

No. 730,659.

PATENTED JUNE 9, 1903.

B. HURD.
GAME APPARATUS.

APPLICATION FILED JUNE 20, 1902.

NO MODEL.

Fig. 1

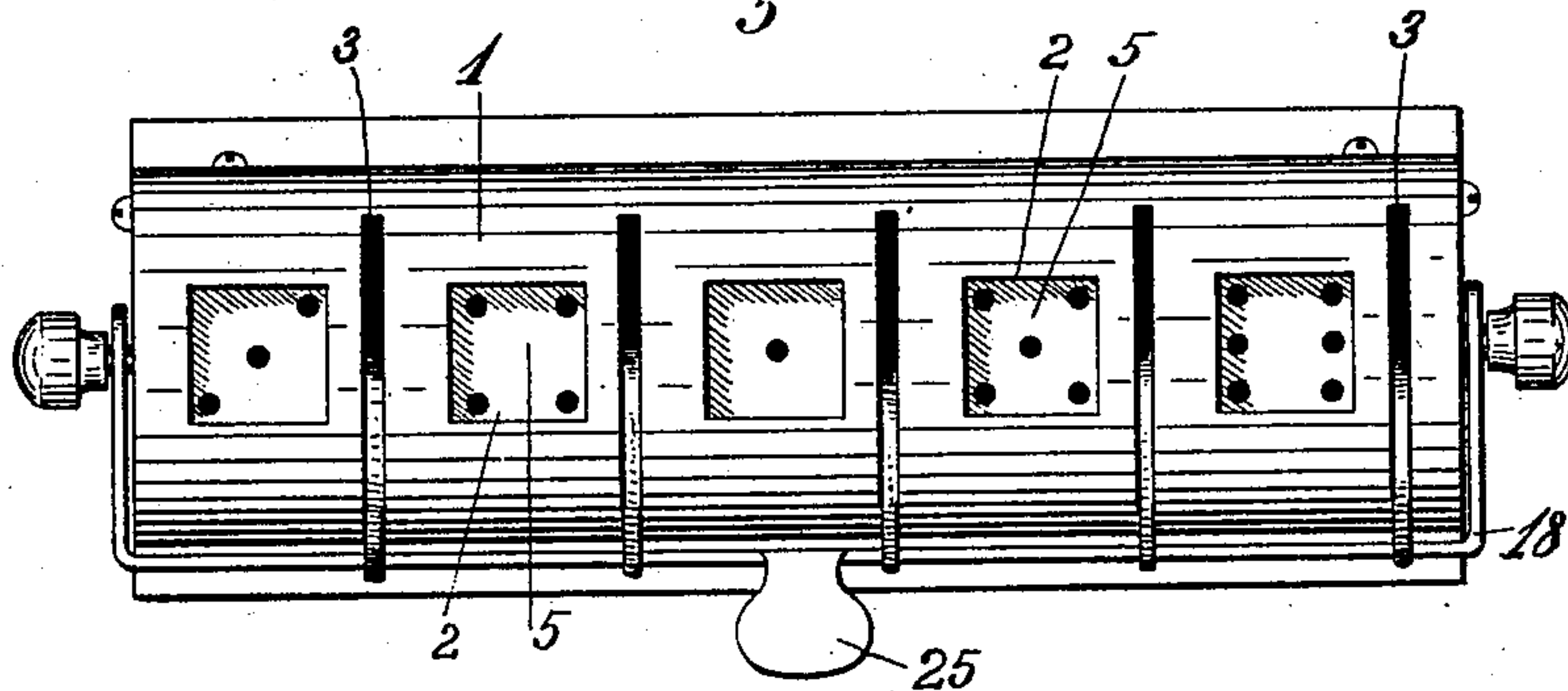


Fig. 2

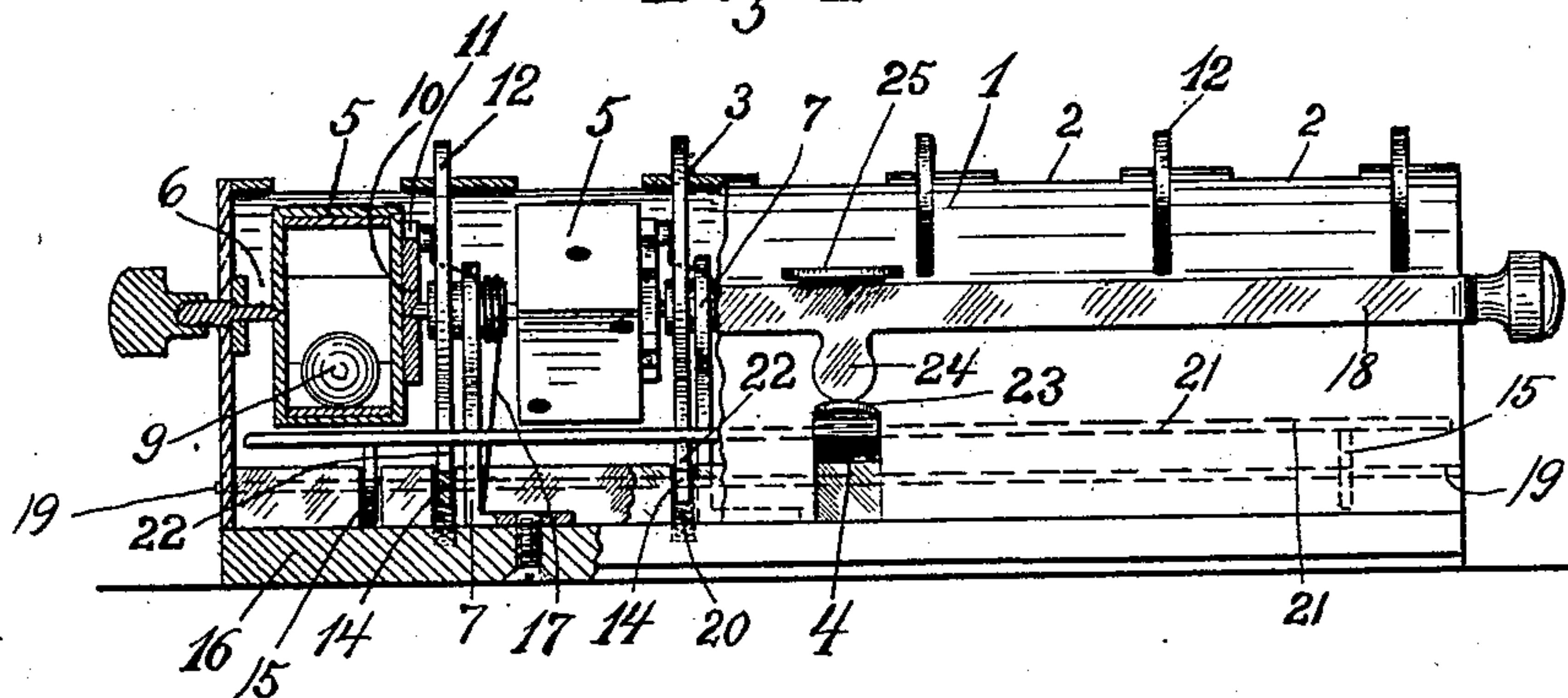


Fig. 3

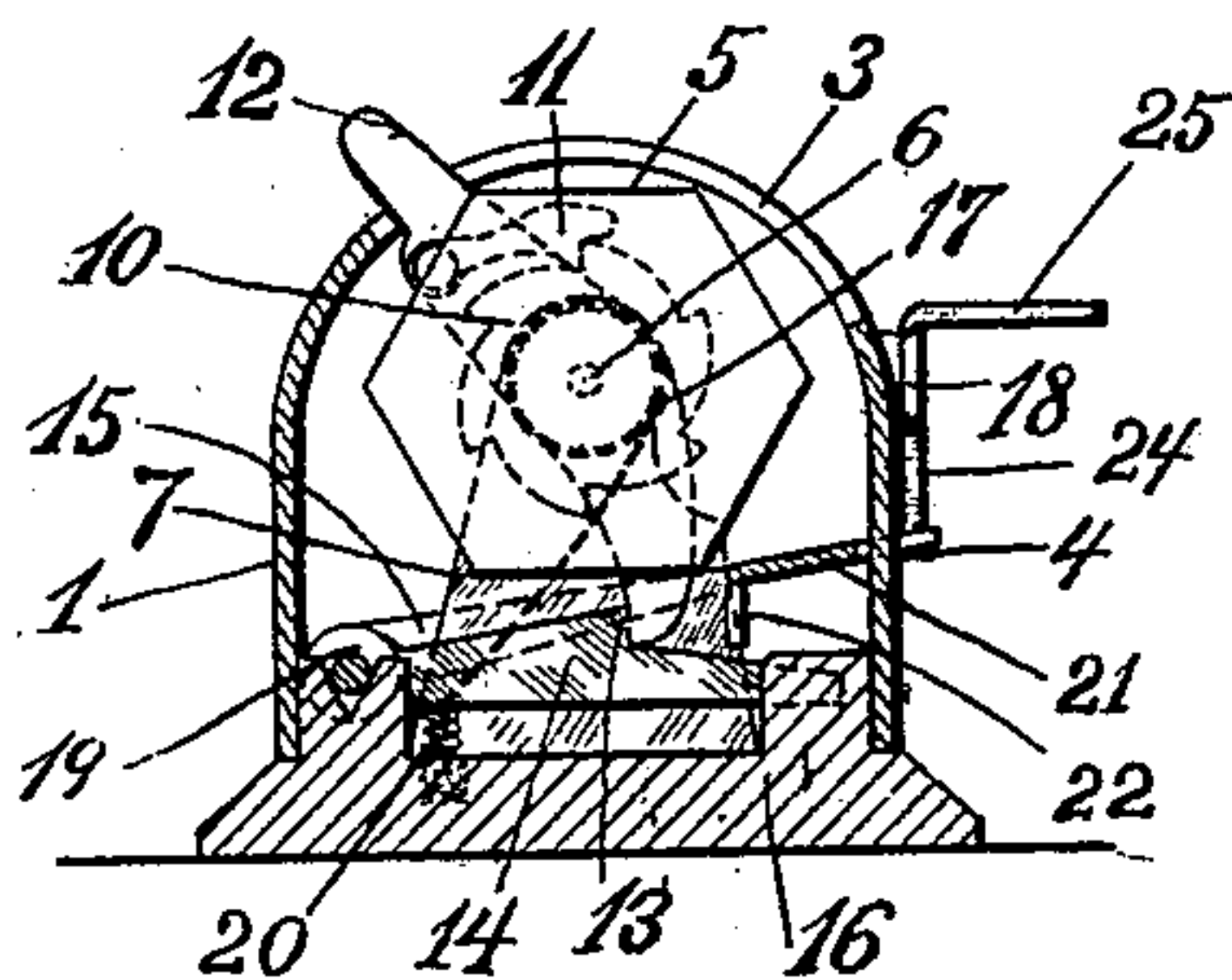


