Wild Parsnip *(Pastinaca sativa)*

aka Poison Parsnip

SK Provincial Designation: Noxious

PHOTO: H. Zell, commons.wikimedia.org

Overview:

Wild parsnip is an invasive herbaceous plant from the carrot/parsley family that is native to Europe and Asia. It was introduced to North America as a culinary plant and has since escaped cultivation. The thick taproot of the wild parsnip is edible, but the sap in the stem, leaves and flowers increases skin's sensitivity to ultraviolet light which can result in severe, painful second-degree chemical burns, blisters, rashes and dermatitis. The plant's chemicals can also reduce weight gain and fertility in livestock that eat it.

PHOTO: Victor M. Vicente Selvas, commons.wikimedia.org

Wild parsnip reduces the quality and saleability of agricultural forage crops such as hay, oats and alfalfa.

PHOTO: Keith Edkins, commons.wikimedia.org

Habitat:

Wild parsnip forms dense stands and can be found in sunny, open areas such as prairies and open fields. It can spread quickly on disturbed sites such as abandoned yards, waste dumps, roadsides and railway embankments.

Identification:

Roots: The thick, edible taproot is white to pale yellow in color.

Leaves: Compact rosettes of leaves grow close to the ground in the first year as the taproot is developing, and then develops into a flowering plant the next year. The leaves of the mature plant are broad, mitten-shaped and sharply toothed.

Stems and Flowers: Erect stalks grow in the second year, up to 1.5 metres tall. The single round stem is grooved and sometimes hairy, and is 2 to 5 centimetres thick. Small yellow flowers form in clusters at the top of the stem. Wild parsnip typically flowers from May to September.

Seeds: Wild parsnip reproduces by seed, with each plant capable of producing hundreds seeds that can remain viable in the soil for up to 4 years. The round seeds are straw-colored, flat and winged.

Handling:

Wild parsnip produces a chemical in its sap that increases skin's sensitivity to ultraviolet light. The potency increases from spring to summer and decreases after seed set. If skin contact is made with the sap from broken stems, leaves or flowers and then is exposed to ultraviolet light (in both cloudy or sunny weather), a reaction occurs that can result in severe and painful second-degree burns, blisters or rashes. The resulting brown skin pigmentation can remain on the skin for years afterwards. If the sap gets into the eyes, it has the potential to cause temporary or permanent blindness.

PHOTO: David J. Eagan, dnr.wi.gov

When working near wild parsnip, it is important to wear gloves, a long-sleeved shirt and long pants. If your skin comes into contact with the plant, immediately cover it until it can be washed with soap and water.

continued next page

Saskatchewan Invasive Species Council
www.saskinvasives.ca
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Agriculture Council of Saskatchewan Inc.
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Wild Parsnip *(continued)*

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Prevention:

Wild parsnip reproduces by seed, and the seeds are easily dispersed by wind and water, but also attached to vehicles, mowers and other equipment. When working in an area that is or has the potential to be infested with wild parsnip or other invasive plants, it is important to clean all vehicles and equipment thoroughly before moving into uninfested areas.

Control:

Grazing: Wild parsnip affects the skin of animals in a similar way to humans. Invasive plants should not be considered as forage.

Mechanical: Seed bank reduction is a beneficial strategy; regardless of what method is used, the goal is to prevent the plants from seeding. Mowing can be effective to prevent seed production if timed appropriately (before seed set) and repeated during the season after re-sprout, or if used in combination with an appropriate herbicide. It is important to clean the mower thoroughly afterwards to remove seeds and toxic sap. Hand-pulling is effective on small infestations but may be difficult due to the thick taproot and the potential for skin reactions. Wear long sleeves and gloves if handling this plant.

Chemical: The use of pesticides in any manner not published on the label or registered under the Minor Use of Pesticides regulation constitutes an offence under both the Federal Pest Control Products Act and provincial acts in Saskatchewan. For the latest information on pesticides for agricultural use in Saskatchewan, please consult the provincial Guide To Crop Protection produced annually by the Saskatchewan Ministry of Agriculture or consult your local Ministry of Agriculture representative.

Biological: The parsnip webworm (*Depressaria pastinacella*) feeds on wild parsnip flowers and developing seeds; it was first recorded in Ontario, Canada in 1869.

Sources:

Constraints on Chemical Coevolution: Wild Parsnips and the Parsnip Webworm. University of Illinois Department of Entomology. July 1986. www.msu.edu

Fact Sheet: Be Aware of Wild Parsnip (*Pastinaca sativa*). Minnesota Department of Transportation Adopt a Highway Program. www.dot.state.mn.us/adopt

Environmental Health Issues - Dangerous Weeds: Giant Hogweed, Poison Ivy, and Wild Parsnip. Leeds, Grenville & Lanark District Health Unit. www.healthunit.org

Weed Identification and Control Sheet: Wild Parsnip (*Pastinaca sativa*). Good Oak Ecological Services. www.goodoak.com

Wild Parsnip, *Pastinaca sativa*. weedinfo.ca

Wild Parsnip: *Pastinaca sativa*. Ontario's Invading Species Awareness Program. www.invadingspecies.com

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