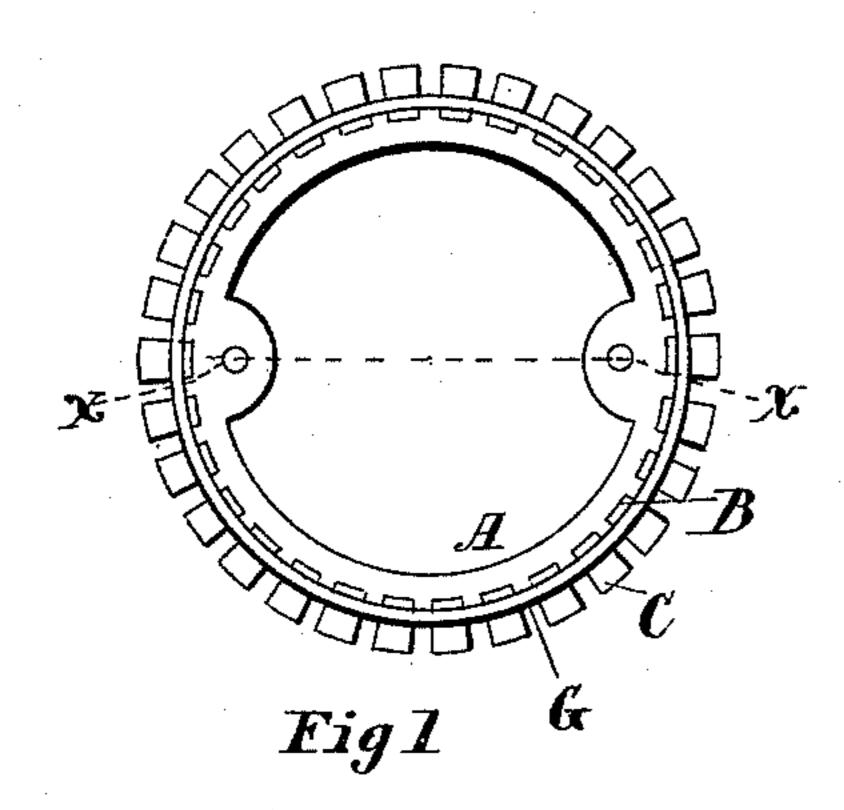
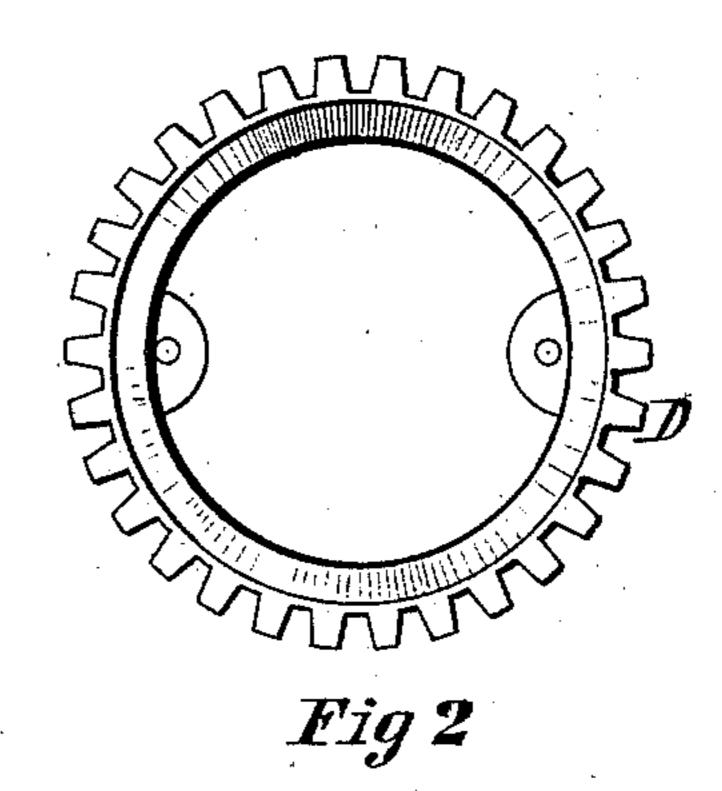
S. CORNFIELD.

