

(No Model.)

M. M. JACOBS.
BONDING COLLAR.

No. 533,221.

Patented Jan. 29, 1895.

Fig. 1.

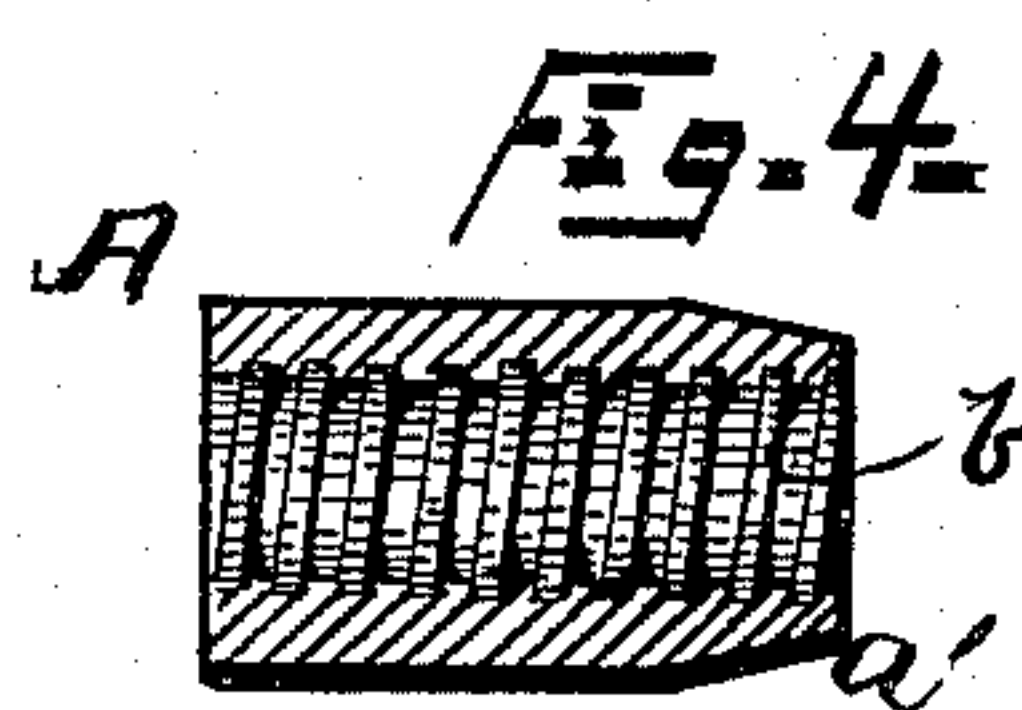
