

A. J. FORD.  
 PRINTING PRESS.  
 APPLICATION FILED NOV. 3, 1908.

915,948.

Patented Mar. 23, 1909.

Fig. 1

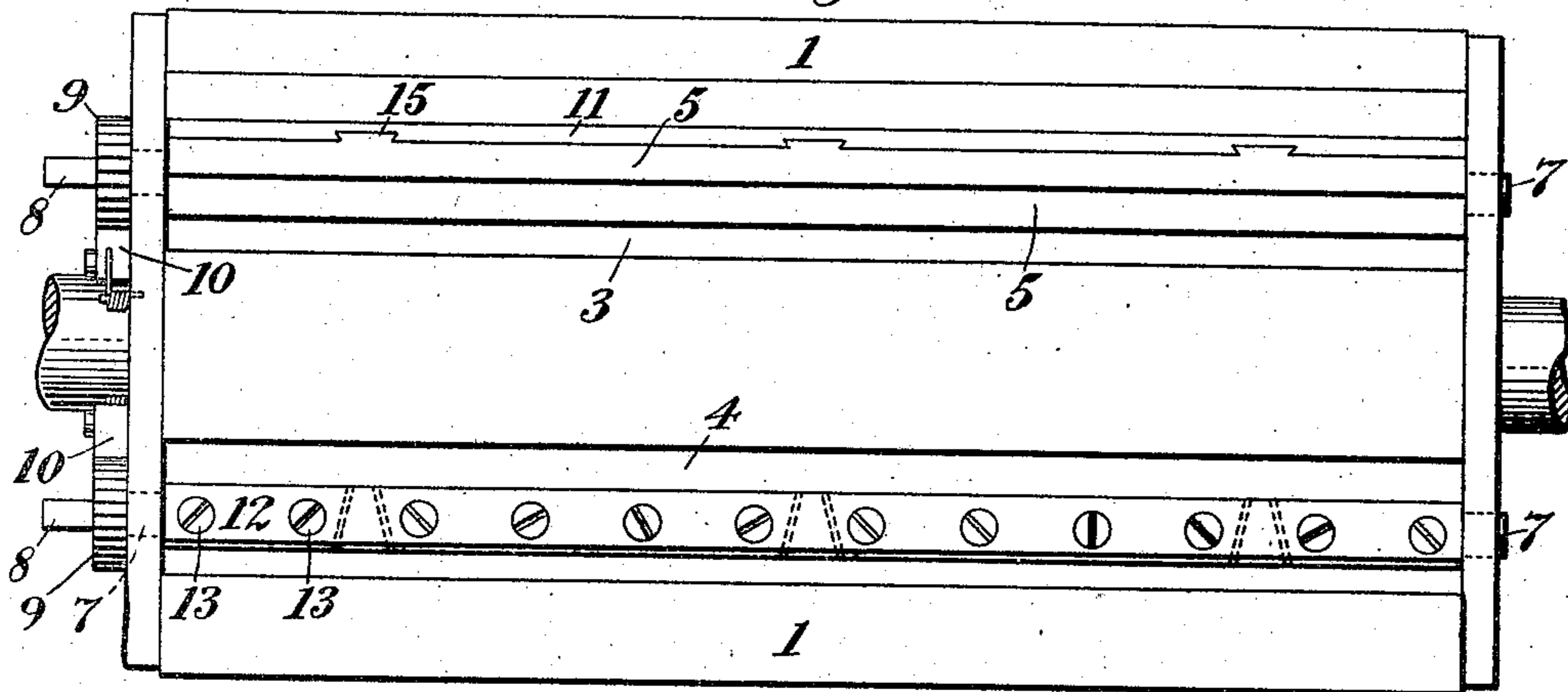


Fig. 2

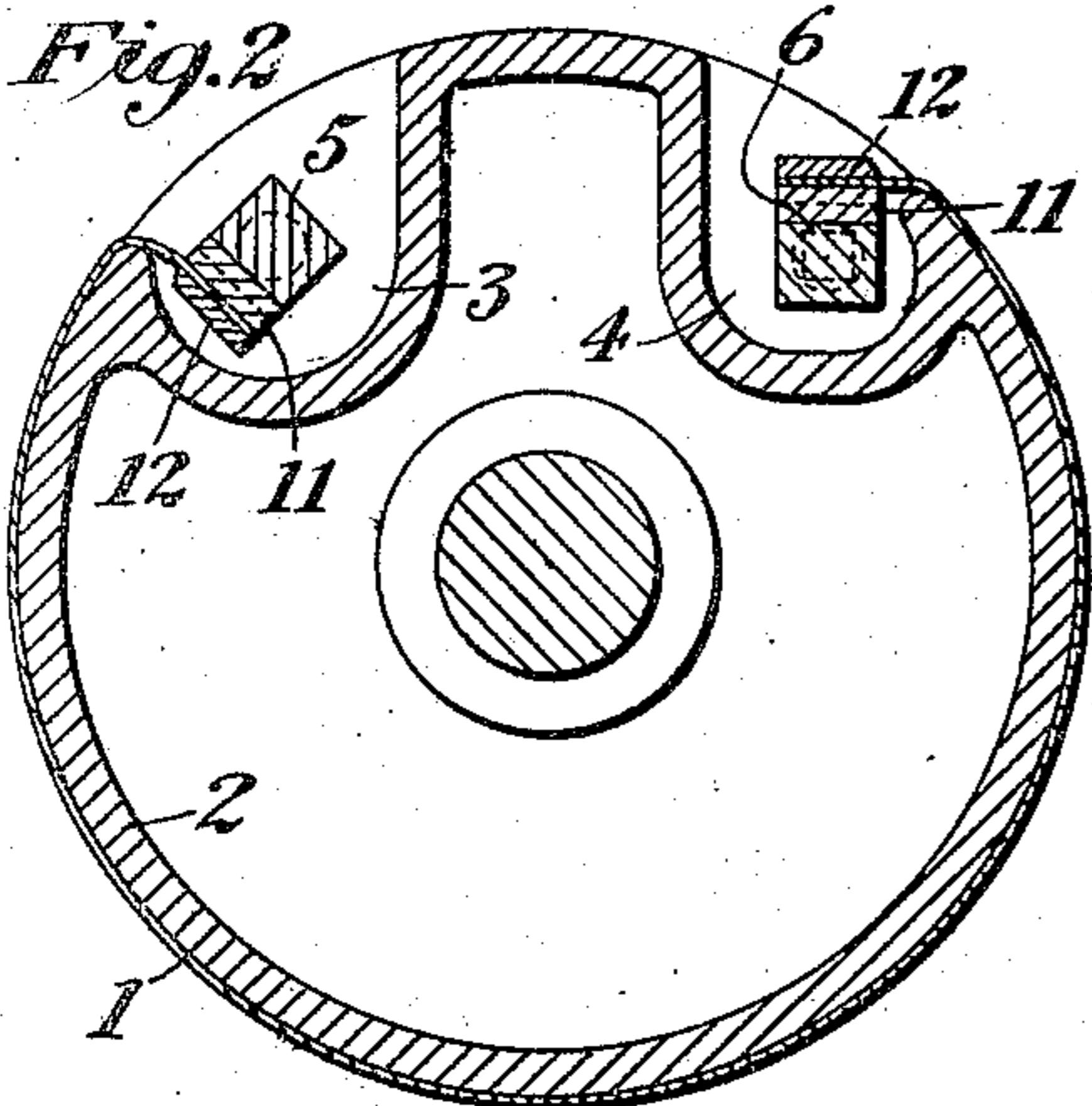


Fig. 3

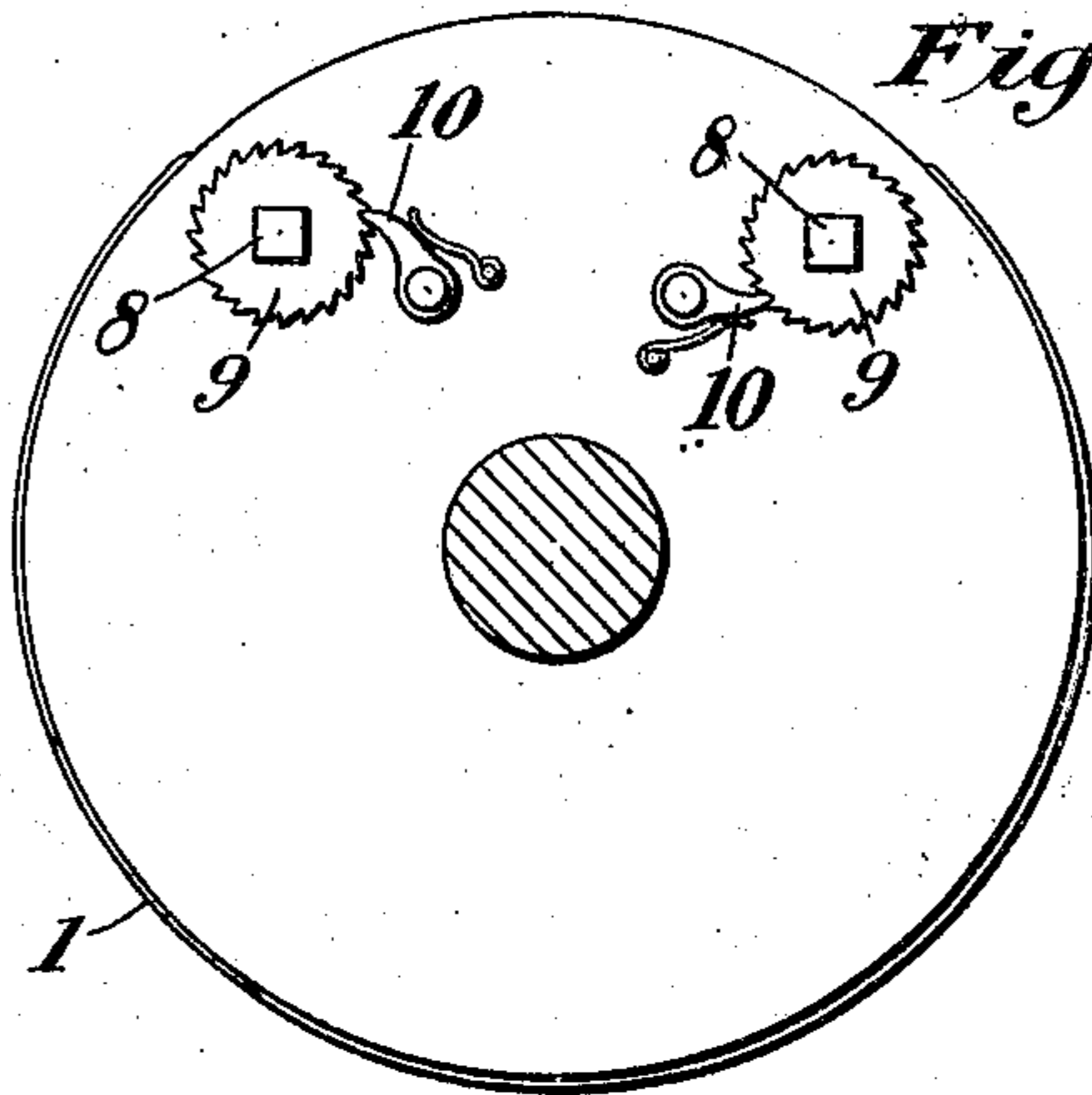


Fig. 4

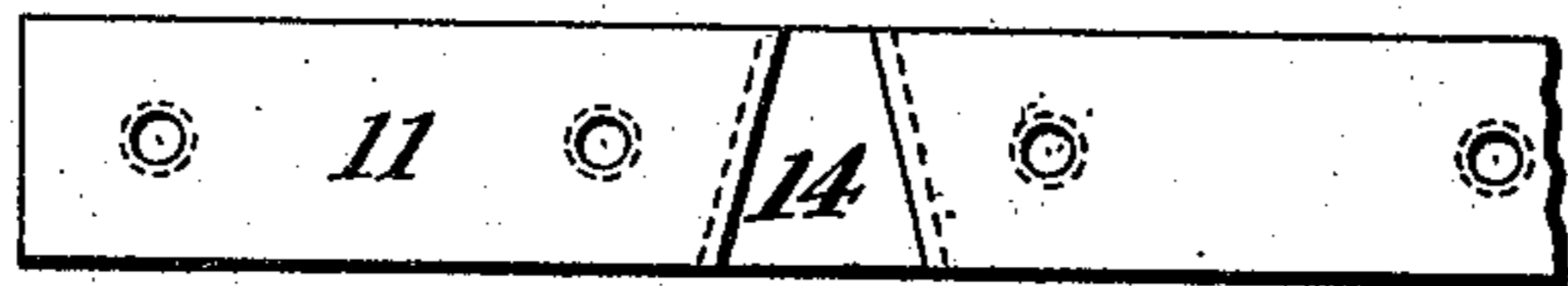


Fig. 5

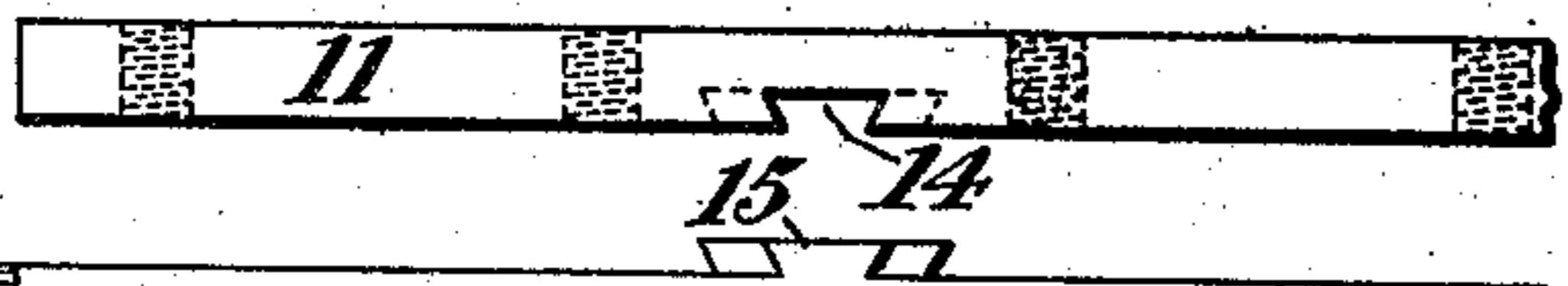


Fig. 6

Fig. 8

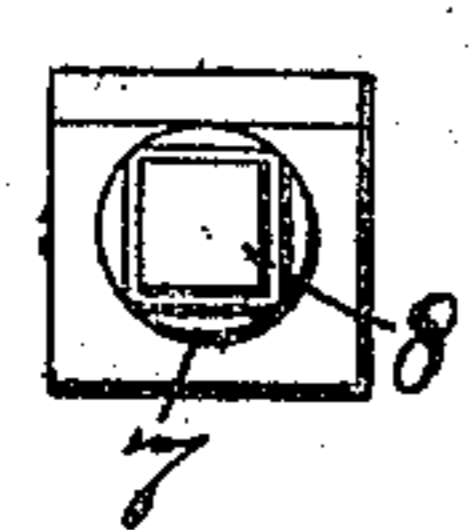


Fig. 7



Witnesses:

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by *Henry B. Williams*  
