

Sept. 24, 1957

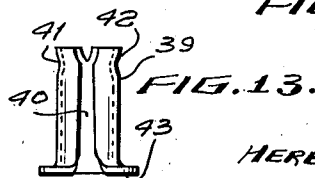
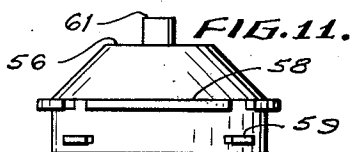
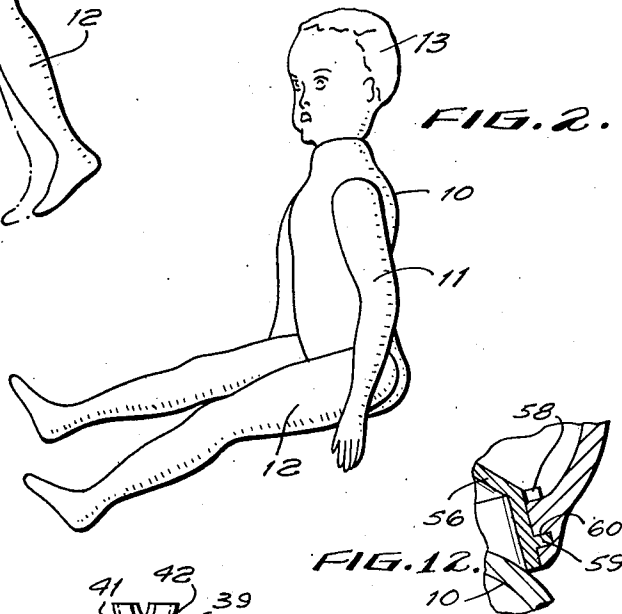
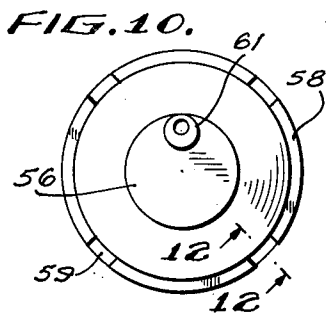
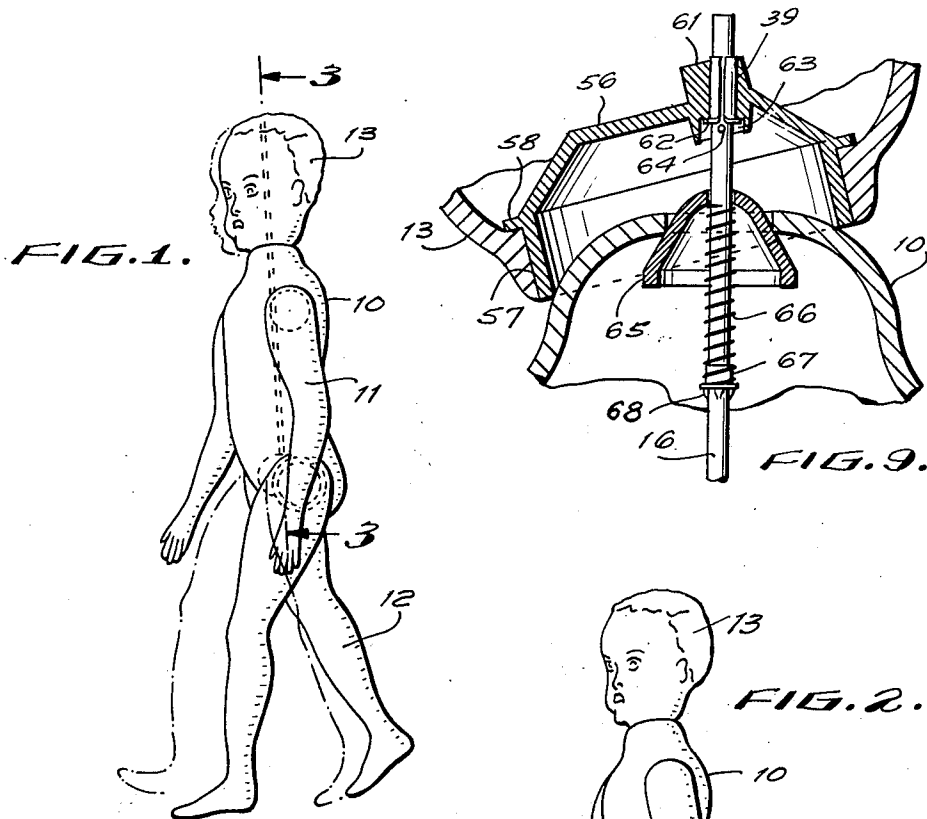
H. R. BEEBE

2,807,119

DOLL HEAD MOUNTING

Filed Aug. 19, 1954

2 Sheets-Sheet 1



INVENTOR.
HERBERT R. BEEBE
BY

Clark & Ott
ATTORNEYS

Sept. 24, 1957

H. R. BEEBE
DOLL HEAD MOUNTING

2,807,119

Filed Aug. 19, 1954

2 Sheets-Sheet 2

FIG. 3.

