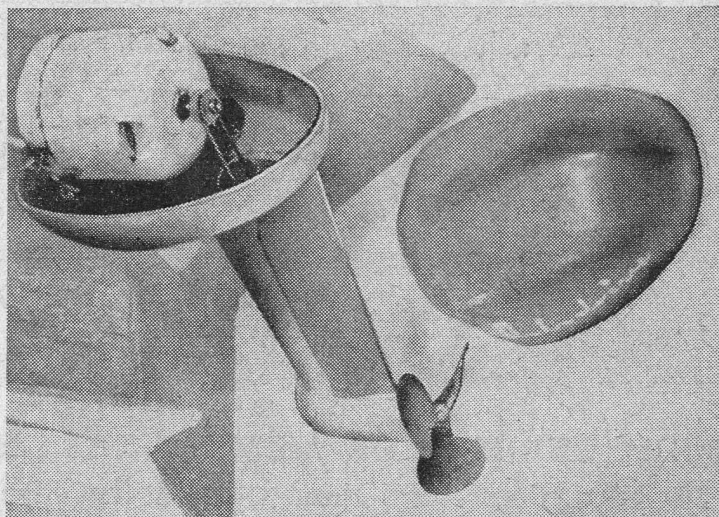


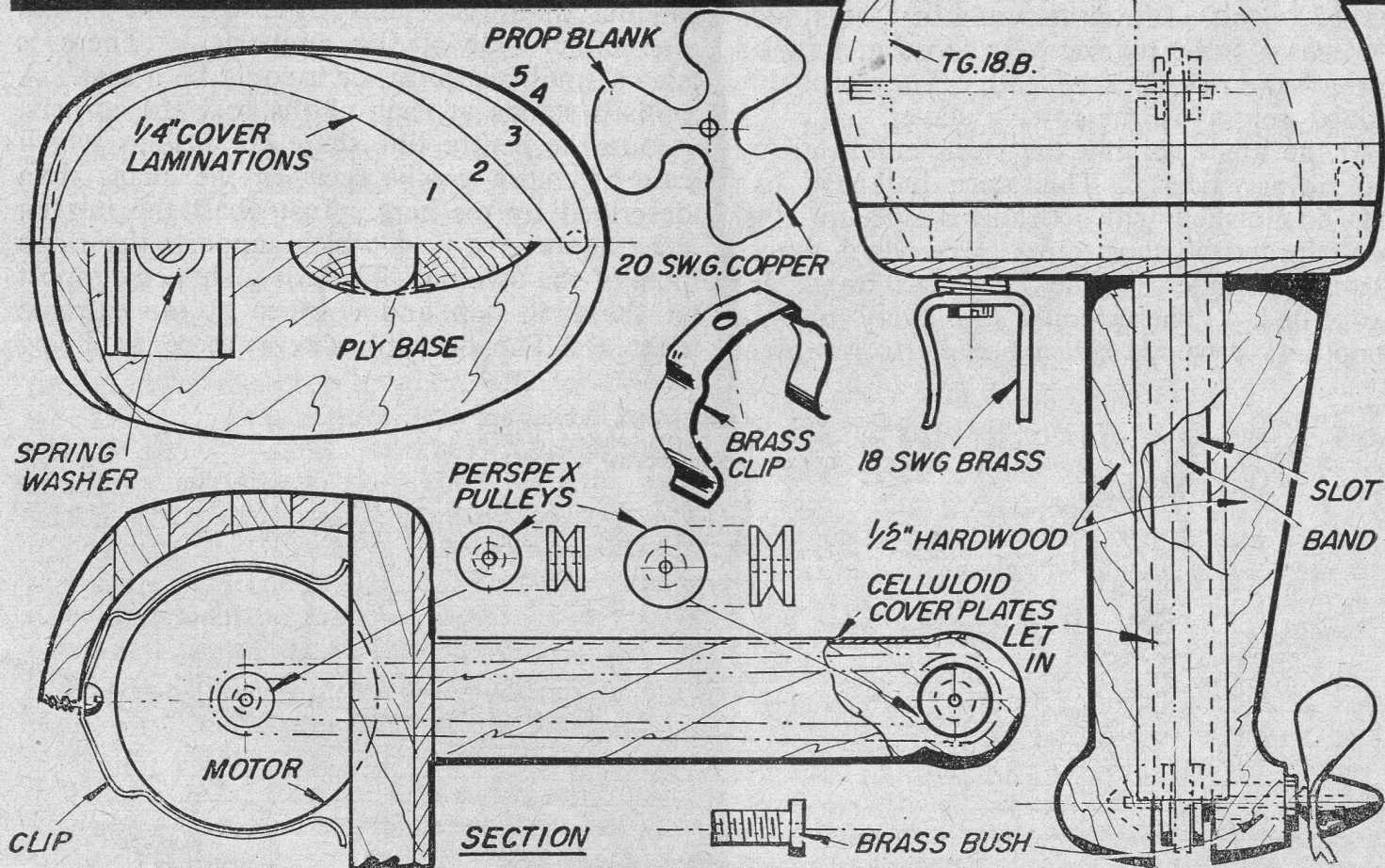
HERE'S the gen you've been waiting for, our lightweight outboard unit for your existing small electric motor, with the big advantage (just take a look at the provisionally patented drive system) of complete lack of things that go whirr, click, and thump—just one rubber band is used!

After many hours of running, the prototype *Robodrive* showed very little wear on the band, which is instantly renewable. A wet belt does not slip under normal conditions, and even if the prop is "braked", a barely perceptible amount occurs.

For the benefit of the chap who likes to make everything for himself, the full size drawing gives all the "bits". Start by making the cover which is "bread and buttered" from  $\frac{1}{4}$  in. obeche or hard balsa, with a  $\frac{1}{16}$  in. ply base. Now cut the down tube pieces from  $\frac{1}{2}$  in. obeche or pine and carve to streamline section, rebate for celluloid or  $\frac{1}{32}$  in. ply cover strips, and glue and screw to case.



# Robodrive



The pulleys require careful finishing for best results. Experiments showed that Perspex was most suitable, and should be turned so that when making the groove for the belt, a slight overheating occurs; this leaves a pattern, rather like chatter marks, and improves the grip. Drill for a tight force fit.

Cut the prop from sheet copper and solder (silver solder if to be used in salt water) to a short length of 16 s.w.g. wire. Make the bush from brass stock or use a commercial model aircraft type. Leave a slot at the bottom of the prop shaft housing for access to the belt. A separate cover for this can be made from thin copper or a small piece of water-

proof surgical plastic. Having the slot open does not spoil the performance noticeably. Having carved and sanded the case and down tube, fill the grain, undercoat, rub down and enamel.

All that remains is to fit the brass clips for the case top and the transom, the latter having a spring washer under its screw to allow the steering to be locked.

The construction shown here, whilst being simple for the average modeller, is slightly heavier than the prototype, but by the time these notes appear inexpensive commercial mouldings, etc., should be available for case and tube.