 Attorney.

# UNITED STATES PATENT OFFICE.

ALBERT J. FORD, OF NEW YORK, N. Y., ASSIGNOR TO FUCHS AND LANG MANUFACTURING COMPANY, A CORPORATION OF NEW YORK.

## PRINTING-PRESS.

No. 915,948.

Specification of Letters Patent.

Patented March 23, 1909.

Application filed November 3, 1908. Serial No. 460,818.

To all whom it may concern:

Be it known that I, ALBERT J. FORD, a citizen of the United States, residing in the borough of Manhattan, city of New York, in the county of New York and State of New York, have invented a certain new and useful Improvement in Printing - Presses, of which the following is a specification, reference being had therein to the accompanying drawings, forming part thereof.

My invention relates to improvements in printing presses.

In printing presses of various kinds it is common to cover the surface of a printing element of cylindrical or other form with a covering or blanket of rubber or other yielding material.

My invention relates particularly to the means by which such a blanket is secured in place upon the printing element, and one object of the invention is to provide for readily detaching or replacing one or both ends of the blanket to facilitate the operation of "making ready". To this end I provide, in addition to the blanket - adjusting means, readily detachable connections between these means and the blanket, designed to permit the immediate removal or replacement of the blanket without the manipulation of screws or other such devices.