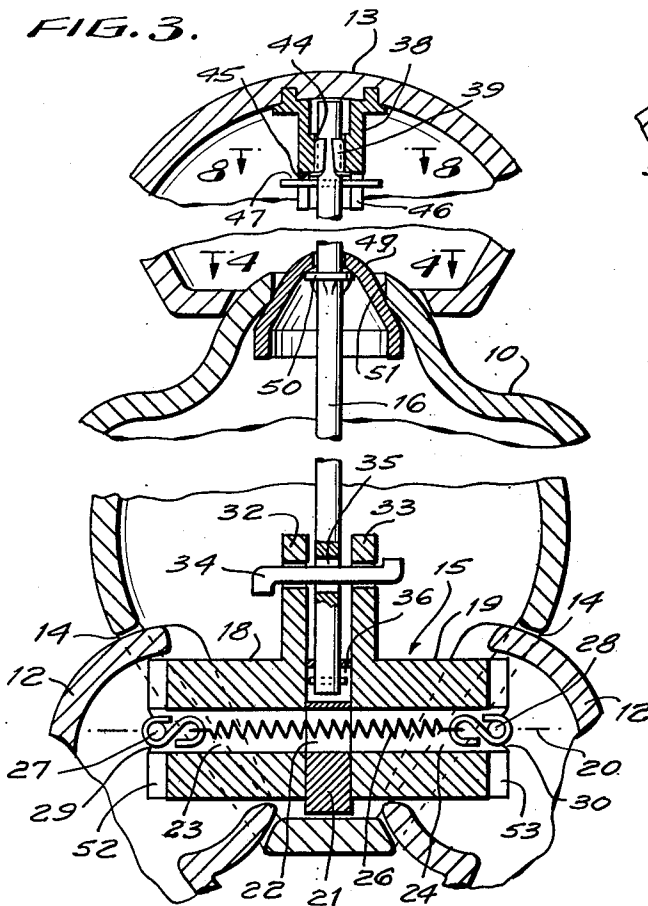


FIG. 4.

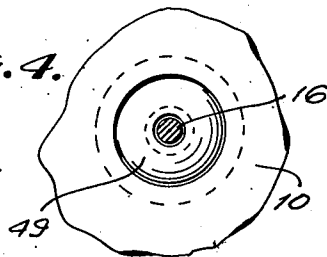


FIG. 5.

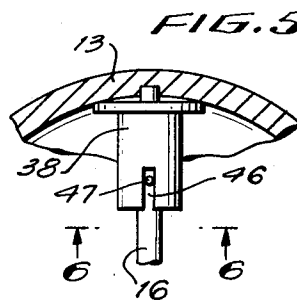


FIG. 6.

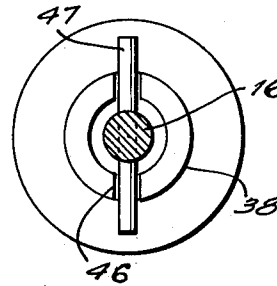


FIG. 7.

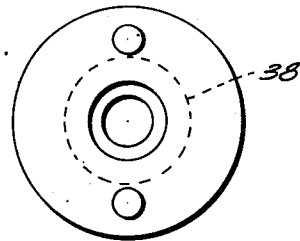
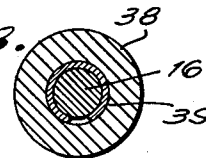


FIG. 8.



INVENTOR.
HERBERT R. BEEBE
BY
Clark & Ott
ATTORNEYS

1

2,807,119

DOLL HEAD MOUNTING

Herbert R. Beebe, New York, N. Y., assignor to American Character Doll Company, New York, N. Y., a firm composed of Jacob Brock and Max Brock

Application August 19, 1954, Serial No. 450,948

2 Claims. (Cl. 46—149)

This invention relates to a doll head mounting and the invention has particular reference to a mounting which is connected with means for effecting walking movement of the legs of the doll.