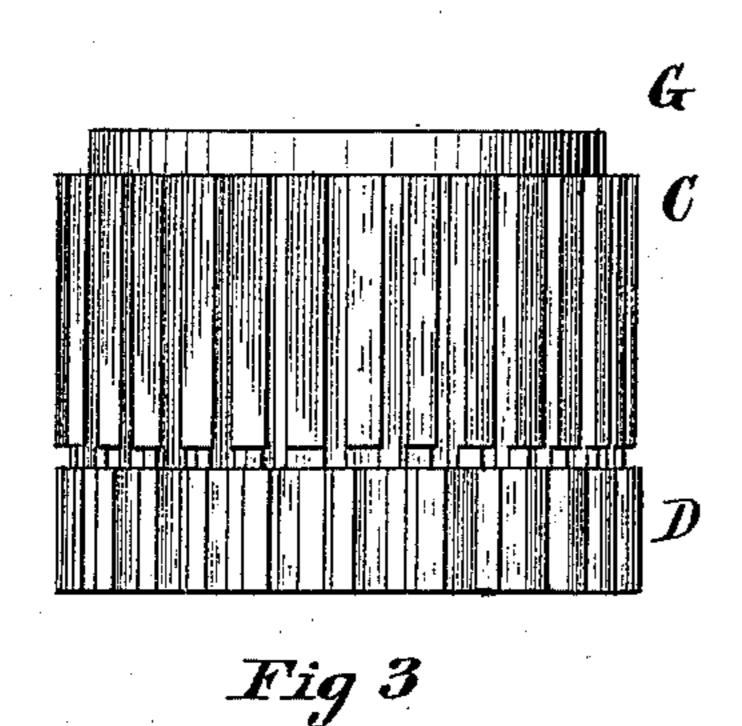
Needle Cylinder or Bed of Knitting-Machines.

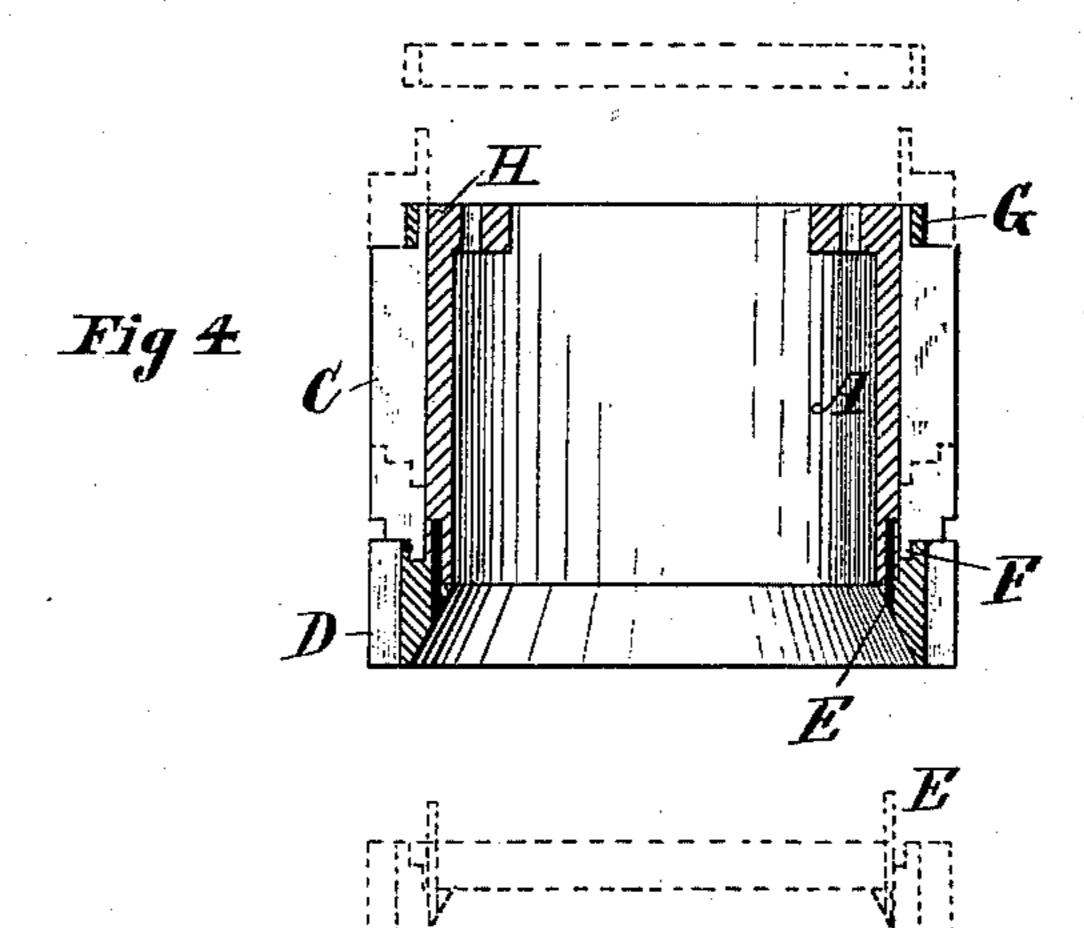
No. 223,710.