Fig. 4

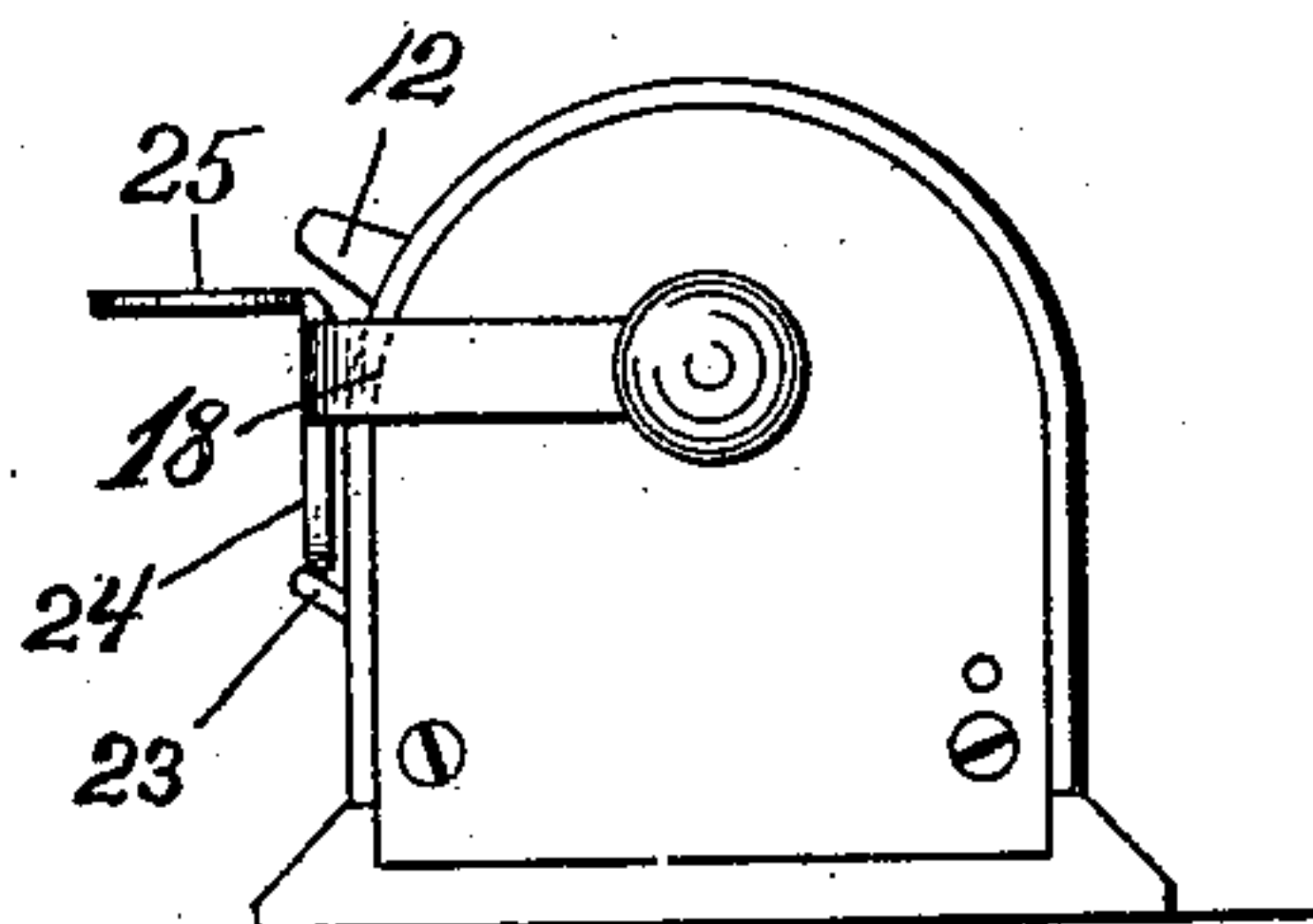


Fig. 6

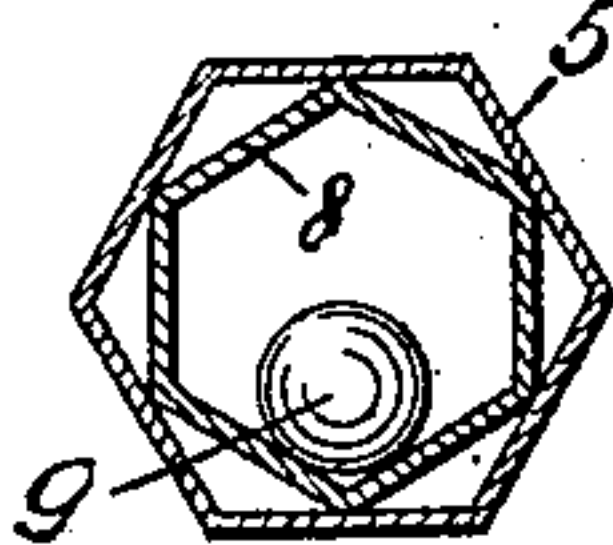
