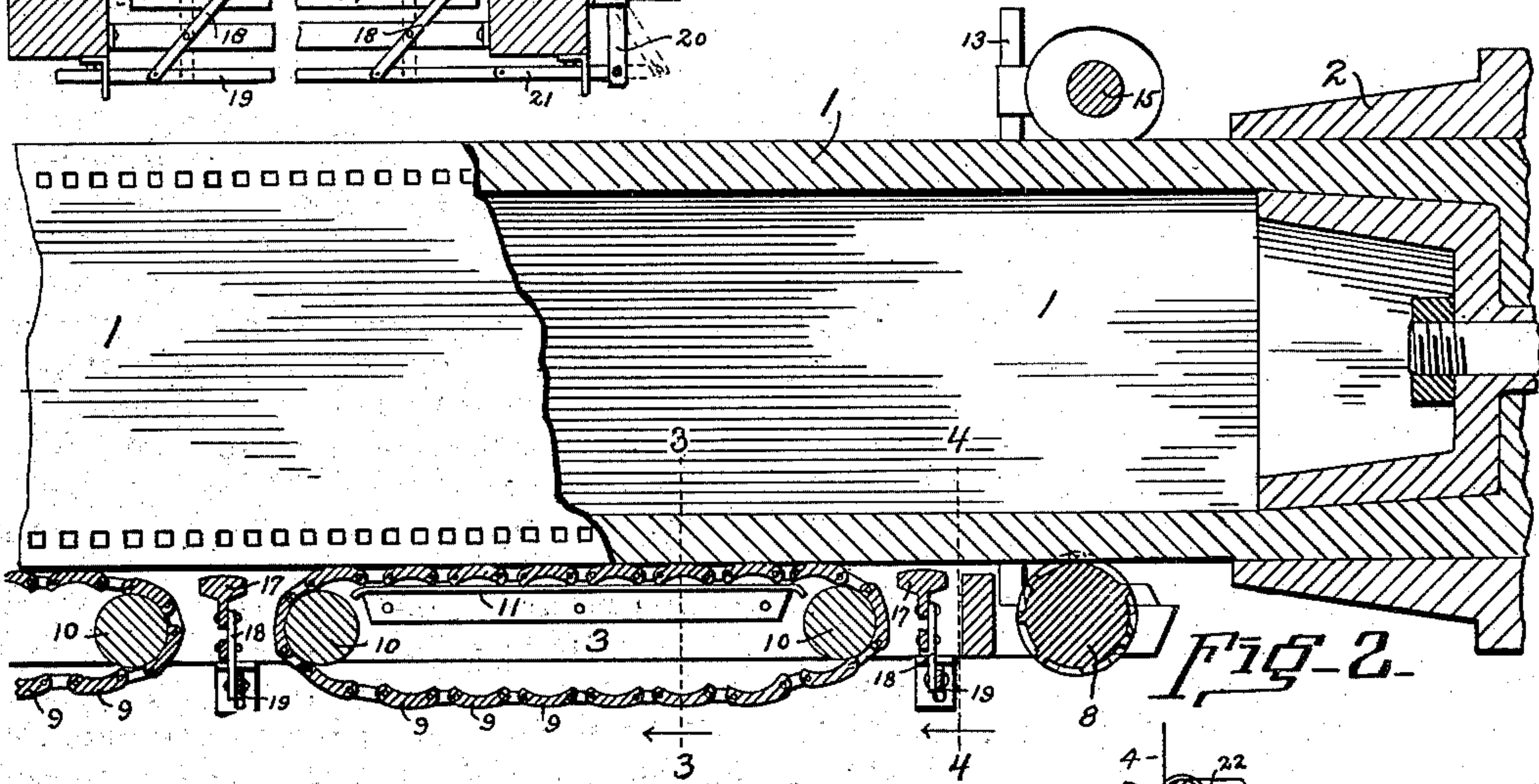
