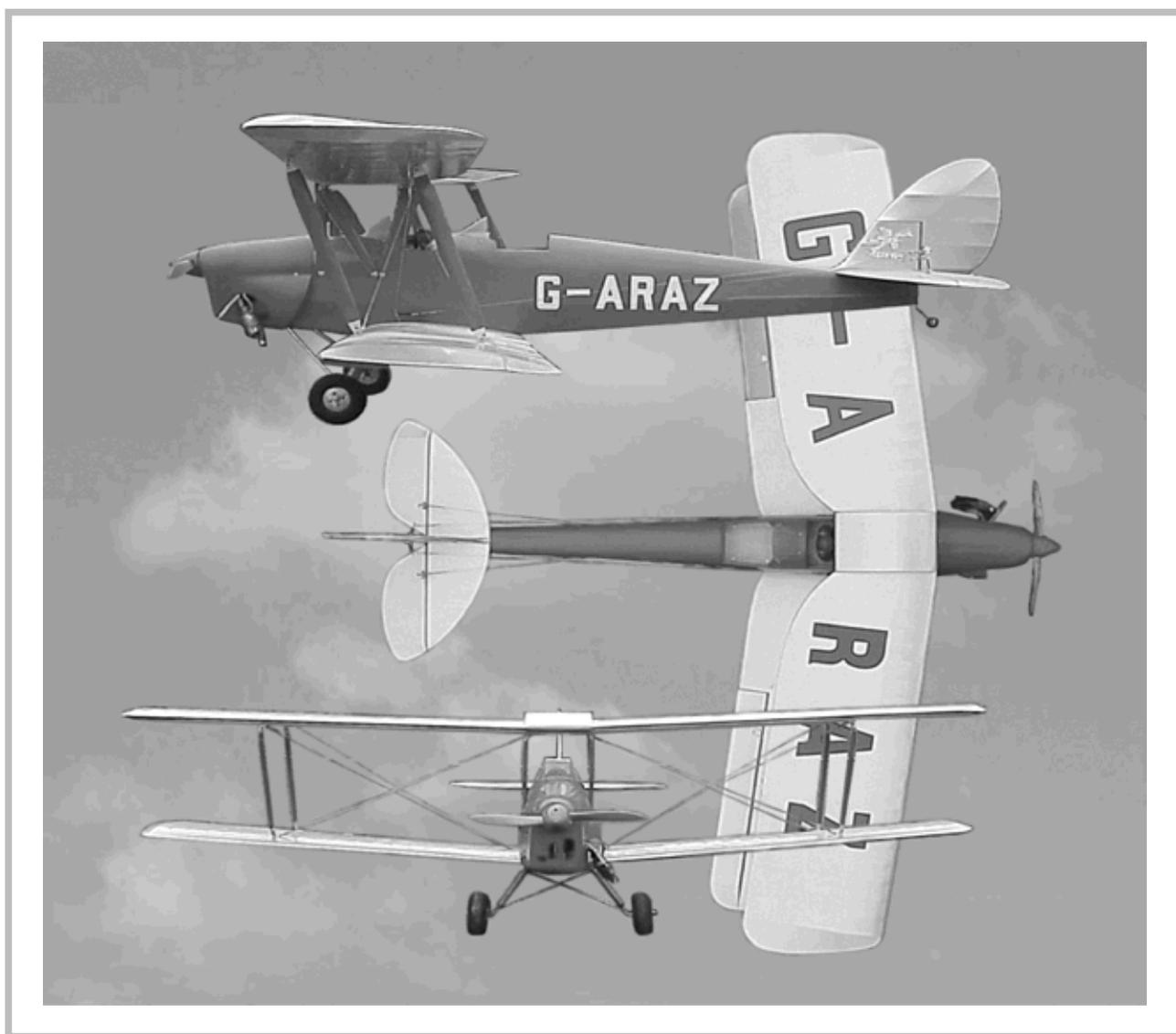


**Green R/C Model Airplanes Co. Ltd.  
Presents**

# *Super Tiger Moth*

**The Unique Almost-ready-to-fly Scale Model Of The World's  
Greatest Training Aircraft D.H. Tiger Moth**



*Design and Manufacture by Green R/C Model Airplane Co.,Ltd.*

# Super Tiger Moth

## Instruction Manual

Congratulations on your purchase of this excellent almost-ready-to-fly scale model ! Although the plane has been designed by our expert engineers and built by the skilled craftsmen, and most of the parts have been factory-assembled and installed for you, its ultimate success depends upon yourself. Please read the entire manual carefully before finally assembling, adjusting and flying.

### WARNING - THIS IS NOT A TOY!

Radio controlled model aircraft are capable of inflicting serious injury and / or property damage if not assembled, operated and maintained in a competent and safe manner. The successful assembly, operation and maintenance of radio controlled model aircraft are not intuitive skills and performing them safely and competently takes experience. If you are not already an experienced radio controlled aircraft modeler, we **strongly** suggest that you find someone who is, to inspect your completed model, to teach you to fly and to point out the proper maintenance procedures to keep your model aircraft in safe operating condition.

### WARRANTY

We guarantee this kit to be free from defects in material and workmanship at the time of purchase. This warranty does not cover any component parts damaged by use, modification or deterioration resulting from the application of adhesives or other products not specified in the instructions. In no event should our liability exceed the original purchase price of the kit. Besides, we reserve the right to change or modify this warranty without notice.

Since we have no control over the final assembly or components used in the final assembly of this kit, no liability is assumed or accepted for any damage resulting from the use of the final assembled model aircraft. By the act of using the final assembled model aircraft the user accepts all resulting liability.

### 1 Parts List

Refer to Table (1), inspect all the parts and sub-assemblies carefully. Please call your shopkeeper if anything is missing or damaged. When you want to place your order with us, or to buy spare parts from the local hobby shop, please refer to the Stock No. of our product.

Note: The meaning of the English letters in Stock No. are explained as below: \_\_

STM stands for Super Tiger Moth (span 1980mm)  
TM stands for smaller Tiger Moth (span 1200mm)  
C ----- for Controls  
E ----- Engine  
F ----- Fuselage  
L ----- Landing gear  
T ----- Tail-surfaces  
W ----- Wings

For example: STM-C05 stands for Elevator pull-pull control cable.(included in the fuselage)

STM-E01 ----- for Engine mount (left and right beam)  
STM-F01 ----- The Fuselage Sub-assembly  
STM-L01 ----- Main landing gear assembly (steel wire)  
STM-T02 ----- Stabilizer hinged with elevator  
STM-W03 stands for The Upper Wing Center Section , etc.

Details as shown in Table (1).

**Table (1) Parts and Sub-assemblies**

Pack No.	Stock No.	Description.	Qty.	
Bag 1	STM-F01	Fuselage sub-assembly (including the following parts	1 pcs.	
	F02	Wind-shield (with 8 pcs. of M2 x 8 fix screw )	2 set	
	C05	Elevator pull-pull control cable.(included in the fuselage)	2 sets	
	C02	Rudder control arm & push-rod with a pivot-screw	1 set	
	E08	Fuel tank & Fuel tube	1 set	
	E09	Throttle push-rod with connector and outer tube	1 set	
Bag 2	STM-E01	Engine mount (left and right beam)	1 set	
	E02	Anti-vibration washer	4 pcs.	
	E03	Mounting bolt (M3 x 30)	8 pcs.	
	E04	Self-lock nut (M3)	4 pcs.	
	E05	Metal washer	8 pcs.	
	E06	Screws to fix the engine cowl	3 pcs.	
Bag 3	STM-E07	Engine Cowl	1 pc.	
Bag 4	STM-W01	Upper wing panel	2 pcs.	
Bag 5	STM-W02	Upper wing center section	1 pcs.	
Bag 6	STM-W03	Lower wing panel hinged with ailerons	2 pc.	
Bag 7	STM-W04	Wing front dihedral joiner (Stainless steel tube 9.5 x 280 mm)	2 pc.	
	W05	Upper wing rear joiner (Steel bar 4 x 260 mm)	1 pc.	
	W06	Lower wing rear joiner (Steel bar 4 x 130 mm)	1 pc.	
	W07	Wing rear strut (longer)	2 pcs.	
	W08	Wing front strut (shorter)	2 pcs.	
	W09	Upper wing cabane (longer)	2 pcs.	
	W10	Upper wing cabane (medium)	2 pcs.	
	W11	Upper wing cabane (shorter)	2 pcs.	
	Bag 8	STM-W12	Aluminium angle attachment	12 pcs.
		W13..	Self-tapping screw (3 x 12 mm)	32 pcs.
		W14	Metal bolt (M3 x 10)	12 pcs.
W15		Self-lock nut (M3)	12 pcs.	
W16		Flying wire connector		
Bag 9	STM-W17	Wing flying wire sub-assembly	4 sets	
	W18	Lower Wing hold-down bolt (M6 x 45mm)	2 pcs.	
	C03	Rudder pull-pull control cable	2 sets	
Bag 10	STM-L01	Main landing gear assembly (steel wire)	1 set	
Bag 11	STM-L02	Main wheel	2 pcs.	
	L03	Wheel collar (stopper) with set screw	4 sets	
	L04	Main gear hold-down plate	4 pcs.	
	L05	Main gear mounting bolt (M3 x 20mm)	8 pcs.	
Bag 12	STM-L06	Tail wheel	1 pc.	
	-L07	Tail gear (steel wire)	1 pc.	
	-L08	Wheel collar (stopper) with set screw	2 sets	
	-L09	Tail gear mounting plate (Secure to fuselage bottom)	1 pc.	
	-L10	Mounting plate set screws (M2 x 14mm)	2 pcs.	
	-L11	Tail gear retainer (Secure to the end of fuselage)	1 pcs.	
	-L12	Retainer set screw (M2 x 8 mm.)	4 pcs.	
	-T03	Tail-surfaces mounting bolt (M3 x 50mm)	2 pcs.	
	Bag 13	STM-T01	Fin hinged with rudder	1 set
		-T02	Stabilizer hinged with elevator	1 set
Bag 14	STM-C01	Rudder control horn with mounting screws	1 set	
	C04	Elevator control horn with mounting screws	2 sets	
	C06	Aileron control horn with mounting screws	2 sets	
	C07	Aileron push-rod	2 sets	

## Kit highlights

- 1) All wood construction. Everything looks real the engine cowl, the landing gear, and the scale pull-pull control cable, etc.
- 2) Balsa built-up wings and tail-surfaces. For easy transportation, the wings are made up of five plug-in panels, and the tail-surfaces are screwed onto the fuselage.
- 3) Covered with real iron-on films.
- 4) Come with all hardware, accessories and flying wire.
- 5) Symmetrical airfoil for the upper wing and semi-symmetrical airfoil for the lower wing. Thus, you can easily fly this Super Tiger Moth as a slow docile trainer as well as a fully aerobatic pattern model.
- 6) Hands-off stability when trimmed properly.

