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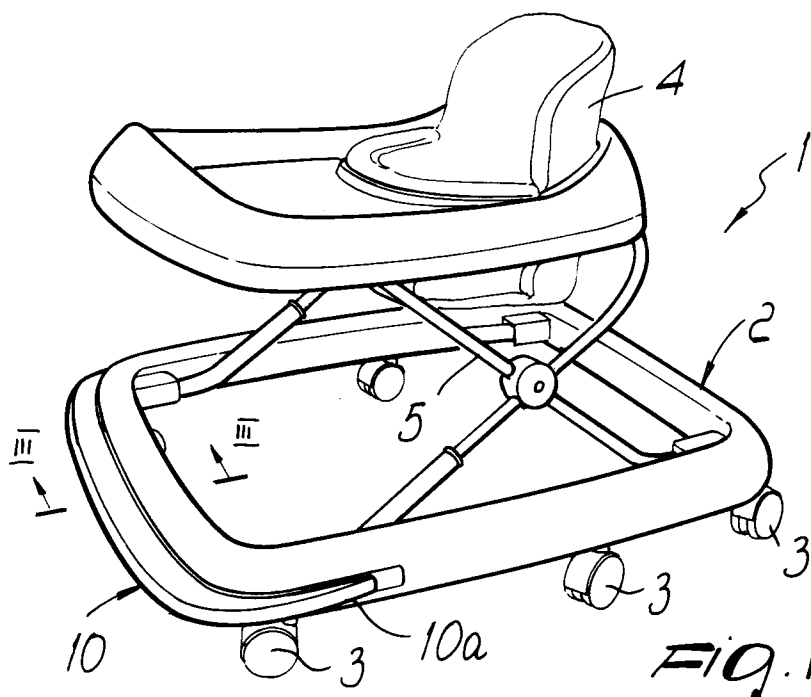
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I-20123 Milano (IT)**(54) **Baby-walker with overturning prevention means.**

(57) A baby-walker with overturning prevention means, comprising a base frame (2) mounted on casters (3) and connected to a child's chair (4).

Furthermore, the structure comprises, at least in

a perimetric portion of said frame (2), elastically yielding means (10) for absorbing kinetic energy in case of impact.

**Fig. 1****EP 0 680 716 A1**

The present invention refers to a baby-walker with overturning prevention means.

It is known that baby-walkers are generally made by using a base frame having a closed structure and which supports a child's chair.

The frame is mounted on a plurality of casters allowing the child to move in all directions.

A problem residing in the baby-walkers now used consists in that, in the occurrence of an impact against an obstacle, it is not rare that the baby-walker overturns, with grave relevant risks for the child.

Another problem resides also in the fact that the inescapable bumps of the baby-walker against furniture, edges and the like, may provoke damages thereto.

An object of the invention is to solve the above-mentioned problem by providing a baby-walker having overturning prevention means which, substantially does not allow, when impacts occur, overturning of the baby-walker, thus preserving the child's safety.

Within the above-mentioned object, a particular aim of the invention is to provide a baby-walker which allows to dampen the impacts against objects or the like, avoiding in this way damages thereto.

It is yet another aim of the present invention to provide a baby-walker which, for its peculiar constructive features, is adapted to assure the highest reliability and safety in use.

Last but not least, it is an aim of the present invention to provide a baby-walker which is easily obtainable starting from elements and materials commonly available on the market, and furthermore, which is competitive from a merely economic point of view.

The above-mentioned object, as well as the mentioned aims and others which will better appear hereinafter, are achieved by a baby-walker with overturning prevention means, according to the present invention, comprising a base frame mounted on casters and connected to a child's chair, characterized in that it comprises, at least in a perimetric portion of said frame, elastically yielding means for absorbing kinetic energy in case of impact.

Further features and advantages will better appear from the detailed description of a baby-walker with overturning prevention means, illustrated only by way of non-limitative example in the accompanying drawings, in which:

figure 1 shows the baby-walker schematically in a perspective view;

figure 2 shows a portion of the frame with, in an exploded view, the elastically yielding means;

figure 3 is a cross-section along the line III-III of figure 1;

figure 4 is a cross-section along the line III-III of figure 1, with the elastically yielding means in a compressed position;

figure 5 shows the base frame of the baby-walker as viewed from underneath;

figure 6 is a cross-section along the line VI-VI of figure 3.

