

No. 738,628.

PATENTED SEPT. 8, 1903.

F. REINHARDT.
DOLL, PUPPET, OR THE LIKE.

APPLICATION FILED APR. 20, 1903.

NO MODEL.

Fig. 1.

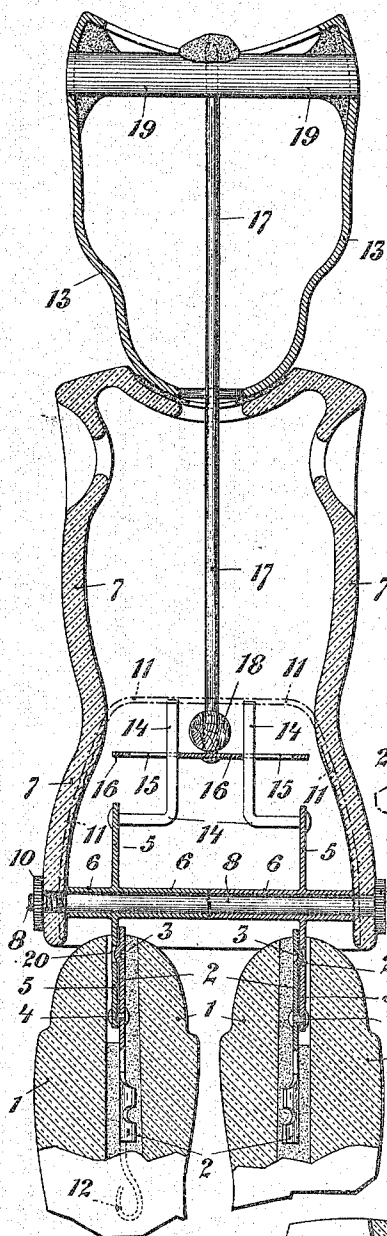


Fig. 2.

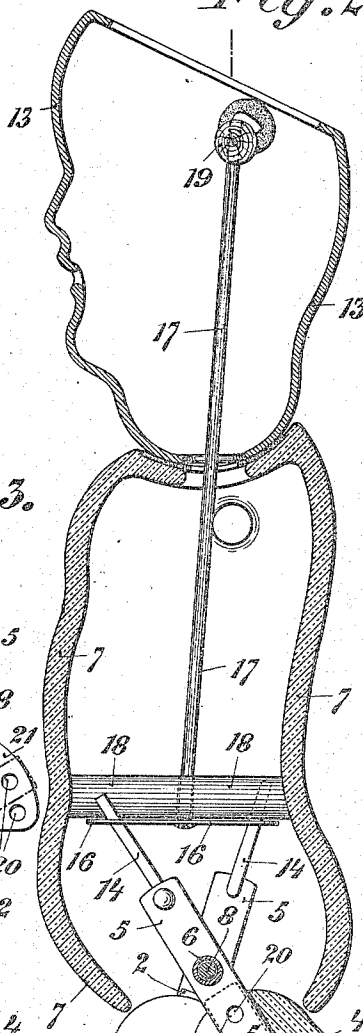


Fig. 3.

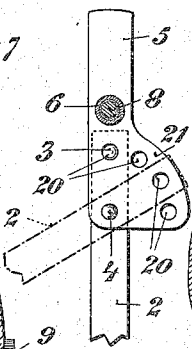
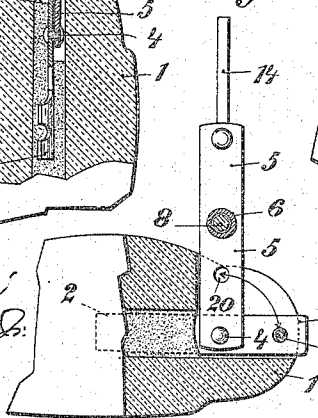


Fig. 4.



Witnesses:
James L. Norris, Jr.
J. D. Kueper

Inventor
Franz Reinhardt
James L. Norris
Atty.

UNITED STATES PATENT OFFICE.

