1/3 PAULISTINHA P-56

Requires: 80 c.c. gasoline engine, 4-channel radio w/ 6 high torque servos.

Specifications

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<table>
<thead>
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<tbody>
<tr>
<td>Wing Span</td>
<td>141 in / 3580 mm</td>
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<tr>
<td>Wing Area</td>
<td>2821 sq in / 182 sq dm</td>
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<tr>
<td>Flying Weight</td>
<td>28.5 lbs / 13000 g</td>
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<tr>
<td>Fuselage Length</td>
<td>91 in / 2310 mm</td>
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Warning! This model is not a toy.
It is designed for maximum performance. Please seek advice if one is not familiar with this kind of engine powered precision model. Operating this model without prior preparation may cause injuries. Remember, safety is the most important thing. Always keep this instruction manual at hand for quick reference.
BEFORE YOU BEGIN

1. Read through the manual before you begin, so you will have an overall idea of what to do.

2. Check all parts. If you find any defective or missing parts contact your local dealer. Please DRY FIT and check for defects for all parts that will require CA or Epoxy for final assembly. Any parts you find to be defective after the gluing process may be difficult to remove for warranty replacement. The manufacturer will replace any defective parts, but will not extend to the parts that are good before gluing to defective parts during assembly. Warranty will not cover any parts modified by customer.

3. Symbols used throughout this instruction manual comprise of the following:

- **AB**: Apply epoxy glue.
- **CA**: Apply instant glue (C.A.glue, super glue.)
- **L/R**: Assemble left and right sides the same way.
- **N.I.**: Must be purchased separately!
- **3mm**: Drill holes with the specified diameter (here: 3mm).
- **!**: Pay close attention here!
- **! Warning!**: Do not overlook this symbol!
1. MAIN WING -- 1 pair
2. SERVO MOUNTING PANEL (For Aileron) -- 1 pair
HEAVY DUTY CLEVIS PL4112200 -- 4 sets
SCREW PM4x50mm -- 2 pcs
M4 NYLON INSERT LOCK NUT -- 2 pcs
HEAVY DUTY HORN BRACKET PL4112400 -- 2 sets
HEAVY DUTY SERVO HORN PL4120250 -- 2 sets
HEAVY DUTY CLEVIS PL4112200 -- 4 sets

3. SCREW HM4x20mm -- 12 pcs
   COPPER CLIPPER 0.5mm -- 8 pcs
   MAIN WING STRUTS -- 1 pair
   WING STRUT WIRE D4mm -- 2 pcs
   M4 NYLON INSERT LOCK NUT -- 4 pcs
   WASHER d4xD9mm -- 4 pcs
   WASHER d4xD12mm -- 4 pcs

4. FUSELAGE -- 1 pc.
   STABILIZER & ELEVATOR -- 1 set
   SCREW PWM2.5x12mm -- 2 pcs
   STABILIZER WIRE Ø4x200mm -- 2 pcs

5. VERTICAL FIN & RUDDER -- 1 set

6. TAIL GEAR ASSEMBLY (PL3410022) -- 1 set
   COPPER PLATE (For Stays on Tail Fueslage Bottom) 1x12x60mm -- 1 pc.
   SCREW PA3x18mm -- 3 pcs
   SCREW PW4x5.1x12mm -- 2 pcs

7. MAIN LANDING GEAR -- 1 set
   SCREW HM4x18mm -- 2 pcs
   SCREW PA4x14mm -- 12 pcs
   SCREW PA4x20mm -- 2 pcs
   WASHER d4x12mm -- 2 pcs
   WASHER d4x9mm -- 2 pcs
   MOUNTING PLATE 12x20mm -- 6 pcs
   ALUMINUM PLATE 3x15x77mm -- 2 pcs

