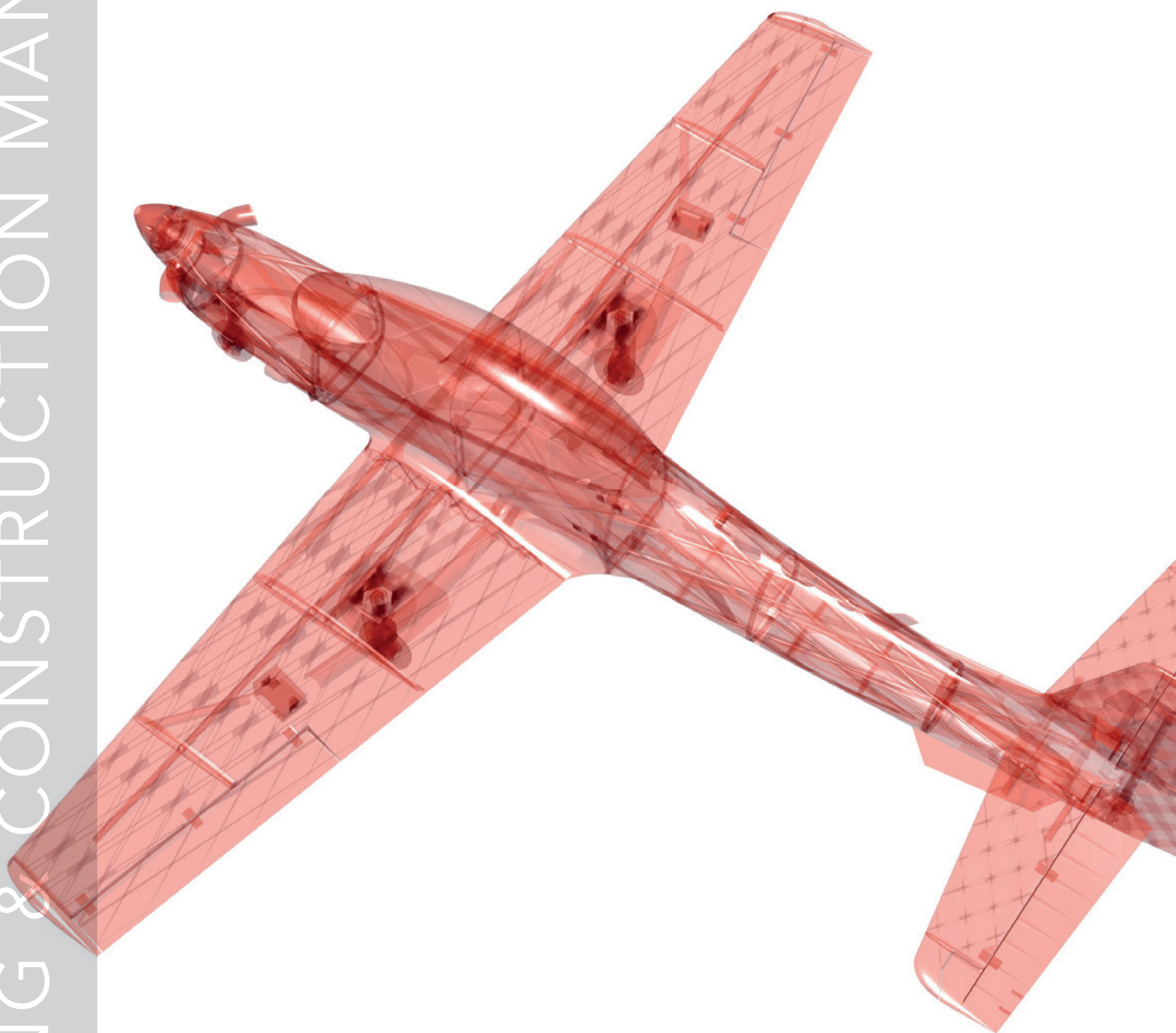# PLANE PRINT.com

very light 3d printable rc planes

PLANEPRINT SUPER TUCANO
WINGFASTENING SYSTEM

For this upgrade, replace the original STL of
Fuselage 5 and Wing 1 with these new ones.