## Specifications

Wing span: 78 in. (1,980 m.m.)      Wing area: 1,841 sq.in. (118.8 sq.dm.)  
Fuselage length: 65.7 in. (1,670 m.m.)      Take-off weight: 10.5-11.5 lbs.(5.0-5.5 kgs.)  
Radio required: 4-ch. With 5 servos.      Engine: 2C 0.90 cu.in. / 4C 1.20 cu.in.

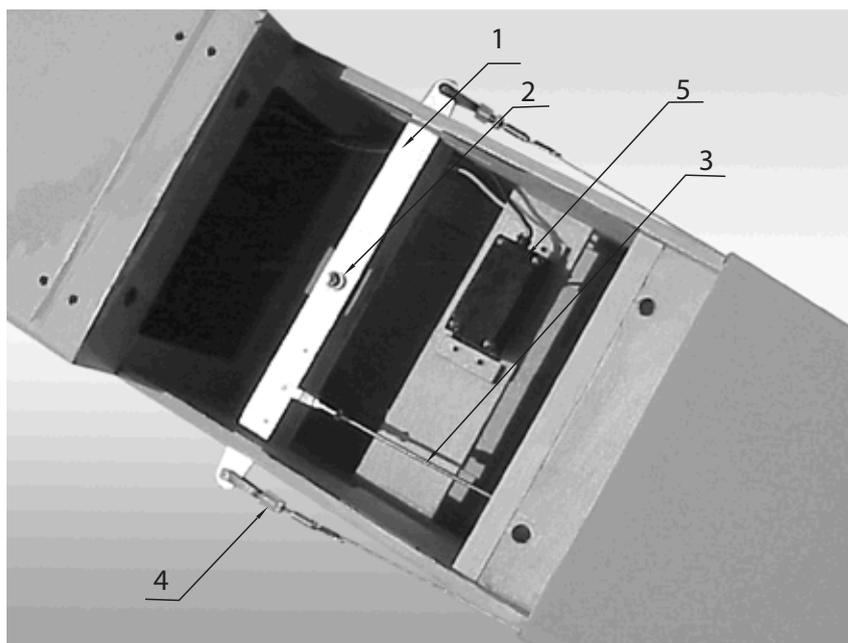
## Final Assembly

### Step 1. Work on the fuselage and install the servos

- 1) 1 pen **Bag 1** to take out the **fuselage sub-assembly** (STM-F01) and other parts included in the Same bag. Details are shown in **Table (1)**
- 2) Put the fuselage up-side down as shown in **Fig.(1)** to get access to the opening in the fuselage Bottom side. Fix the **rudder control arm & push-rod** (STM-C02) in place with the **pivot-screw** Supplied. Please be noted that the **clives end** of the push-rod is connected in the **second small Hole** in the control arm and the **Z-end** of the push-rod is to be connected to the **rudder servo Horn**.

**Fig.(1) Installation of the rudder control arm and push-rod**

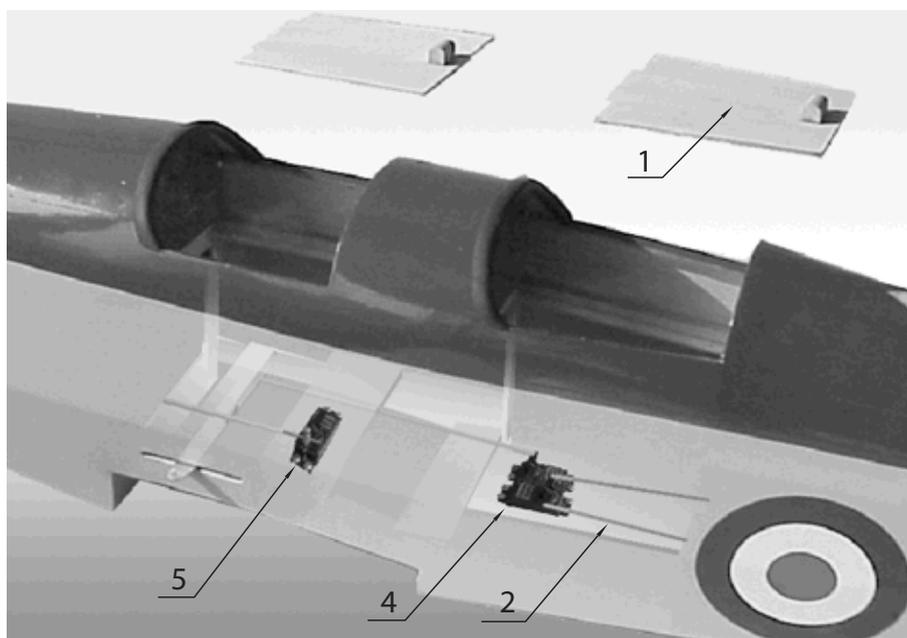
- |                                    |                    |
|------------------------------------|--------------------|
| 1. Rudder intermediate control arm | 2. Pivot screw     |
| 3. Rudder intermediate push-rod    | 4. Pull-pull cable |
| 5 Throttle servo (not included)    |                    |



- 3) Then, turn the fuselage right-side up as shown in **Fig (2)**. Firstly loosen the 4 pcs.of fixed screws in each of the **cabin floors** and remove the two cabin floors to get access to the two **servo-trays** inside the fuselage.
- 4) Install your **elevator servo and rudder servo** in the **rear servo-tray** and **throttle servo** in the **front servo-tray**.
- 5) Connect **clevis** of the two sets of **elevator pull-pull cable** (STM-C05) to the **elevator servo horn** and the **clevis** of the **rudder control push-rod** to the **rudder servo horn**. AT this stage, the **throttle servo horn** is not yet connected to the **throttle push-rod** (STM-E09)

**Fig.(2) Installation of the servos**

1. Cabin floors
- 2 Servo tray
3. Rude servo (not included)
4. Elevator servo (not included)
5. Throttle servo (not included)



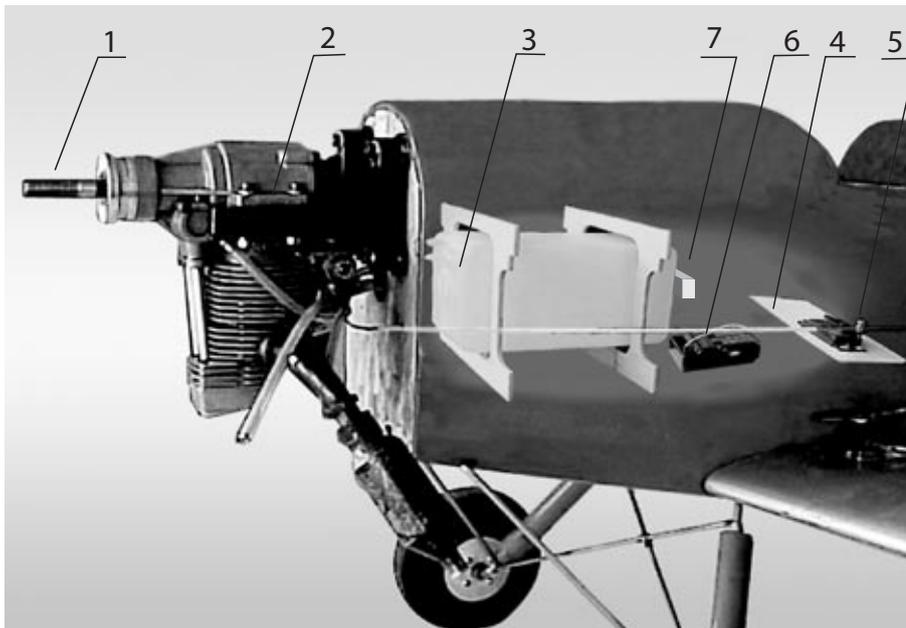
- 6) Mount and fix the rear cabin floor in place again, but, let the front cabin floor still open until you have connected the **throttle push-rod** (STM-E09) to the **throttle servo horn**. The receiver and its battery is to be installed under the fuel tank after the fuel tank is installed. (See **Step 2**. below.)
- 7) Then, install the front and the rear **wind-shield** (STM-F02) with the (2 x 8mm) **self-tapping screw** supplied with the windshields. There are holes in the fuselage top to locate the position of windshields.

**Step 2. Install the engine, fuel tank and connect the throttle push-rod**

- 1) Open **Bag 2** to get the **engine mount** (STM-E01) and all the hardware needed. As there are a lot of work to do. You'd better have a close look at the illustrations as shown in **Fig.(3)** to get an idea of the installation of all these items.

