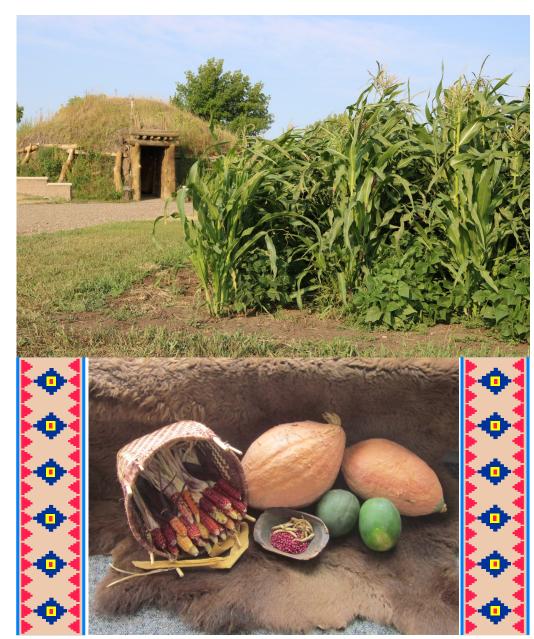
2020 Garden Guide

Knife River Indian Villages National Historic Site



A Cornerstone to a Culture....



The rich bottomlands between the Knife and Missouri Rivers provided Hidatsa villagers with fertile soils to produce extensive garden fields. Generations of experience provided them with the knowledge of the best planting practices, seed selecting, and harvesting.

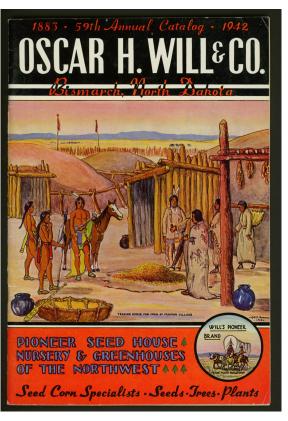
Women of the villages took great pride in this fact and worked hard daily to have a successful growing season. As Buffalo Bird Woman would later state: "We Indian people love our gardens, just as a mother loves her children."

This passion for agriculture was essential for it meant the success of the whole village. Not only did it provide sustenance for everyone in the villages, but extended out through the entire region has items to trade. Other tribes from every direction would make their way to the Hidatsas and neighboring Mandans to trade bison meat and robes for corn, beans, squash, and sunflowers.

Just like farmers today, it was commerce and feeding the heartland on a grand scale.

Preserving Cultural Heritage through Seed...

Beyond the Knife River villages over to Like-A-Fish-Hook, gardening was still a central focus in the tribal society. But as reservation life began, gardening as a lifeway waned from the issuance of government rations, difficulty working in upland soils and other factors. But like many other aspects within the cultural identity of today's MHA Nation, it was not lost entirely. Recognizing this importance, some continue to grow and maintain the varieties of their ancestors.



Whether he recognized at the time or not, Oscar Will of Bismarck preserved many of these varieties and introduced them on a national scale. In the early 1880s, he travelled to the Fort Berthold Reservation in hopes of finding garden varieties suitable for Northern Plains growing conditions.

Over the next several years, his catalog offered many of these and continued for more than 70 years.

Some of them would be crossed with others to produce different strains. For example, the popular Great Northern Bean is derived from white beans grown right here at the Knife River Indian Villages!

Today's Suppliers:

There has been a growing resurgence (pun intended) in preserving heirloom varieties of fruits and vegetables of all types. These include many native varieties of the Mandan, Hidatsa, and Arikara (most of them from Will's Company). Some of these suppliers include: Heritage Harvest Seed, Victory Seed, Seed Saver's Exchange, Sand Hill Preservation Center, and Baker Creek Heirloom Seeds.

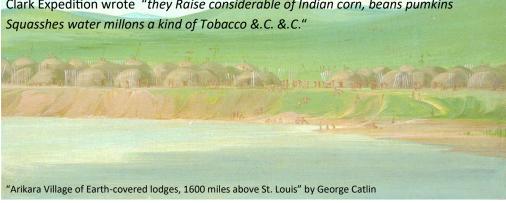
Arikara Watermelon (*Citrullus lanatus*)

Small plot near Earthlodge



From a historical standpoint, this is the most recent addition to the regional Native garden. Watermelons are of African origin and were grown in early colonial gardens. Likely making there way up from New Orleans, they arrive in St. Louis in the late 18th Century. Distributed by traders heading up river, it didn't take long for the sweet treat to catch on within the Upper Missouri River region.

Amongst an Arikara village in October of 1804, Sergeant John Ordway of the Lewis & Clark Expedition wrote "they Raise considerable of Indian corn, beans pumkins



2020 Selected Varieties...

Strong Tobacco (*Nicotiana rustica*):



This species is common throughout tribes east of the Mississippi River, although it is also associated with the Mayans and Aztecs. It is likely one of two species mentioned by Meriwether Lewis while visiting Arikara villages in October of 1804.

It goes by many common names, however, "strong tobacco" seems to fit well since it has a nicotine content up to nine times stronger than today's common cultivated tobacco (N. tabacum).

