

PUSHER PURSUIT

By Aviation Cadet Fred Tuxworth

ANY WAY YOU LOOK AT IT, THIS BEAUTIFUL TETHER JOB PROVES CONTROL-LINE FLYING IDEAL FOR TESTING THOSE DREAM SHIPS. THE AUTHOR'S PET IS AN EFFECTIVE BLEND OF LOOKS AND REALISM.

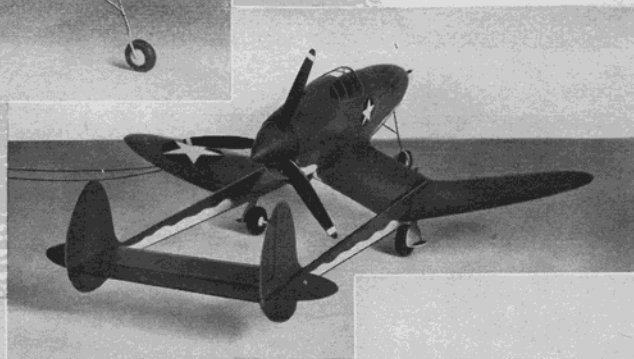
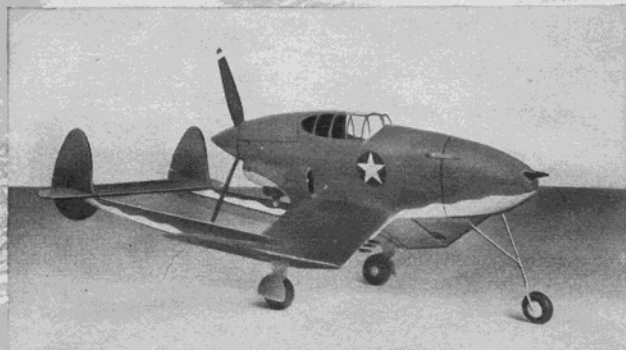
THIS model, although of unusual arrangement, is excellent for the beginning tether flier. Being a pusher, it goes a long way toward preserving engines and propellers. Its tricycle landing gear makes high-speed taxiing quite safe, thus simplifying test flying. The detachable nose section is designed to snap off in the event of severe impact. Since the nose section houses the batteries, the most concentrated portion of the plane's weight, most of the energy of impact is absorbed when it is dislodged. The control system is simplified and entirely external. The U-tube carries the entire control-line load and, since it is stationary, it is very simple to mount securely. This system also allows long levers on the rest of the control system, which minimizes the effect of lost motion and friction.

The cockpit and engine nacelles are carved from two blocks of soft balsa temporarily joined with dowel pins; this is the fastest and easiest method of construction. If two blocks of the correct thickness are available, join them with the pins to form a split line down the center of the nacelle. If only one block of the total

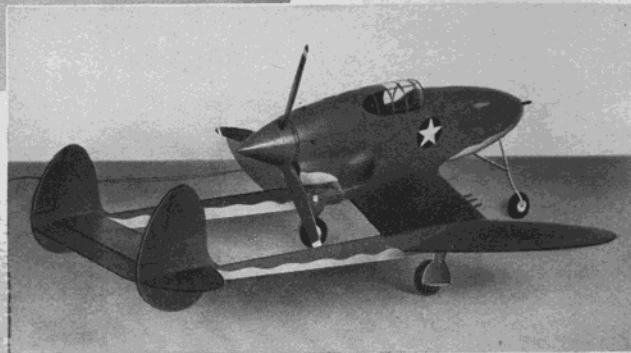
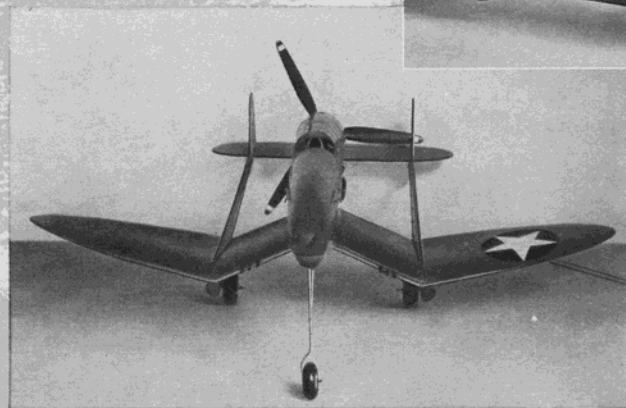
thickness is used, saw it down the center and join the halves with the smooth faces together to form a straight split line. If you have a jig or band saw, lay out the top and side views on their faces and saw them out. Replace the scrap after cutting one face to keep the block square in cutting the other. Without a jig or band saw, it is best to separate the blocks, lay out the side view on the split-line faces and cut out the profile on each block separately with a knife. This will make the profile correct at the split line, upon which the accuracy of the balance of the carving depends. The plan form will automatically take shape as the block is cut to conform with the templates.