**Fig.(3) Installation of engine, fuel tank and throttle push-rod**

- |                                      |                                     |              |
|--------------------------------------|-------------------------------------|--------------|
| 1. Engine (not included)             | 2. Engine mount                     | 3. Fuel tank |
| 4. Throttle push-rod                 | 5. Throttle servo (not included)    |              |
| 6. Receiver & battery (not included) | 7. Wood strip (to retain Fuel tank) |              |



- 2) Before installing **fuel tank & fuel tube** (STM-E08) you have to drill a hole in the firewall to allow the **throttle push-rod** (STM-E09) to pass through. This hole must be carefully located such that you will not drill into your **fuel tank** in the fuselage. The location of the hole depends upon the position of the **throttle arm** on your engine **carburetor**. To fix fuel tank in place, apply the **wood strip** supplied to prevent the tank from moving backward. You have to secure the wood strip with CA.
- 3) After fuel tank installed, put **your receiver** and **battery** into the fuselage and securely fix it under the fuel tank with the **velcro straps** supplied.
- 4) Insert 4 pcs. of the **mounting bolt** (STM-E03) through its **metal washer** (STM-E05) and into the holes in the engine mount. The **anti-vibration washer** (STM-E02) should be sandwiched between engine mount and firewall. And then, insert 4 pcs of the mounting bolt through the holes in the engine mount and firewall. Tighten the bolts into the **blind nut** built-in the fire-wall which has the correct **right thrust** and **down thrust** pre-built in.  
Refer to the dimensions of your engine, drill holes into the engine mount beams. The 4 pcs. of the same
- 5) **bolt** (STM-E03) and 4 pcs. of the **self-lock nut** (STM-E04) is for you to fix your engine inverted on the engine mount beams. But, at this stage, you are not to securely fix the engine in place because you have to firstly connect the **┘┘Z-end┘┘ of throttle push-rod** (STM-E09) to the **carburetor throttle arm** and move the engine along with the connected throttle push-rod in order to insert the push-rod into the hole in the firewall. Should you had fixed the engine, it would be impossible to do this.  
Insert the un-threaded end of the throttle push-rod into the firewall. Now, you can tighten securely the bolts to fix your engine in place on the mount beams.
- 6) Then, you can connect the **un-threaded end of throttle push-rod** to the **throttle servo horn**. To do this, firstly insert the un-threaded end of throttle push-rod through the **adjustable connector** which should have already been installed in the throttle servo horn. Adjust the **effective length of the push-rod** such that when the **throttle stick** on the transmitter **is set to its lowest position, the engine should operate idling**. After adjusting, tighten the **setscrew** in the connector.
- 7) Now that you have installed all above (i.e. the engine, the fuel tank, the throttle servo with throttle push-rod connected and the reciver with battery, you can place the front cabin floor to its original position and fix it.
- 8)

### Step 3. Mount the engine cowl

- 1) Open **Bag 3** to have the **engine cowl** (STM-E07)
- 2) To mount engine cowl you should **remove** the **engine muffler** first.
- 3) Refer to **Fig.(4)**, drill a **hole** in one side of the cowl to get access to the **hi-speed needle** and cut a **large opening** in the opposite side to let the **muffler** to protrude through the owl. The location and size of the hole and the opening depends upon your engine.
- 4) Fix the cowl with the 3 pcs. of self-tapping screw supplied.
- 5) Mount the muffler again after the cowl is fix in place.

**Fig.(4) The engine cowl**

1. Small hole (access to hi-speed needle)
2. Large opening (for muffler)

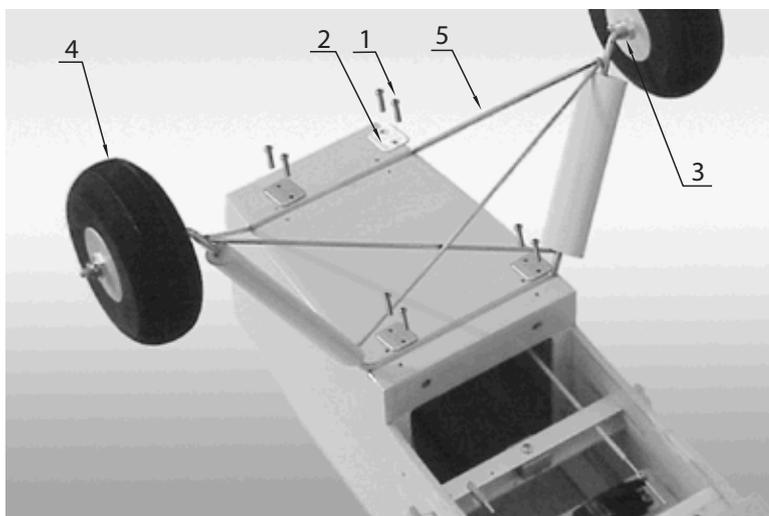


### Step 4. Mount the main landing gear sub-assembly

- 1) Open **Bag 10** and you'll have the **main landing gear assembly** (STM-L01).
- 2) Turn the fuselage up-side down again. The wire of main landing gear assembly may need spreading to match the forward and the rear slots that are located under the covering.

**Fig.(5) Mounting the main landing gear**

1. Mounting bolts
2. Hold-down plate
3. Wheel collars
4. Main wheel
5. Landing gear (steel wires)



- 3) As shown in **Fig. (5)**, there are holes pre-drilled in the bottom side of fuselage to locate the position to mount main landing gear. The gear wire will push covering into slots when you tighten the **mounting bolts** (STM-L05) through the aluminium **hold-down plates** (STM-L04) into the **blade nuts** pre-built in fuselage bottom. You don't need to cut away the covering in the slots because the covering in slots will help keep the wood slots from getting oil soaked.
- 4) Locate the **wheel collars** (STM-L03) and fix the **main wheels** (STM-L02) in place with the **set Screw** in the collar.

### **Step 5. Mounting the tail-surfaces and the tail wheel**

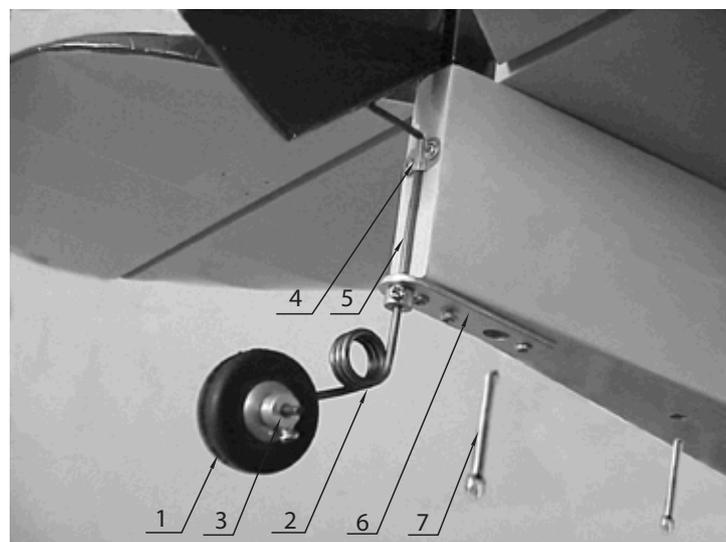
- 1) Open **Bag 13** to get the **fin hinged with rudder** (STM-T01) and the **stabilizer hinged with elevator** (STM-T02). Please be noted that the 2 pcs of **tail-surfaces mounting bolt** (STM-T03) are put in **Bag 12** in fear that the two metal bolts would damage the covering of the tail-surfaces.
- 2) Open **Bag 12** and you will have the tail-wheel and all the hardware needed .
- 3) Open **Bag 14** to get the **rudder control horn** (STM-C01) and **elevator control horn** (STM-C04). Mount the control horns onto rudder and elevator respectively.
- 4) Place tail wheel and the 2 pcs. of **collar** (STM-L08) on the **axle** of the **tail gear** (STM-L07). One of the collars is to keep the wheel from coming off the axle. Another is to prevent the gear from moving upward through the hole in the **tail gear mounting plate** (STM-L09).
- 5) Insert the sharp end of **tail-gear** into the hole pre-drilled in the fin and apply thin CA to secure it in the fin.
- 6) Refer to **Fig. (6)**, mount the **tail-surfaces** along with the **tail-wheel sub-assembly** onto the tail-end of fuselage by inserting the 2 pcs of (M3 x 50 mm) **tail-surfaces mounting bolt** (STM-T03) into the **holes & tubes** pre-built in the fuselage and securely tightening the bolts into the **nuts** built-in the fin to fix the tail-surfaces in place.
- 7) Tighten the 2 pcs of (M2 x 14 mm) **screw** (STM-L10) to fix the **tail gear mounting plate** (STM-L09) in place at the bottom of fuselage.
- 8) Use the (M2 x 8 mm) **retainer set screw** (STM-L12) to fix the **tail gear retainer** (STM-L11) in place at the end of fuselage. Make sure that the tail gear **can rotate freely** in its retainer.
- 9) Finally, connect the **pull-pull control wires** to the **horns** on the elevator and the rudder respectively. By turning the clives clockwise or counter-clockwise to get the appropriate tension in the wires. Otherwise you will have trouble to control your plane in flight.

### **Important**

- \* The **elevator control pull-pull cables** are put in the fuselage already.
- \* Before connecting the **elevator pull-pull cable** to the **elevator horns**, you have to adjust the **effective length of the pull-pull cable**. Refer to **Fig. (12)**, please be noted that the **original clamp** is a stainless steel tube **which has not yet be flattened**. Therefore, you can **pull the cable freely in the tube** to adjust the effective length of the pull-pull cable. After adjustment made, **flatten** the tube with a pair of pliers **to clamp** the cable Securely.

