

# PATENT SPECIFICATION

DRAWINGS ATTACHED

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891,682

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International Classification:—A63h.

## COMPLETE SPECIFICATION

### Improvements in or relating to Toy Model Vehicles

We, MECCANO LIMITED, of 236, Binns Road, Liverpool, 13, Lancashire, a British company, do hereby declare the invention, for which we pray that a patent may be granted to us, and the method by which it is to be performed, to be particularly described in and by the following statement:—

This invention concerns miniature toy vehicles and in particular to arrangements in such vehicles for permitting pivoting of an axle to provide a steering effect.

In the Specification of our application No. 12500/60 (Serial No. 891,681) there is described and claimed a toy motor vehicle in which the axle for at least the front wheels passes through slots in upstanding lugs on opposite sides of the vehicle floor plate, which slots have rearward upwardly inclined extensions, and a spring acts on the axle urging it to assume a normal position for straight line movement of the vehicle at the bottom of the inclined extensions of the slots. A pivot means is provided for the front axle of the vehicle and such pivot means may be constituted by a pair of spaced downwardly extending lugs pressed out of the material of the spring, or a pair of spaced upwardly extending lugs pressed out of the material of the floor plate, or a pair of spaced upwardly extending spigots formed on the face of a die cast floor plate of the vehicle.

The present invention constitutes an improvement in or modification of the invention of the application referred to above and according to the present invention the pivot means for the front axle of the vehicle is constituted by a slot formed in the lower end of a web member depending from the vehicle body, such web member being integral with or separate from a spigot also depending from the vehicle body and serving to secure the body and floor plate together.

The invention will be described further by way of example with reference to the accompanying drawing which shows a toy

motor vehicle incorporating the invention with most of the body omitted for clarity of illustration.

The floor of the vehicle comprises a sheet metal plate 1 bent to form upstanding lugs 2 and 3 which are slotted for the reception of front and rear axles 4 and 5 respectively. A blade spring 6 rivetted or otherwise secured to the floor plate 1 at 7 overlies the front and rear axles to provide springing of the vehicle and to urge the front axle into the horizontally extending parts of the slots in the lugs 2. At its forward end spring 6 is slotted longitudinally and the slot is enlarged at a point between its end to accommodate a spigot 8 depending from the body of the vehicle and serving for securing the body and floor plate together. The spigot 8 has a web 9 which passes through the slot in spring 6 and at its lower end is slotted to accommodate the front axle 4 and provide a pivot means for this axle.

When the body of the assembled vehicle is pressed downwardly and towards the left or right side, one end of the axle 4 rides up the inclined part of one of the slots in the lugs 2 at the same time pivoting about the slot in the web 9 so that the other end moves forwardly along the horizontally extending part of the slot in the other lug 2, and the vehicle turns to the left or the right as the case may be.

The slots in the lugs 2 may be provided with aligned depressions or recesses in their lower faces to define a normal position for the axle 4 which produces straight line movement of the vehicle.

The web 9 may be integral with the spigot 8 as shown in the drawing or it may be a separate member projecting from the body structure.

The lugs 2 may be as shown in the drawing or they may be curved outwardly of the plate 1 as indicated at 2a by the dotted lines between the forward and rearward edges of

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the lugs in such a manner as to maintain the minimum spacing between the two front wheels constant as the axle is moved away from its position corresponding to straight line movement of the vehicle.

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WHAT WE CLAIM IS:—

1. A toy motor vehicle in which the axle for at least the front wheels passes through slots in upstanding lugs on opposite sides of the vehicle floor plate, which slots have rearward upwardly inclined extensions, and a spring acts on the axle urging it to assume a normal position for straight line movement of the vehicle at the bottom of the inclined extensions of the slots, wherein a web member depending from the body of the vehicle is slotted at its lower end to provide a pivot means for the axle, such web member

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being either integral with or separate from a spigot also depending from the vehicle body and serving to secure the body and floor plate together. 20

2. A toy motor vehicle as claimed in claim 1 in which the lugs are curved outwardly of the vehicle floor plate between their forward and rearward ends in such a manner as to maintain the minimum spacing between the front wheels constant as the axle is moved away from its normal position. 25

3. A toy motor vehicle substantially as herein described with reference to and as illustrated in the accompanying drawing. 30

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COMPLETE SPECIFICATION

1 SHEET

*This drawing is a reproduction of  
the Original on a reduced scale*