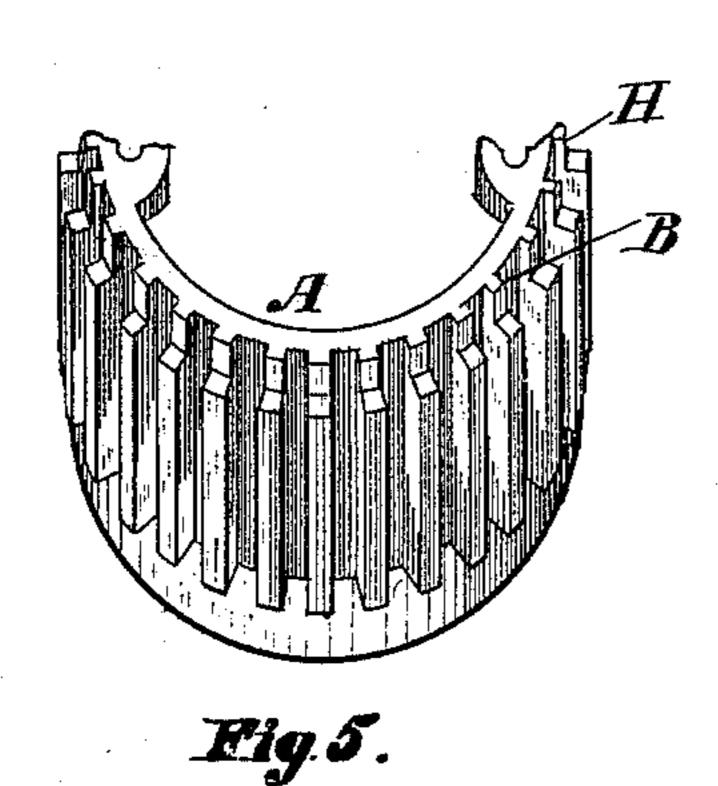
Patented Jan. 20, 1880.

