

# herbs at a glance

## Goldenseal



© Steven Foster

This fact sheet provides basic information about goldenseal—common names, what the science says, potential side effects and cautions, and resources for more information.

**Common Names**—goldenseal, yellow root

**Latin Name**—*Hydrastis canadensis*

Goldenseal is a plant that grows wild in parts of the United States but has become endangered by overharvesting. With natural supplies dwindling, goldenseal is now grown commercially across the United States, especially in the Blue Ridge Mountains. Historically, Native Americans have used goldenseal for various health conditions such as skin diseases, ulcers, and gonorrhea. Currently, folk or traditional uses of goldenseal include colds and other respiratory tract infections, infectious diarrhea, eye infections, vaginitis (inflammation or infection of the vagina), and occasionally, cancer. It is also applied to wounds and canker sores and is used as a mouthwash for sore gums, mouth, and throat.

The underground stems or roots of goldenseal are dried and used to make teas, liquid extracts, and solid extracts that may be made into tablets and capsules. Goldenseal is often combined with echinacea in preparations that are intended to be used for colds.

### What the Science Says

- Few studies have been published on goldenseal's safety and effectiveness, and there is little scientific evidence to support using it for any health problem.
- Clinical studies on a compound found in goldenseal, berberine, suggest that the compound may be beneficial for certain infections—such as those that cause some types of diarrhea, as well as some eye infections. However, goldenseal preparations contain only a small amount of berberine, so it is difficult to extend the evidence about the effectiveness of berberine to goldenseal.
- NCCAM is funding research on goldenseal, including studies of antibacterial mechanisms and potential cholesterol-lowering effects. NCCAM is also funding development of research-grade goldenseal, to facilitate clinical studies.

U.S. DEPARTMENT OF HEALTH  
AND HUMAN SERVICES

National Institutes of Health

National Center for Complementary  
and Alternative Medicine



NCCAM

## Side Effects and Cautions

- Goldenseal is considered safe for short-term use in adults at recommended dosages. Rare side effects may include nausea and vomiting.
- There is little information about the safety of high dosages or the long-term use of goldenseal.
- Goldenseal may cause changes in the way the body processes drugs, and could potentially alter the effects of many drugs.
- Other herbs containing berberine, including Chinese goldthread (*Coptis trifolia*) and Oregon grape (*Mahonia aquifolium*), are sometimes substituted for goldenseal. These herbs may have different effects, side effects, and drug interactions than goldenseal.
- Women who are pregnant or breastfeeding should avoid using goldenseal. Berberine, a chemical in goldenseal, can cause or worsen jaundice in newborns and could lead to a life-threatening problem called kernicterus.
- Goldenseal should not be given to infants and young children.
- Tell all your health care providers about any complementary health practices you use. Give them a full picture of what you do to manage your health. This will help ensure coordinated and safe care. For tips about talking with your health care providers about complementary and alternative medicine, see NCCAM's Time to Talk campaign at [nccam.nih.gov/timetotalk/](http://nccam.nih.gov/timetotalk/).

## Sources

Goldenseal. Natural Medicines Comprehensive Database Web site. Accessed at [www.naturaldatabase.com](http://www.naturaldatabase.com) on July 21, 2009.

Goldenseal (*Hydrastis canadensis* L.), Berberine. Natural Standard Database Web site. Accessed at [www.naturalstandard.com](http://www.naturalstandard.com) on July 14, 2009.

McKenna DJ, Plotnikoff GA. Goldenseal (*Hydrastis canadensis*). In: Coates P, Blackman M, Cragg G, et al., eds. *Encyclopedia of Dietary Supplements*. New York, NY: Marcel Dekker; 2005:297-308.

## For More Information

Visit the NCCAM Web site at [nccam.nih.gov](http://nccam.nih.gov) and view *Using Dietary Supplements Wisely* ([nccam.nih.gov/health/supplements/wiseuse.htm](http://nccam.nih.gov/health/supplements/wiseuse.htm)).

## NCCAM Clearinghouse

Toll-free in the U.S.: 1-888-644-6226

TTY (for deaf and hard-of-hearing callers): 1-866-464-3615

E-mail: [info@nccam.nih.gov](mailto:info@nccam.nih.gov)

## PubMed®

Web site: [www.ncbi.nlm.nih.gov/sites/entrez](http://www.ncbi.nlm.nih.gov/sites/entrez)

## NIH Office of Dietary Supplements

Web site: [www.ods.od.nih.gov](http://www.ods.od.nih.gov)

## NIH National Library of Medicine's MedlinePlus

Goldenseal Listing: [www.nlm.nih.gov/medlineplus/druginfo/natural/943.html](http://www.nlm.nih.gov/medlineplus/druginfo/natural/943.html)

*This publication is not copyrighted and is in the public domain. Duplication is encouraged.*

NCCAM has provided this material for your information. It is not intended to substitute for the medical expertise and advice of your primary health care provider. We encourage you to discuss any decisions about treatment or care with your health care provider. The mention of any product, service, or therapy is not an endorsement by NCCAM.

National Institutes of Health



U.S. Department of Health and Human Services