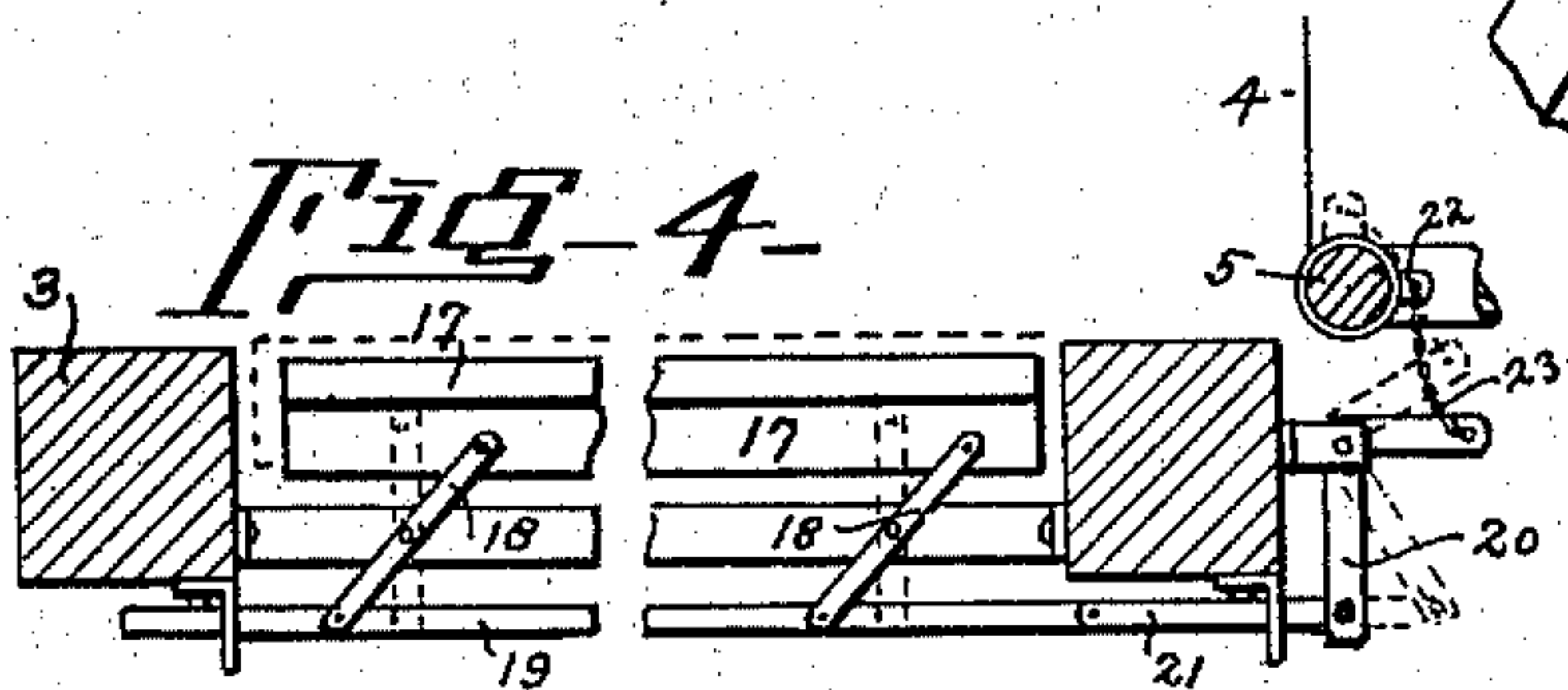