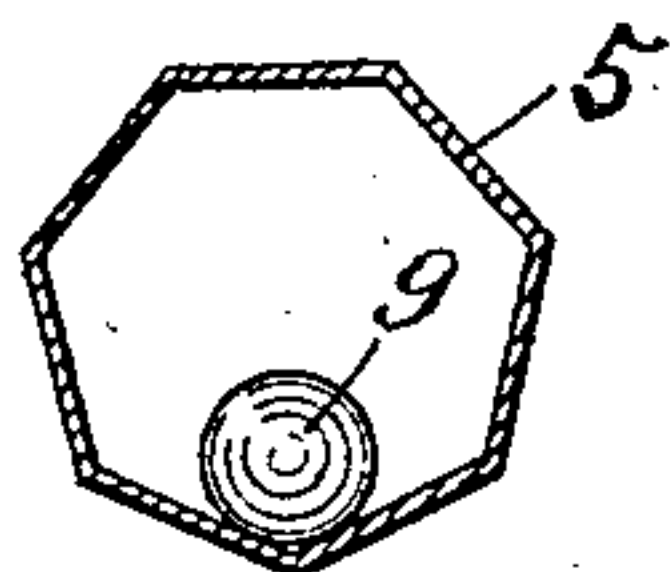


Fig. 5

Witnesses
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UNITED STATES PATENT OFFICE.