**Fig. (6) Assembly of the tail-surfaces and the tail wheel**

1. Tail wheel
2. Tail gear axle
3. Wheel collar
4. Tail gear retainer
5. Tail gear strut
6. Mounting plate
7. Mounting bolts



### Step 5. Installation of the aileron servos

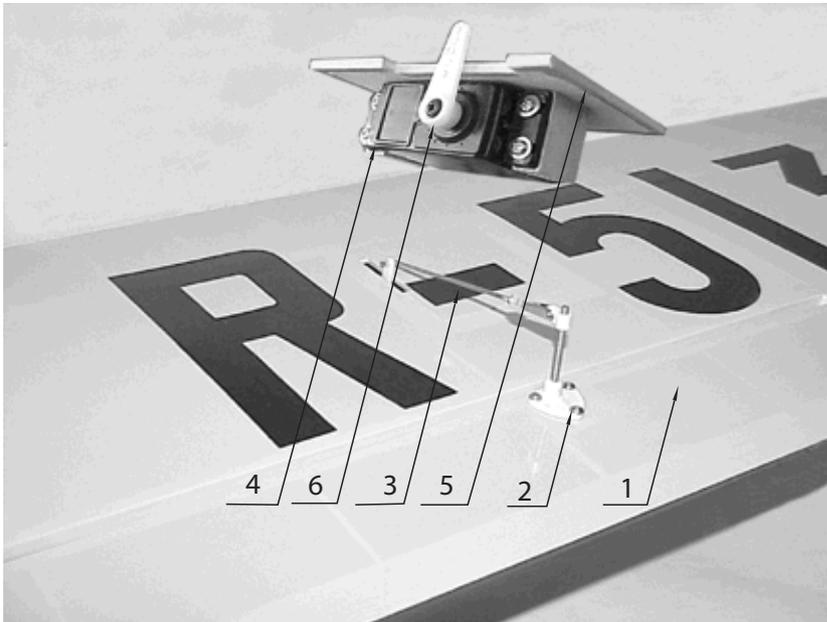
- 1) Open **Bag 6** to get the **lower wing panels with ailerons** (STM-W03). Also open **Bag 14** to get the aileron control horns and push-rods.
- 2) Mount the **aileron control horn** (STM-C06) and **aileron push-rod** (STM-C07) on the ailerons. There are holes pre-drilled to locate the position.
- 3) Refer to **Fig. (7)**, locate and remove the **aileron servo access doors**. Mount your aileron servos to the access doors. **Long servo horns** are going to be needed to get it outside the slots in the servo door. You will need 2 pcs of **servo extensions** and 1 pc of **Y-extension**. The wing (left and right) panels have **pull string pre-installed**. Carefully pull the extension through the panel and connect your Y-extension.
- 4) After installing the servos and connecting the servo extensions, close and fix the doors again.
- 5) Finally connect the aileron push-rods to the aileron servos.

### Step 6. Assembling the lower wing and mounting the wing struts

- 1) Open **Bag 6** to get the **lower wing panel hinged with aileron** (STM-W03).
- 2) Open **Bag 7** to get the **wing dihedral joiners** (STM-W04, STM-W05 and STM-W06), the **wing struts** (STM-W07, STM-W08) and the **wing cabanes** (STM-W09, STM-10 and STM-W11).
- 3) Open **Bag 8** and **Bag 9** to get all the hardware needed for assembling the wings.
- 4) Insert the **wing front dihedral joiner** (STM-W04) and **rear dihedral joiner** (STM-W06) into the root chord of the wing panel and join the left and right panels tightly together to get the **complete lower wing**.

**Fig.(7) Installing the aileron servos and controls**

1. Aileron
2. Aileron horn
3. Push-rod
4. Aileron servo
5. Access door
6. Long servo arm (not included)

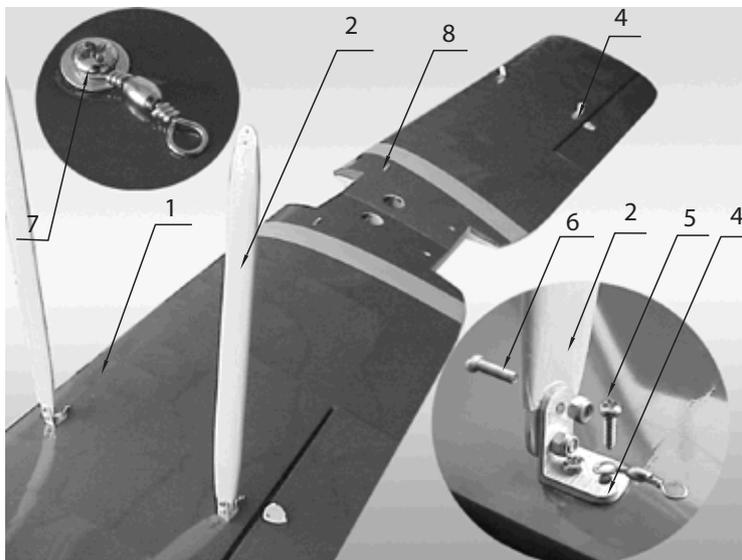


- 5) Refer to **Fig (8)**, firstly use the **self-tapping screw** (STM-W15) to fix the **aluminium angle attachment** (STM-W12) and the **wing flying wire connector** (STM-W18) in place on the top side of the lower wing panels. The wing panels are pre-drilled holes for you to locate the position of the aluminum **angle mounts** and the **flying wire Connectors** (STM-W16). There is also a pre-drilled location on each of the lower wing panel top side near the fuselage saddle area, this will be the **attachment point** of the upper **wing flying wire sub-assembly** (STM-W17) And then, then, use 4 pcs of **metal bolt** (STM-W14) and **self-lock**

**nut** (STM-W15) to connect the 4 pcs of **wing Struts** to the 4 **aluminium angle attachments**. Pay attention to the length of the struts: The **rear wing strut** (STM-W07) is longer than the **front wing strut** (STM-W08). At this stage don't screw the bolt bolts too tightly until you have connect the lower wing to the upper wing.

**Fig.(8) Assembling the lower wing and mounting the wing struts**

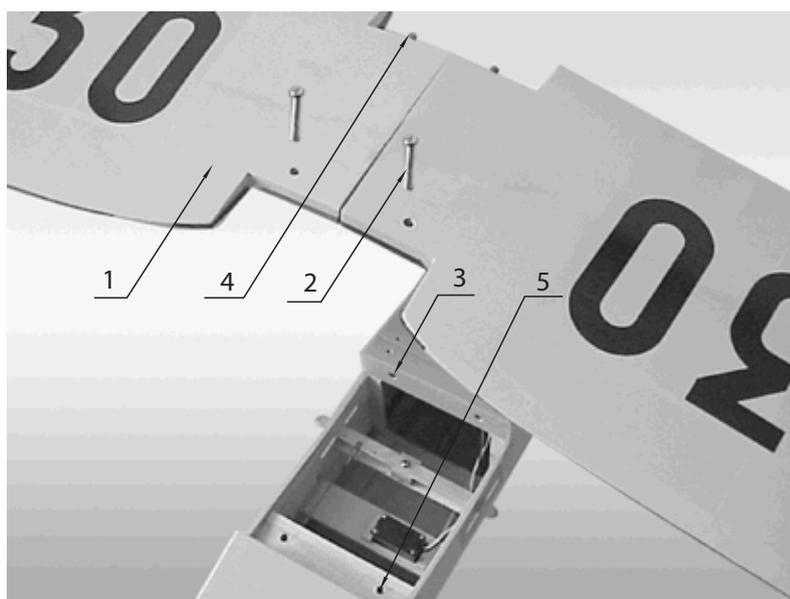
1. Wing panels (L & R)
2. Wing struts (L & S)
3. Ailerons
4. Alum. angle attachment
5. Self-tapping screw
6. Metal bolt & nut
7. Flying wire connector attachment
8. Wing dihedral joiners



**Step 7. Mounting the lower wing onto fuselage**

Refer to **Fig.(9)**, put the fuselage up-side down to install the complete lower wing to the fuselage saddle. Be noted that there are **two dowel pre-built** in the center portion of the lower wing and **two holes pre-drilled** in the fuselage. Slide the dowels into the holes and settle the lower wing onto the fuselage saddle. Then insert the 2 pcs of **lower wing hold-down bolt** (STM-W18) into the **blade nuts** built-in the fuselage and tighten the bolts securely to fix the complete lower wing in place..

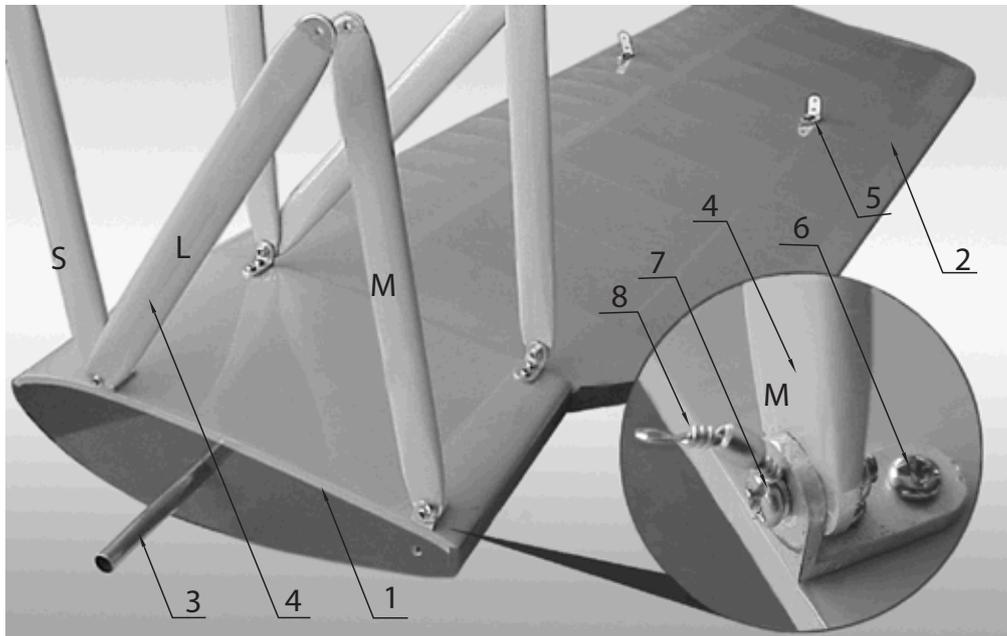
**Fig.(9) Mounting the complete lower wing onto fuselage**



