



Fencing the Great Plains: The History of Barbed Wire

Introduction



Homestead National Monument of America's barbed wire fence display marks the eastern boundary of the Daniel Freeman homestead. This fence is directly west of the Heritage Center, along the walking trail to the tallgrass prairie.

The lands settlers encountered in the mass western migrations of the mid- to late 19th century were unlike any other they had seen before: vast, treeless expanses of open prairie bereft of any distinguishing features, an ocean of grass and wildflowers as far as the eye could see. With no trees for fences and no stones to build walls, the homesteaders needed more practical ways to contain their livestock and fence their property.

Some planted hedgerows, stock-proof living walls of thorny trees and bushes, such as the Osage orange hedgerow planted by Daniel Freeman in the early 1870s, which demarcates the monument's southern boundary. However, prior to 1874, most homesteaders simply allowed their cattle and sheep to freely graze on the open prairie, sharing pasture and water resources with other settlers. These were the days of the "open range," when cowboys drove cattle long distances to eastern prairie markets, when nomadic Plains Indian tribes followed the vast buffalo herds, and when thousands of pioneers bound for the far western territories set out on the Oregon, California, and Mormon Trails.

Invention of Barb Wire

The idea of barbed wire as a means for fencing livestock had been around for some time. In 1868, a man named Michael Kelly had invented the basic design for barbed wire when he twisted two plain wires together to create a cable for barbs. Then, in 1874, Joseph Glidden, a farmer from De Kalb, Illinois, made improvements to Kelly's invention, locking a simple wire barb into a double-strand wire, for which he received a patent from the U.S. government. Glidden's design was cheap, easy to mass produce, and effective at confining livestock, and it soon spread across the Plains.

Homesteaders at last had a simple, yet effective tool for marking their boundaries and confining their animals. Other inventors received patents for their own variations on the basic barbed wire design and the U.S. government issued over 500 patents between 1868 and 1874. Over the decades that followed, much of the open prairies were divided up into parcels marked by barbed wire parcels marked by barbed wire fencing.

Importance of Barbed Wire

The introduction of barbed wire had an adverse impact on the cultures that had subsisted on the open spaces. Plains tribes and the buffalo herds they followed could no longer move freely across the now-vanishing expanses and ranchers had nowhere left to graze or even herd their cattle on the long cattle drives. At first, the cattlemen resisted, cutting the barbed wire fences to make a path across private property for their herds, sparking the infamous era of the "range wars." But by the

early 1900s, ranching itself had changed in response to the changing landscape, and ranchers were using barbed wire themselves to fence their cattle. All of the Plains tribes had also been forcibly settled on reservations by this time. The days of the open range were over.

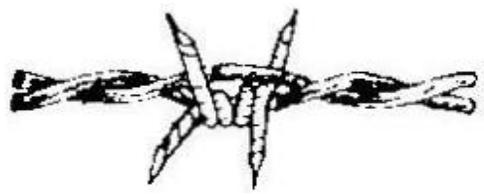
Barb Wire Variations: Individual Expression and Practicality

As patents were being issued for the various types of barbed wire and manufacturing companies were springing up to meet the demand, some homesteaders found that it was easier and cheaper to just make the barbed wire themselves, using models they were already

familiar with as a guide. This practical approach resulted in more than 2,000 variations on over 500 barbed wire patents, some of which can be viewed on the barbed wire display. They are described on the next page.

Shinn Locked Four Point

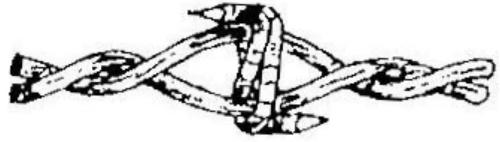
Two twisted-strand wire with four-point barb on one strand. One leg of barb is overlapped by other leg. Patented March 1, 1881 by Milton C. Shinn of Burlington, Iowa.

**Brotherton Flat Barb**

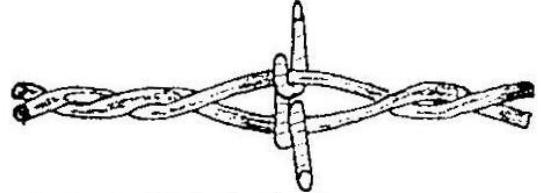
Two-strand wire with two-point flat barb. Variation of the patented Brotherton Two-Strand Two-Point.

