

A model of a special Coal Lorry designed to fill and weigh sacks of coal automatically in the presence of the customer. It was built by C. J. Somerfield, London N.3

## Notes and Ideas for Meccano Model-Builders

By "Spanner"

### An Interesting Model Coal Lorry

The model coal lorry illustrated on this page was built by C. J. Somerfield, London N.3, and is based on a very interesting type of vehicle known as the Autobagger, introduced by Charrold Ltd., London. In building his model, Somerfield has tried to incorporate some of the main functions of the vehicle, which operates semi-automatically and is designed to load a weighed amount of coal into a sack in the presence of the customer. The actual vehicle was illustrated on page 505 of the October, 1957, *Meccano Magazine*.

The sequence of operations in the model is as follows. First the container is tipped and the chute cover moved away so that coal flows into the bucket of the machine. When the correct weight is in the bucket—and this is indicated by a pointer—the chute cover closes. Then the release lever is operated and the bucket is lowered so that the coal can be run off into a sack. Finally the container is lowered to its normal position, and the release lever falls back into place automatically.

### A Useful Crane Grab

In Fig. 1 is shown a useful working grab that can be fitted to many kinds of model

cranes. The grab jaws are constructed from  $2\frac{1}{2}$ " Triangular Plates 1 edged at their bases by  $2\frac{1}{2}$ " Curved Strips 2. The grab is raised or lowered by means of four lengths of cord 3, while another cord 4 passes round a 1" Pulley carried from the cross-piece 5. If both the cords 3 and 4 are hauled in or paid out at the same speed, the grab travels up or down without the jaws moving, but if one cord ceases to move the grab opens or closes according to the movement of the other cord. The joints marked "A" are all pivoted by means of

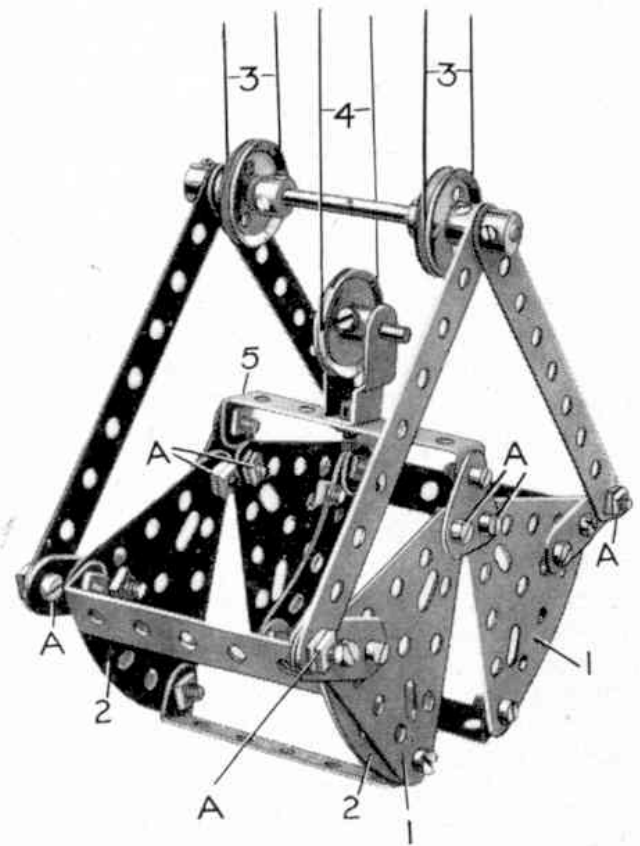


Fig. 1. A working grab that will be of interest to model crane builders.