1. Lower wing panels (L & R)
2. Hold-down bolts
3. Holes (built-in fuselage)
4. Dowels
5. Blind nuts (built-in fuselage)

**Fig.(10) Assembling the upper wing panels**

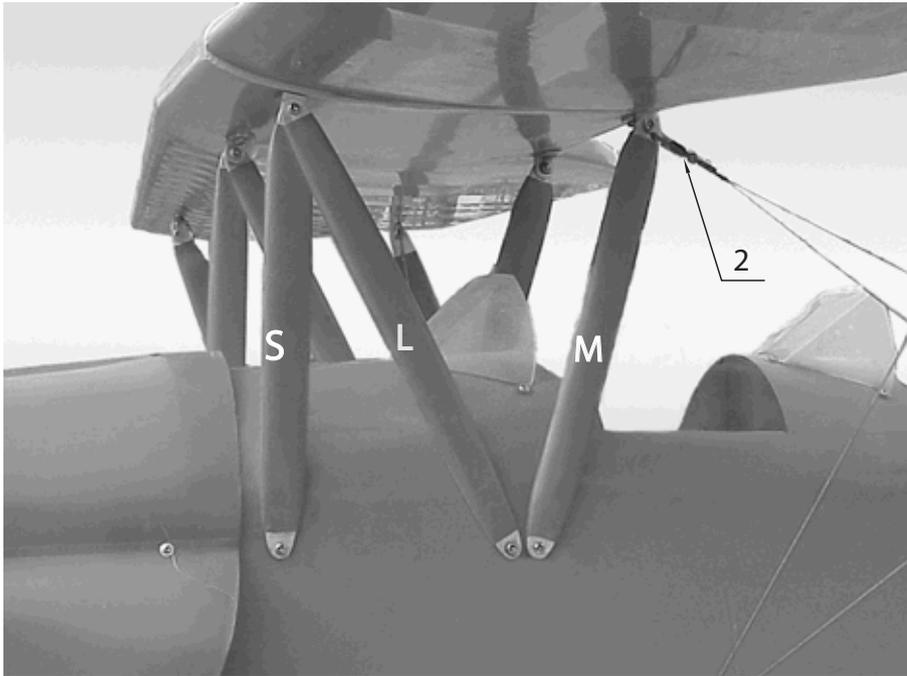
- |                             |                              |
|-----------------------------|------------------------------|
| 1. Wing center section      | 2. Wing outer panels (L & R) |
| 3. Dihedral joiners (L & S) | 4. Wing cabanes (L, M, S)    |
| 5. Alum. angle attachment.  | 6. Self tapping screw        |
| 7. Metal bolt & nut         | 8. Flying wire connector     |



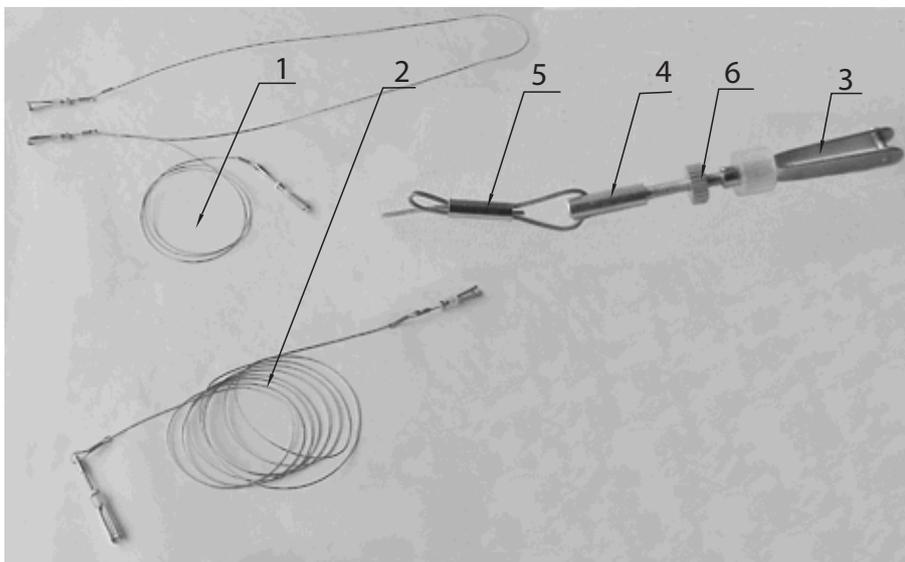
**Step 8. Assembling and mounting the upper wing**

- 1) Open **Bag 4** and **5** to get the **upper wing panel** (STM-W01) and the **wing center section**(STM-W02). Insert the upper wing **front dihedral joiner** (STM-W04) and **rear dihedral joiner** (STM-W05) through the upper wing center section and into the root chord of the left and right wing panel respectively. Tightly join the three parts together to form the **complete upper wing**.
- 2) Then, put the complete upper wing up-side down. Use the **self-tapping screws** (STM- W13) to fix 4 pcs of the **aluminium angle attachments** (STM- W12) in place **on the bottom side of the wing center section**, and another 4 pcs **on bottom of the left and right paneal** respectively as shown in **Fig.(10)**. There are holes pre-drilled to locate the position of the aluminum angle attachments.
- 3) Use the self-tapping screws to fix 6 pcs of the **upper wing cabane** in place on the fuselage side There are holes pre-drilled in the fuselage to locate the position of where to fix the cabanes. **Pay attention to** the different length of wing cabanes: the 2 pcs of shorter **upper wing cabane** (STM-W11) are for the front, the 2 pcs of medium **cabane** (STM-W10) for the rear and the 2 pcs of longer **cabane** (STM-W09) for the diagonal.
- 4) Use the **metal bolts** (STM-W14) and **self-lock nuts** (STM-W15) to connect the wing cabanes (STM-W09), (STM-W10) and (STM-W11) to the aluminum angle attachment on the bottom side of upper wing center section to fix the complete upper wing on top of the fuselage.
- 5) Finally, connect the upper wing to the lower wing by means of the 4 pcs of wing struts already mounted on the lower wing as shown in **Fig.(11)**

**Fig.(11) Mounting the upper wing onto fuselage**  
 1. Upper wing cabanes (L, M, S) 2. Wing flying wires



**Fig.(12) Flying wire and rudder control pull-pull cable sub-assembly**  
 1. Rudder pull-pull cable 2. Flying wires 3. Clives 4. Threaded connector  
 5. Stainless steel tube (flattened to secure the cable) 6. Nut (to secure the clives)

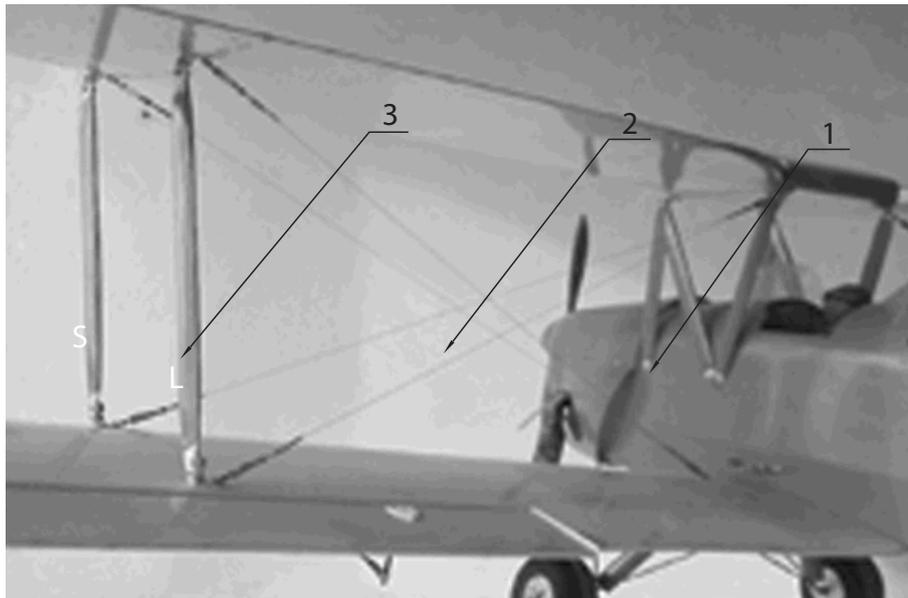


**Step 9. Installing the wing flying wire**

- 1) Before installing the **wing flying wire sub-assembly** (STM-W17), let's have a close look at the parts of the wire sub-assembly and the parts of **elevator pull-pull control cable** (STM-C05). The wire sub-assembly is made up of 4 parts, i.e. the **clives**, **the threaded connector**, **the clamp** and **the cable** as shown in **Fig.(12)**.
- 2) As you can see, there are **aluminium angle attachment** (STM-W12) and **flying wire connector** (STM-W16) already fixed on the upper and lower wing panels. Connect the **clives** end of the wire to the **connector** At all the points as shown in **Fig.(13)**.
- 3) Make adjustment to get the appropriate tension of the wire such that the wing panels will not twist and the wing incidence will not be changed.

**Fig.(13) Installation of the wing flying wires**

1. Wing cabanes 2. Flying wires 3. Wing struts



#### **Final Check before flying**

- 1) Check the **alignment** and **symmetry** of the Kit after final assembly.
- 2) Check the **tension** in the wing flying wires and the pull-pull control wires.
- 3) Check **everything** which should **be securely fixed**.
- 4) Check the **C.G. point**, which is to be balanced at about 6 to 6.5 inches (155 to 165 m.m.) behind the **L.E.** measured at the root chord of **upper wing center section**.
- 5) Make sure that the **servos operate properly** and the **control surfaces move in the correct direction**. The **travel** of each control surface depends upon your own need and flight level. We recommend the following **movement** for your reference:

Elevator 1-1/4" (32 m.m.)  
Rudder: 1-1/2 (38 m.m.)  
Ailerons: 1/2" (13 m.m.)

#### **6) Radio and engine check** as follows:

- \* Collapse the antenna.
- \* Before switch on your transmitter, make sure that the throttle stick is at its lowest position.
- \* Turn on the transmitter first, and then the receiver.
- \* Move the controls to be sure that they are all functioning correctly.
- \* Walk away from your model for at least 100 feet (30 meters) and check all the movements. When doing this, give slow steady signals and have an assistant watch for elevator, rudder, or Aileron control flutter. Do not give fast left/right/left/right signals.
- \* Definitely carry out the same control check with the engine running at idle as well as flat out. This safety check may show up a faulty receiver, servo or wiring/switch problems which only occur with vibration.
- \* Don't forget to extend the antenna of your transmitter to its full length before you start flying.