8. SCREW PA1.7x8mm -- 6 pcs
   SCREW PM3x10mm -- 8 pcs
   WASHER d3xD7mm -- 16 pcs
   M3 NUT -- 8 pcs
   COLLAR Ø6.1mm w/ set screw -- 4 sets
   LARGE SCALE CAPTIVE AIR WHEELS Ø140mm -- 2 sets
   PLYWOOD 2x211.5x193.5mm (Main Langing Gear Cover) -- 1 pair
   COPPER CLIPPER -- 8 pcs

9. BLIND NUT M6 -- 4 pcs
   WASHER d6xD15mm -- 4 pcs
   SOCKET HEAD SCREW M6x30mm -- 4 pcs

10. COWLING -- 1 pc.
    TRANSPARENT 3D TEMPLATE -- 1 pc.
    SCREW PA3x12mm -- 4 pcs
    WASHER d3xD7mm -- 4 pcs
    SILICON GROMMET d2.5xD8.5mm PL1285135 -- 4 pcs

11. FUEL TANK 1500cc (PL1121500G-gasoline) -- 1 set
    CABLE TIE (For Fuel Tank) 1.5x8x500mm -- 1 pc.
    DOUBLE-SIDED TAPE 40x160mm -- 1 pc.

12. PUSHROD Ø2.3x215mm w/ Threads (For Elevator) -- 2 pcs
    SCREW PM4x50mm -- 2 pcs
    M4 NYLON INSERT LOCK NUT -- 2 pcs
    SWIVEL CLEVIS HORN FAIRING PL4610010 -- 2 sets
    HEAVY DUTY HORN BRACKET PL4112400 -- 2 sets
    HEAVY DUTY SERVO HORN PL4120250 -- 2 sets
    HEAVY DUTY CLEVIS PL4112200 -- 4 sets

13. PUSHROD Ø2.3x170mm w/ Threads (For Rudder) -- 1 pc.
    SCREW PM4x50mm -- 1 pc.
    M4 NYLON INSERT LOCK NUT -- 1 pc.
    SWIVEL CLEVIS HORN FAIRING PL4610010 -- 1 set
    HEAVY DUTY HORN BRACKET PL4112400 -- 1 set
    HEAVY DUTY SERVO HORN PL4120250 -- 1 set
    HEAVY DUTY CLEVIS PL4112200 -- 2 set

14. SCREW PM2x16mm -- 12 pcs
    WASHER d2xD5mm -- 24 pcs
    M2 NUT -- 12 pcs
    CLEVIS -- 12 pcs
    WIRE Ø1x4200mm -- 1 pc.
    FLYING WIRE BRACKET -- 12 pcs
    CLIP PIN -- 12 pcs
    EYE SCREW -- 6 pcs
    COPPER TUBE Ø2.5xØ3.2x8mm (For Rudder) -- 16 pcs

15. SIDE WINDOWS -- 1 pair

16. LINKAGE CONNECTOR Ø2.1mm w/ set screw -- 1 set

17. PLYWOOD 3x196x304mm (For Fuselage Servos) -- 1 pc.
    PLYWOOD 3x10x160mm (For Fuselage Servo Stand) -- 2 pcs
    BALSA 10x10x288mm (For Fuselage Servo Stand) -- 2 pcs
    SPONGE 10x80x200mm -- 2 pcs
    THROTTLE PUSHWIRE Ø1.2x480mm -- 1 pc.
    PLASTIC TUBE d2xD3x300mm -- 1 pc.