FRANZ REINHARDT, OF WALTERSHAUSEN, GERMANY.

DOLL, PUPPET, OR THE LIKE.

SPECIFICATION forming part of Letters Patent No. 738,628, dated September 8, 1903.

Application filed April 20, 1903. Serial No. 153,517. (No model.)

To all whom it may concern:

Be it known that I, ERANZ REINHARDT, manufacturer, a subject of the Duke of Saxe-Coburg-Gotha, residing at Waltershausen, in the Duchy of Saxe-Coburg-Gotha, German Empire, have invented certain new and useful Improvements in or Relating to Dolls, Puppets, or the Like, of which the following is a specification.

10 My invention relates to a doll, puppet, or the like which can have its legs adjusted in upright, oblique, or sitting position and whose head is arranged to be moved, say, from side to side while walking by means of a vertical spindle inside the body. The upper parts of the legs, pivoted to the body, are mounted so as to be easily interchangeable and so that they can be fixed in position without the use of springs. Such a doll, made of
20 any suitable materials, is illustrated in the accompanying drawings, in which—

Figures 1 and 2 are two vertical sections at right angles to each other, and Figs. 3 and 4 are detail views.

25 The upper parts 1 of the legs of the doll are provided with suitably-secured preferably steel strips 2, provided at the top with a stud or projection 3, made, preferably, by stamping. On this strip and below the projection 3 is mounted at 4 another bar 5, which extends above the top of the strip 2 and is provided with a sleeve 6. The sleeves 6 of these bars, one for each leg, are carried by a transverse spindle 8, loosely passing through
35 the body 7. The spindle 8 is provided at one end with a head 9 and at the other with a nut 10, by means of which it can be clamped in position. The thighs or upper parts of the legs of the doll are in this way interchangeably mounted on the body 7. The metal strips 2 terminate at the bottom in hooks 12 for receiving elastic cords for connecting the lower portions of the leg (see Fig. 1) to the thigh portions, or the two parts may be connected in other suitable manner, or they
45 might be in one rigid piece.

The movement of the head 13, loosely mounted on the body 7, is effected from the thighs 1, pivoted on the spindle 8, in the following manner: The metal strips 5 are provided at the top with L-pins 14, projecting inward and bent upward. These pins 14 pass loosely

through openings 15 in a horizontal lever on the end of the spindle 17, carrying the head 13, the spindle and lever thus forming an inverted-T lever. The spindle 17, passing vertically through the body 7, is supported at the bottom in a transverse bar 18, secured to the body 7 by means of cement or the like and made of wood or other suitable material. 60 The top of the spindle 17 is connected to a cross-bar 19, secured in a suitable manner inside the doll's head. Instead of the cross-bar 18 a metal frame 11 (shown in dotted lines in Fig. 1) could be used. When the thighs 1 or
65 the legs of the doll are given a walking motion, the pins 14 move in opposite directions, whereby the lever 16, and therefore the spindle 17 and the doll's head 13, are alternately turned to a determined extent to the right and to the left. While this motion is going on, the metal strips 2, with their studs or projections 3, engage in corresponding holes or recesses 20 in the metal strips 5, thus locking the two strips together. If it be desired to bring the
75 legs into some other position—such as, for instance, into an oblique position, Fig. 3, or into a sitting position, Fig. 4—the projections 3 are disengaged (by slightly pressing them) from the holes 20, and the legs are then given
80 the desired position. The legs remain in that position merely owing to the frictional contact between the two contact-surfaces of the strips 2 and 5 at pivot 4.

If it is desired to fix the legs of the doll in 85 a sitting position or in any desired oblique position in the same way as they are secured in their vertical position, the metal strips or plates 5 are enlarged, as shown in Fig. 3, the enlarged portions 21 at the lower end being
90 provided with several holes or recesses 20 for receiving the projections 3. In this way the sitting and oblique positions of the legs are quite simply secured.

If it is desired to make any change or execute any repair to the doll or to the hinges or walking mechanism, the nut 10 is unscrewed and the spindle 8 withdrawn, whereupon the legs and the hinges can be removed.