## Flying The Super Tiger Moth

Using an **O.S. FS-70** 4-stroke engine with a 13 x 6 propeller, the Super Tiger Moth was flid perfectly for the first time, by Mr. Tony Farnan, the President of Model Engines, at the Australia's largest giant plane Fly-In during September 2001. This event was bigger than the Australia Nationals and fliers came from all over Australia. Looking at the model on the ground, these experts could not believe that the Super Tiger Moth be an ARF. Though being particular about every detail, they were satisfied with this scale model for its realistic appearance, good quality and high performance.

You can also choose a 4-sroke .91 or 2-stroke .81 engine. The important thing regardless of what engine is used is to make sure that the model balances about one third back from the leading edge of the top wing. Don't hesitate to add a little weight in the nose area if necessary. It is much better to have a plane with so much wing area slightly nose heavy. The Super Tiger Moth not only looks very realistic in he air but also handles perfectly. The only adjustment is to feed in a little down trim, which perhaps would not be necessary if mounted with a lager capacity engine, such as the **O.S. FS-71** which would achieve a more scalistic performance. You can fly the plane around the field most of the time half power.

It's better to test fly your Super Tiger Moth on a fine day with moderate or little wind though it can handle reasonably strong winds. Nevertheless, with its light weight and large wing area, naturally prefers calm conditions.

On take-off , the throttle should be advanced gradually just like a full size Tiger Moth. You may need a little right rudder on the initial take-off roll. The tail will lift fairly quickly and only a little back stick is needed to allow the plane to climb out.

Aerobatics, such as loops and rolls, are easy with the Super Tiger Moth once it has been trimmed out for straight and level flight. To do loops, merely face the model directly into the wind at a reasonable height. After a gentle dive apply a medium "up" elevator, taking it half off at the top of the loop and applying it again as the plane dives on the final part of the manœuvre. Rolls are commenced again by flying directly into the wind and then applying right or left aileron control. It is important, when the model is half way through its roll and on its back inverted, to give medium "down" elevator to keep the aircraft level. Similarly you can roll the plane upside down and fly inverted provided you apply the required amount of "down" elevator. Directional control whether flying upright or inverted is easy with the use of aileron movement. Spinning is easy with the Super Tiger Moth. Gradually pull throttle stick and elevator stick to stall your plane, and apply rudder to make it enter spinning. To recover from a spin requires the use of rudder against the spin, prior to or simultaneously with the elevator. In this way the model will be pitched into a even steeper attitude but will emerge in a steep dive and pick up speed rapidly. Thus, a normal dive recovery can be carried out. It is important that if spinning is to be done deliberately, it should be at good hight.

Landings can be performed as ]「wheel-less」]「 or as ]「three-pointers」]「 if you allow for ]「 a real slow touchdown speed and keep your model straight and level.

In one word, the Super Tiger Moth is designed to fly **like a trainer** for the beginners as well as a **pattern model** for the experienced pilots.

## Good luck and happy flying!!



<http://www.greenmodel.com>  
Design and Manufacture by Green R/C Model Airplanes Co.,Ltd.

# Tiger Moth 1.20 Size ARF

## Instruction Manual Addendum

We are constantly updating and improving our kits. Unfortunately, the Instruction Manual that is included with the new 120 size TIGER MOTH kits doesn't include the latest changes.



Wing Span:  
1980 mm  
77.95 in.



Overall Length:  
1670 mm  
65.75 in.



Wing area:  
1841.4 sq. in.  
118.79 sq. dm.



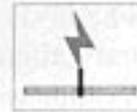
Take-off weight:  
11.02 lbs.  
5 kgs.



Engine:  
.90-120(4C)



Radio required:  
4-ch. with 5 servos



Factory Assembled  
From Laser Cut  
Parts

## **PAGE 2**

- A) Two (2) short cabane                      Four (4) long cabane
- B) Insert two (2) short cabane to front of center section cabane mounts.  
    Insert four (4) long cabane to rear section cabane mounts.
- C) Slip Upper Wing Front Joiner Tube (12 11/16") to front of center section and Upper Wing Rear Joiner (10 1/4") to rear section.
- D) Slip right and left wing panels into center section.

## **PAGE 3**

- A) Fourteen (14) wing cabane and wind struts metal bolts (M3 X 15) Fourteen (14) nylon insert lock nuts (M3)
- B) Twelve (12) flying wire connectors                      Twelve (12) sheet metal screws
- C) Mount flying wire connector to two (2) rear top cabane on center section bolts and nuts.
- D) Mount four (4) flying wire connectors on upper wing near wing strut mount at fuselage side. Pre-drill holes for screws.

## **PAGE 4**

- A) Two (2) short front wing struts.                      Two (2) long rear wing struts.
- B) Insert four (4) wing struts to wing strut mounts on upper wing, two (2) short at front, two (2) long at rear.
- C) Bolts and nuts.
- D) Put whole wing onto fuselage.

## **PAGE 5**

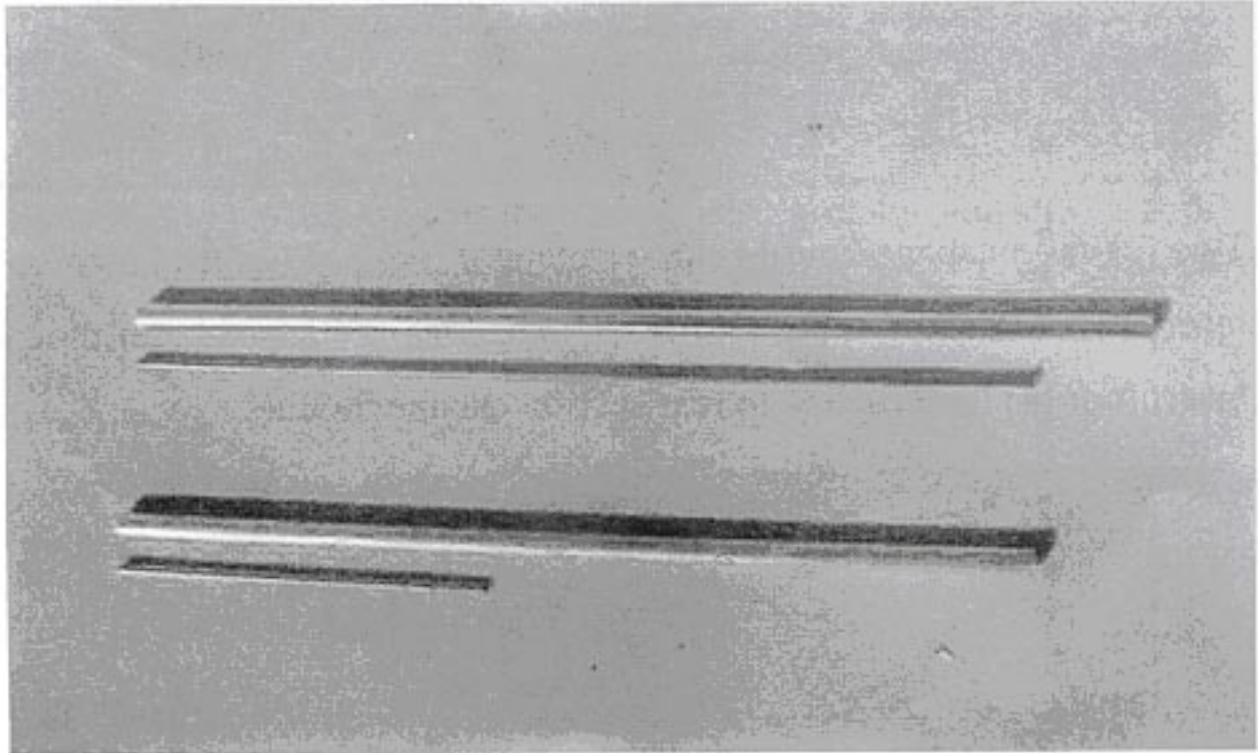
- A) Mount cabane with sheet metal screws on each side of fuselage. Pre-drill holes for screws.
- B) Insert upper wing struts and bolt to lower wing strut mounts. Mount four (4) flying wire connectors on lower wing.
- C) Mount two (2) flying wire connectors to lower wing near fuselage side. Pre-drill hole for screw.
- D) Four (4) set flying wire sub-assembly.

## **PAGE 6**

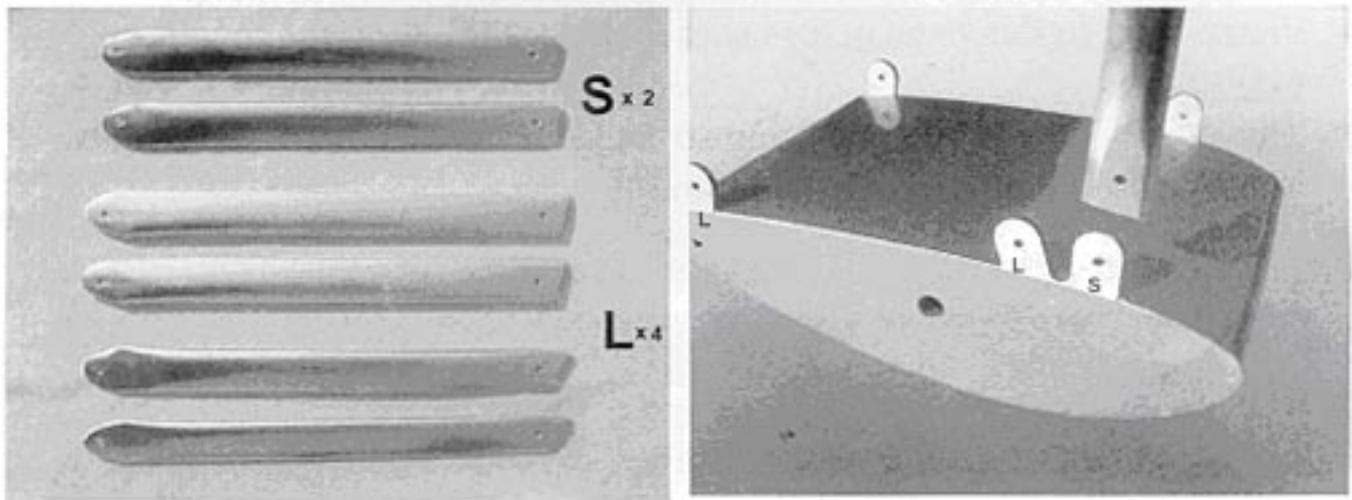
- A) Connect two (2) clevis ends of flying wires to upper and lower wing struts side flying wire connectors, one (1) on front and one (1) on rear.  
    Connect one (1) clevis end to lower wing connector near fuselage and upper center section rear cabane flying wire connectors.  
    Do same way to other wing panel.
- B) Crimp tubes at end of flying wire have been left loose so you can adjust length of cables. You must crimp these tubes with a crimping tool after you finishing adjusting the flying wire. Failure to do this could cause plane to crash. It is a good idea to check that all crimp tubes are tight then put a drop or two of thin CA on the tubes to be doubly sure they won't slip.

