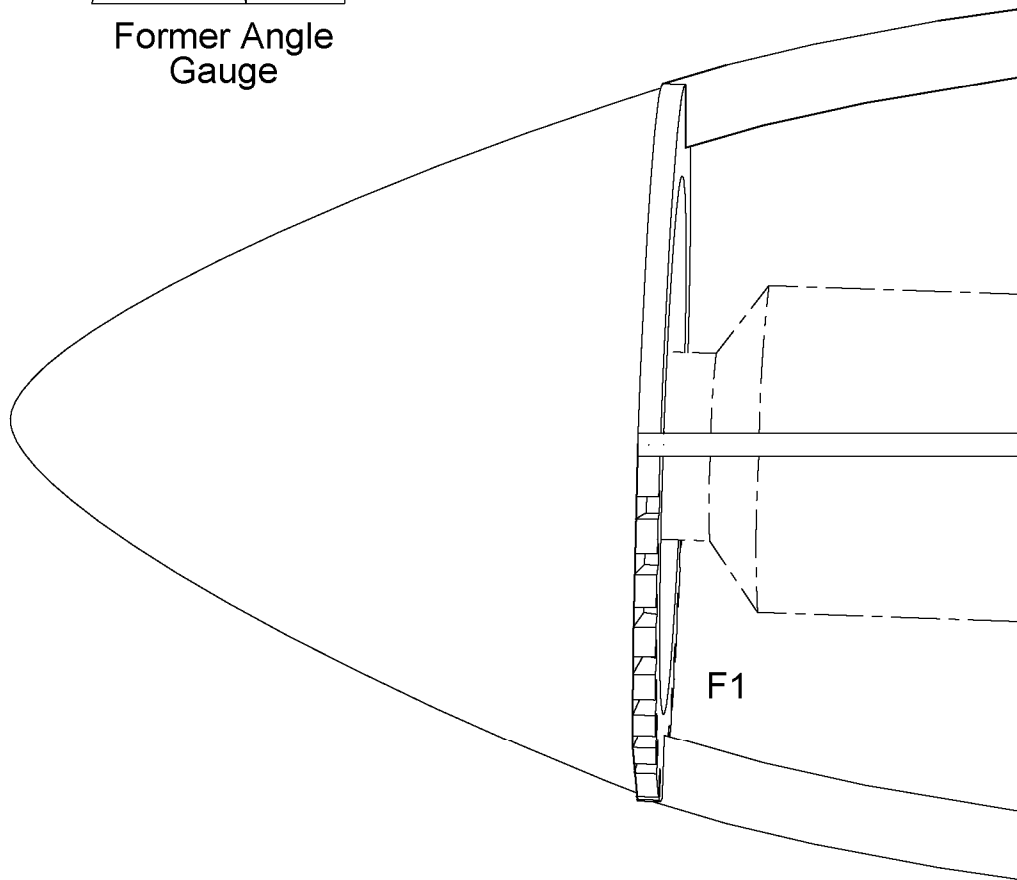


Former Angle Gauge

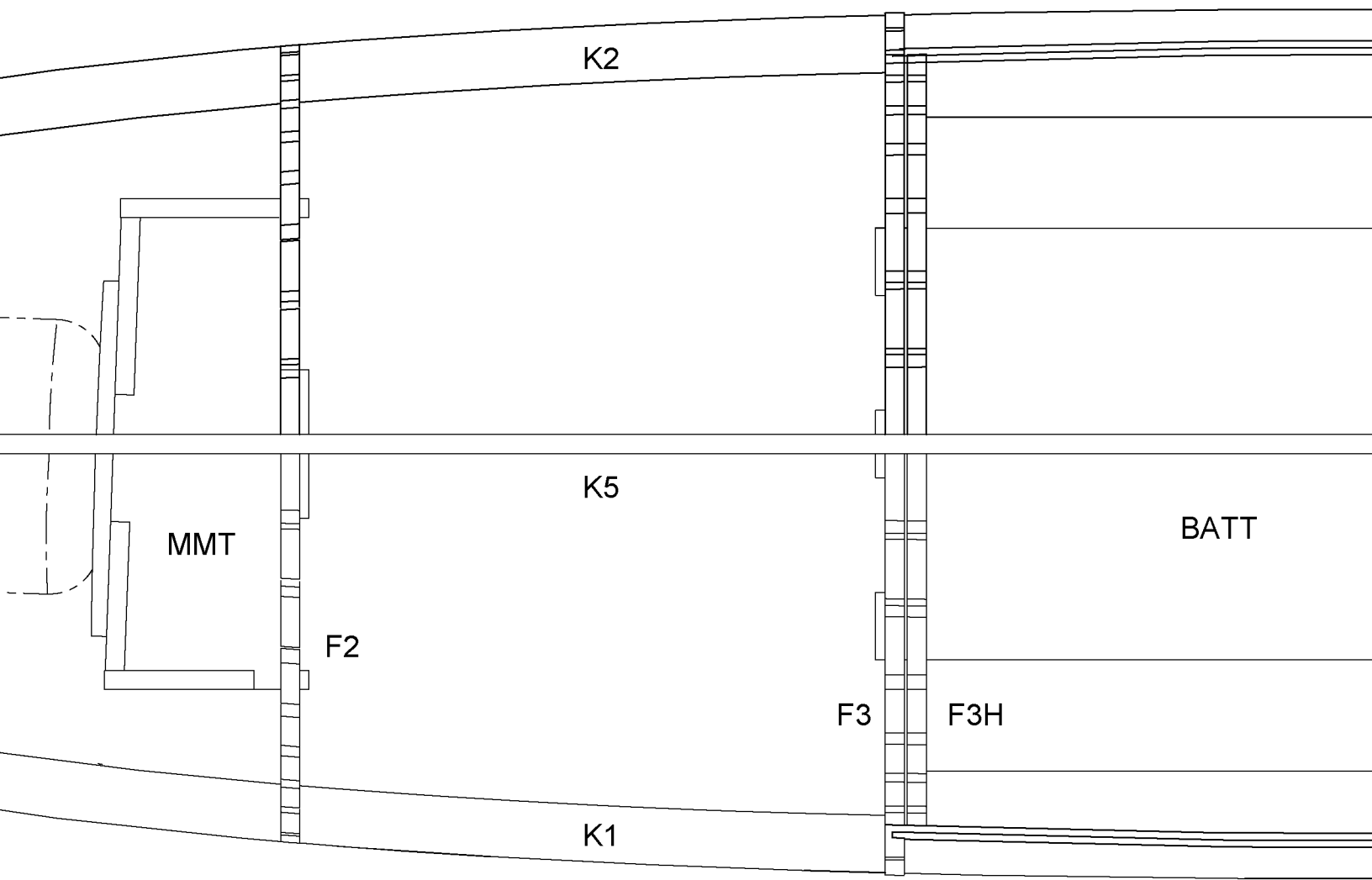


PROTOTYPE SPECIFICATIONS

Wingspan	60"
Length	50.4"
Weight	79oz
Wing Area	501 sq in