An object of the invention is to provide a mounting which connects the head with the body of the doll by an oscillatory shaft formed as a part of the means for effecting walking movement of the doll.

Still another object of the invention is to connect the head with the shaft by means of a split tubular member adapted to be embedded in the head of the doll and to grippingly engage the shaft for effecting movement of the head with the shaft.

Still another object of the invention is to provide a novel construction of mounting by which the doll head may be attached in a more facile manner and which effectively connects the head with the doll without additional retaining means.

With the foregoing and other objects in view, reference is now made to the following specification and accompanying drawings in which the preferred embodiments of the invention are illustrated.

In the drawings:

Fig. 1 is a view in elevation of a doll constructed in accordance with the invention.

Fig. 2 is a similar view showing the doll in seated relation.

Fig. 3 is an enlarged fragmentary vertical sectional view taken approximately on line 3—3 of Fig. 1.

Fig. 4 is a fragmentary horizontal sectional view taken approximately on line 4—4 of Fig. 3.

Fig. 5 is a view in elevation of the mounting means connecting the doll head with the oscillatory shaft.

Fig. 6 is a fragmentary sectional view taken approximately on line 6—6 of Fig. 5.

Fig. 7 is a top plan view of the mounting means with the head removed.

Fig. 8 is a horizontal sectional view taken approximately on line 8—8 of Fig. 3.

Fig. 9 is a fragmentary sectional view similar to Fig. 3 and illustrating a modified form of mounting means.

Fig. 10 is a top plan view of the mounting means shown in Fig. 9.

Fig. 11 is a view in elevation of the mounting means shown in Fig. 10.

Fig. 12 is a fragmentary sectional view taken approximately on line 12—12 of Fig. 10.

Fig. 13 is a view in elevation of the split tubular member forming a part of the mounting means shown in Figs. 3 and 9.

Referring to Figs. 1 to 8 inclusive of the drawings, the doll includes a body 10 having arms 11, legs 12 and a head 13. The arms 11 may be connected with the body in any desired manner while the legs 12 have their upper ends fitted in socket openings 14 and are connected with means 15 for effecting movement of the legs in opposite directions so as to simulate walking. The head 13 is mounted on the neck of the body 10 and is connected

2

with a shaft 16 for turning movement of the head with the movement of the legs.

The means 15 for effecting walking movement of the legs 12 consists of aligned tubular members 18 and 19 which are mounted for turning movement on a transverse axis indicated by the broken line 20. The tubular members abut against an intermediate member 21 disposed therebetween with the opening 22 in said intermediate member disposed in alignment with the central openings 23 and 24 in said tubular members. Arranged in the aligned openings is a coil spring 26 which is attached to pins 27 and 28 anchored at their ends in the walls of the legs 12. The tubular members project into the upper ends of the legs with the pins engaging in notches 29 and 30 in the ends of said tubular members to thereby connect the legs with the tubular members and retain the legs in assembled relation with the body. The spring 26 tensions the tubular members against the intermediate member 21.

The tubular members are provided with upstanding projections 32 and 33 respectively and in order to effect movement of the legs in opposite directions, a cross member 34 extends through apertures in the upper ends of said projections and through an aperture 35 in the shaft 16. The shaft 16 is mounted for swivel turning movement in an opening 36 in the intermediate member 21 and extends upwardly through the body 10 with the upper end thereof connected with the head. For this purpose the head is provided with a depending tubular member 38 in which the upper end of the shaft 16 is secured by means of a metallic tubular element 39. The tubular element 39 is split longitudinally as at 40 and is formed with an annular restricted portion 41 and a flaring upper end 42 adjacent the restricted portion and with a flange 43 at the lower end thereof. The tubular element snugly fits the shaft 16 and when forced into the opening 44 is the tubular member 38, the flaring end 42 is embedded in the inner periphery of the tubular member with the flange 43 abutting against the annular shoulder 45 at the inner end of the slot 46. A cross pin 47 is anchored in an opening in the shaft 16 with the ends of the cross pin projecting through the opposite portions of the slot 46 whereby the head 13 will turn with the movement of the shaft 16. The shaft 16 extends centrally through the neck portion of the doll and in order to retain the head centrally on the neck portion an inverted cup-shaped member 49 is provided through which the shaft freely extends with a retaining member 50 affixed to the shaft and positioned against the inner face of the cup-shaped member to thereby retain the same against the wall of the neck opening 51. Constructed in this manner, the head may be conveniently attached to the body of the doll by applying the tubular element 39 to the upper end thereof and then forcing the upper end of the shaft into the tubular member 38 to dispose the flange 43 of the tubular element against the shoulder 45 and embed the flaring end 42 in the wall of the opening 44.