18. PILOT PC101110A -- 1 set
    SCREW PW4x12mm -- 4 pcs
    COCKPIT BASE PANEL 3x196x444mm -- 1 pc.
    WOOD 10x10x443mm (For Cockpit Base Panel) -- 2 pcs

19. WIND SHIELD -- 1 pc.
    M2 NYLON INSERT LOCK NUT -- 2 pcs
    SCREW PM2x14mm -- 2 pcs
    WASHER d2xD5mm -- 4 pcs
    CLEVIS -- 4 pcs
    MOUNTING PLATE 5x15mm -- 2 pcs
    BALSA ROD Ø8x220mm -- 2 pcs

20. WING TUBE Ø22xØ31mm -- 2 pcs
    SCREW HM3x30mm -- 2 pcs
    SCREW PA3x30mm -- 2 pcs
    WASHER d3xD7mm -- 4 pcs

21. SCREW HM4x15mm -- 2 pcs
    WASHER d4x12mm -- 2 pcs
    M4 NYLON INSERT LOCK NUT -- 2 pcs

22. DECALS: A324DEC -- 1 set

● COVERING:
TOUGHON STL 204 CREAM
LIGHTTEX SGX 201 BLACK
LIGHTTEX SGX 310 RED
1 Main Wing

- Aileron Servo Lead
- Pre-glued

2 Aileron servo

- PM4x60mm Screw x 2
- M4 Nylon Insert Lock Nut x 2
- PWA2.3x8mm Screw x 8

- Heavy Duty Horn Bracket
- M2 Nylon Insert Lock Nut
- Heavy Duty Clevis
- M2x10mm
- Pushrod Ø2.3x129mm
- PM4x60mm
- PA1.7x8mm
- PWA2.3x8mm

- Bottom View

L/R
3 Wing Struts

- HM4x20mm Screw: 12
- d4xD12mm Washer: 4
- d4xD9mm Washer: 4
- M4 Nylon Insert Lock Nut: 4

![Bottom View]

4 Stabilizer & Elevator

- PWM2.5x12mm Screw: 2

Temporary install the main wing, adjust leveling of the stabilizer to make it as parallel to the main wing as possible.

![Completed]  ![Bottom View]

5 Vertical Fin & Rudder

- Pre-glued

![Completed]

A324PO24581008  P.4
6 Tail Landing Gear

- **PA3x18mm Screw**
- **PWA2.5x12mm Screw**

![Bottom View]

7 Main Landing Gear

- **HM4x18mm Screw**
- **PA3x14mm Screw**
- **PA4x20mm Screw**
- **d4xD12mm Washer**
- **d4xD9mm Washer**

![Bottom View]

8 Landing Gear

- **3mm Set Screw**
- **PA1.7X8mm Screw**
- **D6.1mm Collar**
- **PM3x10mm Screw**
- **d3xD7mm Washer**
- **M3 Nut**

![Bottom View]
9 Engine

- M6x30 SOCKET HEAD SCREW: 4
- d6xD15mm Washer: 4
- M6 Blind Nut: 4

10 Cowling

- PA3x12mm Screw: 4
- d2.5x8.5mm Silicon Grommet: 4
- d3xD7mm Washer: 4

- Please refer to the attached sheet for usage of the transparent 3D template.
- First insert the grommet to the cowling then apply screw.

- Completed
11 Fuel Tank

- CABLE TIE 1.5x8x500mm
- DOUBLE-SIDED 40x160mm

Completed

12 Elevator Pushrod

- PM4x50mm Screw 2
- M4 Nylon Insert Lock Nut 2
- M2 Nut

Bottom View

13 Rudder Pushrod

- PM4x50mm Screw 1
- M4 Nylon Insert Lock Nut 1
- M2 Nut

Bottom View
**14 Flying Wire**

- 12 PM2x18mm Screw
- 12 M2 Nut
- 24 d2xD5mm Washer

**15 Windows**

Window A

Window B

Securely glue the windows to the fuselage.

**16 Servo Set**

- 3x3mm Set Screw
- Linkage Connector
- M2 Nut
- 2mm Washer

Throttle Pushwire

Washer 2mm

M2 Nut

Please refer to the attached sheet for linkage connector installation.
17 Radio Equipment

- Install and arrange the servo as shown in the diagram.

