(No Model.)

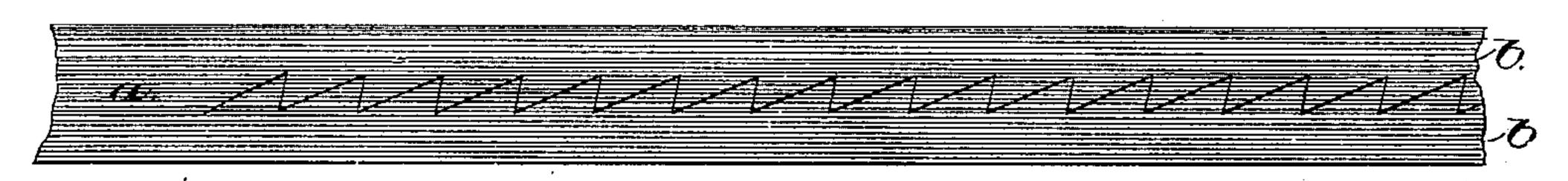
## W. S. BATE.

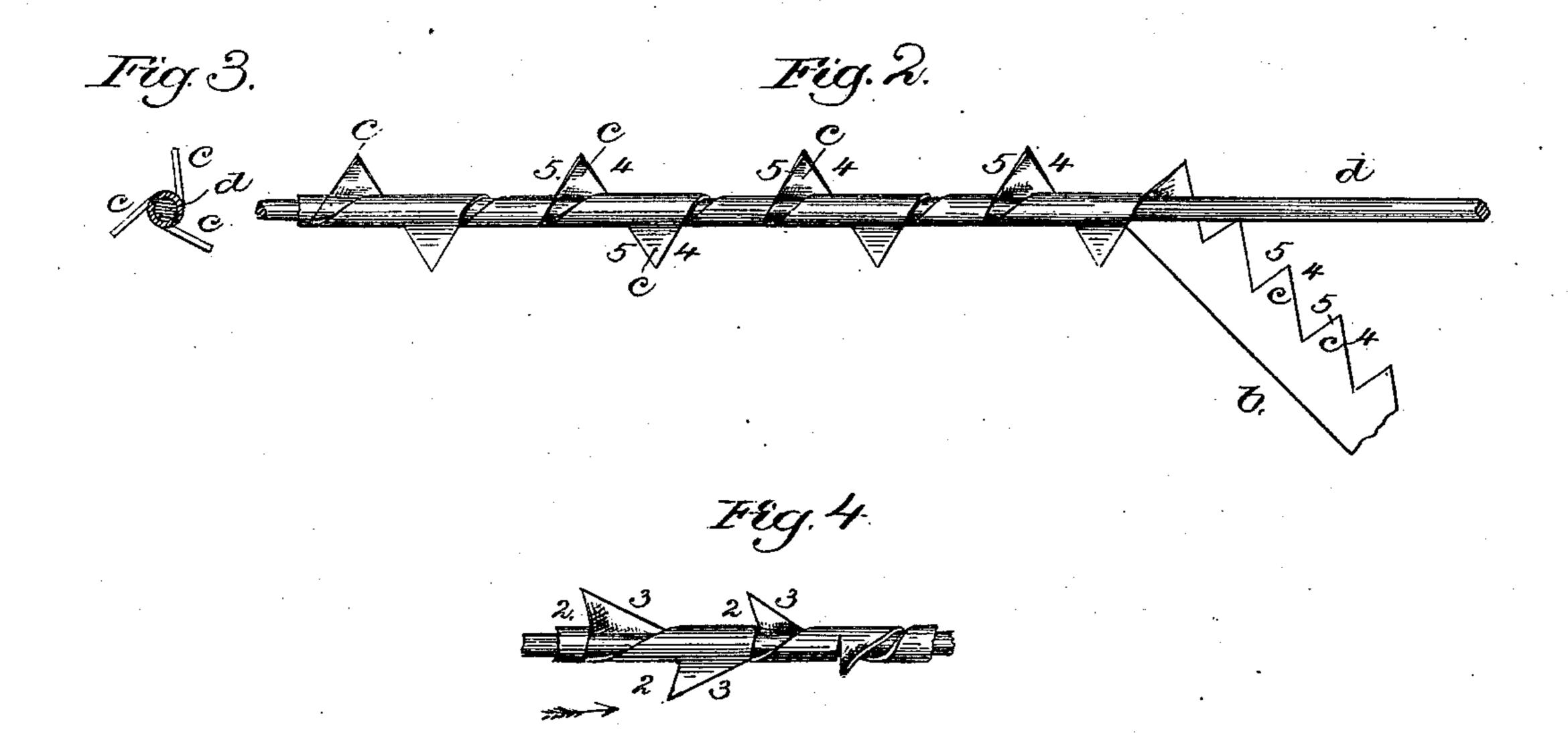
## BARBED FENCE MATERIAL.

No. 273,245.

Patented Mar. 6, 1883.