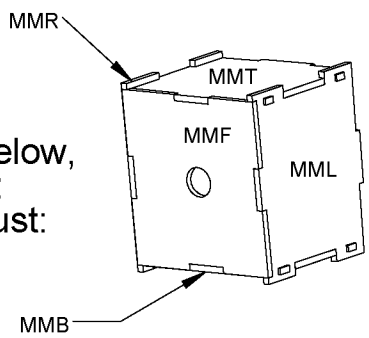
MOTOR MOUNT

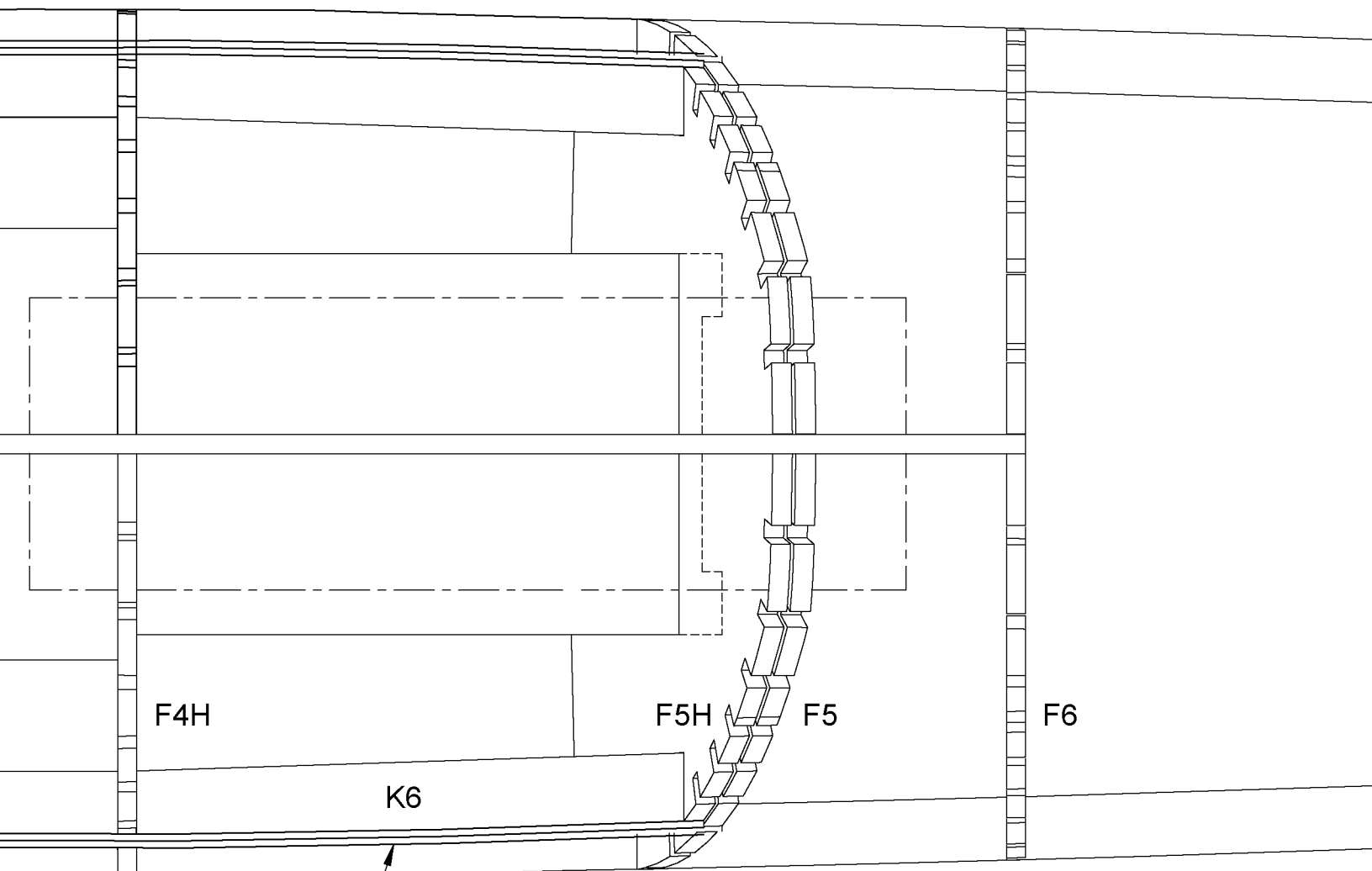
When assembled
the motor mount
degrees of right



NT:

ed as shown below,
nt will provide 2
t and down thrust:





F4H

F5H

F5

F6

K6

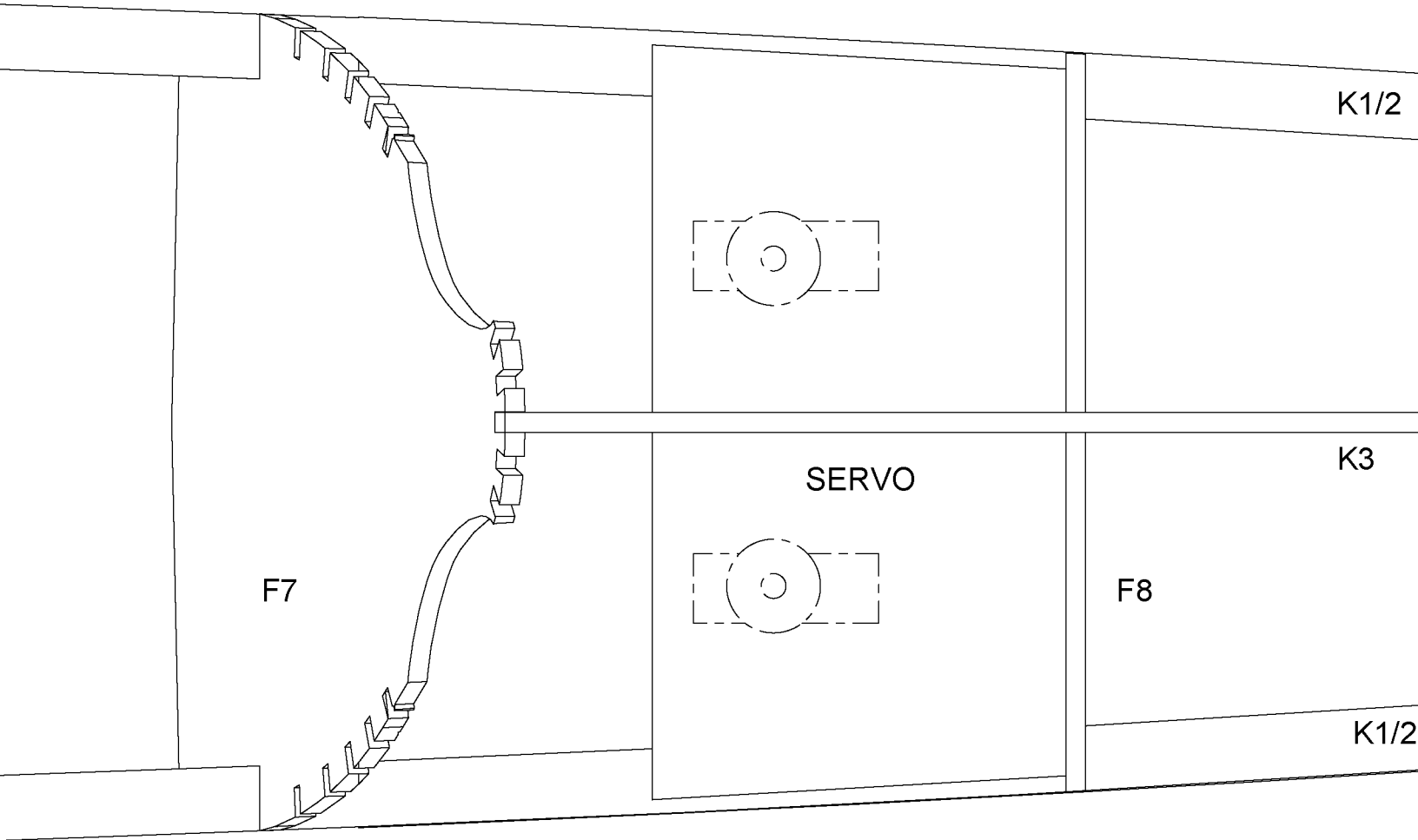
K4

Vacuum formed Canopy available from Park Flyer Plastics

Separate hatch by cutting thru stringers here

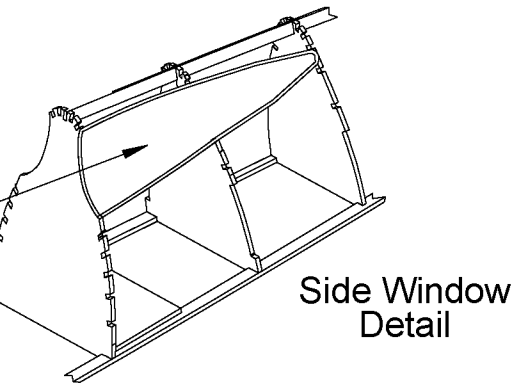
K5

Side window inner wall from 1/32" balsa sheet



ole

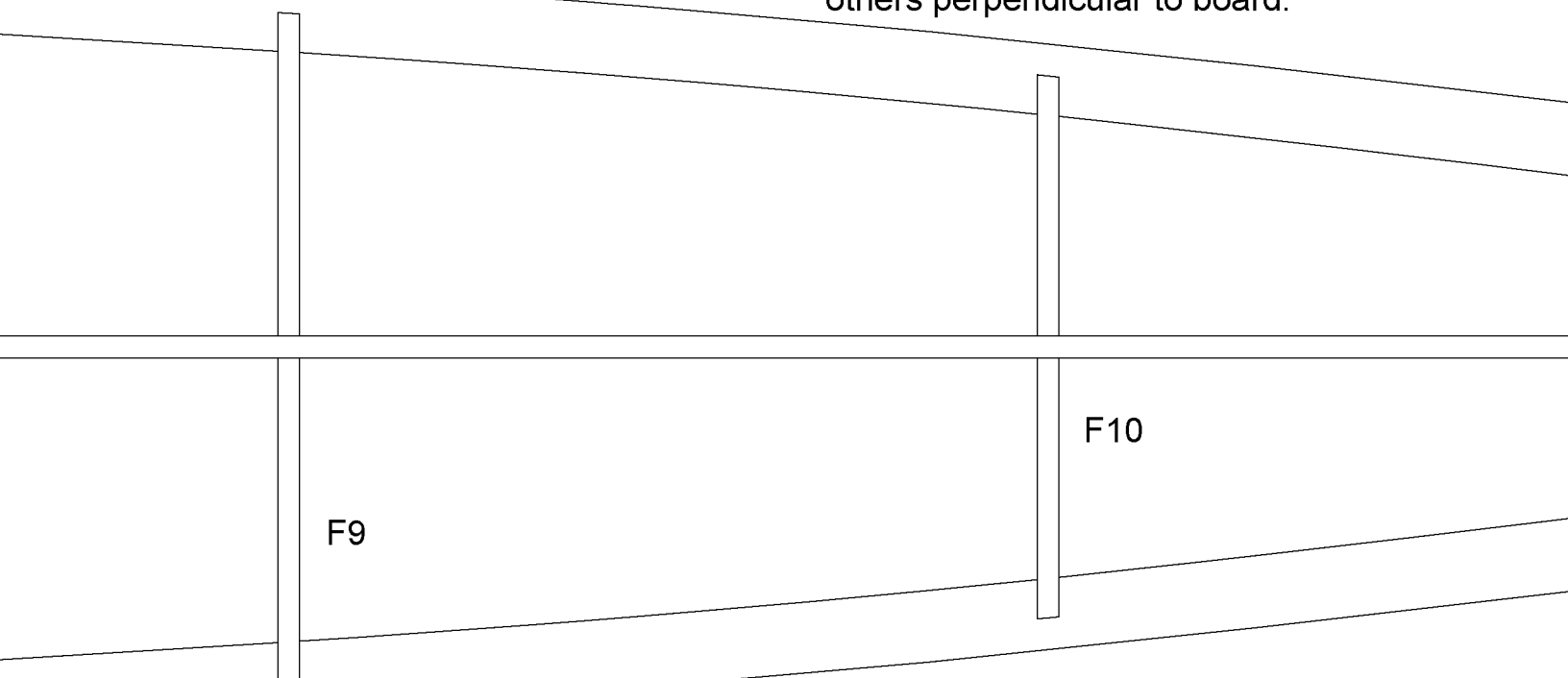




FUSELAGE, UPPER--ASSEMBLY ORDER:

Build the top half of the fuse over the plan.

1. Preassemble Formers F3T, F3B, F4B, F5T thru F9T.
2. Keels K1 and K2--glue ends together and pin to plan.
 1. K1 and K2 use the same back end but are not interchangeable--they set former F1 to the motor right thrust angle.
3. All "T" Former parts F2T thru F12T.
 1. Attach Battery Tray BATT to F3T, then slide F4T and F5T onto BATT as these formers are installed.
 2. Use Former Angle Gauge for F5T and F7T--all others perpendicular to board.

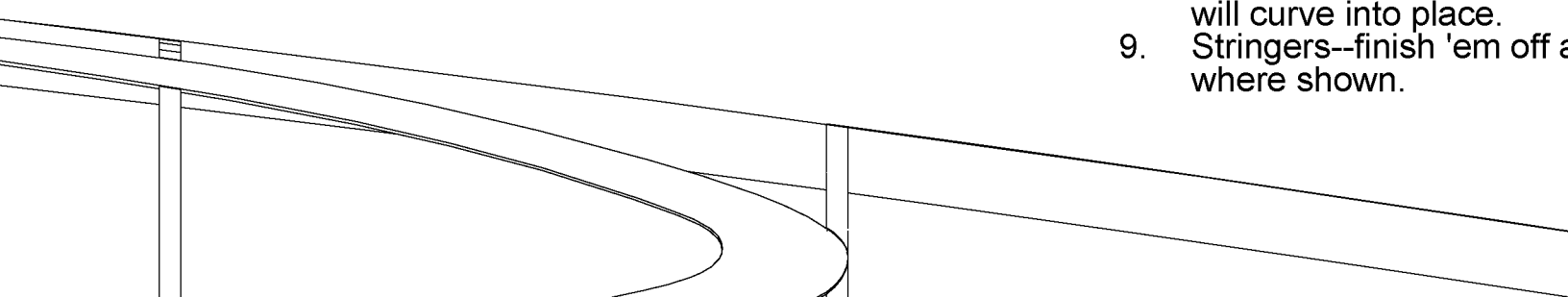


FUSELAGE, LOWER--ASSEMBLY ORDER:

Build the lower half of the fuse free from the plan--side view drawing shown for reference.

1. Attach F1 to front Keels.
2. Wing pin WP--reinforce pin hole in F4B.

3. Wing Bolt Boss--assemble to Former F8B (see detail).
4. Tailwheel Plate--assemble (right).
5. All "B" Former parts F2 thru F8B.
 1. Glue all parallel to the fuselage.
6. Motor Mount assembly (see detail).
7. Keels K7 and K8.
8. Wing Saddles WS--wet cement will curve into place.
9. Stringers--finish 'em off as shown.