WATCH OUT!
This 3D print model
is specially optimized
for CURA.

FAIR DATA USE ©

STL DATA FOR DOWNLOADING
AT **www.planeprint.com**

PRINTING THE PARTS – PRINTING PROFILES

You may wonder why this 3D model is suitable exclusively for CURA right?

The most important thing about small RC model airplanes is always the ratio of size to weight. The lighter a model is, the better its flight characteristics and also the flight time is significantly increased.

With our unique design process, we manage to make Weights relevant items in a **true 1-wall printing process** for the outer skin but also for the filling offer. So we save weight while maintaining the necessary stability.

Here we show you how to get started from a standard CURA profile Make settings. For this model we only need 4, easy to create profiles.

It is **absolutely necessary** to observe the information provided by **PLANEPRINT.com** in order: to slice the component correctly. However, it may make sense to perfect your 3D printing by additionally performing several hiring activities depending on your printer and the filament used.

For slicing all Planeprint models, four profiles have to be created in Cura:

PROFILE P1_fullbody
PROFILE P2_hollowbody
PROFILE P3_surface
PROFILE P4_flex

You can find the description at
www.planeprint.com/print

Important for the 1-wall-print!

In order to print airfoils of the lowest possible weight with high stability, it is necessary to print with only one wall line (Nozzle 0.4 mm). Decisive here is the adhesion between the layers! To achieve this, you must print at a much higher temperature than normal. As a **guideline**, 230°C is a good starting point. The parts-cooling fan should be set to 0% or a maximum of 20%. Since not every printer works the same, it may be necessary to make small adjustments to these settings.

The development of a complex, airworthy RC flight model to express on any standard 3D printer is a very complex and extensive process. Therefore, we appeal to your fairness not to forward the STL data you have acquired to third parties.

Thank you for your understanding and have fun with your PLANEPRINT MODEL!
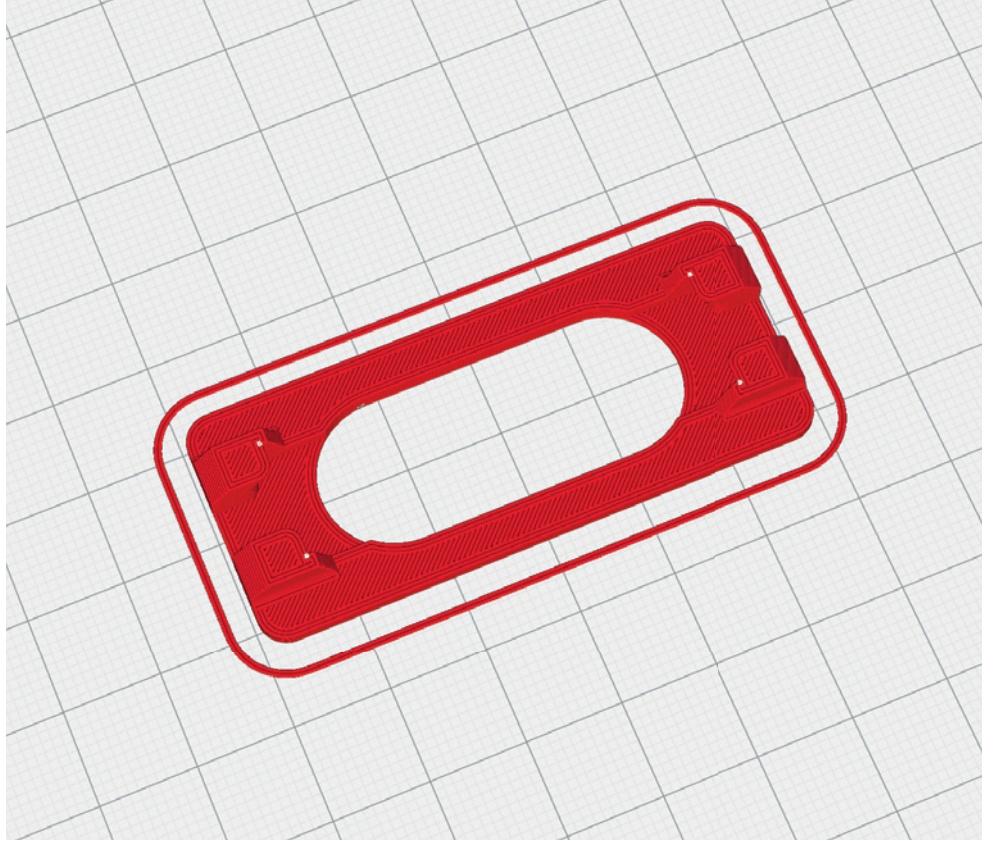
PROFILE P1_FULLBODY