Referring to the above figures, the baby-walker with overturning prevention means, according to the invention, which is generally designated by the reference numeral 1, comprises a base frame 2 having a closed structure and mounted on a plurality of casters 3.

To the frame 2 is connected a child's chair 4 which is jointed through a pair of lateral cross-pieces 5, of a known type, allowing to adjust the height of the child's chair 4.

The peculiarity of the invention resides in the fact that the baby-walker 1 is provided, at an outer perimetric portion of the frame 2, with elastically yielding means having the function to absorb, in case of impact, the kinetic energy.

In a preferred embodiment, such a means is constituted by a bumper 10 which has substantially a C-shape and is housed in a corresponding slot 11 defined at the front portion of the frame 2.

The bumper 10 is provided, at the free ends of its arms 10a, with fork-elements 12 which are inserted astride of the end edge of the slot 11.

Furthermore, the bumper 10, having a U-configuration in cross-section, is provided with extraction prevention limit stop elements 15 which are wedge-shaped, so as to allow their insertion inside the slot 11 and for preventing the accidental extraction of the bumper 10 from the slot since the ledge portion 15a of the wedge-shaped elements 15 engages the inner edge of the frame 2.

On the bumper 10 act springs 20 which are butt-inserted in seats 21 defined by the bumper, and at the other end are coupled in lugs 22 provided on stiffening ribs 23 of the frame.

The springs 20 take up kinetic energy, in case of impacts, by allowing the bumper 10 to enter back into the frame, thus dampening the impact and preventing the overturning of the baby-walker, since most of the kinetic energy is used to load the springs.

The provided arrangement allows to easily take up, at the front part of the frame 2, both sheer frontal and slanting impacts, as the bumper 10 is freely movable inside the slot 11, thus allowing dampening of impacts from different directions.

From what has been disclosed above, it is evident that the invention achieves the aims set, and in particular it is stressed the fact that is provided a baby-walker with overturning prevention means, which, without modifying the conventional way for making a baby-walker, substantially in-

creases the safety thereof.