## Page 1

- ∞ Erase Step 7 in Page 8., Step 9. In page 9
- ∞ Please refer to this page before start Step 8. Mounting the lower wing on to fuselage.
- ∞ The aluminum cabanes and wing struts have a protective film covering. Remove this film before installation.

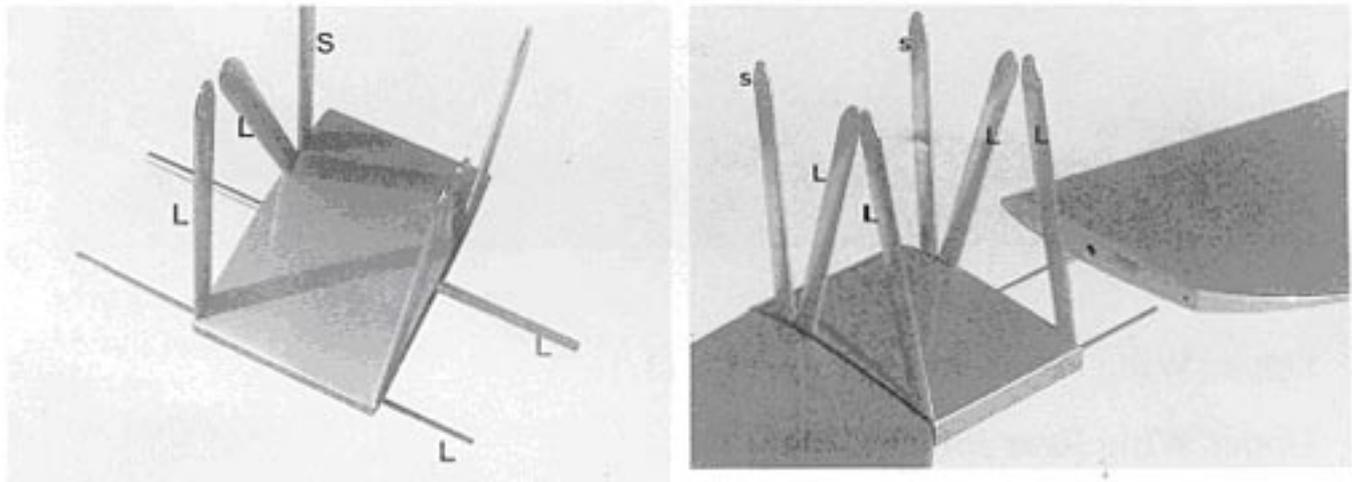


- ∞ Upper Wing Front Joiner Tube (12-11/16")
- ∞ Upper Wing Rear Joiner (10 1/4")
- ∞ Lower Wing Front Joiner Tube (12 1/4")
- ∞ Lower Wind Rear Joiner (5 1/8")



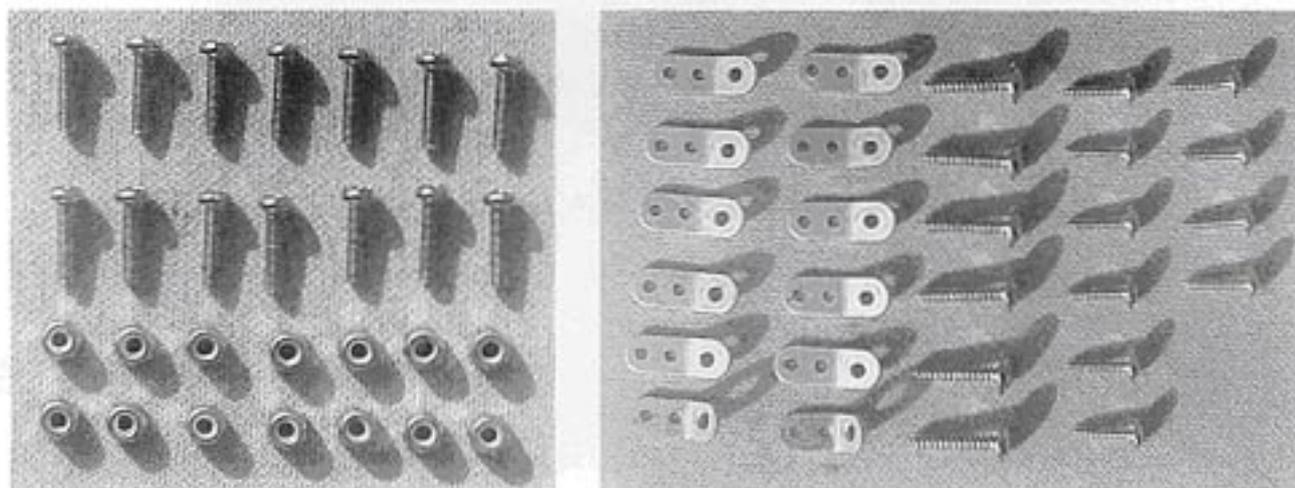
(A) Two (2) short cabane Four (4) long cabane.

(B) Insert two (2) short cabane to front of center section cabane mounts.  
Insert four (4) long cabane to rear section cabane mounts.

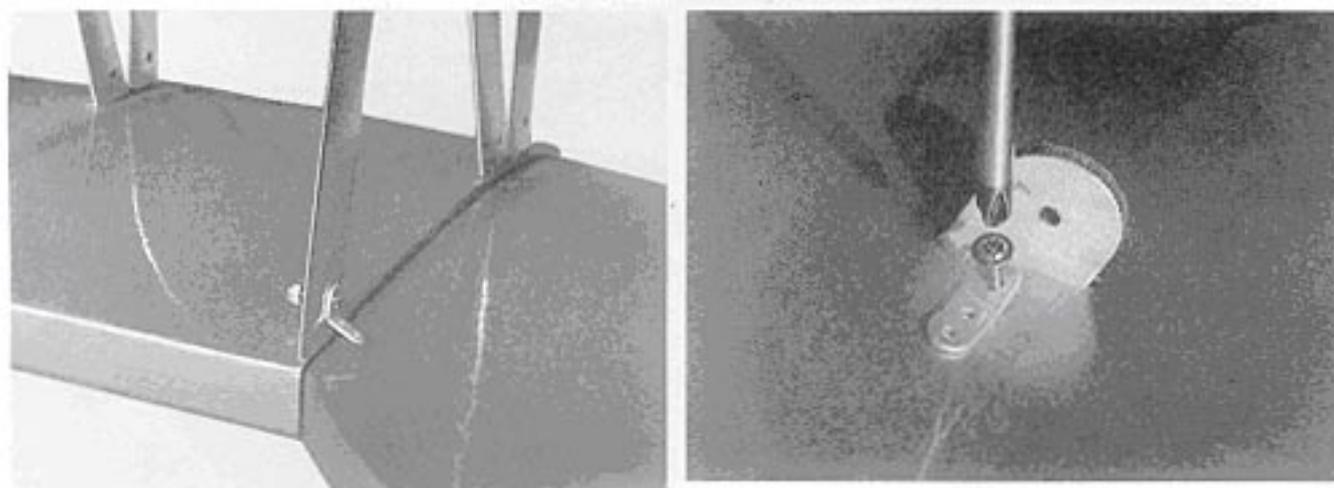


(C) Slip Upper Wing Front Joiner Tube ( $12 \frac{11}{16}$ " ) to front of center section and Upper Wing Rear Joiner ( $10 \frac{1}{4}$ " ) to rear section.

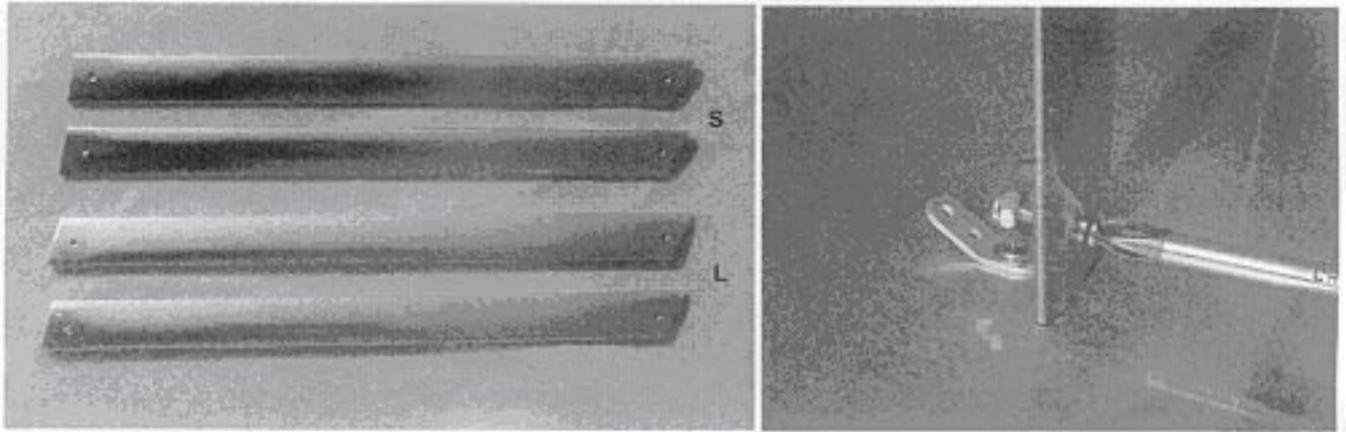
(D) Slip right and left wing panels into center section.