The following parts must be sliced with the profile P1_FULLBODY.
Recommended additional settings are listed in the screenshots.

ADDITIONAL SETTINGS

None nessesery

PROFILE P3_SURFACE

The following parts must be sliced with the profile PROFILE P3_SURFACE (1 Wall Print). Recommended additional settings are listed in the screenshots.
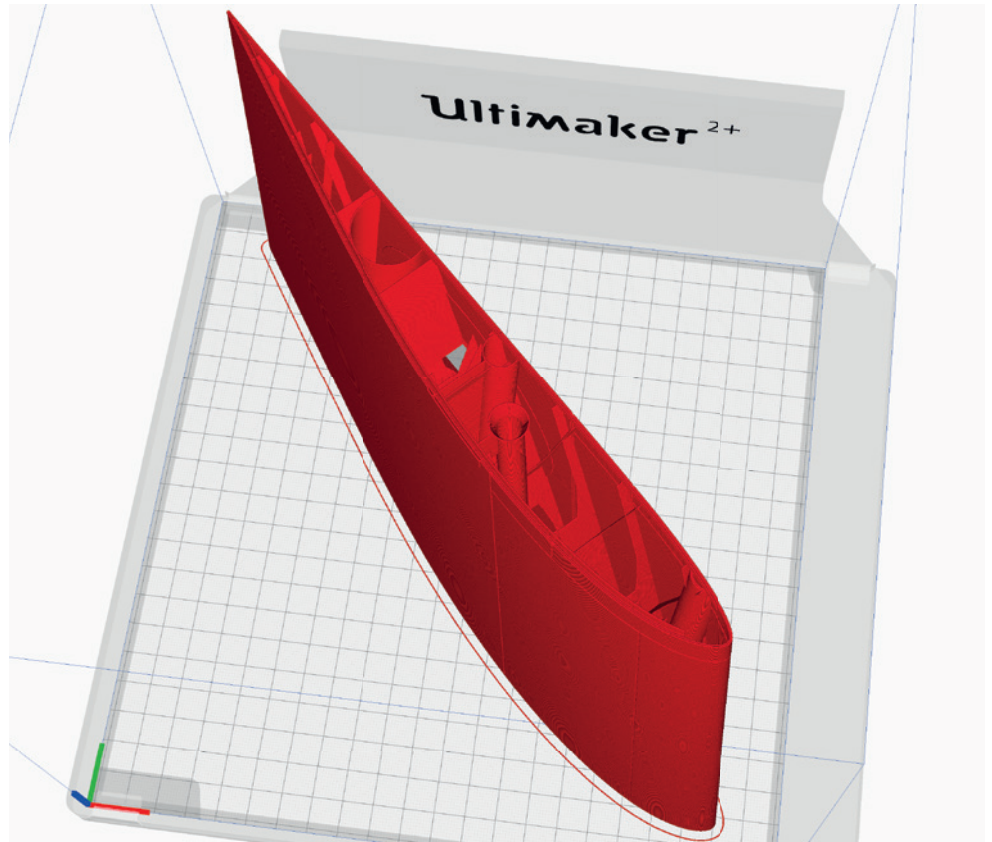
INFO