**Haish Square "S" Barb**

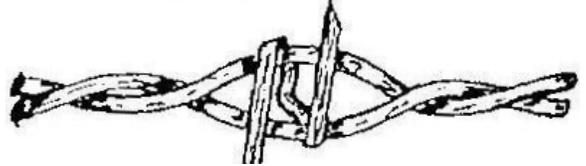
Two twisted-strand wire with two-point barb. Points of barb are bent around strands. Variation of the patented Haish "S" Barb.

**Ellwood Reverse Spread**

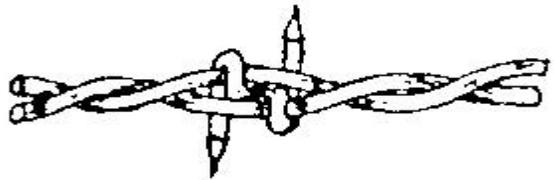
Two-strand wire with reversed wrapped two-point spread barb. Variation of the patented Ellwood Parallel Strands and Reverse Wrap Barb.

**Scutt Flat Crimped Barb**

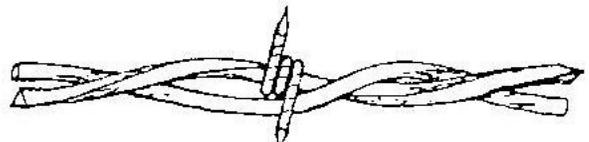
Two twisted-strand wire with two-point flat wire barb. Barb is bent between strands. Variation of the patented Scutt Crimped Round Wire Barb.

**Bain Reverse "H" Barb**

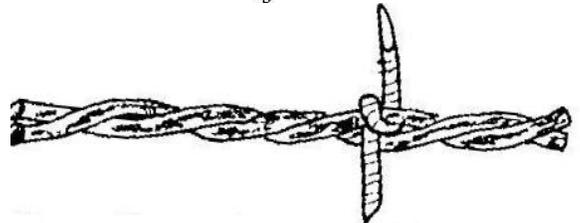
Two-strand wire with two-point "H" shaped barb. Variation of the Bain "H" Barb, patented April 29, 1902 by John H. Bain of Marion, Ohio.

**Glidden Round and Square Strands: Barb on Round Strand**

Twisted round-strand wire. Two-point barb. Variation of the patented Glidden Round and Ribbed Strand.

**Curtis Half-Twist Half-Round Barb**

Two-strand wire with two-point half-round barb. Points of barb are twisted one-half turn. Patented March 15, 1892 by John D. Curtis of Worcester, Massachusetts.

**Buckthorn**

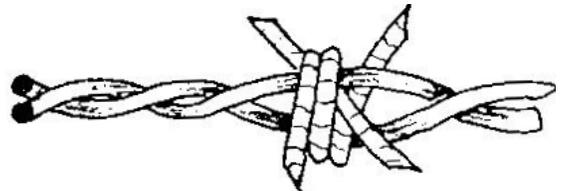
Expensive steel ribbon fencing, used until about 1900. Popular with sheep farmers as wool did not often catch on the wire.

**Merrill Early Four Point**

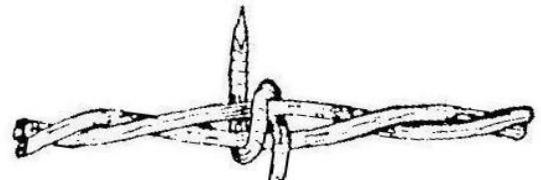
Single strand wire with four point barb. Barb points wrap in parallel. Patented September 29, 1871 by Luther & John C. Merrill of Turkey River Station, Iowa.

**Burnell Four Point**

Two twisted-strand wire with four-point barb. Patented June 19, 1877 by Arthur S. Burnell of Marshalltown, Iowa.

**Edenborn Locked-In Barb**

Two-strand wire with a two-point barb. Variation of the patented Edenborn Webbed Strands with Barb on One Strand (Patented March 17, 1885 by William Edenborn of St. Louis, Missouri).

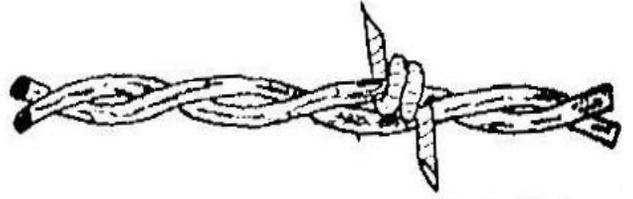
**Baker Flat Barb,**

Perfect two-strand wire with two-point flat barb. Barb has chisel points. Variation of the patented Baker Herringbone Strand (Patented February 27, 1883 by George C. Baker of Des Moines, Iowa).