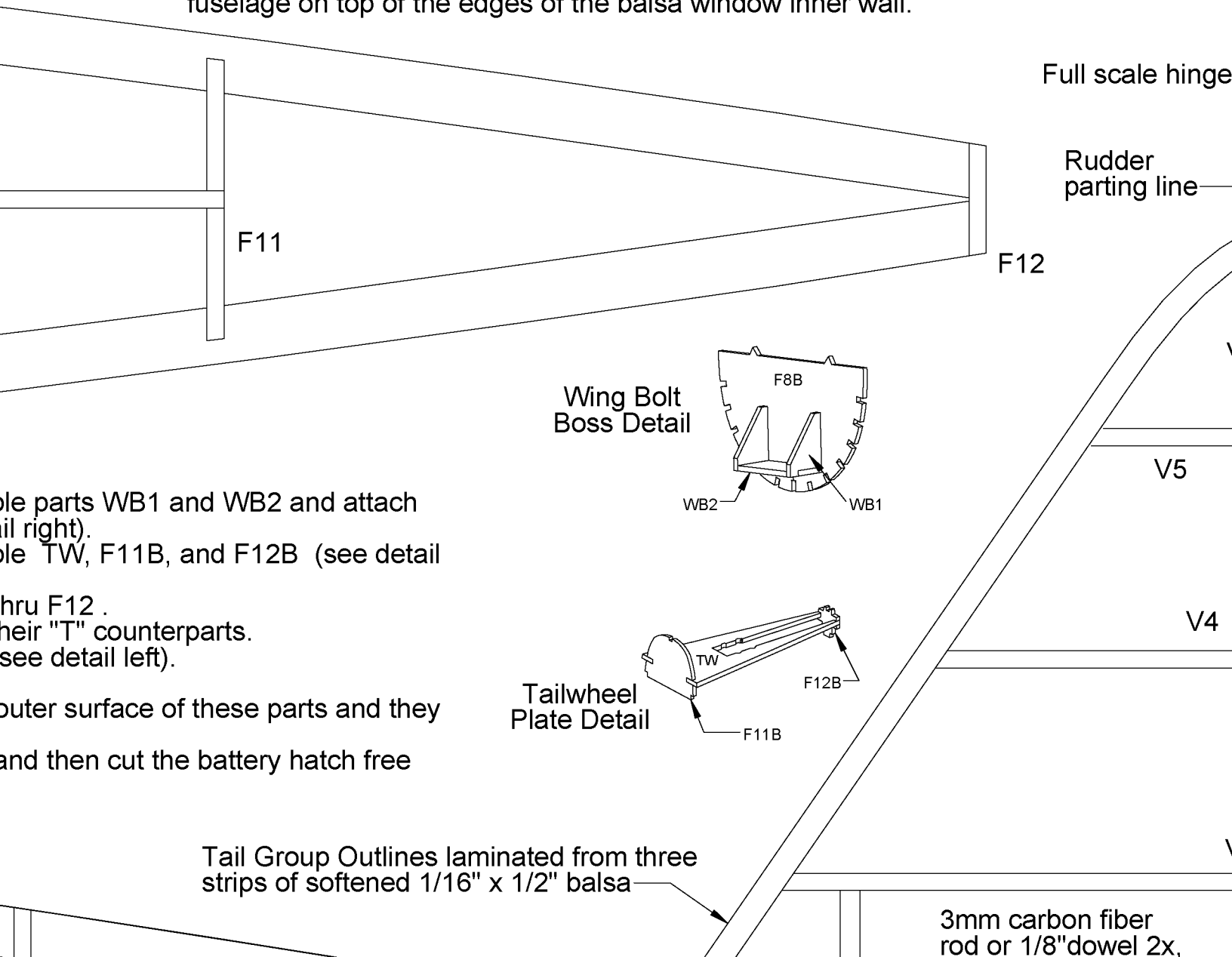


4. Servo tray SERVO.
5. Keel K3--tie F7T thru F11T together.
6. Lower Hatch Rails K4--glue to F3T, F4T, and F5T.
7. Hatch Formers F3H, F4H, and F5H--set into place--do not glue.
8. Keel K5--tie F2T thru F6T including the H Formers together.
9. Upper Hatch Rails K6--slide into place and glue to F3H, F4H, and F5H.
10. Horizontal Stabilizer Supports HS.
11. Stringers--all fuselage stringers are 1/8" x 3/16" balsa.
 1. add enough to make the assembly rigid when unpinned from the board.
12. Side Windows--use outline of window frame as template and cut side window inner walls from soft 1/16" balsa.
 1. Wet the balsa so that it curves into the space between F7T, F8T, and F9T (see detail to left).
 2. Glue into place.
 3. Once cured, trim and sand so that side window sits flush to the fuselage on top of the edges of the balsa window inner wall.

TAIL GROUP

Sheeting the
as open frame

1. Begin t
2. x 1/2" b
3. Pin the
4. Install t
4. Separ
5. Stabiliz
5. Sheet t
6. board.
6. Unpin a
7. Sheet t
8. Sand to



...le parts WB1 and WB2 and attach
...il right).
...le TW, F11B, and F12B (see detail
...hru F12 .
...heir "T" counterparts.
...see detail left).
...outer surface of these parts and they
...and then cut the battery hatch free

Tail Group Outlines laminated from three strips of softened 1/16" x 1/2" balsa

3mm carbon fiber rod or 1/8" dowel 2x,

TAIL GROUP ASSEMBLY

The fin and horizontal stabilizer and covering the rudder and elevators frameworks provides durability with a scale appearance.

Tail group assembly by laminating outlines from three strips of 1/16" balsa around a form.

Cure the outlines into place over the plan.

Assemble the tail framework parts in numerical order.

Attach the Rudder from the Fin and the Elevators from the Horizontal Stabilizer by cutting through the outlines where shown.

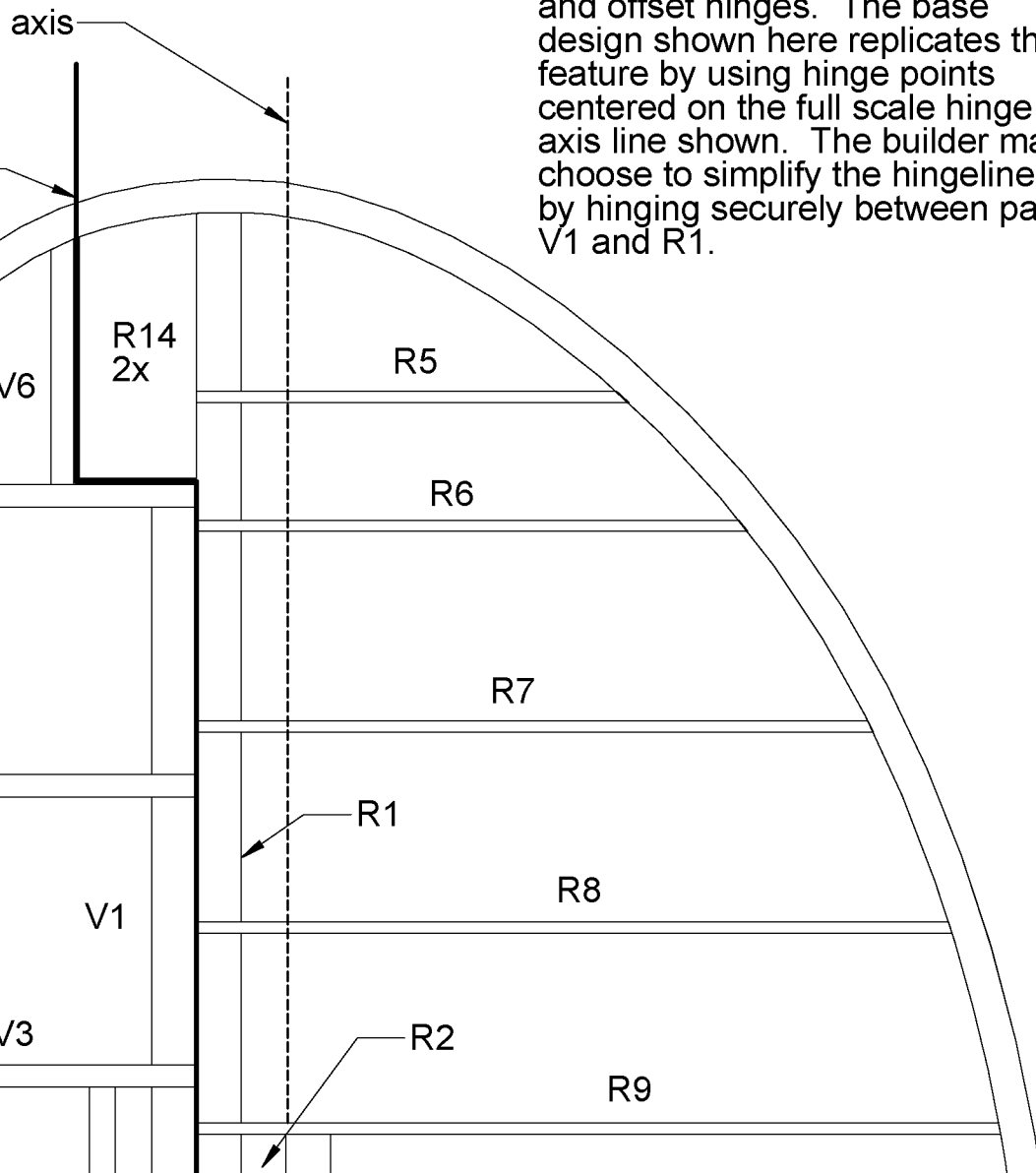
Attach the upper Fin and Stabilizer with 1/16" balsa while pinned flat to the

form and remove the support feet from the bottom of the tail group parts.