Other objects and features of my invention will be noted in connection with the following description of the illustrated embodiment thereof.

I will now describe the embodiment of my invention illustrated in the accompanying drawings, and will thereafter point out my invention in claims.

Figure 1 is a plan view of a printing-press cylinder embodying the present invention. Fig. 2 is a section on the line  $x-x$  in Fig. 1, looking from left to right. Fig. 3 is an end view, looking from left to right, of Fig. 1. Figs. 4 and 5 are a bottom plan view and a front elevation of a part of one of the connecting bars. Figs. 6 and 7 are a front elevation and a plan view of a part of one of the reel rods. Fig. 8 is an end view of one of the reel rods.

The drawings illustrate a cylinder designed for use as the transfer cylinder of a planographic printing press. The blanket 1, of rubber fabric, is wrapped partly around the cylindrical surface 2 of the cylinder and its ends are adjustably secured in recesses 3 and

4 in the cylinder by means of reel rods 5 and 6. The blanket is wrapped more or less about the reel rods and is adjusted by turning the rods, which have journals 7 at their ends turning in bearings in the ends of the cylinder. The rods have squared extremities 8 by which they may be turned, and to hold the rods in adjusted position against the tension of the blanket each reel rod is provided with a ratchet wheel 9 fixed to the rod and engaged by a pawl 10 pivoted on the end of the cylinder.

To provide for the convenient removal and replacement of the blanket in "making ready", I do not secure the blanket directly to the reel rods by means of screws or pins in the usual manner, but secure its ends instead to rigid blanket-holding members, which are formed to be readily secured to or disconnected from the reel rods without the use of screws or similar means. These members comprise connecting bars 11 and clamping bars 12, between which the ends of the blanket are clamped by means of screws 13 threaded into the bars 11. The bars 11 are provided with recesses 14, of dove-tail shape, on their inner sides, and the reel rods are provided with projections 15 of corresponding form and location. The tension of the blanket causes these recesses and projections to remain firmly interlocked when the cylinder is in use, so that each bar 11 and the reel rod to which it is attached are as one solid member, but when it is desired to remove the blanket from the cylinder the tension of the blanket is relieved by disengaging one of the pawls 10 and rotating the corresponding reel rod, and either bar 11 may then be slid out of engagement with the reel rod.

The operation above described is particularly convenient in making the press ready for printing, since it is frequently necessary to place backing material behind certain portions of the blanket to improve the impression at such points, and as this operation may have to be repeated several times before the result is satisfactory, it entails considerable loss of time where the blanket must be released, in each instance, by removing or loosening several screws.

While I have illustrated my invention as applied to a cylinder, it is also applicable to a flat printing element, and various other modifications may be made in the details of construction of the embodiment of my invention

hereinbefore described and illustrated in the accompanying drawings within the nature of the invention and the scope of the following claims.

5 I claim:

1. The combination, with a printing element of a printing press, of a reel rod for adjusting a blanket on said element, and a blanket-holding device comprising two bars  
10 between which the end of a blanket may be clamped, the reel rod and one of said bars having interlocking recesses and projections formed to permit the ready detachment or attachment together of said parts.

15 2. The combination, with a printing element of a printing press, of a reel rod for adjusting a blanket on said element, a bar constructed and adapted to be secured to one end of the blanket, and interlocking recesses  
20 and projections on the reel rod and the bar formed to permit the ready detachment or attachment together of said parts.

3. The combination, with a printing ele-

ment of a printing press, of a reel rod for adjusting a blanket on said element, a bar constructed and adapted to be secured to one  
25 end of the blanket, and recesses and projections on the reel rod and the bar formed to interlock and to be detached by a tangential movement of the bar opposite in direction to  
30 the strain upon the blanket.

4. The combination, with a printing element of a printing press, of two reel rods for adjusting the two ends of a blanket on said  
35 element, two bars constructed and adapted to be secured to the ends of the blanket, and interlocking recesses and projections on the bars and the reel rods formed to permit the ready attachment and detachment of the  
40 bars and the respective reel rods.

In testimony whereof I have affixed my signature in presence of two witnesses.

ALBERT J. FORD.

Witnesses:

S. S. SANGUINETTE,  
WILLIAM A. DEEGAN.