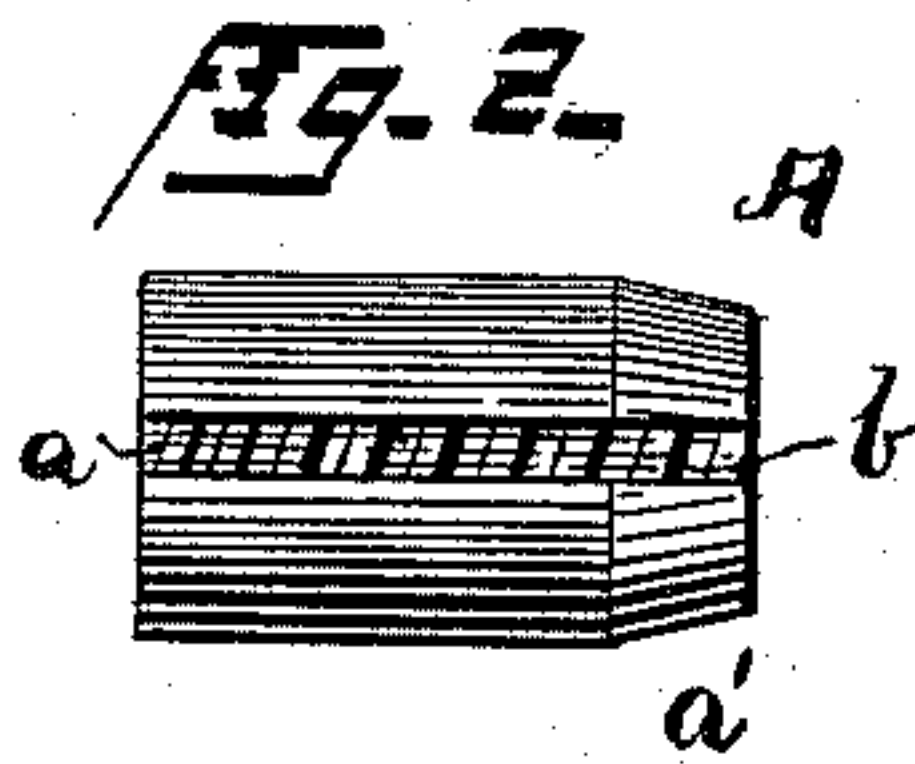
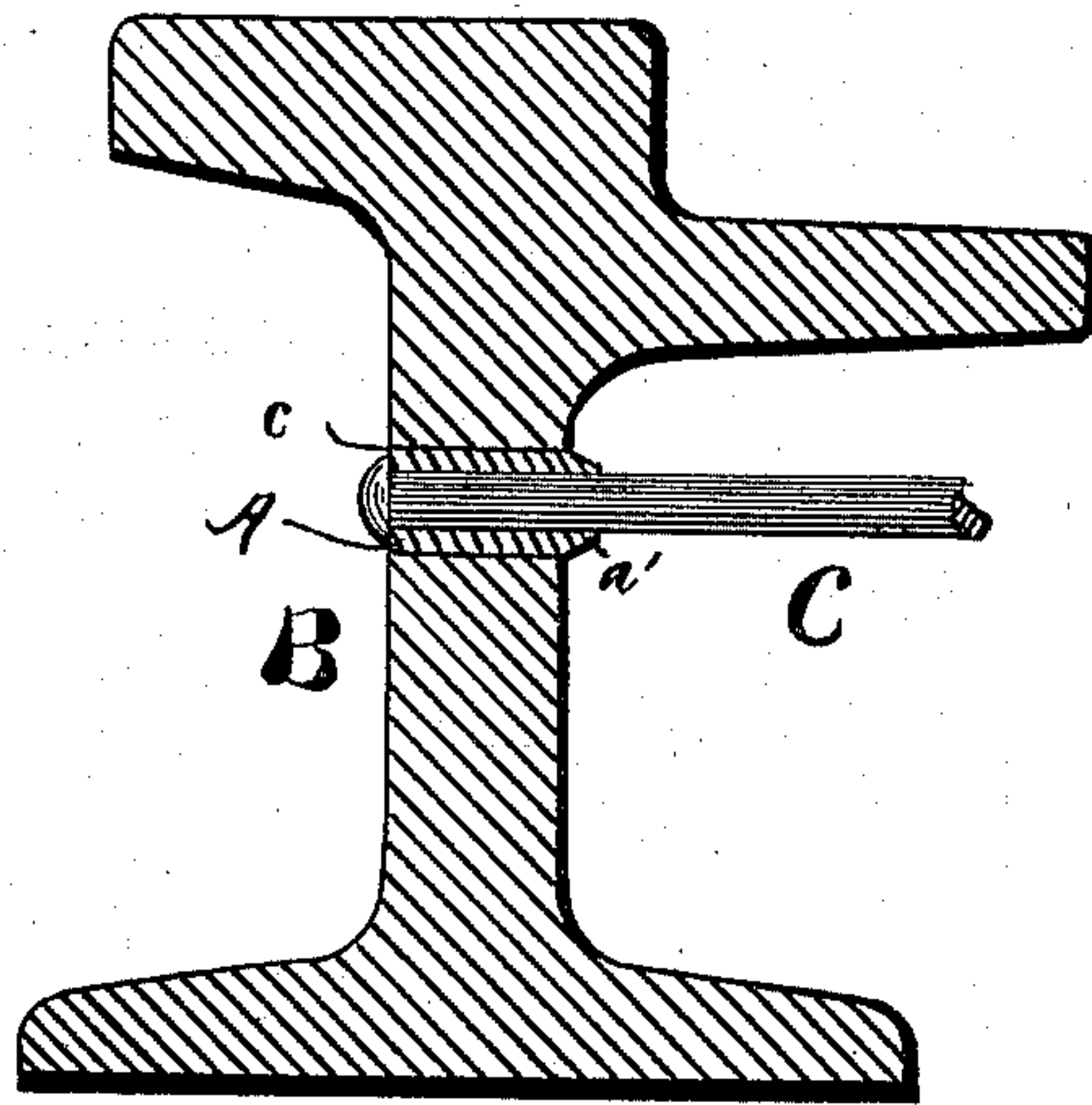
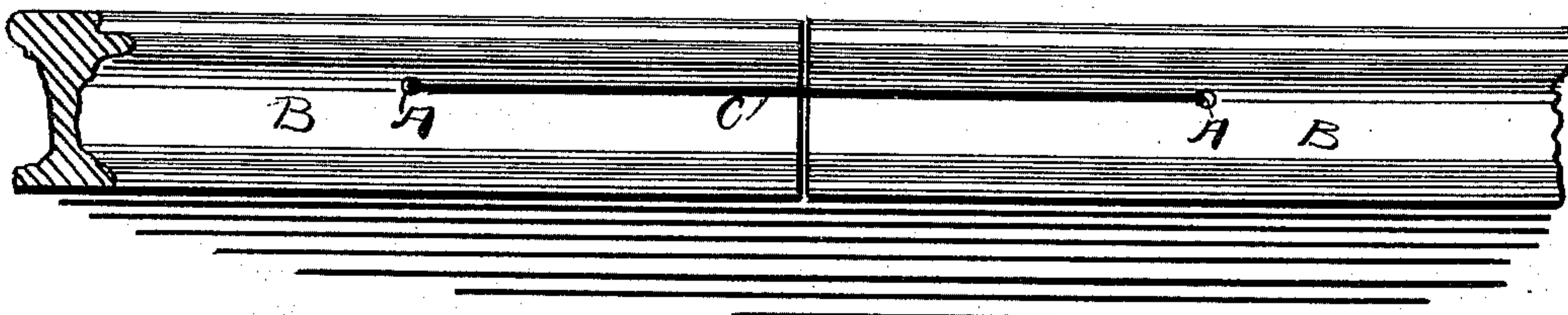