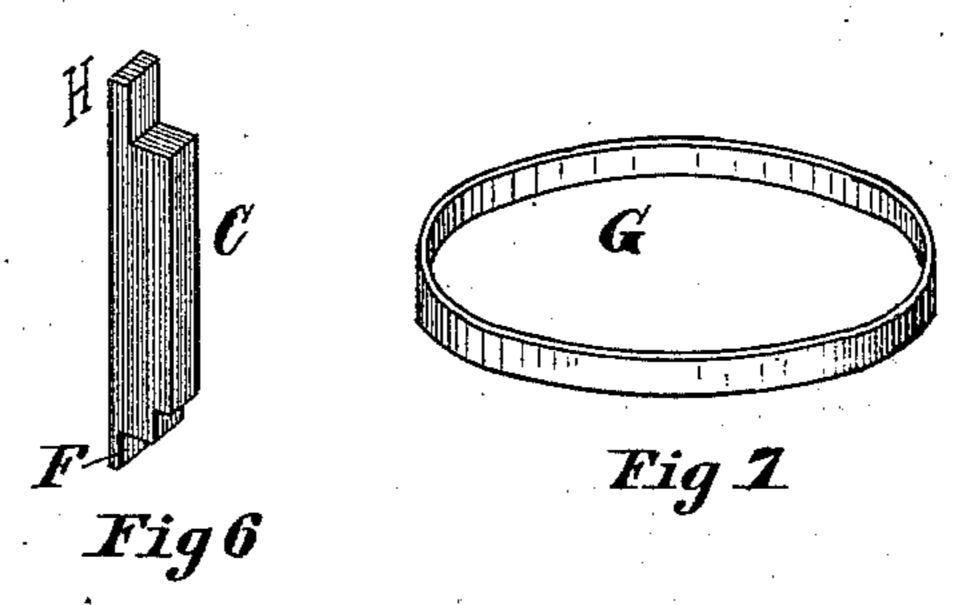












Witnesses Mb. Corlies Ino. Cellactregor INVENTOR

Solomon Cornfield

By Coburn Thachur

Attorneys

United States Patent Office.

SOLOMON CORNFIELD, OF CHICAGO, ILLINOIS.

NEEDLE CYLINDER OR BED OF KNITTING-MACHINES.

SPECIFICATION forming part of Letters Patent No. 223,710, dated January 20, 1880.

Application filed March 8, 1879.

To all whom it may concern:

Be it known that I, Solomon Cornfield, of Chicago, county of Cook, and State of Illinois, have invented a new and useful Improvement in Needle Cylinders or Beds of Knitting-Machines, which is fully described in the following specification, reference being had to the accompanying drawings.

The object of my invention is to construct the needle-cylinder in machines where cylinders are used, and the needle-bed plate in machines where bed-plates are used, in parts so constructed that when they are injured the injured parts can be readily removed and re-

In the accompanying drawings, Figure 1 represents an end view of the needle-cylinder; Fig. 2, an end view of the opposite end of the same; Fig. 3, a side elevation; Fig. 4, a vertical central sectional view, with the parts removed indicated in dotted lines; Fig. 5, a perspective view of a part of the cylinder; Fig. 6, a perspective view of one of the ribs removed from the cylinder; and Fig. 7, a detachable ring removed from the cylinder.

In the accompanying drawings, A represents the backing-plate of the needle-cylinder, in the outside of which there are grooves B. C are detachable rib-pieces, which slide into these grooves from the end, as indicated by dotted lines in Fig. 4. When these pieces are in place the cylinder presents the same external appearance as an ordinary needle-cylinder. D is a removable end of the needle-cylinder,

made with the ribs attached solidly thereto, 35 and is attached to the backing-plate A by means of pins E, and when it is in place it holds the ends of the rib-pieces C by their projecting ends F, as clearly shown in Fig. 4. These detachable rib-pieces C are also held at 40 top by means of the ring G, which passes over the projecting ends H of the rib-pieces.

It will thus be seen that the needle-cylinder is composed of separate pieces fastened together, as above described, and in case the needles bruise or nick either of the rib-pieces C it can be removed and replaced by a new one at a trifling expense. These are the only parts of the needle-cylinder that are very liable to be injured; and as the needle-cylinders or bed-plates are now made, when they are injured it becomes necessary to remove the entire needle-cylinder and replace it with a new one. I obviate that necessity by being able to renew each part separately, as above described. 55 I may make them separate when in any other than a cylindrical form.

Having thus fully described my invention, what I claim, and desire to secure by Letters Patent, is—

The combination of the grooved backingplate A, removable pieces C, removable end D, and ring G, substantially as specified and shown.

SOLOMON CORNFIELD.

Witnesses:
L. A. BUNTING,
CHAS. UTES.