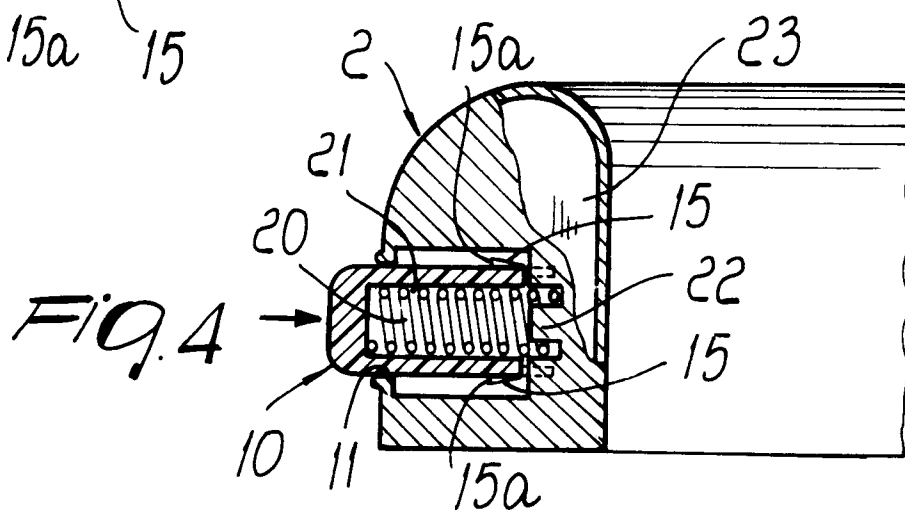
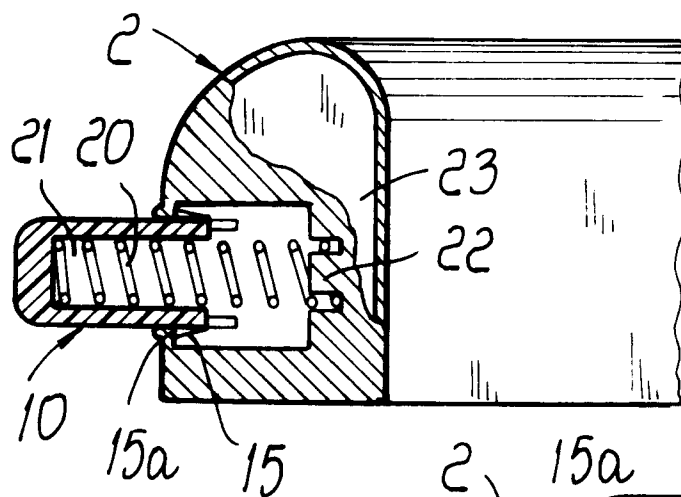
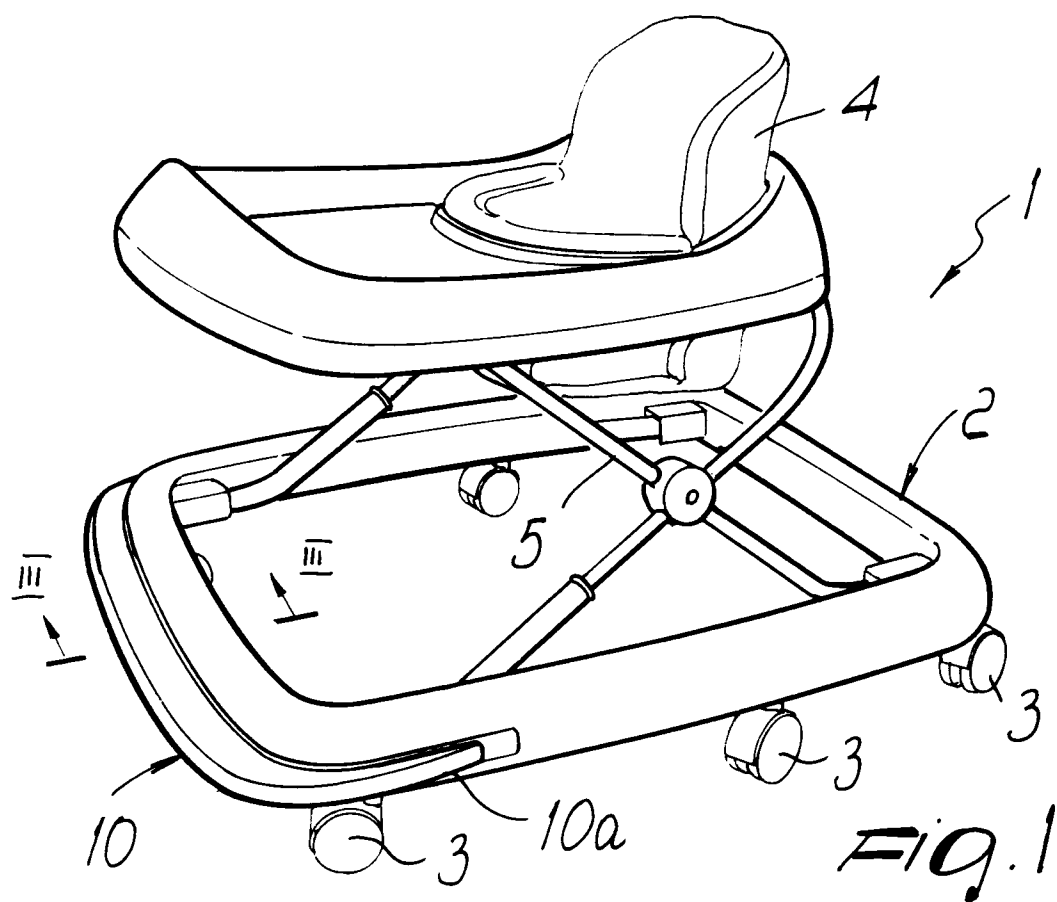
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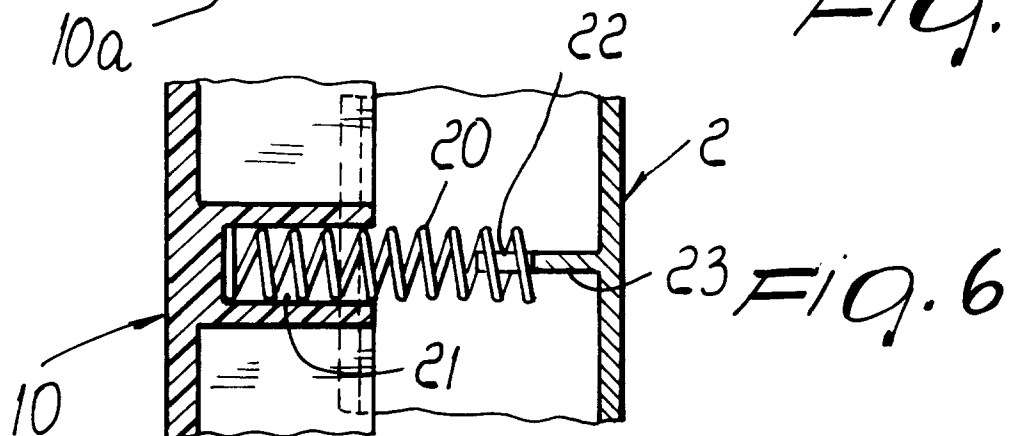