18 Pilot

- PWA 2x12mm Screw

19 Wind Shield

- M2 NYLON INSERT LOCK NUT
- PM2x14mm Screw
- d2 x D5mm Washer

Apply thick CA or Canopy glue.
Step 1. Insert the aluminum wing tube with the pre-drilled hole end into the right wing. Align the lines marked at the wing root and wing tube and apply the PM3x30mm machine screw through the pre-drilled hole on top of the wing. (please confirm the alignment of the hole by putting a 2.5mm diameter rod through the pre-drilled wing hole before applying the screw) The hole on the wing tube is pre-threaded, do not over tighten the PM 3mm screw, the setup is for future removal of the wing.

Step 2. Install the right wing to the fuselage by inserting the wing tube (now attached to the right wing) through the fuselage, then install the left wing.

Step 3. Make sure the wings are resting against the fuselage tightly. Locate the pre-drilled 2.5mm hole at top of left wing, and drill along with 2.5mm drill bit until it passes through the wing tube. Apply the PA3x30mm self-tapping screw.

Note: It is recommended that the wing tube stays with the left wing. Removal of the wings could be achieved by removing the right wing machine screw, the right wing then the left wing with wing tube. If removal of wing tube from left wing is also required, it is recommended that instead of applying self-tapping screw in step 3, you pre-tap with M3 thread cutter and apply M3 machine screw.
21 Wing Struts

- HM4x15mm Screw 2
- d4xD12mm Washer 2
- M4 NYLON INSERT LOCK NUT 2

22 Wing Setting

- Adjust the wing and fuselage configuration as shown in the diagrams.
23 Control Throws

Adjust the control throws as shown in the diagram. These throws are good for general flying. You can adjust according to your personal preference.

- Rudder
  - 65mm
- Elevator
  - 50mm
- Aileron
  - 40mm

24 C.G.

The ideal C.G. position is **150mm (5.9in.)** behind the leading edge measured at where the wing meets the fuselage. In order to obtain the C.G. specified, add weight to the fuselage or move the battery position. Check the C.G. before flying.

- 150 mm
- 5.9 in.

Warning!

Important Safety Precautions

- First time flyer should never fly by himself / herself. Assistance from experienced flyer is absolutely necessary.
- Pre-flight adjustment must be done before flying, it is very dangerous to fly a badly pre-adjusted aircraft.
- **1/3 PAULISTINHA P-56** is specially designed to be powered by **80c.c.** engine, using a more powerful engine does not mean better performance. In fact, over powered engine may cause structural damage and injuries.
- Make sure the air field is spacious, never fly the plane too close to people and never get too close to a running propeller.
- If you find wrinkles on the covering as a result of weather changes, you can use hot iron to remove the wrinkles. Please begin with lower temperature setting and gradually raise the temperature until the wrinkles are gone. Too hot an iron may damage the covering. Don’t use hot iron near the seams or edges, hot iron will melt the glue and shrink the covering at the same time, causing the seams to pull away.
- Check and re-tighten up all factory assembled screws, use thread locker if necessary.
Product Registration Form (US Customers)

We would like to share with you any relevant information regarding your model, including product news and free upgrade parts when applicable. Please fill in the following and send to AirBorne Models, 4749-K, Bennett Drive, Livermore, CA 94551 USA.

1. Name:______________________________________________
2. Address:____________________________________________
3. Phone #:____________________ E-mail:__________________
4. Model:______________________________________________
   Wing QC#_________ Fuselage QC#________________________
   (QC numbers are stamped on wing and fuselage)
5. Date of Purchase:_____________________________________
6. Store Name:_________________________________________

Please call AirBorne Models at 925 371 0922 for any assistance in filling this form. Thank you very much for purchasing our product.

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Usage of the transparent 3D template

This transparent 3D template is used for position guidance of the actual cutting of the pre-painted cowling.

1. Simply cut the transparent 3D template to fit your engine and exhaust pipe, then slide onto the actual cowling and use as template to mark the openings required for final cutting.