STL: st-Wing 1-left_profile3.stl
     st-Wing 1-right_profile3.stl
Material: PLA
Weight: ~ 106 g

ADDITIONAL SETTINGS

Wing1 left: • Z Seam Position left
Wing1 right: • Z Seam Position right

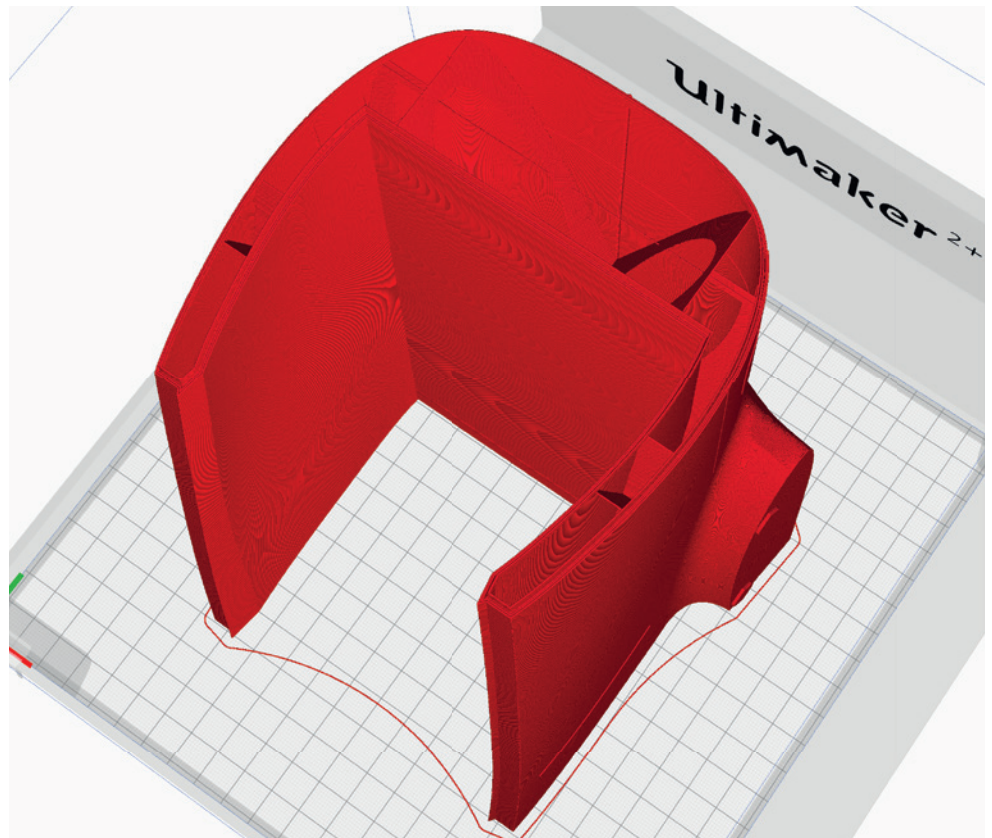Depending on your printer,
a **brim** may not be nessesery.