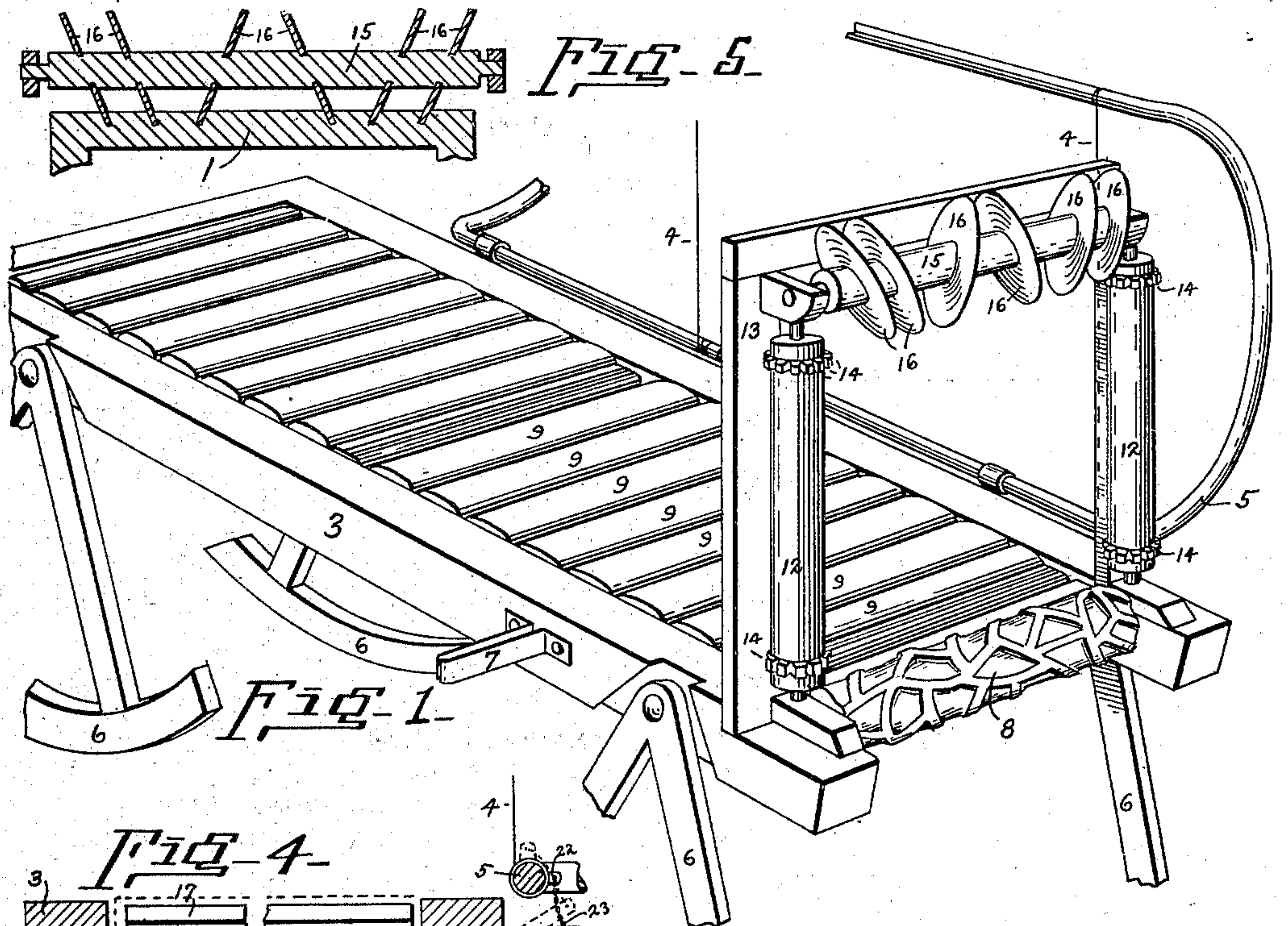