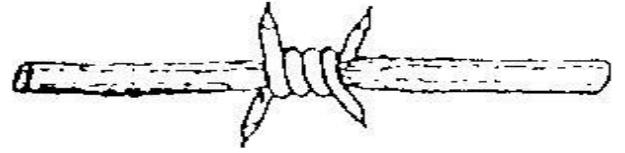


Glidden Winner

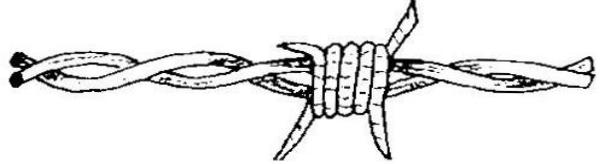
Two twisted-strand wire with two-point barb around one strand. Patented November 24, 1874 by Joseph F. Glidden of DeKalb, Illinois, this simple but effective design won the 1892 Supreme Court Case over the validity of many different barbed wire patents and effectively gave the Washburn & Moen company control over the entire industry.

**Rogers Modern Flattened Strand**

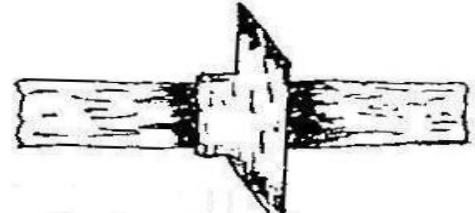
Single-strand wire with four-point barb. Strand is slightly flattened between barbs. Variation of the Rogers Flattened Strand with Half-Round Barb, patented January 10, 1888 by Charles D. Rogers of Providence, Rhode Island.

**Kitselman Right and Left Twist**

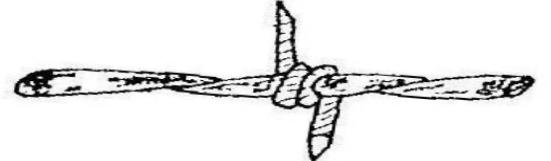
Two strands that reverse direction of twist on each side of four-point barb. Strands and barbs vary in gauge. Also may have a red barb. Patented September 29, 1908 by Alva L. Kitselman of Muncie, Indiana.

**Brinkerhoff Opposed Lugs Lance Point**

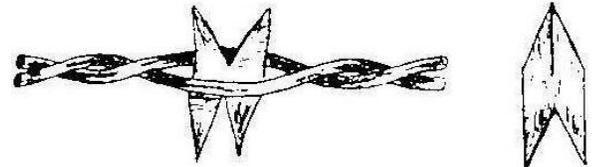
Flat ribbon wire with two-point lance point-applied barb. Variation of the Brinkerhoff Winged Saber Point (patented April 8, 1879 by Jacob Brinkerhoff of Auburn, New York).

**Glidden Twisted Oval**

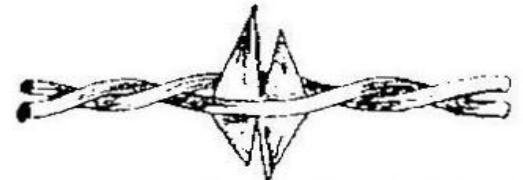
Twisted oval single-strand wire with two point barbs. Barbs may be twisted right hand or left hand. Patented August 22, 1876 by Joseph F. Glidden of De Kalb, Illinois.

**Scutt Arrow Plate**

Two twisted-strand wire with four-point sheet metal arrow plate barb. Barb is split and shaped like an arrowhead. Variation of the Scutt Single Clip "H" Plate, patented June 18, 1878 by Hiram B. Scutt of Joliet, Illinois.

**Frentress Split Diamond**

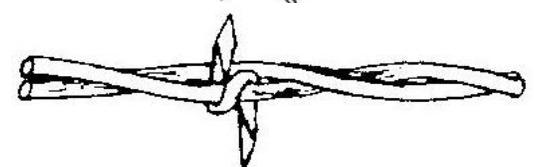
Two twisted-strand wire with diamond shape sheet metal plate that is split to form four-point barb. Patented December 14, 1875 by Henry N. Frentress of Dunleith, Illinois.