Attach the lower Fin and the Stabilizer.

Shape the rudder and install hinges.

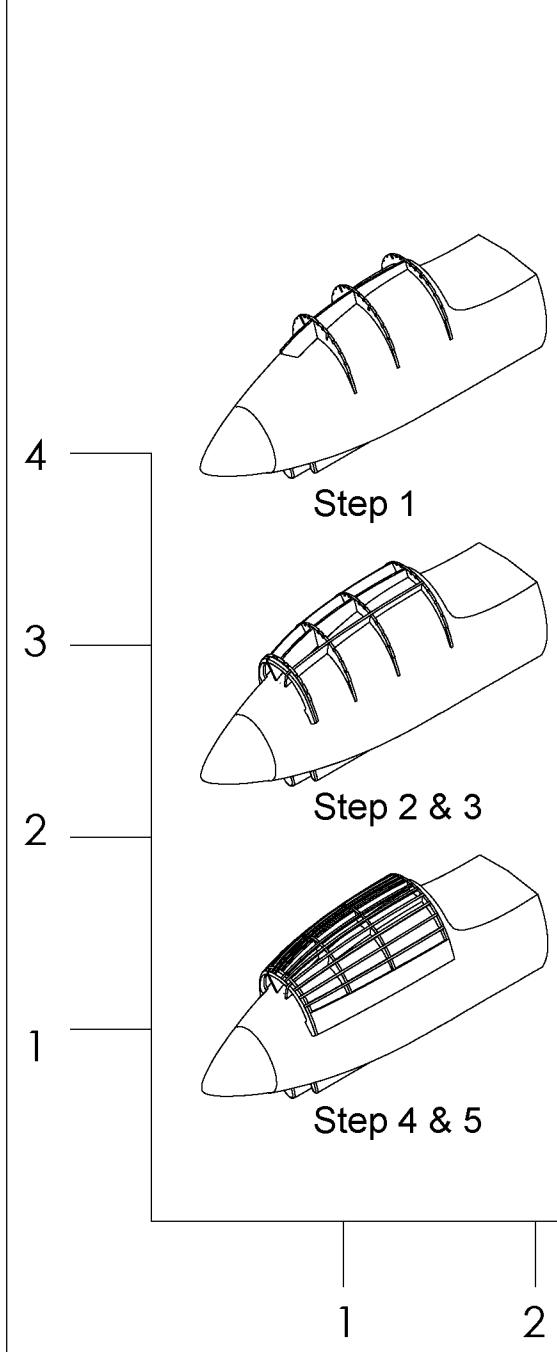
Note: The leading edge of the P-40 rudder had a complex shape and offset hinges. The base design shown here replicates this feature by using hinge points centered on the full scale hinge axis line shown. The builder may choose to simplify the hingeline by hinging securely between parts V1 and R1.



Wing Area	391 sq in
Power	FMS 4258-650kV
Propellor	14x8 3-blade
Battery	4S 3800mAh

SPINNER AND

STL files for a
exhaust stacks
are available o

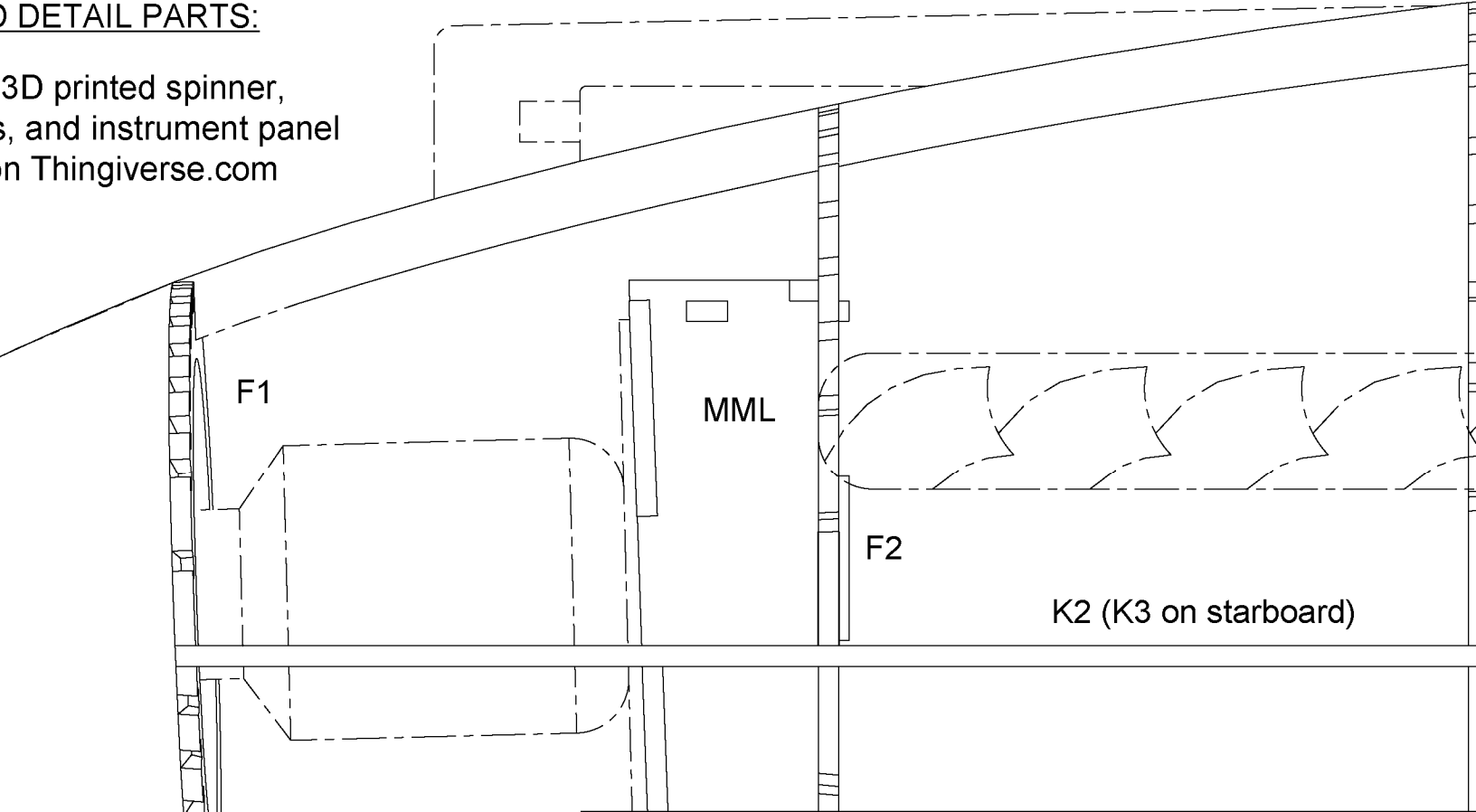


CHIN SCOOP--ASSEMBLY OF

1. Dry fit center Scoop Rail C2 thru C4--this works well if stringers are in place
 1. Fit the assembly close to the fuselage and pin it in place
 2. Once aligned, glue the rail to the fuselage
2. Scoop Dividers C5--not shown
3. Scoop Lip parts C6 and C7
4. Side Panels C8--bevel up to fit fuselage
5. Stringers
6. Unpin finished assembly and shape opening to shape
7. Cover fuselage, attach scoop

DETAIL PARTS:

3D printed spinner,
s, and instrument panel
on Thingiverse.com



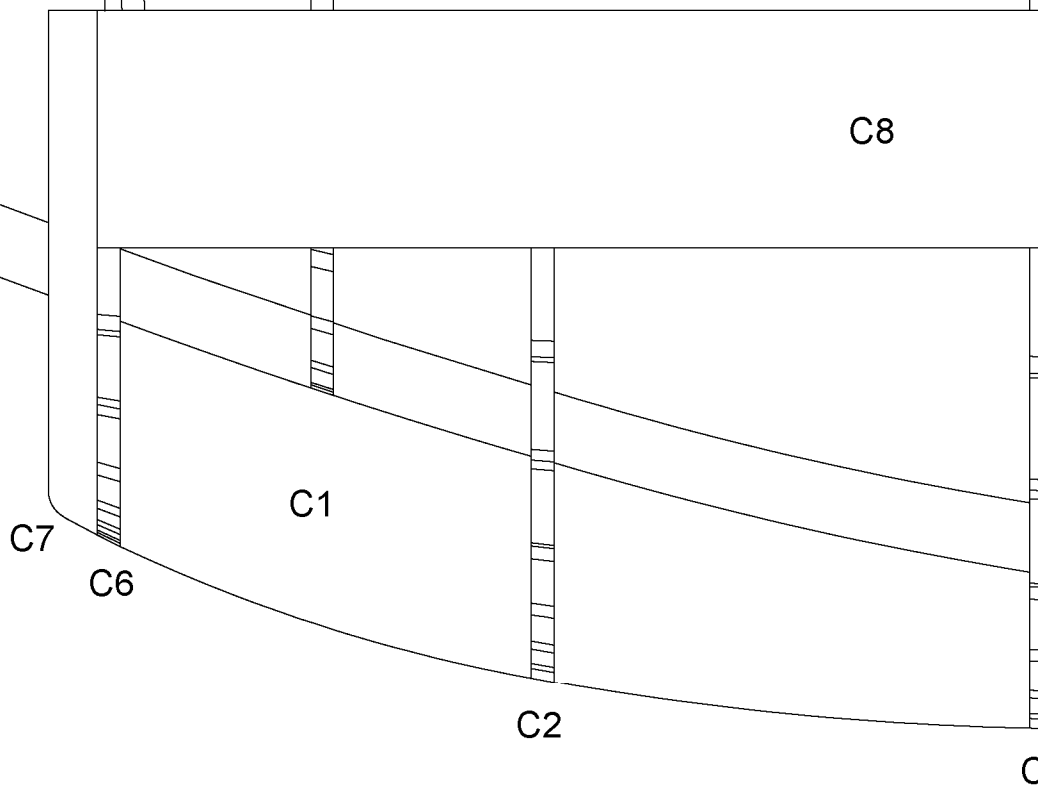
ORDER:

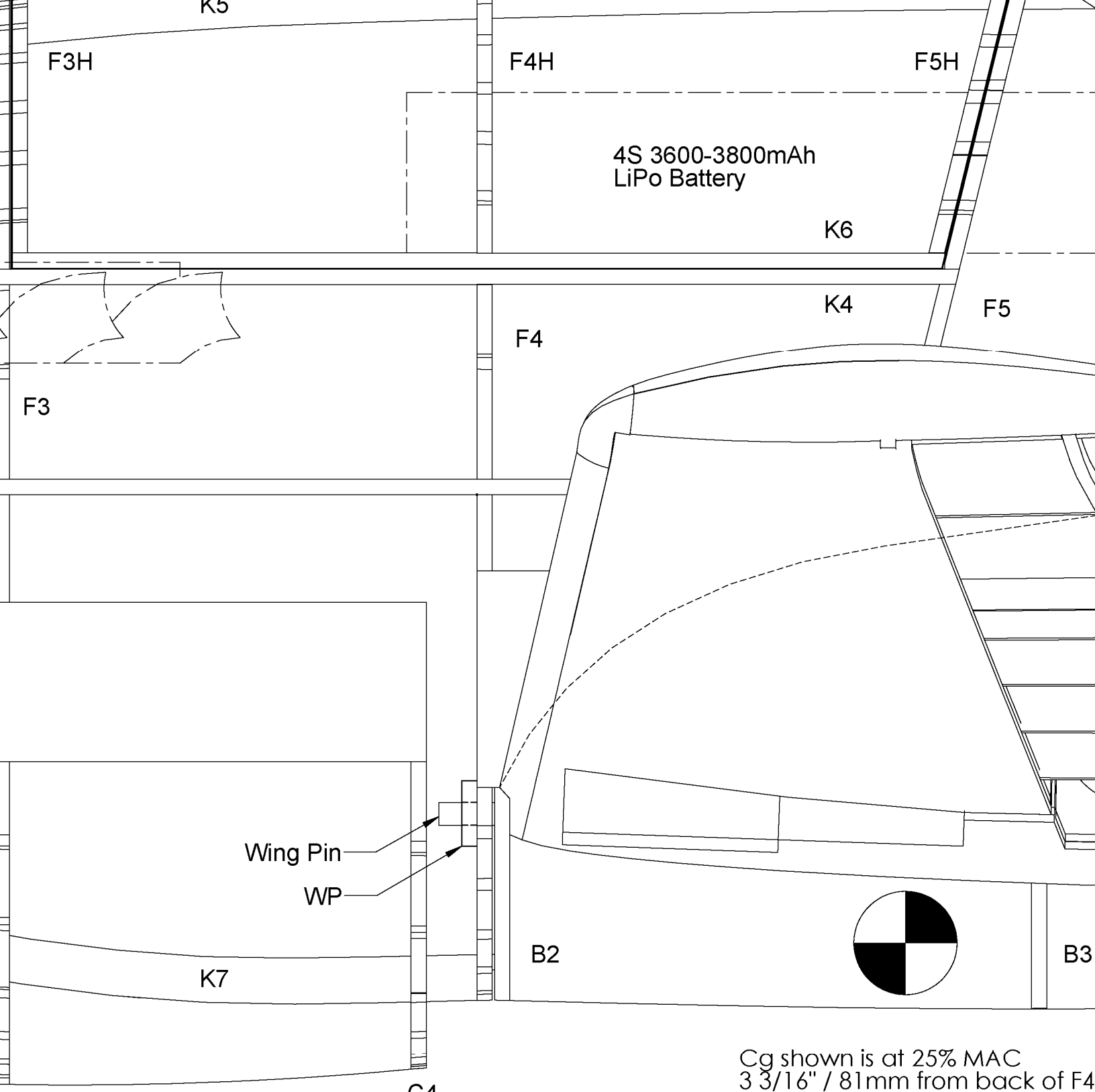
C1 and Scoop Formers
if the fuselage

ely to the underside of
nto place
e scoop parts together
own on plan for clarity
7--preassemble, install
er edges to plend into