BENJAMIN HURD, OF NUTLEY, NEW JERSEY.

GAME APPARATUS.

SPECIFICATION forming part of Letters Patent No. 730,659, dated June 9, 1903.

Application filed June 20, 1902. Serial No. 112,399 (No model.)

To all whom it may concern:

Be it known that I, BENJAMIN HURD, a citizen of the United States, residing at Nutley, in the county of Essex and State of New Jersey, have invented certain new and useful Improvements in Game Apparatus, of which the following is a full, clear, and exact specification.

My invention relates to game apparatus; and its object is to construct a simple apparatus adapted to mechanically rotate or otherwise agitate all or a portion of a number of character-carriers and stop the same in some one of a determined number of positions, the apparatus being designed to so operate the character-carriers that their stopping position will not always be the same, but will differ and depend wholly upon chance.

The invention will be described more in detail with reference to the accompanying drawings, in which—

Figure 1 is a top view of an apparatus embodying my invention. Fig. 2 is a front view of the same with parts broken away and showing one of the character-carriers in section. Fig. 3 is an end sectional view of the same. Fig. 4 is an end view of the exterior of the apparatus. Fig. 5 is a sectional view of one of the character-carriers, and Fig. 6 is a sectional view of a modified form of character-carrier.

In the drawings, 1 represents a receptacle or case of any suitable form, having openings 2 at intervals in its top, said openings being preferably closed with glass or other transparent material. Transverse slots 3 are formed in the case between the openings, and a slot 4 is also provided in the front of the case. The character-carriers 5 are centrally mounted in suitable bearings 6, said bearings in this instance comprising pins 6, journaled in suitable standards 7. The character-carriers are each provided with faces adapted to register with the openings 2 and having marked thereon suitable characters—such, for example, as the usual spots of a die. In order to insure that the characters will always stop in such position that one of the faces of the carrier will register with the opening 2, I prefer to make the character-carrier

hollow and provide a ball 9 or other suitable body within the character-carrier, the ball being adapted to maintain the carrier in some one of the determined number of positions. If the character-carriers have six faces to correspond with the six numbers of a die, then I provide a six-sided hollow interior body 8 within the carrier 5, the body 8 being staggered with respect to the carrier, as shown in Fig. 5. This plan may be followed whenever the character-carrier has an even number of faces. When a carrier has an odd number of faces, the intersection of two faces will be opposite the center of a third face, and, as shown in Fig. 6, the ball 9 will tend to hold the carrier in such position that the upper face may register with the opening in the case. Obviously other means may be employed for insuring that the carrier shall stop in some one of a determined number of positions. The arrangement shown, however, is advantageous in that the ball being a free agent will seldom be moved with exactly the same force or exactly the same direction, and therefore which one of the positions the character will assume is dependent entirely upon chance.

A ratchet-wheel 10 is fixed to one side of each of the character-carriers, and a pawl 11, carried by a lever 12, normally engages the ratchet 10. The levers 12 are pivoted intermediate their ends upon the pins 6 at one side of the character-carriers and project at one end through the slots 3. The other end when in the position shown in Fig. 3 engages the shoulder 13 of the bar 14. Bar 14 is pivoted at one end 19 to the base 16 of the apparatus, and a spring 20 normally holds the bar up and in engagement with the end of the levers 12. Springs 17 are attached at one end to the base 16 and after being coiled around the central bearing-pins have their other ends attached to the levers 12, the springs tending to force the upper ends of the levers 12 forward. A bar 18 is pivoted at the ends of the receptacle and is free to swing in an arc around the outside of the case, engaging the upper ends of the levers 12.