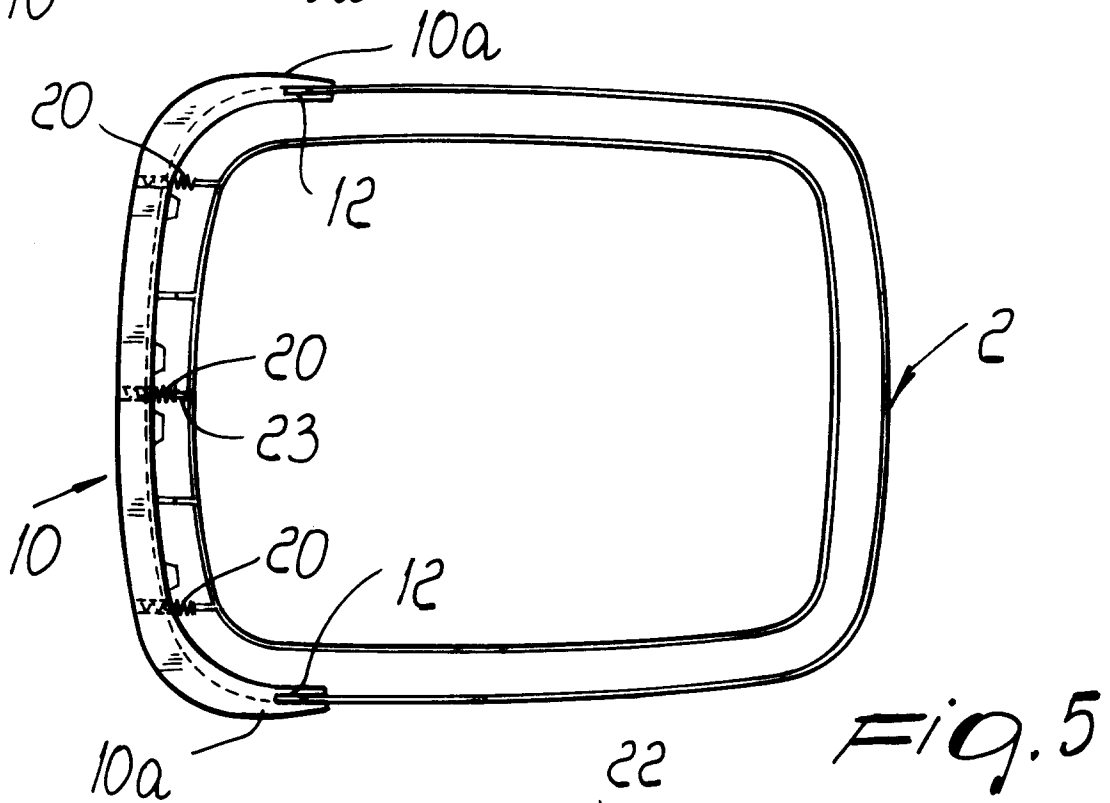
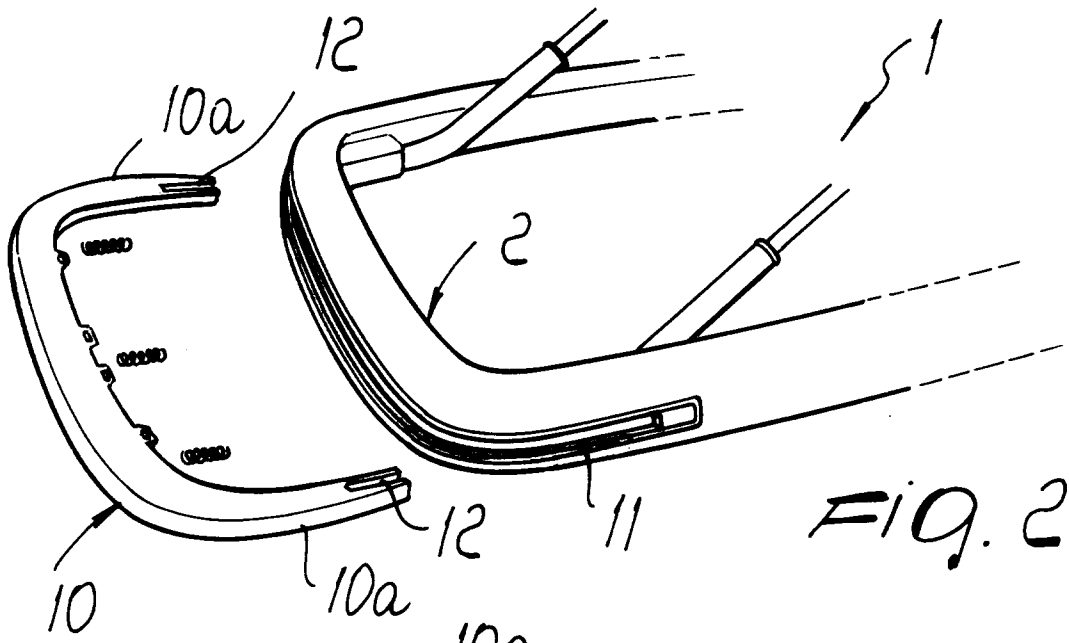
In practice, the materials employed, as well as the contingent dimensions, may be any according to the requirements.

