felter and Lloyd 1983 [1898]; Grieve 1971 [1931])

Route(s) of administration: Oral

Dosage form(s): Those suited to the allowable route(s) of administration. This monograph is not intended to include food-like dosage forms such as bars, chewing gums or beverages.

Use(s) or Purpose(s): Statement(s) to the effect of:

- ▶ Traditionally used in Herbal Medicine as an expectorant to help relieve bronchial illness, coughs and colds (Bradley 2006; Hoffmann 2003; Blumenthal et al. 2000; Grieve 1971 [1931]).
- ▶ Traditionally used in Herbal Medicine to aid digestion (stomachic) (Bradley 2006; Hoffmann 2003; Blumenthal et al. 2000; Mills 1985; Grieve 1971 [1931]).
- ▶ Traditionally used in Herbal Medicine to help relieve flatulent dyspepsia (carminative) (Bradley 2006; Hoffmann 2003; Grieve 1971 [1931]).
- ▶ Traditionally used in Herbal Medicine to help relieve feverish

conditions by inducing sweating (diaphoretic) (Bradley 2006; Grieve 1971 [1931]).

- ▶ Traditionally used in Herbal Medicine as a diuretic (Barnes et al. 2007; Hoffmann 2003; Mills 1985; Felter and Lloyd 1983 [1898]).

Dose(s):

Root and Rhizome: Preparations equivalent to 0.3-12 g dried root and rhizome, per day (Barnes et al. 2007; Bradley 2006; Blumenthal et al. 2000; Mills 1985)

Leaf: Preparations equivalent to 0.4-5 g dried leaf, 3 times per day (BHP 1983)

Seed: Preparations equivalent to 1-2 g dried seed, 3 times per day (Mills 1985)

See Appendix 1 for examples of appropriate dosage preparations, frequencies of use and directions for use, according to cited references. The purpose of Appendix 1 is to provide guidance to industry.

Duration of use:

Diuretic: For occasional use only (Berardi et al. 2002; CPA 2002).

Other uses: No statement required.

Risk information: Statement(s) to the effect of:

Caution(s) and warning(s):

- ▶ Consult a health care practitioner if symptoms persist or worsen.
- ▶ Avoid prolonged exposure to sunlight, ultraviolet light (UV) or UV therapy (Barnes et al. 2007; Brinker 2001; Blumenthal et al. 2000).
- ▶ Consult a health care practitioner prior to use if you have a peptic ulcer (Brinker 2001).
- ▶ Consult a health care practitioner prior to use if you are breastfeeding (Barnes et al. 2007).

Contraindication(s): Do not use if you are pregnant (Barnes et al. 2007; Brinker 2001; Blumenthal et al. 2000).

Known adverse reaction(s): No statement required.

Non-medicinal ingredients: Must be chosen from the current NHPD *List of Acceptable Non-medicinal Ingredients* and must meet the limitations outlined in the list.

Specifications: Must comply with the minimum specifications outlined in the current NHPD *Compendium of Monographs*.

References cited:

Barnes J, Anderson LA, Philipson JD. Herbal Medicines, 3rd edition. London (UK): Pharmaceutical Press; 2007.

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Blumenthal M, Busse W, Goldberg A, Gruenwald J, Hall T, Riggins C, Rister R, editors. The Complete German Commission E Monographs: Therapeutic Guide to Herbal Medicines. Austin (TX): American Botanical Council; 1998.

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Bradley PR, editor. British Herbal Compendium: A Handbook of Scientific Information on Widely Used Plant Drugs, Volume 2. Bournemouth (UK): British Herbal Medicine Association; 2006.

Brinker F. Herb Contraindications and Drug Interactions, 3rd edition. Sandy (OR): Eclectic Medical Publications; 2001.

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Felter HW, Lloyd JU. King's American Dispensatory, Volume 1, 18th edition. Sandy (OR): Eclectic Medical Publications; 1983 [Reprint of 1898 original].