A bar 21, carried by the arms 15, which are pivoted on the shaft 19, mounted in the base

- of the apparatus, is adapted to swing in an arc. The bar 21 carries at intervals the projections 22, which are adapted to engage the outer ends of the arms 14. A tip 23, carried by the arm 21, projects through the opening 4 in the front of the case and is itself adapted to be engaged by a projection 24, carried by the bar 18. 25 is a suitable handle carried by bar 18.
- 10 It will be understood, of course, that I do not limit myself to the exact construction shown in the drawings, but that the receptacle may be of any convenient shape, and the character-carriers may be revolved on separate shafts or on a common shaft. Any suitable markings upon the carriers, means for stopping the carriers in some one of a number of determined positions, or mode of revolving the character-carriers may be used.
- 15 In the operation of the apparatus the bar 18, by means of the handle 25, is swung backward and striking the ends of the levers 12 moves the same backward, compressing the springs 17 until the lower ends of levers 12 pass the shoulders 13 upon the arms 14, whereupon the springs 20 cause the arms 14 to spring upward and the shoulders 13 to engage and hold the levers 12. At this time pawls 11 drop into engagement with the ratchets 10 upon the character-carriers. The arm 18 is then swung downward until the projection 24 engages the projection 23 and moves bar 21 downward, causing the projections 22 to engage the arms 14 and move the latter downward, compressing the springs 20. This trips the shoulders 13 from the ends of levers 12 and permits the upper ends of the levers 12 to fly forward under the influence of the spring 17. The forward movement of the levers 12 causes the pawls 11 to move the character-carriers forward with the lever. When the lever reaches the end of the path of its movement, the character-carrier will continue to revolve by reason of its inertia. When the driving force of character-carrier expends itself, the ball 9 will lodge in the lowest corner of the carrier, as shown in Figs. 5 and 6, thus bringing the faces of the character-carriers nearest the openings 2 into a horizontal plane and directly under the openings, where they may be read. When the pressure on the bar 18 is released, the spring 20 will tend to force the bar upward, and when the levers 12 are pressed back again the shoulder 13 will be in a position to engage their lower ends, and thus prepare the device to be again operated. If it is desired to rotate a selected number of character-carriers, it is only necessary to press back a corresponding number of levers until they engage the shoulder 13. The character-carriers for which levers have not been pressed back will not revolve when the device is operated.
- 65 It will be understood, of course, that the operation of each individual character-carrier is the same as that of all the rest. It will also be understood that any suitable number of carriers may be employed.
- Having thus described my invention, I declare that what I claim as new, and desire to secure by Letters Patent, is—
1. The combination with a character-carrier, and an actuating-spring, of a lever and a ratchet mechanism connecting the spring and the character-carrier, means for holding the lever and thereby the spring set, and a pivoted bar for releasing the lever to permit the spring to actuate the character-carrier, substantially as described.
 2. The combination with each of a plurality of character-carriers having positioning means and ratchet-teeth, of actuating-springs, levers for setting the springs, said levers carrying pawls engaging the ratchet-teeth, latches locking the levers to hold the springs set, a pivoted bar which operates the levers to set the springs and which releases the latches to permit the character-carriers to be actuated, substantially as described.
 3. In a game apparatus, the combination of a series of movable character-carriers each having a ratchet, spring-actuated levers having each a pawl for engaging the ratchet, each lever being pivoted intermediate its ends, one end projecting outward and the other end engaging a latch pivoted on the casing, and means for operating the latches simultaneously to actuate the character-carriers.
 4. In a game apparatus, the combination of a series of movable character-carriers, levers and connections for actuating the character-carriers, each lever being pivoted intermediate its ends, one end projecting outward and the other engaging a latch pivoted on the casing, means for setting the levers simultaneously and for releasing the latches simultaneously, substantially as described.
 5. In a game apparatus, the combination of a series of movable character-carriers with means for positioning the character-carriers, actuating-springs, levers having connections for actuating the character-carriers, each lever being pivoted intermediate its ends, one end projecting outward and the other engaging a latch to hold the springs set, means for setting the levers simultaneously and for releasing the latches simultaneously, substantially as described.
 6. The combination with a slotted casing, of a series of movable character-carriers, levers, springs, and connections for actuating the character-carriers, each lever being pivoted intermediate its ends, one end projecting outward through the slots of the casing and the other engaging a latch, and means pivoted on the casing for setting the levers when moved in one direction, and for releasing the latches when moved in the other direction, substantially as described.
 7. The combination with a plurality of char-

acter - carriers and actuating - springs, of
ratchet mechanisms, comprising levers con-
necting the springs and the character-car-
riers, latches for holding the levers set, a bar
5 for simultaneously setting the levers, and a
second bar for simultaneously releasing the
latches, substantially as described.

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

BENJAMIN HURD.

Witnesses:

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HENRY BEST.