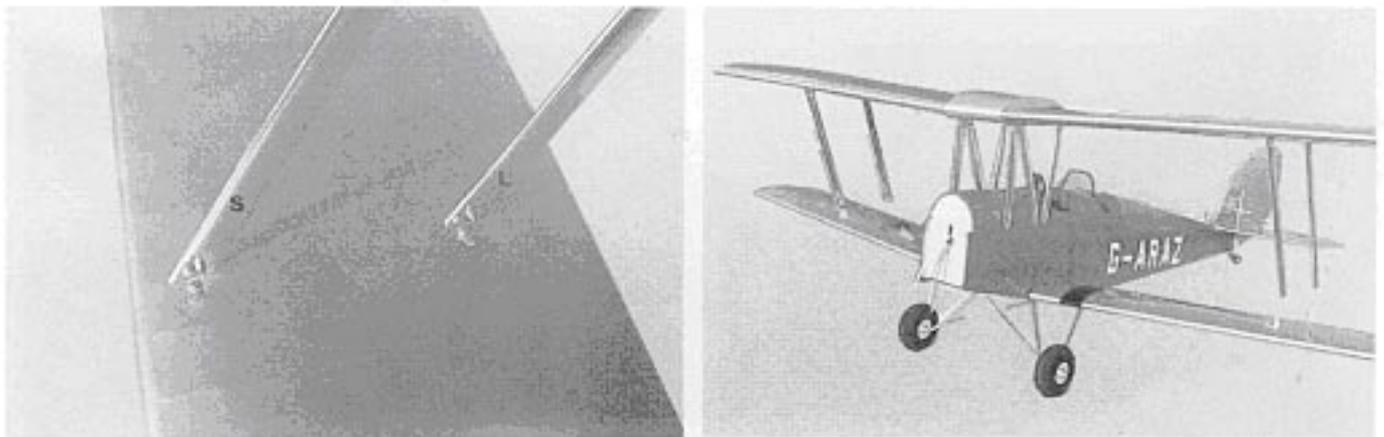
(A). Fourteen (14) wing cabane and wind struts metal bolts (M3 X 15), Fourteen (14) nylon insert lock nuts (M3). (B). Twelve (12) flying wire connectors Twelve (12) sheet metal screws.



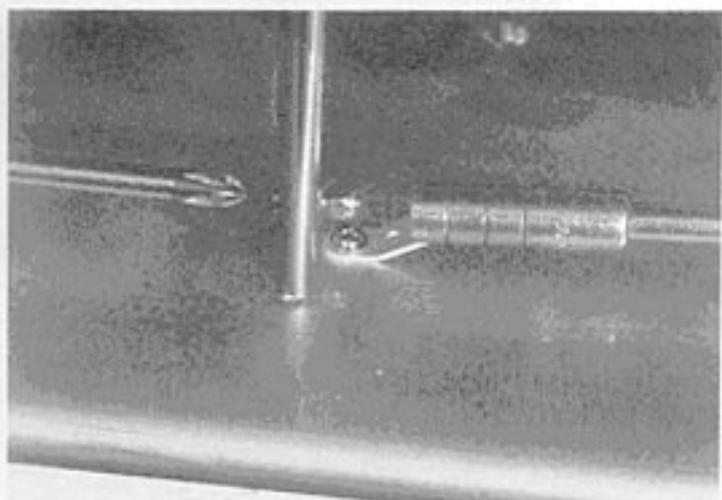
(C) Mount flying wire connector to two (2) rear top cabane on center section bolts and nuts.  
(D) Mount four (4) flying wire connectors on upper wing near wing strut mount at fuselage side. Pre-drill holes for screws.



- (A) Two (2) short front wing struts. Two (2) long rear wing struts.
- (B) (B) Insert four (4) wing struts to wing strut mounts on upper wing, two (2) short at front, two (2) long at rear.

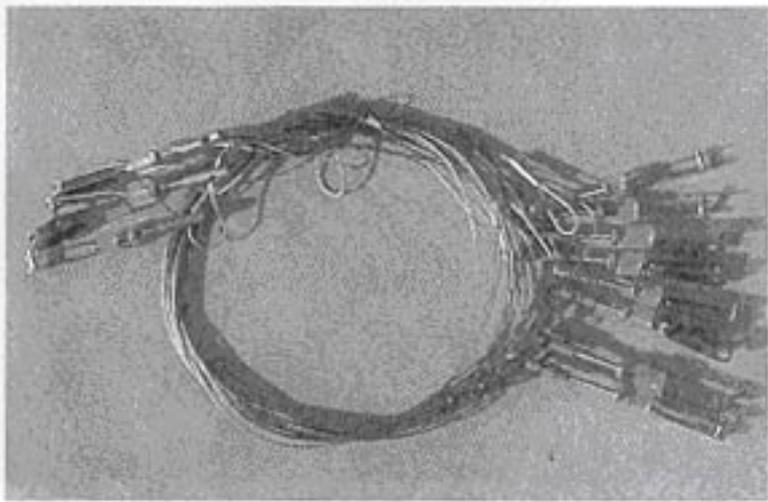
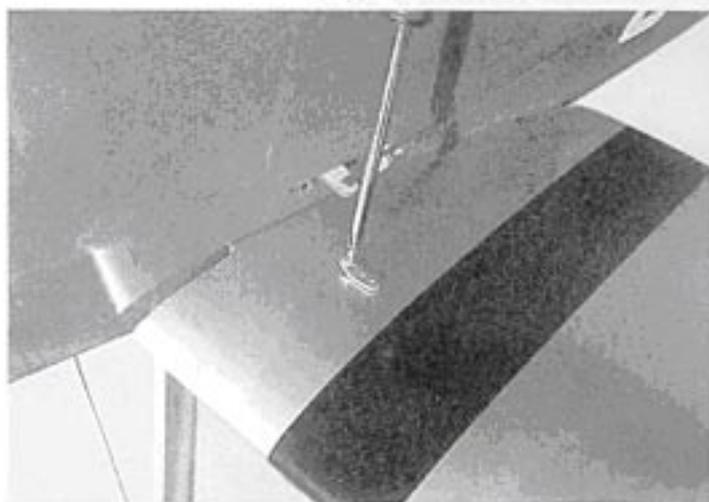


Bolts and nuts. Put whole wing onto fuselage.



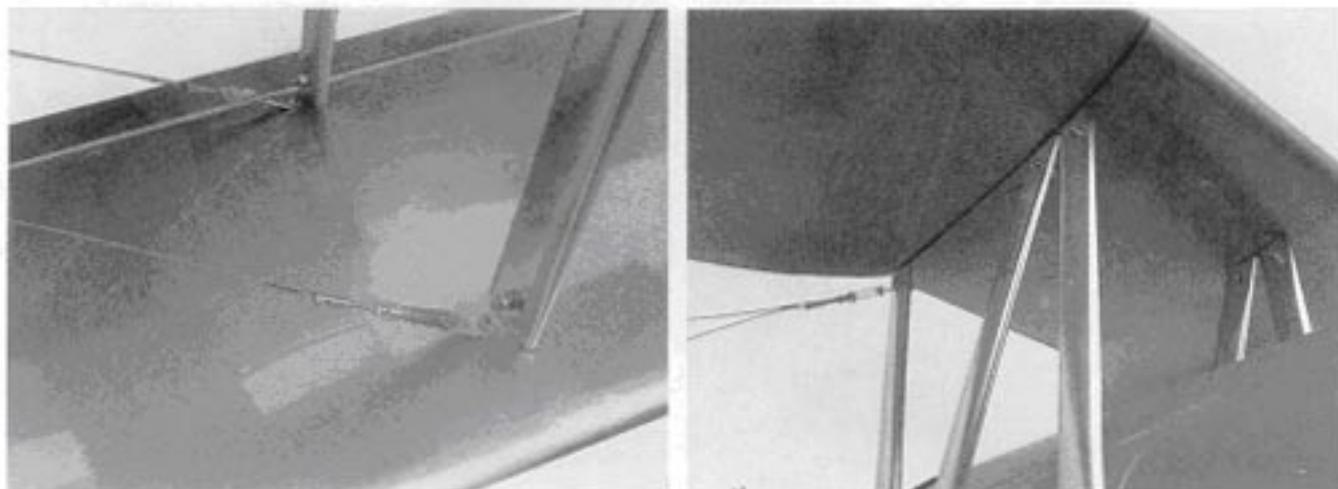
(A) Mount cabane with sheet metal screws on each side of fuselage. Pre-drill holes for screws.

(B) Insert upper wing struts and bolt to lower wing strut mounts. Mount four (4) flying wire connectors on lower wing.



(C) Mount two (2) flying wire connectors to lower wing near fuselage side. Pre-drill hole for screw.

(D) Four (4) set flying wire sub-assembly.



Connect two (2) clevis ends of flying wires to upper and lower wing struts side flying wire connectors, one (1) on front and one (1) on rear. Connect one (1) clevis end to lower wing connector near fuselage and upper center section rear cabane flying wire connectors. Do same way to other wing panel.



Crimp tubes at end of flying wire have been left loose so you can adjust length of cables. You must crimp these tubes with a crimping tool after you finishing adjusting the flying wire. Failure to do this could cause plane to crash. It is a good idea to check that all crimp tubes are tight then put a drop or two of thin CA on the tubes to be doubly sure they won't slip.