and sand scoop

oop, and then cover





Cg shown is at 25% MAC
 3 3/16" / 81mm from back of F4

Use this outline to
make side windows
from PET sheet

F6

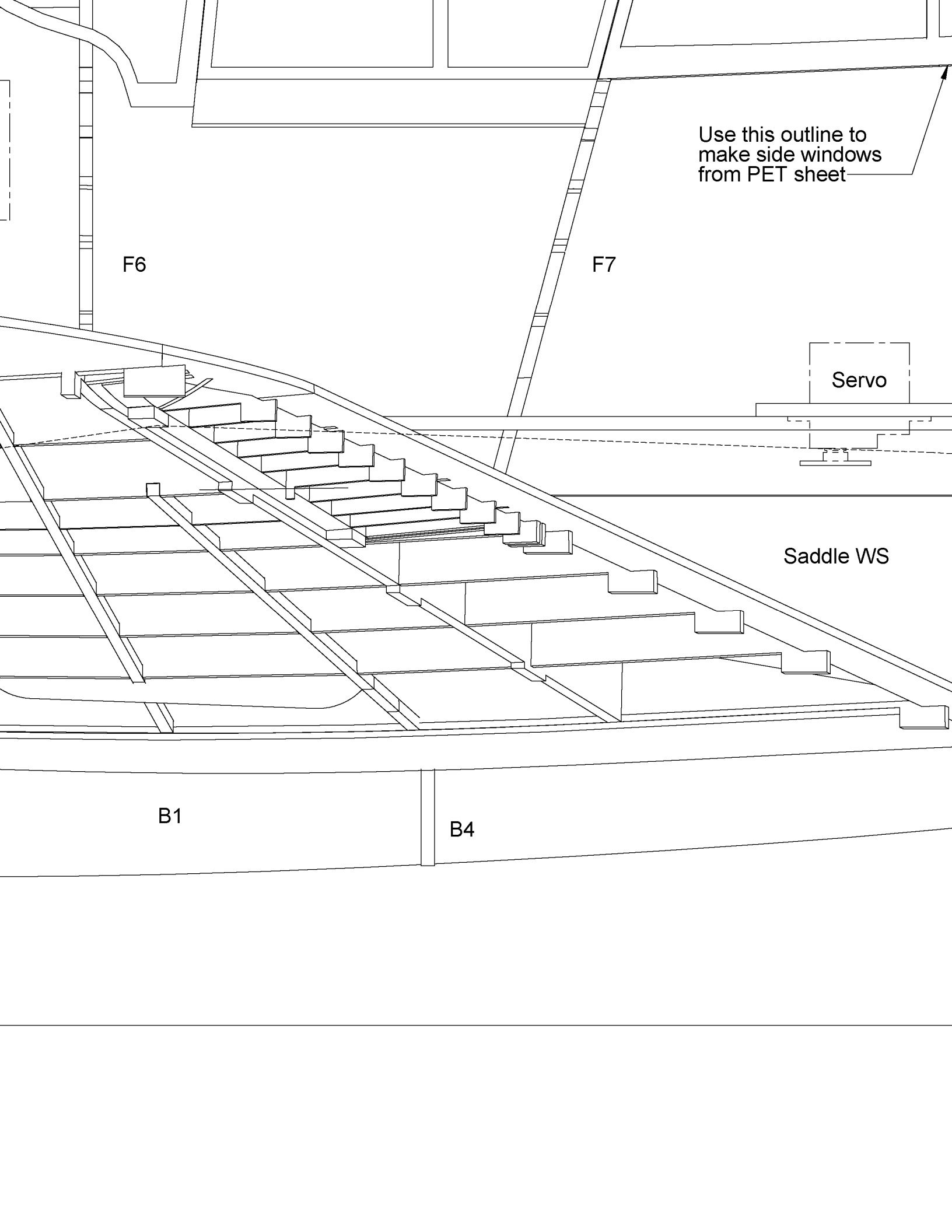
F7

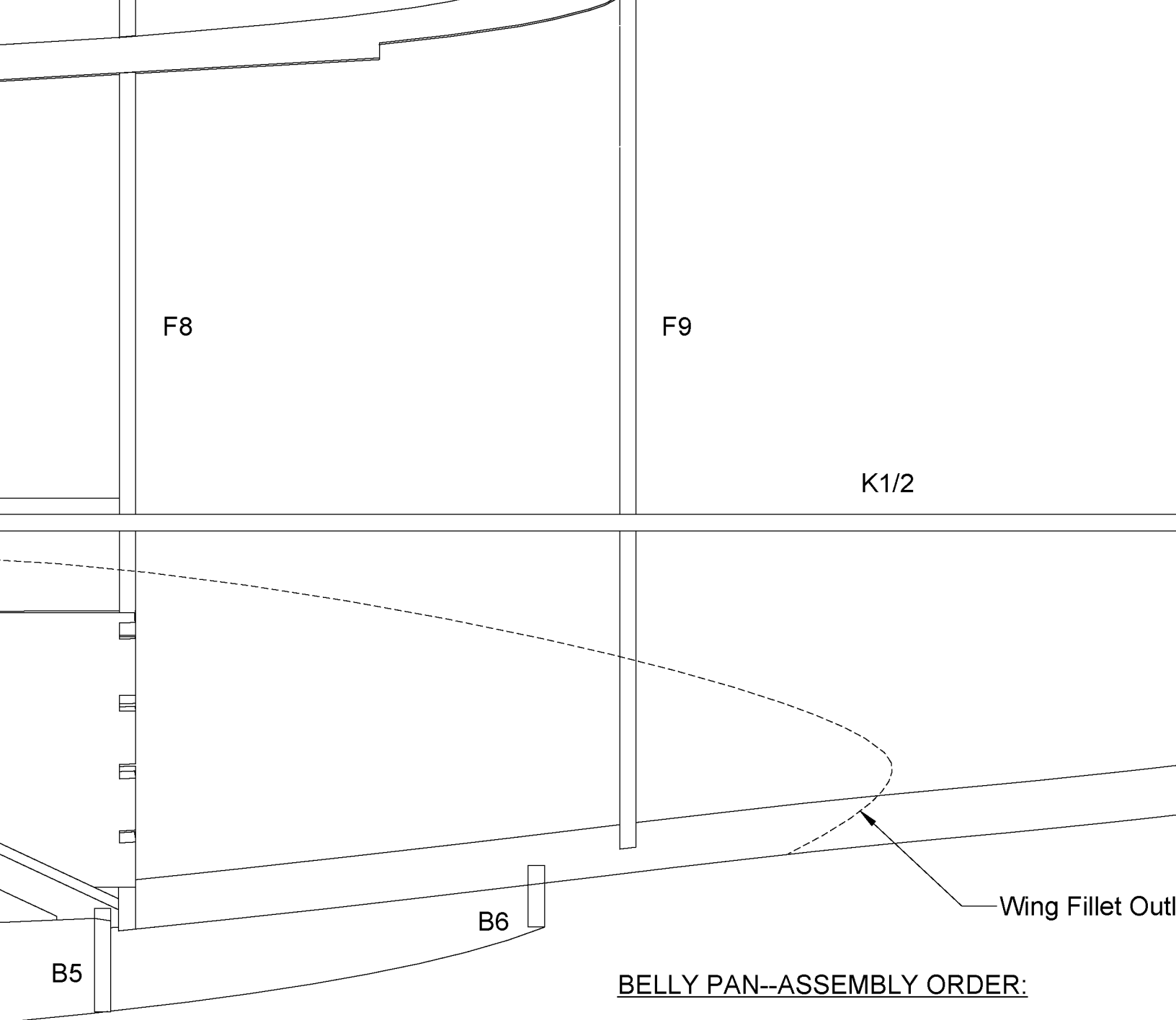
Servo

Saddle WS

B1

B4

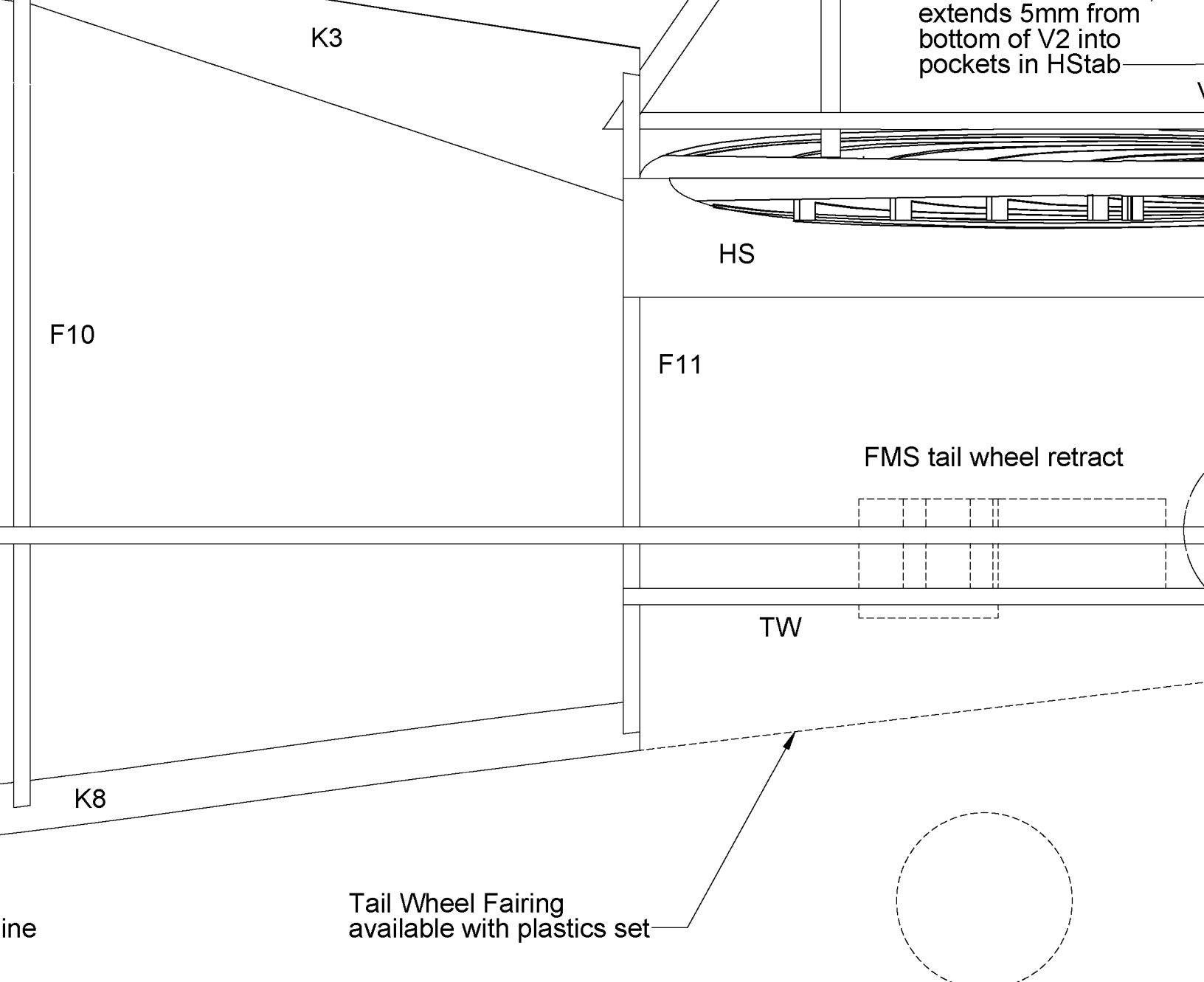




BELLY PAN--ASSEMBLY ORDER:

Build the pan directly over the wing/fuselage ass

1. Glue front Former B2 perpendicular to keel
 1. Pin this assembly to back of Fuse Form (detail).
2. Formers B3 thru B6--perpendicular to B1 and
3. Plank from B2 thru B6 with 1/16" balsa.
4. Belly Pan can be made removable with a pi

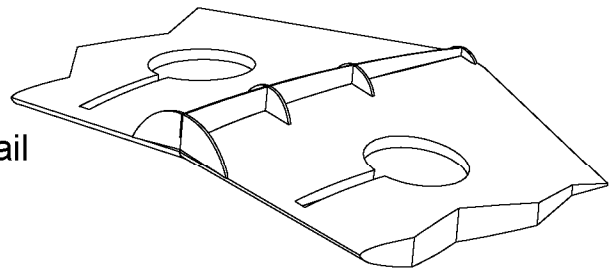


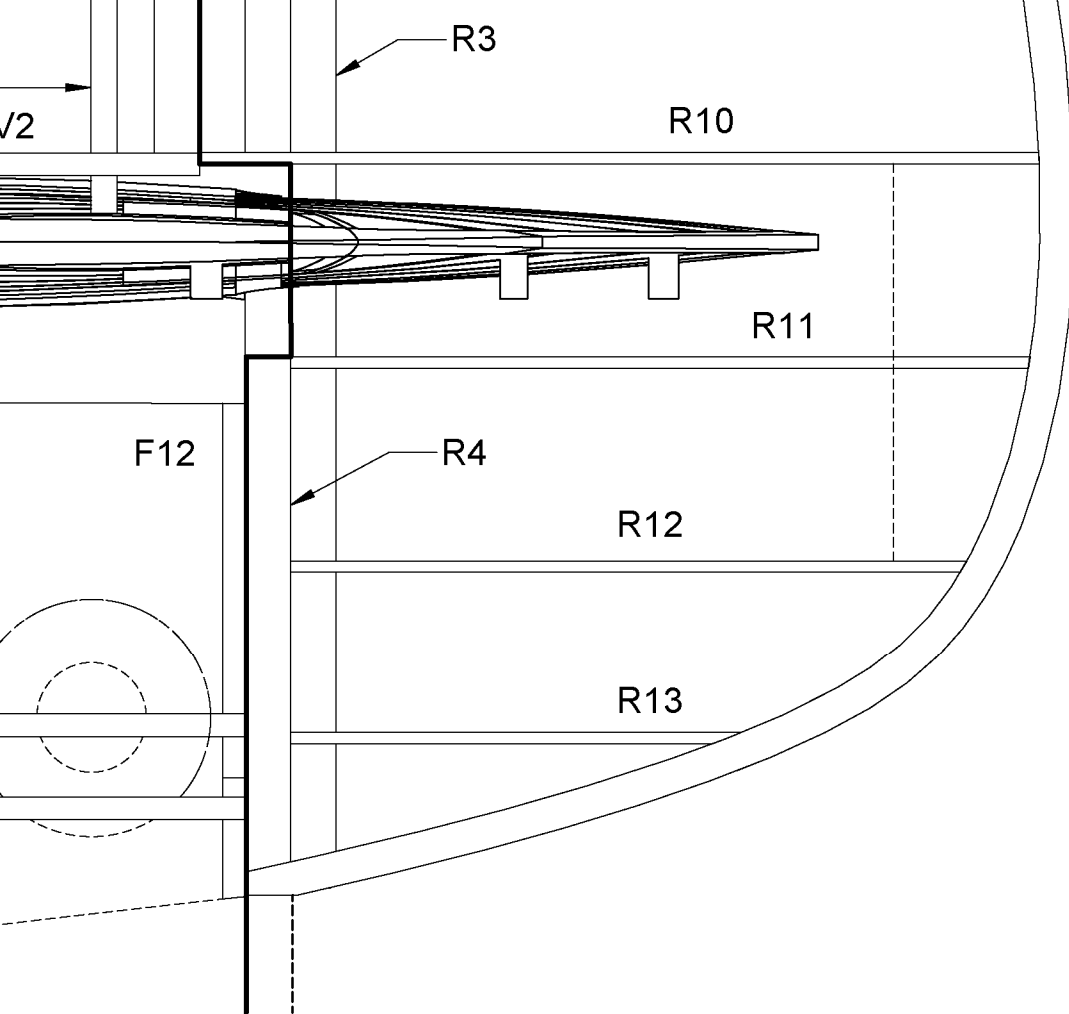
assembly after fitting the wing to the fuselage.

B1.
 inner F4 and to the centerline of the wings (see
 and flush to wing.

in at the front and magnets at the rear.

Belly Pan
 Frame Detail





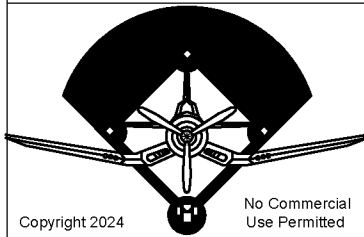
Copyright 2024



and **ModelAviation**

Copying for resale of this drawing without the written approval or consent of AMA is expressly prohibited.

INFIELD ENGINEERING[™] by Paul Kohlmann



Copyright 2024

No Commercial Use Permitted

Laser cut kit with plastics available from Manzano Laser Works

www.manzanolaser.com

Title

60" Curtiss P-40C Tomahawk

Plans No. 1143

Size

Y

Dwg. No.

Curtiss P40C.drw

Rev

A

Scale: 1:1

Weight: 4.5-5.5lbs

Sheet 1 of 4