Where technical features mentioned in any claim are followed by reference signs, those reference signs have been included for the sole purpose of increasing the intelligibility of the claims and accordingly, such reference signs do not have any limiting effect on the interpretation of each element identified by way of example by such reference signs.

Claims

1. A baby-walker with overturning prevention means, according to the present invention, comprising a base frame mounted on casters and connected to a child's chair, characterized in that it comprises, at least in a perimetric portion of said frame, elastically yielding means for absorbing kinetic energy in case of impact.
2. Baby-walker, according to the preceding claim, characterized in that said elastically yielding means are housed at a slot defined at the front part of said base frame.
3. Baby-walker, according to the preceding claims, characterized in that said elastically yielding means comprises a bumper being substantially C-shaped and slidingly housed in said slot.
4. Baby-walker, according to one or more of the preceding claims, characterized in that it comprises elastic means acting between a housing seat defined in said bumper and a butting lug defined on said base frame.
5. Baby-walker, according to one or more of the preceding claims, characterized in that it comprises, at the free ends of the arms of said bumper, fork-elements arrangeable astride of the end edge of said slot.
6. Baby-walker, according to one or more of the preceding claims, characterized in that it comprises extraction prevention limit stops for said bumper constituted by wedge-shaped elements defined at the internal free edge of said bumper and coupleable in abutment against the inner edge of said base frame.
7. A baby-walker with overturning prevention means, characterized in that it comprises one or more of the features described and/or illus-







European Patent
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EUROPEAN SEARCH REPORT

Application Number
EP 95 10 6868

DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int.Cl.6)
A	US-A-4 988 138 (DANNA ET AL.) * column 2, line 4 - column 3, line 58; figures 1-5 * -----	1,7	A47D1/00 A47D13/04
			TECHNICAL FIELDS SEARCHED (Int.Cl.6)
			A47D A47C
The present search report has been drawn up for all claims			
Place of search THE HAGUE		Date of completion of the search 10 August 1995	Examiner Mysliwetz, W
CATEGORY OF CITED DOCUMENTS X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document			