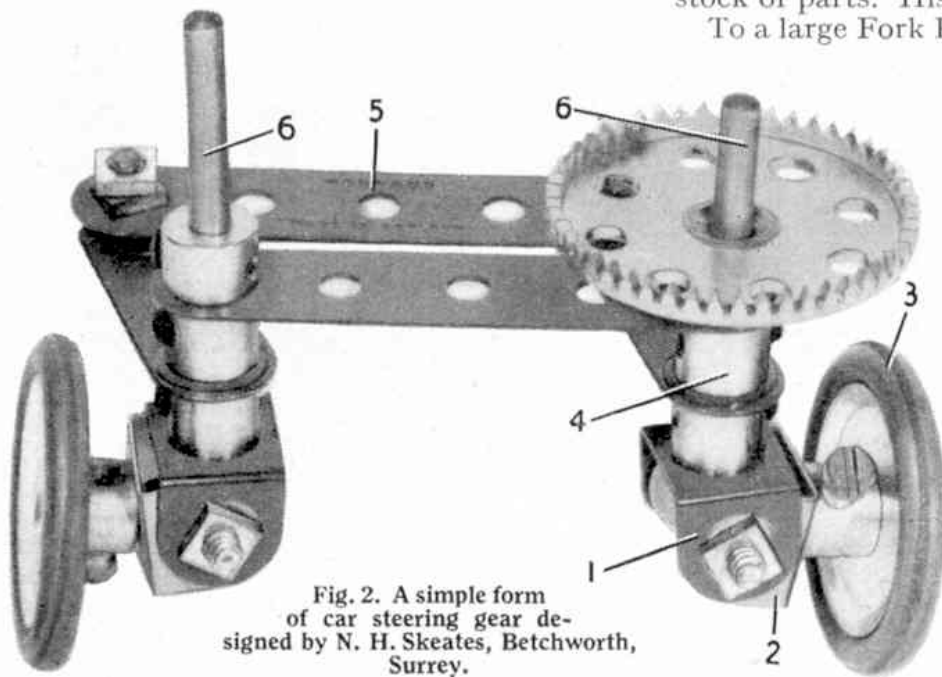


Fig. 2. A simple form of car steering gear designed by N. H. Skeates, Betchworth, Surrey.

bolts and lock-nuts. If the outer sides of the grab jaws are filled in with cardboard, the grab will pick up small loads of sand, marbles, etc.

#### Simple Steering Gear

Eleven-year-old N. H. Skeates, Betchworth, Surrey, asks me to include in these pages details of a simple form of steering gear he has designed, as he thinks it may be a help, and be of interest to, other young model-builders who do not possess a large

stock of parts. His idea is shown in Fig. 2.

To a large Fork Piece 1 a Double Bracket 2 is bolted at a slight angle to give the effect of camber to the road wheel 3, which is fixed on a  $\frac{3}{8}$ " Bolt passed through the Double Bracket. This construction is the same for both road wheels. The Fork Pieces are fixed on the ends of short Rods 6, one of which carries a Contrate Wheel that can be meshed with a Pinion on the steering column.

The track rod assembly is made by slipping a Washer over a  $\frac{3}{8}$ " Bolt which is then passed through the slotted hole of a Crank 4 and fitted with a nut that is tightened securely. The shank of the Bolt is then passed through an end hole of a  $2\frac{1}{2}$ " Strip 5 that forms the track rod, and is fitted with lock-nuts. This process is repeated for the other wheel.

This is an easy, yet effective method of steering, which does not entail any complicated construction features, thereby enabling inexperienced model-builders to make use of it.

## Big Prizes for Small Models

LAST month we announced details of the Simplicity Model-Building Competition and as this is open for entries until August 31, we are repeating the main details so that any readers who did not see the previous issue will have a chance to prepare, and send in, entries.

In the "Simplicity" Contest we are offering Cash Prizes for miniature Meccano models of any kind constructed realistically with the minimum number of parts. It is not necessary for a model actually to work. A realistic appearance is all that is required. It is possible to make hundreds of really "life-like" models using no more than a dozen or so Meccano parts, and the prizes will be awarded to those who succeed in producing the most realistic and original models. The Competition is open to every owner of Meccano, and it is only necessary to send a photograph or a good sketch of

any model you wish to submit. Entries should be addressed: "Simplicity Model-Building Competition, Meccano Ltd., Binns Road, Liverpool 13".

All entries will be grouped into one section, but the age of the competitor will be taken into consideration in assessing the merits of his work.

Your photographs or drawings, if unsuccessful, will be returned to you provided that a stamped addressed envelope of the necessary size is enclosed. It should be noted, however, that photographs of prize-winning models become the property of Meccano Ltd.

The prizes will be as follows: First, Cheque for £5 0s. 0d.; Second, Cheque for £3 0s. 0d.; Third, Cheque for £1 10s. 0d. There will be also ten prizes each of 15s., and ten prizes each of 7s. 6d.

Don't forget: the closing date is August 31.