Fig.Z





Wetreesses. John F.C. Brinkers Fred J. Dowell.

Treventor.
William S. Bate

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attys.

## United States Patent Office.

WILLIAM S. BATE, OF BOSTON, MASSACHUSETTS.

## BARBED FENCE MATERIAL.

SPECIFICATION forming part of Letters Patent No. 273,245, dated March 6, 1883.

Application filed October 31, 1882. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM S. BATE, of Boston, county of Suffolk, State of Massachusetts, have invented an Improvement in Barbed 5 Fence Material, of which the following description, in connection with the accompanying drawings, is a specification, like letters on the drawings representing like parts.

My invention relates to that class of barbed 10 fence material which is composed of a wire having a strip or ribbon of sheet metal wound about it, the edge of the strip being cut to pro-

duce prongs.

In the class of fence material referred to it 15 is common to provide one or both edges of a thin sheet-metal strip with a series of parallel incisions cut diagonally into the said strip, to thus form a series of parallal side barbs, which, when the strip is wound about the wire, will 20 extend outwardly and present sharp points. Each parallel side barb of a metal strip such as referred to, when thrown out by winding the strip upon the wire, will project as a hookshaped barb, or a barb the edges of which 25 project in the same direction; but such a barb is very objectionable for two reasons: first, because cattle rubbing against the fence material in the direction of the inclination of the barbs are not pricked by the barbs, as they 30 should be in order to cause the cattle to leave the fence; and, secondly, because when cattle rub against the fence material in a direction opposite the inclination of the barbs the latter enter the flesh deeply, as a hook, and, ow-35 ing to the acute-angled inner edge of the barb, cause the flesh to be badly torn, often seriously injuring the cattle when it is only desired to prick them.

My invention has for its object the avoid-40 ance of this objection; and it consists in fencing material composed of a wire core around which is spirally wound a sheet-metal strip having barbs or prongs on one edge only, the edges of said barbs being opposite angles of 45 the same degree and standing off from the wire, as hereinafter particularly set forth.

In practicing my invention I take thin sheet metal wide enough to form two strips of fence material, and sever it centrally and longitudi-50 nally with a zigzag cut, thus forming two

strips, each of which has a series of prongs having but two edges, and in which the two edges are not parallel, but are inclined each with relation to the other, as will be described. In the formation of pronged strips in this way 55 the prongs for two strips will be formed by one cutter at one operation and handling, and without waste of stock, and when the pronged strips are wound about the central wire or core the said prongs thrown out from the strip 60 point directly away from the center of the wire, rather than toward one end of it, and the two edges of each of the said prongs, commencing at the point, incline toward the wire and the base of the prong in opposite directions, thus 65 forming a prong with its edges so inclined that cattle rubbing against the fence in either direction will be pricked; but the prongs, owing to the inclination of their sides from their points backward—one to the right and the 70 other to the left—are made to present two edges, which will not allow the prongs to hook into the flesh as the cattle move in either direction in contact with the fence, thus obviating tearing of the flesh.

Figure 1 represents a metal strip the main part of which is shown as severed longitudinally in accordance with my method. Fig. 2 represents fence material embodying my invention, it showing a central wire with one of 80 my barbed strips nearly wound thereon. Fig. 3 is a cross-section of Fig. 2, and Fig. 4 represents a form of fence-stock now used.

Referring first to Fig. 4, which represents the particular kind of barbed fencing it is the 85 special object of my invention to improve, it will be seen that the two edges 2 3 of the prongs commencing nearest the wire center incline toward the left. Should cattle rub along the fence in the direction of the arrow 90 near Fig. 4, the prongs will enter or hook into the flesh deeply, and tear and injure the flesh; but if cattle rub along the fence in the opposite direction the prongs have but little, if any, effect.

To produce my improved fence material I take a broad strip, a, of thin sheet metal, and sever it longitudinally along the zigzag line shown in Fig. 1, forming two separate toothed strips, b, having prongs or portions c, pro- 100

vided with edges 45, shaped and located each with relation to the other, as shown clearly in Fig. 2. The strip b is wound spirally about the central wire or core, d, as shown in Fig. 2, and as it is wound the edges 45 of the prongs or portions c assume the inclined positions shown in the drawings, Fig. 2, so that the said prongs will not enter and hang in the flesh, as will prongs of the shape shown in Fig. 4, to but will merely scratch or prick the cattle. As the edges of the prongs or portions c, shaped as shown in Fig. 2, will not tear the flesh, I shall designate them as prongs having nontearing edges.

; I claim—

The fencing material herein shown and de-

scribed, the same consisting of a wire, d, provided with the strip b, wound spirally around it, and having the barbs or prongs c on one edge only thereof, the edges 45 of which barbs 20 or prongs stand off from the wire at opposite angles of the same degree, as set forth, and for the purpose specified.

In testimony whereof I have signed my name to this specification in the presence of two sub- 25

scribing witnesses.

WILLIAM S. BATE.

Witnesses:

G. W. GREGORY,

B. J. Noyes.