INFO

STL: st-Fuselage 5_profile3.stl
Material: PLA
Weight: ~ 84 g

ADDITIONAL SETTINGS

Depending on your printer,
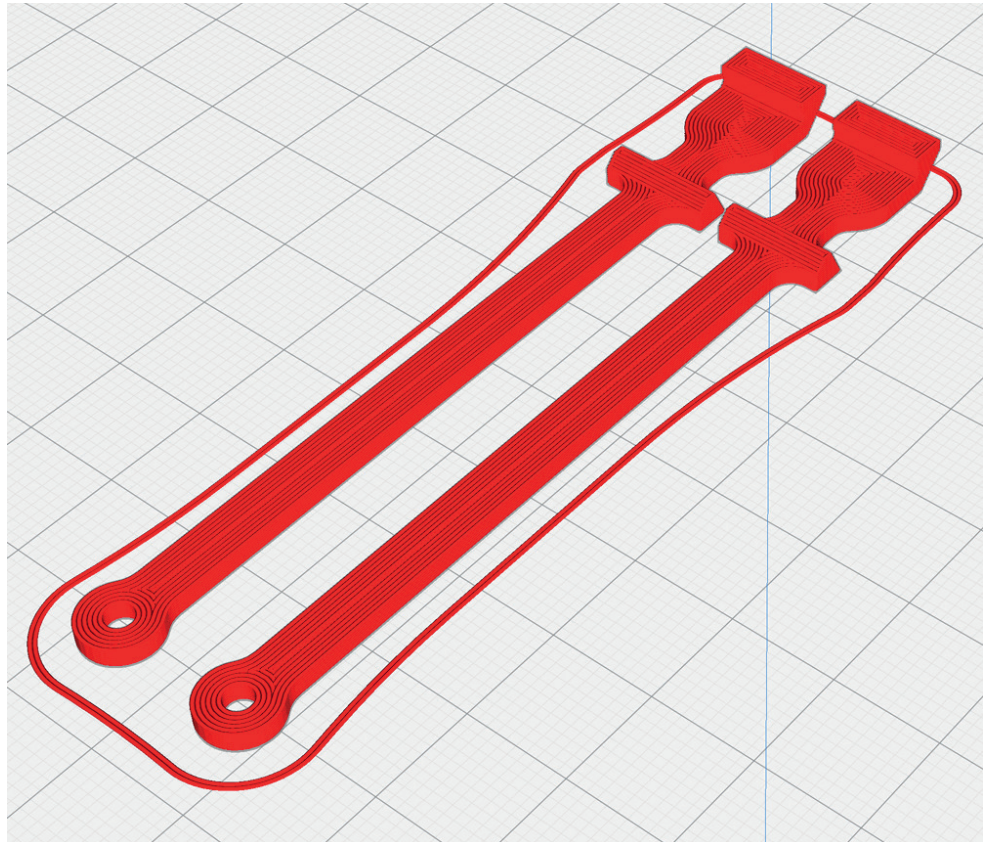a **brim** may not be nessesery.

PROFILE P4_FLEX

The following parts must be sliced with the profile PROFILE P4_FLEX (flexible materials).
Recommended additional settings are listed in the screenshots.