It will be understood that by this construction forward movement of the leg 12 on the left hand side of Fig. 3 will effect rotation of the tubular member 18 to thereby turn the projection 32 rearwardly with a consequent forward movement of the projection 33 and a rotation of the tubular member 19 so as to effect rearward movement of the leg 12 on the right hand side of Fig. 3. When the legs 12 are positioned as shown in Fig. 1 for walking movement, the cross pins 27 and 28 are located in the notches 29 and 30 of the tubular members 18 and 19. The tubular members are also provided with notches 52 and 53 which are located in right angular relation to the notches 29 and 30. The said notches have cam upper edges which permit the camming of the cross pins 27 and 28 out of the notches 29 and 30 and into the notches 52 and 53 when the legs are swung for disposing the doll in a

3

seated position as shown in Fig. 2 of the drawings. The legs may also be swung from the position shown in Fig. 2 back to the position shown in Fig. 1, the cross pins 27 and 28 being cammed out of the notches 52 and 53 and entering the notches 29 and 30.

The doll may be constructed of any desired hard or resilient material. However, for a doll head constructed of relatively soft resilient material, the shaft 16 is preferably connected with the head by means of a relatively rigid member 56 which is secured in the opening 57 in the bottom of the head, as shown in Fig. 9 of the drawings, whereby the bottom portion of the head which seats on the neck of the body 10 is relatively rigid.

The member 56 is provided with peripheral flange sectors 58 which seat on the inner wall of the head adjacent the openings 57 and below the sectors, arcuately spaced outwardly extending projections 59 are provided which fit into recesses 60 formed in the wall of the opening 57 as shown in Fig. 12 of the drawings. The shaft 16 projects through a tubular portion 61 formed integrally with the top wall of the member 56 and is secured thereto by a tubular element 39. When assembling the head with the shaft 16 the tubular element 39 is engaged on the end of the shaft and when the same is forced into the opening in the tubular portion 61 the flaring end 42 thereof is embedded in the inner periphery of the tubular portion with the flange 43 abutting against the annular shoulder 62 similar to the construction and arrangement by which the shaft 16 is secured to the tubular portion 38, as shown in Fig. 3 of the drawings. The tubular portion 61 is formed with a slot 63 through which extends a pin 64 slidably fitted in an opening in the shaft 16 to thereby connect the head with the shaft for movement therewith. The shaft 16 extends through an inverted cup-shaped member 65 similar to the cup-shaped member 49 and which is urged into engagement with the wall of the neck portion by a coil spring 66 interposed between the inner face of the cup-shaped member and a flanged sleeve 67 retained in position on the shaft by the lugs 68.

What is claimed is:

1. In a doll construction, a doll body, a head mounted on the doll body, a shaft mounted within the doll body

4

and projecting into the head, a tubular member arranged within and secured to the head, said tubular member having a transverse slot at its inner end and an annular shoulder on the inner periphery thereof at the upper end of said slot, a longitudinally split tubular member fitting the inner periphery of said first mentioned tubular member and having a flared end and a restricted portion adjacent said flared end, said split tubular member also having a flanged end abutting against the said annular shoulder, said shaft when forced into said split tubular member engaging said restricted portion to embed said flared end in the inner periphery of said first mentioned tubular member, and said shaft having an opening extending therethrough and a cross pin anchored in said opening with the ends thereof disposed in said slot for turning the head with the movement of the shaft.

2. In a doll construction, a doll body, a head mounted on the doll body, a shaft mounted within the doll body and projecting into the head, a tubular member arranged within and secured to the head, a longitudinally split tubular member fitting the inner periphery of said first mentioned tubular member and having a flared end and a restricted portion adjacent said flared end, said split tubular member also having a flanged end fitting within the inner end of said first mentioned tubular member, said shaft when forced into said split tubular member engaging said restricted portion to embed said flared end in the inner periphery of said first mentioned tubular member, and means keying said shaft to said first mentioned tubular member for turning the head with the movement of the shaft and limiting the movement of said shaft into said tubular member.

References Cited in the file of this patent

UNITED STATES PATENTS

681,974	Purvis	Sept. 3, 1901
2,170,771	Benjamin	Aug. 22, 1939
2,194,460	Heimann	Mar. 26, 1940
2,400,142	Tinnerman	May 14, 1946
2,593,187	Reichelson	Apr. 15, 1952
2,733,547	Cohn	Feb. 7, 1956