No. 749,354.

PATENTED JAN. 12, 1904.

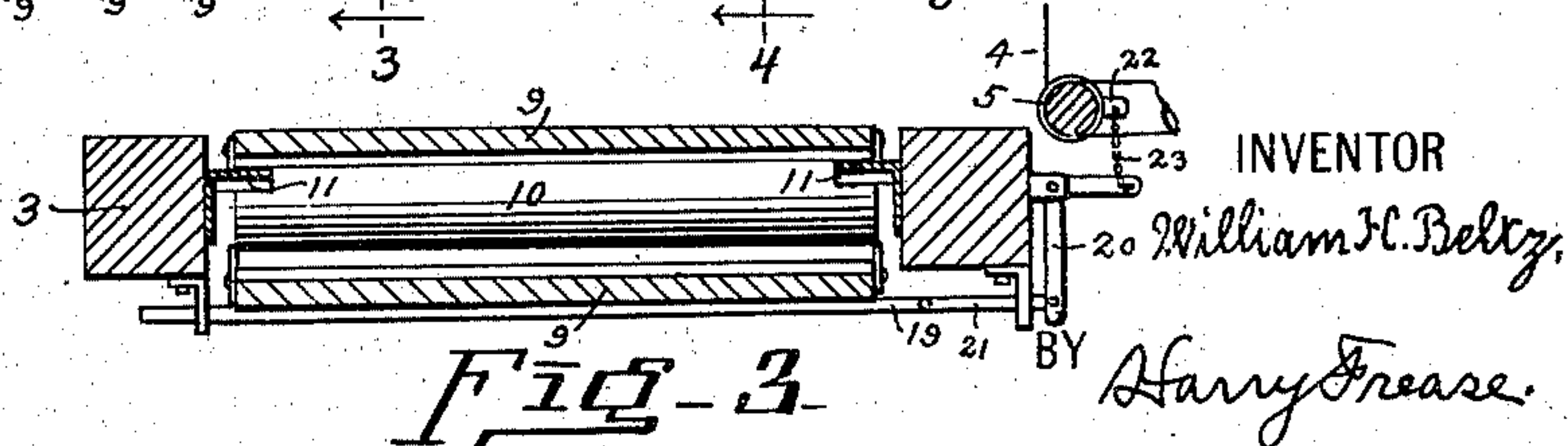
W. H. BELTZ.  
BRICK CUT-OFF TABLE.  
APPLICATION FILED MAY 27, 1903.

NO MODEL.



WITNESSES:

*W. H. Stough*  
*Euphrasia Henry*



INVENTOR

*William H. Beltz*

BY *Harry Freese*

ATTORNEY



# UNITED STATES PATENT OFFICE.

WILLIAM H. BELTZ, OF CANTON, OHIO.

## BRICK-CUT-OFF TABLE.

SPECIFICATION forming part of Letters Patent No. 749,354, dated January 12, 1904.

Application filed May 27, 1903. Serial No. 158,988. (No model.)

*To all whom it may concern:*

Be it known that I, WILLIAM H. BELTZ, a citizen of the United States, residing at Canton, in the county of Stark and State of Ohio, have  
5 invented certain new and useful Improvements in Brick-Cut-Off Tables, of which the following is a specification.

In the manufacture of brick, and especially of hollow tile or block for building purposes,  
10 it is frequently desirable to emboss one side of the block for the exposed face, to form cavities or depressions in two adjoining sides for receiving the mortar or cement of the joints, and to rough or furrow the fourth side for in-  
15 creasing the adhesion of the plaster or other inside finish; and the objects of my invention are to provide mechanism on the cut-off table used in connection with an ordinary brick or tile machine which will automatically emboss,  
20 form cavities in, and rough or furrow the respective sides of the clay column as it passes onto the cut-off table and to construct and arrange the cut-off table so that the impression made on the clay column will not be effaced  
25 and so that the cutting of the column will not bend or warp the blocks at their ends. I attain these objects by the mechanism, construction, and arrangement illustrated in the accompanying drawings, in which—

30 Figure 1 is a perspective view of part of an ordinary cut-off table, showing the improved mechanism applied thereto; Fig. 2, a longitudinal vertical section showing the mode of operation; Fig. 3, a cross-section on line 3 3,  
35 Fig. 2, showing the supporting-flanges; Fig. 4, a cross-section on line 4 4, Fig. 2, showing the supporting-bar; and Fig. 5, a fragmentary cross-section showing the furrowing-disks.

Similar numerals refer to similar parts  
40 throughout the drawings.