Near front entry of Visitor Center

Indian Tobacco (Nicotiana quadrivalvis):



This species seems to have a wider acceptance of cultivation along the Upper Missouri River. Its ancestral roots trace back to drier areas of Northern California and Eastern Oregon.

It is the "smaller species" mentioned by Meriwether Lewis who collected samples and seed, which later was grown by Thomas Jefferson at his Monticello home.

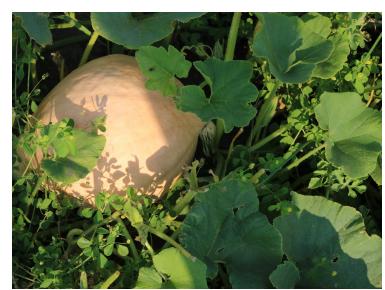
Here within the villages, it made up the bulk of what was smoked for ceremony and leisure. In fact, the entire plant is dried for this purpose with blossoms being a particular favorite. Sometimes it's blended with the leaves of Rose, Kinnikinik, and the inner bark of Red-twigged Dogwood.

Hidatsa Name: miriishisha

Arikara Squash (*Cucurbita maxima*):

Not present, grown in 2018 and 2019

Hidatsa name: gagúwi



This Hubbard-type variety has large pale orange fruit that can weigh 20+ pounds.
They also store extremely well for the winter.

The texture can be stringy, however, it blends well to make an excellent soup.

Mandan Squash (Cucurbita pepo):

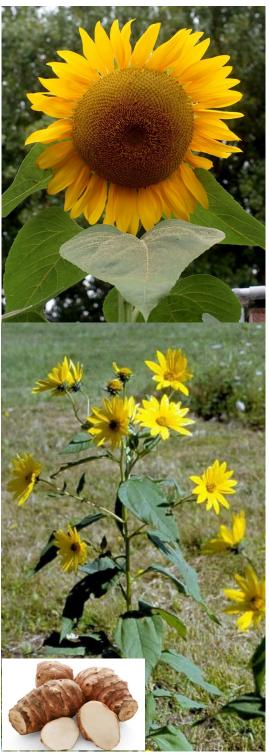
Front of large plot and back of small plot near Earthlodge



This variety is quick to mature but does not keep well. Therefore, it is cut lengthwise in thin slices and strung through a long sturdy stick. After some time on the drying rack, it is preserved for winter use. Its flavor is much less sweet, but can be cooked young like a summer squash.

Its rind can also be yellow with green stripes and white with orange stripes.





Sunflower (*Helianthus* annuus)

Hidatsa name: maapáa

Large plot opposite Earthlodge

These create the border surrounding the Hidatsa garden. After many generations of selecting the largest flower heads for next season's seed, we have the sunflower of today.

A popular traditional use is to grind seed into a coarse meal and roll them into balls with lard— a high energy trail food.

Jerusalem Artichoke (*Helianthus tuberosus*)

Hidatsa name: kakca Small plot near Earthlodge

Never cultivated in the gardens, these are harvested as underground tubers growing wild along the riverbottoms.

Also, it is neither from Jerusalem nor an artichoke. It is a sunflower also known as a Sunchoke.

They have a lot of the starch known as inulin which can be hard for the human body to digest. When eaten in large quantities, they can make you "full of wind"!



Corn (Zea mays)

Hidatsa name: góoxaadi

Large plot opposite Earthlodge

This year's variety is known as 'Painted Mountain'- see picture above. It is a variety that is a composite of over 100 different varieties with over three decades of selective breeding—many of Mandan origin. Credit going to Dave Christensen of Big Timber, Montana on this project.

At least nine varieties were known to exist historically. They are distinguished by their color and hardness. Some are flint (hard) and some are flour (soft). One is even gummy! Today they can be found under the labels such as 'Mandan Bride' and 'Mandan Red Clay'. Why so many Mandan? According to Hidatsa oral history, the Mandan introduced corn to them...

Long ago, a Hidatsa war party found themselves across the river from a Mandan village. But they arrived hungry. Some of the Mandan shot arrows with pieces of a cob of parched corn to the other side and yelled or signed "EAT" (the word is the same in both languages). They did and found it good. The excited warriors returned to their village an told the others of this new food. Eventually, the Hidatsas moved next to the Mandans learned how to grow their own after a chief gave them half an ear of yellow corn.



Hidatsa Shield Figure Beans
Not present, grown in 2018 and 2019
Pole variety



Hidatsa Red Beans

Not present, grown in 2018 and 2019

Pole variety



Arikara Yellow Beans
Large plot near Earthlodge
Bush variety

Hidatsa Name: awáasha

In general, beans (*Phaseolus vulgaris*) are traditionally planted between corn that provides light shade or a support to climb on. These three varieties represent virtually all that is left between the Mandan, Hidatsa and Arikara tribes today. At least with the Hidatsa, three other varieties were grown—white, black, and spotted.

All of them are very good picked young as a snap bean or dried as a shelling bean. The traditional cooking method is to boil them (green or dry) in a pot with a little bison lard.