Having now particularly described and as- 100-
certained the nature of my said invention and in what manner the same is to be performed, I declare that what I claim is—

1. A mechanical doll, comprising narrow

strips secured to the legs and provided on one of their faces with integral projections of less width than the faces of the strips, narrow strips pivotally connected with the first-named strips and provided with depressions of less width than the faces of the strips, said depressions adapted to receive the projections on the first-named strips for retaining the legs in a standing or sitting position, and means for connecting the last-named strips to the body of the doll.

2. A mechanical doll, comprising narrow strips secured to the legs and provided on one of their faces with integral projections of less width than the faces of the strips, narrow strips pivotally connected with the first-named strips and provided with depressions of less width than the faces of the strips, said depressions adapted to receive the projections on the first-named strips for retaining the legs in a standing or sitting position, and means for detachably connecting the last-named strips to the body of the doll.

3. In a mechanical doll, narrow strips secured to the legs and provided on one of their faces with integral studs, narrow strips pivotally connected with the first-named strips and further provided with depressions, said depressions registering with and adapted to receive the studs on the first-named strips to permit of adjusting the legs to a standing or sitting position, means for detachably connecting the last-named strips to the body of the doll, and means connected with the head of the doll and with said mechanism for moving the head from left to right whenever the legs execute a walking movement.

4. In a mechanical doll, narrow strips secured to the legs and provided on one of their faces with integral studs, narrow strips provided between their ends with sleeves and pivotally connected with the first-named strips and further provided with depressions, said depressions registering with and adapted to receive the studs on the first-named strips to permit of adjusting the legs to a standing or sitting position, a spindle extending transversely of the body of the doll and adapted to receive the said sleeves for detachably connecting the last-named strips to the body of the doll, and means connected with the head of the doll and with said mechanism for moving the head from left to right whenever the legs execute a walking movement.

5. In a mechanical doll, narrow upper strips secured to the thigh-pieces and provided at their lower ends with means for attaching the lower parts of the legs thereto and further provided on one of their faces with integral studs, narrow strips pivotally connected near their lower ends to said first-named strips to

permit of adjusting the legs to a standing or sitting position and provided with depressions, said depressions registering with and adapted to receive the studs on the first-named strips for retaining the legs in their adjusted position, means for connecting the upper strips to the body of the doll, and means connected with the head of the doll and with said upper strips for moving the head from left to right whenever the legs execute a walking movement.

6. A mechanical doll, comprising a body having an uninterruptedly-open lower end, a spindle extending transversely of the body portion near the lower end thereof and detachably secured thereto, sleeves mounted on said spindle and provided between their ends with oppositely-disposed vertical strips, means for attaching legs to the depending strips, and means extending through the body portion and the head of the doll and connected at its upper end to the head and at its lower end with the upwardly-extending strips for connecting the said upwardly-extending strips to the head of the doll for moving the head from left to right whenever the legs execute a walking movement.

7. A mechanical doll, comprising a body having an uninterruptedly-open lower end, a spindle extending transversely of the body portion near the lower end thereof and detachably secured thereto, sleeves mounted on said spindle and provided between their ends with oppositely-disposed vertical strips, a stay member fixedly and permanently secured in the body of the doll, a stay member fixedly and permanently secured in the head, a vertical spindle extending through said stay member in the body of the doll and having its upper end detachably secured to the stay member in the head, a horizontally-extending lever attached to the lower end of said vertically-extending spindle and provided with openings near its ends, and crank-pieces connected to the upper end of said upwardly-extending strips and having their other ends extending through the openings in said horizontally-extending lever and adapted to turn the vertically-extending spindle in the stay member in the body of the doll and thereby move the head from left to right whenever the legs execute a walking movement.

In testimony whereof I have hereunto set my hand in presence of two subscribing witnesses.

FRANZ REINHARDT.

Witnesses:

ERNST GUMPERT,
MAX SCHUSTER.