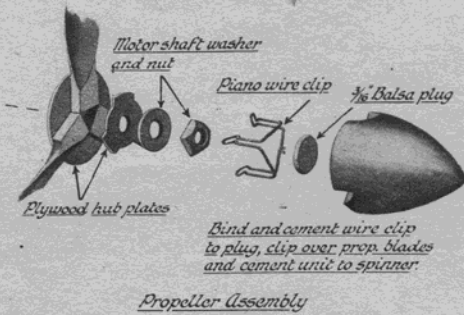
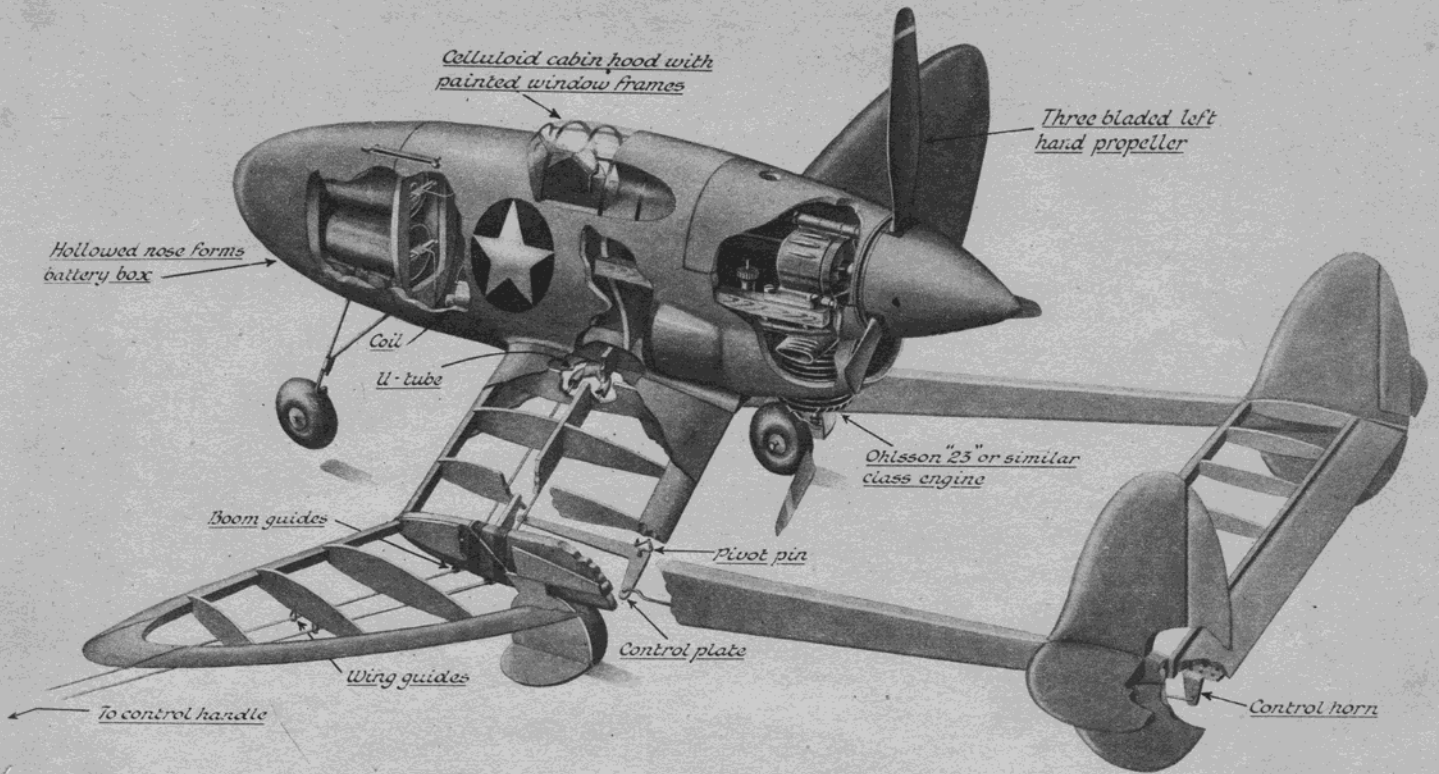
The nacelle is now ready to be shaped. The split line acts as an indestructible center line to which the templates are fitted. Mark at the center line the positions for the templates. Start the whittling by cutting the block to fit each template at its position. This is done by cutting a groove around the block until the wood contacts the template at all points and the template corners are at the center line; a small wood carver's gouge is a great help. As each template position is finished, draw a pencil line around the block where the template has been fitted to indicate an accurate section; this line should remain intact until the entire carving is done. When all the templates have been carefully fitted, cut away the surplus wood between each template position to give smooth flowing lines. The block need be sanded only roughly at this stage.

Separate the halves and hollow them to about $\frac{1}{8}$ " to $\frac{3}{16}$ " thickness. The after end, which houses the engine, should be slightly thicker for strength. The nose section is cut off and hollowed only enough to form a battery box. While the (*Turn to page 48*)

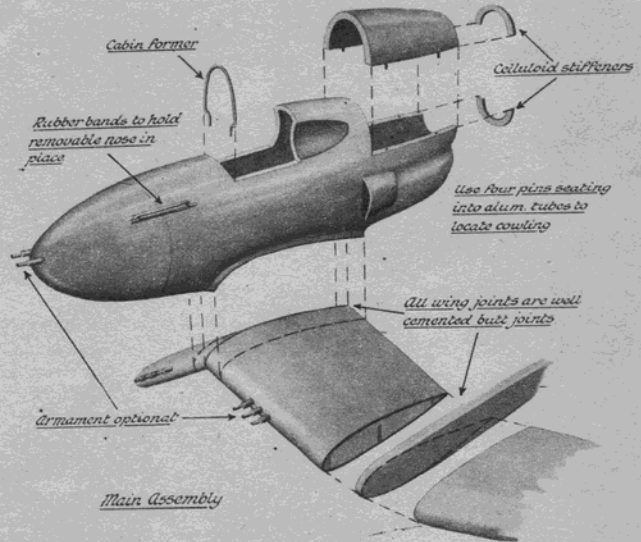


This semiscale job is a real prop saver because of pusher arrangement with tricycle landing gear. Note detail of guns and exhaust.





Drawings by Corne Williams



Carving Procedure

