

SPECIES FACT SHEET

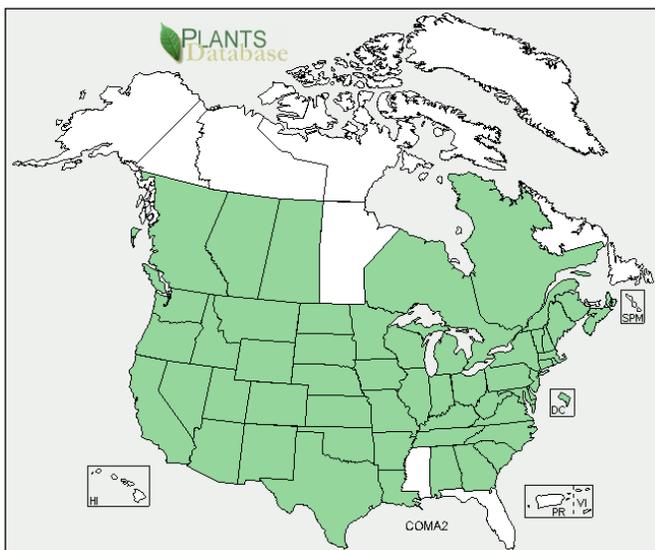
Apiaceae (Carrot family)

Poison Hemlock*Conium maculatum***At a Glance**

- Biennial
- Stems with purple splotches grow two to ten feet tall.
- Divided compound leaves that taper to a point.
- White flowers are borne in umbrella-shaped clusters.
- Fruit is egg-shaped in outline, with distinctive wavy ribs on the surface.
- Highly toxic

Habitat and Ecology

Native to Europe, western Asia, and North America, poison hemlock (*Conium maculatum*) is now naturalized in almost every state in the United States. It was introduced in the 1800s as a garden plant, marketed as being a “winter fern”. Poison hemlock is highly poisonous to humans and animals. It can act as a pioneer species and quickly colonized disturbed sites. Infestations occur along roadsides, field margins, ditches, marshes, meadows, and low-lying areas, but poison hemlock prefers shaded areas with moist soil.



Map of poison hemlock distribution from the USDA PLANTS database (<http://plants.usda.gov/java/profile?symbol=coma2>).

EXOTIC

JOHN CARDINA / THE OHIO STATE UNIVERSITY

The white flowers of poison hemlock are borne in many umbrella-shaped clusters.

Description

Poison hemlock is a highly toxic biennial with the musty, unpleasant odor associated with alkaloids. It grows two to ten feet tall. The stems are ribbed and hollow with purple streaks or splotches. Poison hemlock reproduces by seeds that fall near the plant and disperse via fur, birds, water, and, to a limited extent, wind. Most seeds fall from September through December, but they can fall as late as the end of February. The seeds germinate in the fall, but the plant usually does not produce flowers until the second spring.

Leaves

The leaves have some resemblance to ferns. They are opposite and compound, with the leaflets divided into narrow segments. When crushed, the leaves emit a rank odor.

Flowers and Fruits

The small, white or yellowish flowers have five petals that bloom above the ovary. The flowers are borne in many umbrella-shaped clusters at the end of the flower stalks. Underneath each cluster are four to six brown bracts.

The fruit is egg-shaped in outline, with distinctive wavy ribs on the surface. It is composed of two dry halves, each





LEFT: Poison hemlock leaves are pinnately compound.

MIDDLE: Poison hemlock stems have purple stripes or splotches.

RIGHT: Poison hemlock plants after flowering.

with one seed, that eventually separate from each other. The fruit is 2-3 mm wide.

Etymology

Co'nium is derived from the ancient Greek name coneion, meaning hemlock. Macula'tum means spotted, referring to purple splotches on the stems of leaves or on petals.

Ethnobotany

Poison hemlock is highly toxic. Ancient Greeks used poison hemlock to execute prisoners—Socrates being the most famous example.

Similar Species

Poison hemlock looks similar to wild carrot (*Daucus carota*), wild parsnip (*Pastinaca sativa*), and water hemlock (*Cicuta maculata*). Wild carrot and wild parsnip do not have purple mottling on their stems. In addition, wild carrot has a hairy stem. Water hemlock does have purple mottling and hairless stems, but unlike poison hemlock, it has a cluster of fleshy taproots at the base.

Control Methods

Possible control methods are explained at these websites:

- <http://www.imapinvasives.org/GIST/ESA/esapages/documnts/conimac.pdf>
- <http://www.cal-ipc.org/ip/management/ipcw/pages/detailreport.cfm@usernumber=32&surveynumber=182.php>

References

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