**Solo Wire**

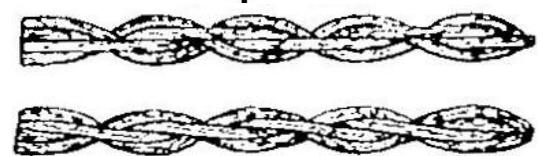
Kinked single-strand wire with four-point barb.

**Curtis Quarter-Twist, Half-Round Barb**

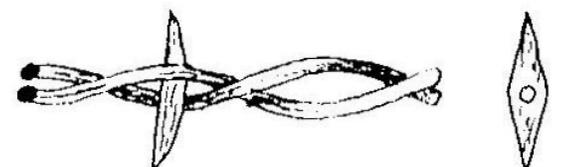
Two-strand wire with two-point half-round barb. Points of barb are twisted one-quarter turn. Patented March 15, 1892 by John D. Curtis of Worcester, Massachusetts.

**Cleveland Weave and Twist**

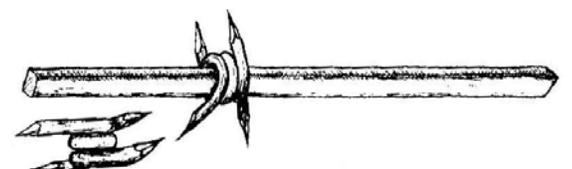
Two round twisted strands with two round strands woven into twisted strands. Patented November 22, 1892 by John B. Cleveland of Indianapolis, Indiana.

**Kelly Thorny Two-Strand**

Two twisted-strand wire with two-point thorny barb on one of two strands. Patented February 11, 1868 by Michael Kelly of New York, New York.

**Glidden Square Strand**

Single square strand wire with four point coil barb. Patented, February 18, 1876 by Joseph F. Glidden of De Kalb, Illinois.



Watkins Vertical Lazy Plate

Two twisted wire strands with a lazy arrow plate sheet metal barb mounted vertical between strands. Patented November 21, 1876 by William Watkins of Joliet, Illinois.

Huffman One-Point Flat Parallel

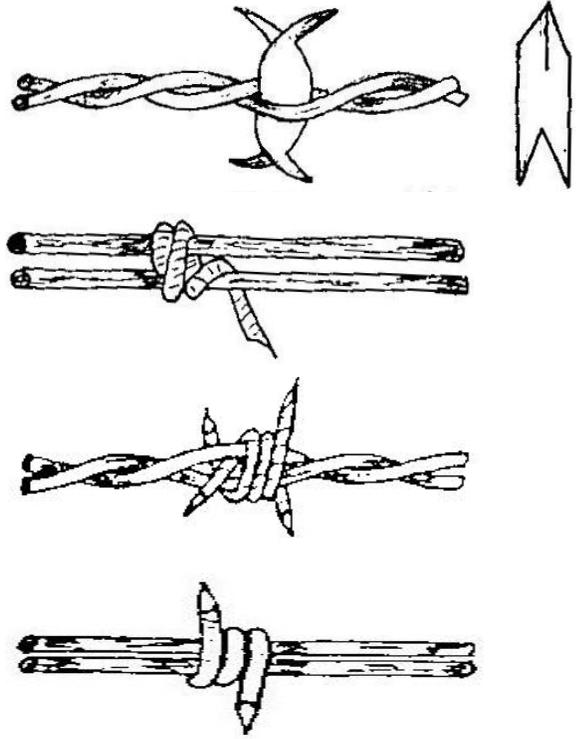
Flattened parallel strands with one-point barb that wraps both strands. Variation of a similar wire, patented December 31, 1889 by Orlando Huffman of Friend, Nebraska.

Ross Four Point

Two twisted strand wire with four-point barb. Patented June 10, 1879 by Noble G. Ross of Chicago, Illinois.

Glidden Barb Around Two Parallel Strands

Parallel strand wire with two-point barb around both strands. Variation of the Glidden Winner (shown above), patented November 24, 1874 by Joseph F. Glidden of De Kalb, Illinois

**Sources**

Glover, Jack. The "Bobbed Wire" Bible. Sunset: Sunset Trading Post, 1969.

Hagemeier, Harold L. Barbed Wire: Identification Encyclopedia, Third Edition. Kearney: Morris Publishing, 2001.