

## ***Post-Paint>Fuselage>Fit doors***

### **Objectives of this task:**

At this stage the doors have been painted and now they can be refitted to the aircraft.

### **Materials required:**

Door hardware from Card # 1T 'Doors'

### **Fit the door seals**

Clean the inside of the door lip and fit the white door seal rubber around the entire outer edge of the door. The door seal is adhesive backed: peel the backing paper back as you stick the seal into place. Start and finish at the top hinge.

### **Refit the doors**

Fit the hinges to the door pivot arms using the screws and nuts that were used in the *Pre-Paint>Fuselage>Pre-fit doors* task and tighten the nuts to safety.



Fit each door to the fuselage. Apply a single drop of Loctite 242 to each screw, then fit the top screw first to hold the top of the door, then fit the bottom screw and check that the door closes in the centre of the door opening – there will be enough movement in the hinge screw holes to allow the door to be centred very accurately.

Tighten both screws firmly while the door is shut and both latches are closed.

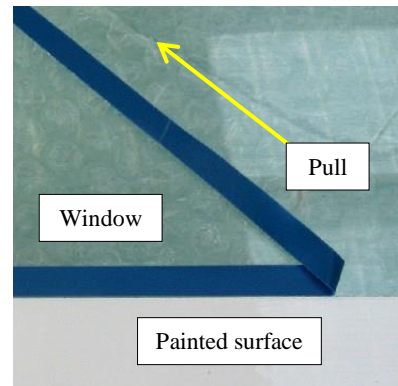
Check that the door can be opened and closed easily and make any minor adjustments that may be required.

### Remove the masking

Both sides of the window will still be masked at this stage – carefully remove all of the masking until you only have the blue “*Fine Line*” masking tape left around the window and then very carefully peel the “*Fine Line*” tape from the window by pulling the tape back over itself and in towards the centre of the window as shown in the photo at right.

This will allow the edge of the tape to cut the paint to a nice clean edge, which is the reason for using the tape.

**Never** pull any masking tape towards the painted surface, always pull **away** from the painted surface.



### Fit the door swing straps

These straps prevent the doors from swinging too far forward in windy conditions.

Loop a length of black webbing through the bracket at the front of each door and measure out enough webbing so that the door can be opened to no more than 90° to the fuselage and the webbing can be wrapped around the inside the front of the door jamb.

Cut the webbing to length and secure to the back of the door jamb with a countersunk screw.

Use your soldering iron to burn the bolt hole through the fabric – this will seal the edges of the hole.

Seal the cut ends of the webbing with a flame.

Fit the screw through the door frame: countersink the hole and fit the screw with a Tinnerman washer under the head then place a penny washer over the webbing as shown at right and secure with a Nyloc nut tightened firmly.



### Fit the striker plate

Place the striker plate on the door jamb and align the latch pin hole. Hold the striker plate in place with some tape and check that the door can be closed and that the latch pin will fit through the striker plate – make any required adjustments and then rivet the plate in place with 2 x 5/32” rivets as shown in the photo at right.

Repeat for the other door.



## Fit the door locks

Fit the door locks through the lock holes in the fuselage behind each door and fix in place with the retaining nuts. Tighten each retaining nut firmly.

Fit the locking arm to the end of the shaft with the supplied screw: apply a drop of Loctite 242 to each screw.

Check that the locking arm works in the correct sense and that the key can be removed at both the locked and unlocked positions. It may be necessary to lengthen the slot slightly if the key cannot be removed in the locked position.



## Clean the windows

Now you can clean the windows: start with a small amount of methylated spirits on a clean cloth and carefully remove any dust and debris from the painting process then, using a clean soft cotton cloth, polish both sides of each window with a good quality cleaner such as *Novus Plastic Polish*: start with *Novus #2* and then finish with *Novus #1*. *Novus #3* should only be used for buffing out extremely heavy scratches.

Support an open door with one hand while you polish the window.

Any cleaner/polish used must be safe to use on acrylic and must not contain any silicon.

This completes the *Post-Paint>Fuselage>Fit doors* task.