Grieve M. A Modern Herbal, Volume 1. New York (NY): Dover Publications; 1971 [Reprint of 1931 Harcourt, Brace & Company publication].

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McGuffin M, Kartesz JT, Leung AY, Tucker AO, editors. Herbs of Commerce, 2nd edition. Silver Spring (MD): The American Herbal Products Association; 2000.

Mills S. The Dictionary of Modern Herbalism. Wellingborough (UK): Thorsons Publishers Ltd; 1985.

USDA 2007: United States Department of Agriculture, Agricultural Research Service, National Genetic Resources Program. Germplasm Resources Information Network (GRIN). *Angelica archangelica* L. National Germplasm Resources Laboratory, Beltsville (MD). [Accessed 2007-12-14]. Available from: http://www.ars-grin.gov/cgi-bin/npgs/html/tax_search.pl

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References reviewed:

Barnes J, Anderson LA, Philipson JD. Herbal Medicines: A Guide for Healthcare Professionals, 2nd edition. London (UK): The Pharmaceutical Press; 2002.

McGuffin M, Hobbs C, Upton R, Goldberg A, editors. American Herbal Products Association's Botanical Safety Handbook. Boca Raton (FL): CRC Press; 1997.

Mills S, Bone K. Principles and Practice of Phytotherapy. Toronto (ON): Churchill Livingstone; 2000.

Moerman DE. Native American Ethnobotany. Portland (OR): Timber Press; 1998.

Williamson EM, Evans FJ, Wren RC. Potter's New Cyclopaedia of Botanical Drugs and Preparations. Saffron Walden (UK): C.W. Daniel Company Limited; 1988.

Appendix 1: Examples of appropriate dosage preparations, frequencies of use and directions for use

Root and rhizome:

Dried root and rhizome:

- ▶ 0.6-2 g, 3 times per day (Bradley 2006)
- ▶ 4.5 g, per day (Blumenthal et al. 2000)
- ▶ 1-2 g, 3 times per day (Blumenthal et al. 2000; Mills 1985)

Infusion:

- ▶ 1-2 g dried root and rhizome, 3 times per day (Barnes et al. 2007)
- ▶ 0.6-2 g dried root and rhizome, 3 times per day (Bradley 2006)
- ▶ 2-4 g dried root and rhizome, 3 times per day (Blumenthal et al. 2000)

Directions for use: Pour 150 ml of boiling water on dried root and rhizome and steep for approximately 10 minutes. Drink warm, one half-hour before meal times (Blumenthal et al. 2000).

Decoction:

1.5 g dried root and rhizome, 3 times per day (Blumenthal et al. 2000)

Directions for use: Place dried root and rhizome in 150-250 ml of cold water, bring to a boil and simmer for approximately 10 minutes in a covered vessel. Drink warm, one half-hour before meal times (Blumenthal et al. 2000).

Fluidextract:

- ▶ 0.5-2 g dried equivalent, 3 times per day (1:1, 25% alcohol, 0.5-2 ml) (Bradley 2006)
- ▶ 1.5-3 g dried equivalent, per day (1:1, 1.5-3 ml) (Blumenthal 1998)

Tincture:

- ▶ 100-400 mg dried equivalent, 3 times per day (1:5, 50% alcohol, 0.5-2 ml) (Bradley 2006)
- ▶ 300 mg dried equivalent, per day (1:5, 1.5 ml) (Blumenthal et al. 1998)

Leaf:

Dried leaf: 2-5 g, 3 times per day (BHP 1983)

Infusion: 2-5 g dried leaf, 3 times per day (BHP 1983)

Fluidextract: 2-5 g dried equivalent, 3 times per day (1:1, 25% alcohol, 2-5 ml) (BHP 1983)

Tincture: 0.4-1 g dried equivalent, 3 times per day
(1:5, 45% alcohol, 2-5 ml) (BHP 1983)

Seed (fruit):

Dried seed: 1-2 g, 3 times per day (Mills 1985)