Fig. 5.



WITNESSES:

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MILTON M. JACOBS, OF NEW YORK, N. Y.

BONDING-COLLAR.

SPECIFICATION forming part of Letters Patent No. 533,221, dated January 29, 1895.

Application filed September 12, 1894. Serial No. 522,836. (No model.)

To all whom it may concern:

Be it known that I, MILTON M. JACOBS, of New York, in the county of New York, in the State of New York, have invented new and useful Improvements in Bonding-Collars, of which the following, taken in connection with the accompanying drawings, is a full, clear, and exact description.

This invention relates to bonding collars, which are adapted to secure the wires to conductors for the purpose of electrically connecting them.

In bonding rails or other large conductors it is essential that a joint be made which shall not only make an electrical connection, but preserve the electrical connection, and in order to do this a joint or connection must be made which shall not permit of corrosion, secure it beyond a possibility of the connection being disengaged and in so making the bond connection or joint that it may be easily and readily inspected, and to that end my object is to produce such a bonding collar adapted to be readily secured to the ends of the wire, so that when driven into the rail a positive non-corrosive connection is formed; and to that end my invention consists in the several new and novel features of construction hereinafter described and which are specifically set forth in the claim hereunto annexed.

It is constructed as follows, reference being had to the accompanying drawings, in which—

Figure 1 is a cross section of a rail, showing the bonding collar in use securing the end of the wire to the conductor. Fig. 2 is a side view of the bonding collar detached. Fig. 3 is an end view thereof. Fig. 4 is a longitudinal section. Fig. 5 is a side view of the adjacent end of two rail conductors bonded with my collars.

For the purpose of illustrating the use of this bonding collar I show it connecting the bonding wire to two rail conductors, although I do not limit myself to its specific use in this line of work, as it will be evident that it may be used wherever it is desired to make an electrical connection.

—A— is the bonding collar constructed substantially circular or polygonal in cross section and is provided with a slot-way —a— upon one side or may be provided with groove or grooves and is preferably reduced in size at one end as shown at —a'—, so that it may be readily inserted into the opening in the rail. The interior of the collar is preferably threaded as shown at —b— or may be roughened in any manner desired, for the purposes hereinafter set forth.

—B— is a conducting rail provided with an opening transversely —c— to correspond with the form of the collar used.

—C— is the bonding wire, preferably constructed U-shaped, so as to permit of its being easily passed through the openings in the adjacent ends of the conducting rail. The collar —A— is then passed over each end and the ends of the wire riveted down against the outer end of the collar, so as to prevent its being withdrawn. The collars are then driven into the apertures in the conducting rail, which are slightly smaller than the periphery of the collar. This act swages or forces the collar closely and tightly about the wire the roughened inner face or threads embedding firmly into the wire and serves to keep the connection air and water proof and thus avoids corrosion. The collar —A— is also preferably tinned or coated with similar material, so that when it is driven into the aperture of the conducting rail, all of the interstices are filled, thus making the connection air and water proof and preventing corrosion.

What I claim, and desire to secure by Letters Patent, is—

A bonding collar, provided with a coating of tin or similar substance, grooved or slotted longitudinally and threaded or roughened interiorly, as set forth.

In witness whereof I have hereunto set my hand on this 29th day of August, 1894.

MILTON M. JACOBS.

In presence of—

JESSIE E. MURRAY,
HOWARD P. DENISON.