No. 660,897.

Patented Oct. 30, 1900.

T. E. GRAFTON. WALL TIE.

(Application filed Jan. 27, 1900.)

(No Model.)

Mig. 1

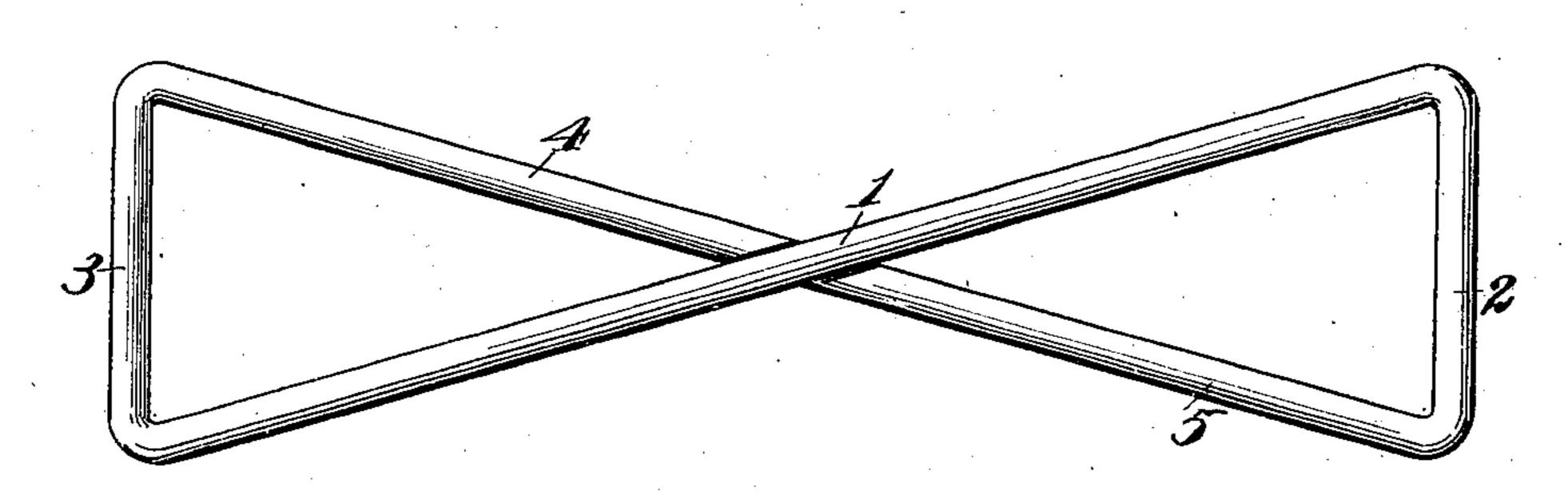


Fig. 2
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WALL-TIE.

SPECIFICATION forming part of Letters Patent No. 660,897, dated October 30, 1900.

Application filed January 27, 1900. Serial No. 2,995. (No model.)

To all whom it may concern:

Be it known that I, Thomas Edward Grafton, a citizen of the United States, residing at New York, in the county of New York and State of New York, have invented certain new and useful Improvements in Wall-Ties, of which the following is a full, clear, and exact specification.

This invention relates to wall-ties, and its object is to construct a simple and cheap tie which shall possess great strength and be adapted for convenient and efficient use. Such ties as have heretofore been in common use have comprised a piece (or pieces) of wire bent upon itself. Such constructions are objectionable, because the double thickness of wire prevents a close joint being made. I propose to construct a tie that will embody but one thickness of wire and will be of such shape that the greater the strain put upon the tie the more firmly will the parts of the tie be held together.

The invention will be more particularly described with reference to the accompanying drawing, in which the figure represents a tie constructed in accordance with my invention.

The tie is formed of wire of any suitable material, preferably malleable-iron wire gal-30 vanized, and comprises a single piece bent, as illustrated in the drawing, to form a straight portion 1, the opposite ends of which are bent over to form two end portions 23, parallel to each other, at the ends of which the wire is 35 again bent to form the inwardly-directed portions 45, the ends of which meet the straight portion 1 at substantially the middle portion thereof and preferably directly opposite each other. Obviously the parts 4 5 may be so 40 formed as to meet the portion 1 at any suitable part. For illustration, the parts 4 and 5 may be bent as illustrated by the dotted lines in the drawing.

The tie is placed in position between the bricks when in use in substantially the same manner as such ties have heretofore been placed; but it will be observed that by reason of the fact that all of the parts lie in substan-

tially the same plane a very close 'joint may be formed and also that whatever strain is 50 placed upon the tie tends only to force the portions 4 and 5 more tightly against the portion 1, which tends to make the two counterpart wedge portions more solid.

If preferred, the tie may be stamped out of 55 a single sheet of metal, in which case it will have the same exterior shape as that shown in the drawing.

Having thus described my invention, I declare that what I claim as new, and desire to 60 secure by Letters Patent, is—

1. A wall-tie comprising a single piece of wire bent to form a central portion and having its ends bent to form two wedge-shaped portions, said ends being directed against said 65 central portion and braced against the same, substantially as described.

2. A wall-tie comprising a single piece of wire bent to form a central portion, and having its ends bent to form two wedge-shaped 7c portions, said ends being directed against said central portion and loosely braced against the same, all of said parts lying in substantially the same plane, substantially as described.

3. A wall-tie comprising a portion 1, the outer portions 2 and 3, and the inwardly-directed portions 4, 5, the latter being directed against said central portion 1, and loosely braced against the same at or about the mid- 80 dle thereof, substantially as described.

4. A wall-tie comprising a portion 1, the outer portions 2 and 3, and the inwardly-directed portions 4, 5, the latter being directly against said central portion 1, and loosely 85 braced against the same at or about the middle thereof, all of said portions lying in substantially the same plane, substantially as described.

In testimony whereof I affix my signature 90 in presence of two witnesses.

THOMAS EDWARD GRAFTON.

Witnesses:

J. S. R. VAN METER, A. J. PARSONS,