

TOMCAT Manual



TOMCAT is a polyvalent glider. it is able to fly very fast and in big conditions, but it is also possible to fly in small conditions and works well in the thermal updrafts. Its qualities make a great playfellow to the slope as plain with the motorized version.

Before the building

The workspace must be clean and clear.

Check the assembly of the different components. It may be that the wing joiner is too tight, It will free after a few flights. If it is too tight sand delicately. You can also use a little wax.

On the wings, the job is to:

- Glue the servos supports flap and aileron provided in the kit if you use slim wing servos.



- Glue the horns of aileron and flap. feel free to drill the side rails of flap to increase the gluing horn.



Take your time and do several dry installation.

Once near, if necessary, to the cyano pointed to test the amplitude control surfaces. Supports servos can be glued with epoxy 5min and the horns will be glued to the cyano or with a mixture of epoxy and silica.

-Pass the cables through the holes planned. (To facilitate this step can make use of a piano wire) then solder the plugs.

Before installing the servos, put in neutral for the aileron servos. Provide an offset of 20 ° for the flap servos. This is to be a large movement of the flaps.

You can now install the servos and connect the rods. Favor a mechanical adjustment. You can now set up the servos caches. If the running clearance is too high. You can add a drop of cyano on the horn and the rudder

The wing is now complete !!! Go to the fuselage !!

To get started easily. First paste the horn drift. Same as for the wing, do not hesitate to dig the spar and glue the cap on the carbon rod.



The installation of the fuselage has no particular problem. Take the time to reflect on the servos used and their location. same for the battery.

The servoplate will paste it epoxy 24 hours with silica. Predict the location of the ballast tube and it locks. In the photo, he was chosen to stick a M4 nut in the tube. A screw will block the ballasts.



SETTING of the first flight.

The settings are a matter of taste. Here is a starting point for a first flight without worry.

Control surface movements and CG settings

C/G = **96 mm** from Leading Edge to start. Move back slowly in small increments to further improve control responses.

Neutral position of elevator.



Control surface settings: All dimensions are measured at the root of the control surface and at the trailing edge.

Elevator: +7mm + / -7 mm

Rudder: +15mm / -15mm

Ailerons: +18mm / -10mm

Flap -> ailerons +8mm /-4mm

Snap Flap : Flap : 4mm , Ailerons (aligned with flap)

Thermal :

Flap : 2mm down

Ailerons aligned with flap

Butterfly :

Flap : as much as possible

Ailerons : -6mm

Elevator : -5mm (depends on the working range of flaps)