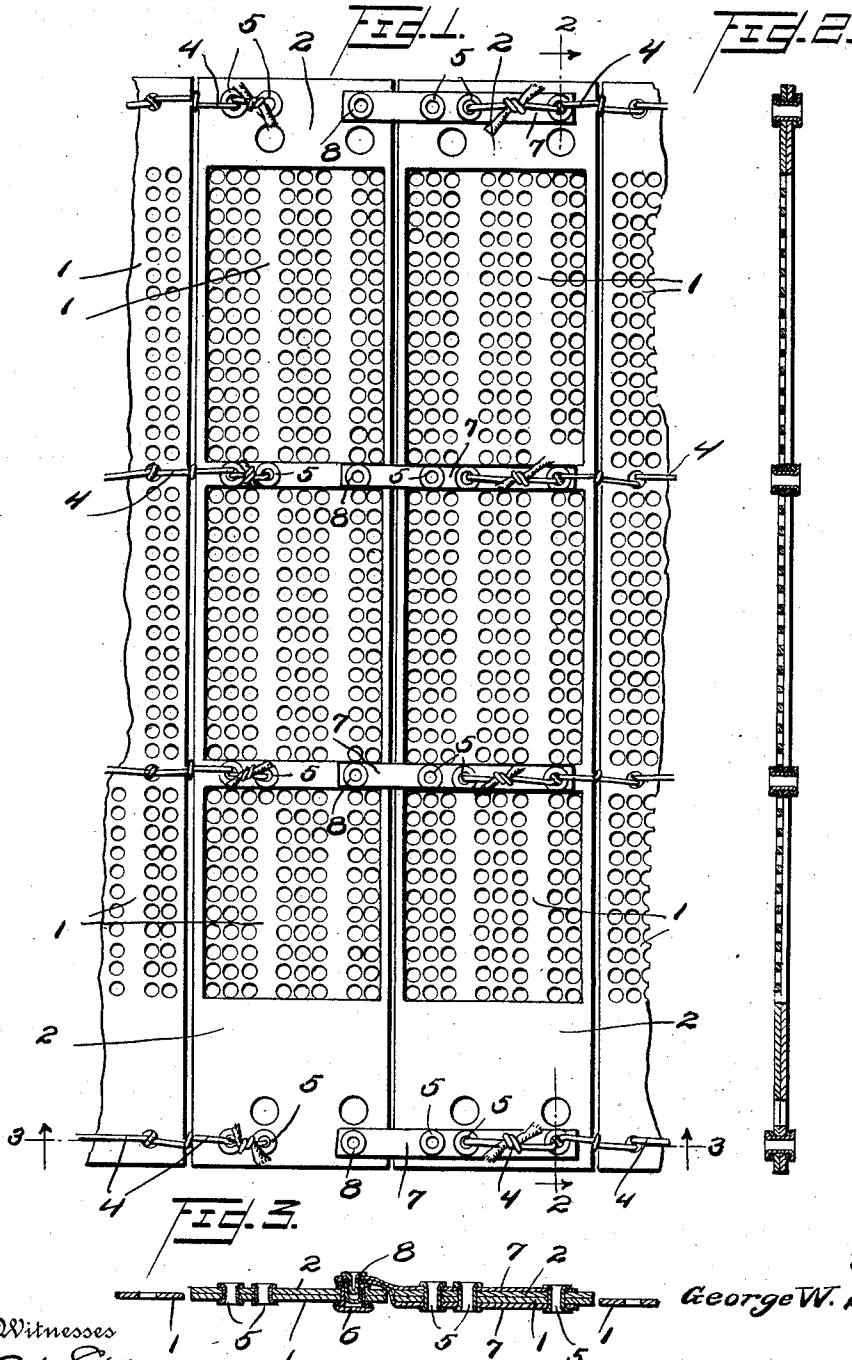


G. W. STOKES.
CARDS FOR JACQUARD LOOMS.
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Patented Feb. 18, 1913.



Witnesses
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GEORGE W. STOKES, OF PHILADELPHIA, PENNSYLVANIA.

CARD FOR JACQUARD LOOMS.

1,053,451.

Specification of Letters Patent.

Patented Feb. 18, 1913.

Application filed March 1, 1912. Serial No. 680,821.

To all whom it may concern:

Be it known that I, GEORGE W. STOKES, a citizen of the United States, residing at Philadelphia, in the county of Philadelphia and State of Pennsylvania, have invented certain new and useful Improvements in Cards for Jacquard Looms, of which the following is a specification.