As the clay column 1 emanates from the die 2 of the brick or block machine it passes onto the usual cut-off table 3, upon which it is cut into suitable lengths by the wires 4, stretched  
45 in the frame 5, which is hinged to one side of the table. The cut-off table has an endwise movement, as on the rockers 6, so that it can travel a short distance along with clay column while a cut is being made, and it is usual to  
50 provide the arm 7 on one side, which arm rests

against the leg of the operator and by which the table is steadied and returned toward the machine-die after a cut has been made. The same operator usually operates the cut-off frame by hand, all of which parts and operations are well known in the art. 55

The embossing-roller 8 is transversely journaled on the end of the cut-off table adjacent to the machine-die, on the face of which roller is cut or formed the design to be impressed on  
60 the face or exposed side of the block, which impression is made on the lower side of the clay column by the weight of the column as it passes over the roller. To prevent an effacement of this impression, which would occur  
65 if the clay column afterward slid across a smooth surface or on a series of rollers of small diameter, I provide a series of endless belts, formed of the sidewise adjacent transverse slats 9, which belts travel around the  
70 idle rollers 10, and between the rollers the ends of the slats are supported by the travel on the flanges 11, which are fastened to the table. The slats 8 are located quite close together and are formed flat or only slightly  
75 rounded, so that the clay column rests on a substantially continuous and comparatively flat surface, which surface travels along with the column, and there is consequently no rubbing or effacement of the embossed lower side  
80 of the clay column.

The side rollers 12 are vertically journaled in the bracket 13 on each side of the cut-off table and are preferably located in the same plane with the embossing-roller. On the side  
85 rollers are provided the bosses 14, which form cavities in the sides of the clay column for the mortar joints of the block. These bosses are preferably located so that the cavities will be formed near the edges of the block and in  
90 case of a large block also along the middle line, where the mortar is usually laid; but the bosses can also be located to form cavities elsewhere on the side of the blocks, as may be desired. 95

The disk bar 15 is transversely mounted in the bracket 13 above the clay column and preferably in the same plane with the embossing and side rollers, and on the disk bar are mounted the disks 16, the lower edges of which are 100



located to cut longitudinal furrows in upper side of the clay column as it passes on the cut-off table. The disks are preferably inclined from the vertical one way and another, 5 so that the furrows which are cut in the clay column are inclined in their depth in alternate directions to furnish better adhesion for the plaster. The disks may be rigidly mounted on the disk bar, but are preferably rotatably 10 mounted thereon, so that they will rotate with the passing clay column and cut therein without any retarding effect and also will have every portion of their peripheries brought successively into play.

15 The supporting-bars 17 are transversely located in the cut-off table near the ends of the respective endless belts, at which points the cutting-wires are located. The supporting-bars are pivotally attached on the upper arms 20 of the straight levers 18, which levers are in turn pivoted to the cut-off table. The lower ends of the straight levers are pivoted to the transverse rod 19, which rod is in turn connected to the lower arm of the angle-lever 20 25 by means of the link 21. The angle-lever is pivoted to the cut-off frame, and its upper arm is connected with the arm 22 on the cut-off frame by means of the link 23. These various connections are so arranged and adjusted 30 that when the cut-off frame is rotated on its hinges to cut the clay column the supporting-bars are simultaneously elevated to come in contact with and to support the lower side of

the clay column immediately under the cut-off wires, which support prevents any bending or 35 sagging of the clay column by the action of the cut-off wires, and when the cut-off frame is raised after a cut is made the supporting-bars are simultaneously depressed to free the clay column from their contact. 40

I am aware that embossing-rollers have been applied to the die of a brick-machine and adapted to act on the clay column while it is supported by the die; but I am not aware that an embossing-roller has been used in combination 45 with a cut-off table, as illustrated and described herein.

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

1. In a cut-off table, a series of inclined disks 50 longitudinally mounted thereon with their edges being adapted to cut into the clay column.

2. In a cut-off table, a frame hinged longitudinally thereon, transverse wires in the frame, 55 supporting-bars transversely mounted in the table in line with the wires, and means operated by the movements of the frame for alternately elevating and depressing the bars.

In testimony whereof I have signed my name 60 to this specification in the presence of two subscribing witnesses.

WILLIAM H. BELTZ.

Witnesses:

FRIEDRICH KRAYL,  
HARRY FREASE.