My invention relates to improvements in cards for Jacquard looms, the object of the invention being to provide improved means which enable the end cards of a series of cards to be quickly connected and disconnected without the necessity of tying cords. Heretofore, the cards of a Jacquard loom have been provided at their ends with cords and the end cards of one set are connected to another by tying the cords. This has proven a matter of considerable time, trouble and expense, and it is the purpose of my invention to provide a simple, quick, and yet secure manner of connecting the end cards which will result in a great saving of time and expense.

With these and other objects in view, the invention consists in certain novel features of construction and combinations and arrangements of parts, as will be more fully hereinafter described and pointed out in the claims.

In the accompanying drawings: Figure 1, is a fragmentary plan view showing the end cards connected by my improved means. Fig. 2, is a view in section on the line 2—2 of Fig. 1, and Fig. 3, is a view in section on the line 3—3 of Fig. 1.

1, represents the ordinary cards of a Jacquard loom, and 2 are metal plates which are secured on the end cards. These metal plates are cut out to expose the perforations in the cards and they are made as thin and light as possible, consistent with strength and durability.

The end cards, like all the other cards of a set, are perforated for the reception of the tie cords 4, and the perforations in the end cards register with perforations in the metal plates. As is customary, there are four sets of these tie cords, and they are passed through the two outer openings in the end plates and tied as shown in Fig. 1. These cord receiving openings in the metal plates and in the end cards are strengthened by metal eyelets 5 which serve also to secure the metal plates on the end cards. The

openings adjacent the outer or free edge of one of the cards and metal plates, are closed by the cap member 6 of snap buttons. In other words, while all of the openings, which are normally adapted for the reception of the cords, are closed by metal fasteners, all of such metal fasteners are ordinary eyelets with the exception of the four adjacent the free edge of one card as seen most clearly in Fig. 3. The eyelets 5 on the other card serve also to secure tapes 7 to the card and the metal plate, and at their free ends are provided with snap button plungers 8 which are adapted to be projected into the members 6 and firmly hold the cards together.

A simple construction is illustrated in which a piece of tape is folded between its ends and the plunger member 8 secured to the tape adjacent its fold, the ends of said tape being located above and below the plate and card, and the eyelets passed through the card, the plate and both ends of the tape. Sufficient of the tape is allowed to project beyond the end of the card, and plate, to extend over the other plate and be forced into the member 6. It will thus be noted that when it is desired to disconnect the cards, it is simply necessary to pull the plunger member 8 out of member 6. This enables the cards to be quickly separated and joined without the tiresome and tedious process of untying and tying the cords. Furthermore, the metal plates and the eyelets reinforce the end cards to such an extent that they relieve the cards of the strain of the cords, and give them sufficient strength to sustain the extra wear which they necessarily receive by reason of their connection and disconnection. My invention, therefore, has to do with the provision of means which enable the connection and disconnection of the cards and may be utilized in connection with any form or size of Jacquard loom card. The invention is not limited to any particular formation of the openings, nor to any particular formation of the securing means, except that they are of the quick detachable sort, and permit an economy of time and labor, and hence result in a cheaper product.

Various slight changes might be made in the general form and arrangement of parts described without departing from my invention, and hence I do not limit myself to the precise details set forth, but consider myself

at liberty to make such changes and alterations as fairly fall within the spirit and scope of the appended claims.

Having thus described my invention, what I claim as new and desire to secure by Letters Patent is:

1. The combination with Jacquard loom cards, of metal eyelets projected through said cards and adapted to receive cords tying the cards together, snap button members secured to one end card, tapes secured to the other end card, and snap button members on said tapes constructed to interlock with the first-mentioned snap button members, substantially as described.

2. The combination with Jacquard loom cards, metal plates located on the end cards and cut out uncovering the perforations in the cards, eyelets securing said metal plates on the cards, and fastening devices connected to the metal plates and the cards, whereby the end cards may be quickly attached and detached, substantially as described.

3. The combination with Jacquard loom cards, fastening members on one end card and other fastening members on another end card, whereby the cards may be quickly connected and disconnected, and reinforcing plates secured to the end cards and cut out exposing the perforations therein, substantially as described.

4. The combination with Jacquard loom

cards, snap button members on the end cards, and reinforcing plates secured to the end cards and cut out exposing the perforations therein, substantially as described.

5. The combination with Jacquard loom cards having eyelets through said cards adapted to receive cords tying the cards together, of snap button members secured to one end card, tapes secured to the other end card, and snap button members on said tapes constructed to interlock with the first-mentioned snap button members, substantially as described.

6. The combination with Jacquard loom cards, metal eyelets projected through said cards and adapted to receive cords tying the cards together, snap button members secured to one end card, tapes secured to the other end card, and snap button members on said tapes constructed to interlock with the first-mentioned snap button members, and reinforcing plates secured to the end cards and cut out exposing the perforations therein, substantially as described.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

GEORGE W. STOKES.

Witnesses:

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