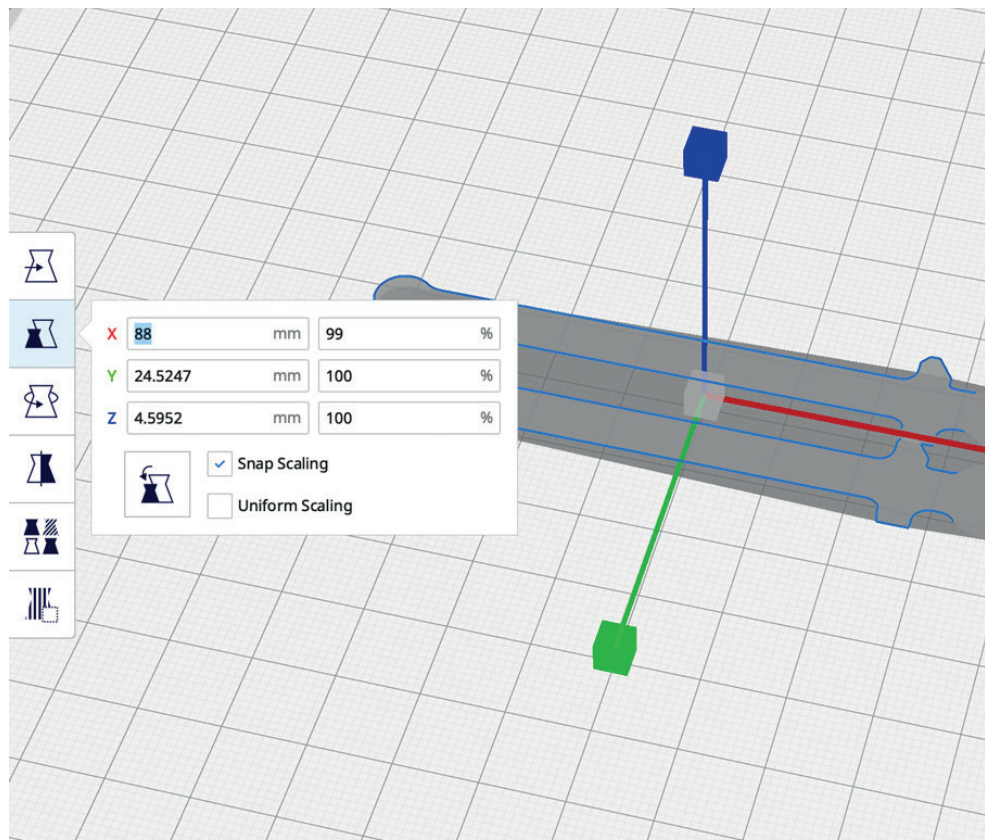STL: st-Tension belt_profile4.stl
Material: TPU soft
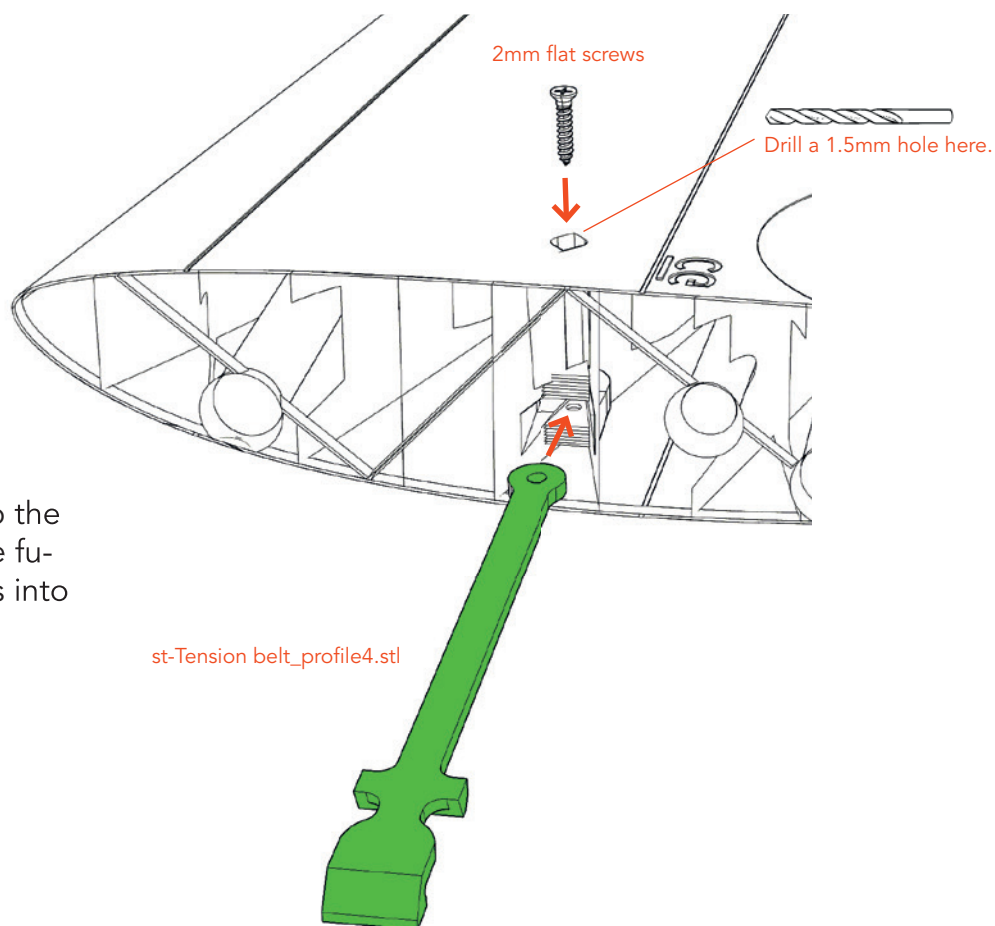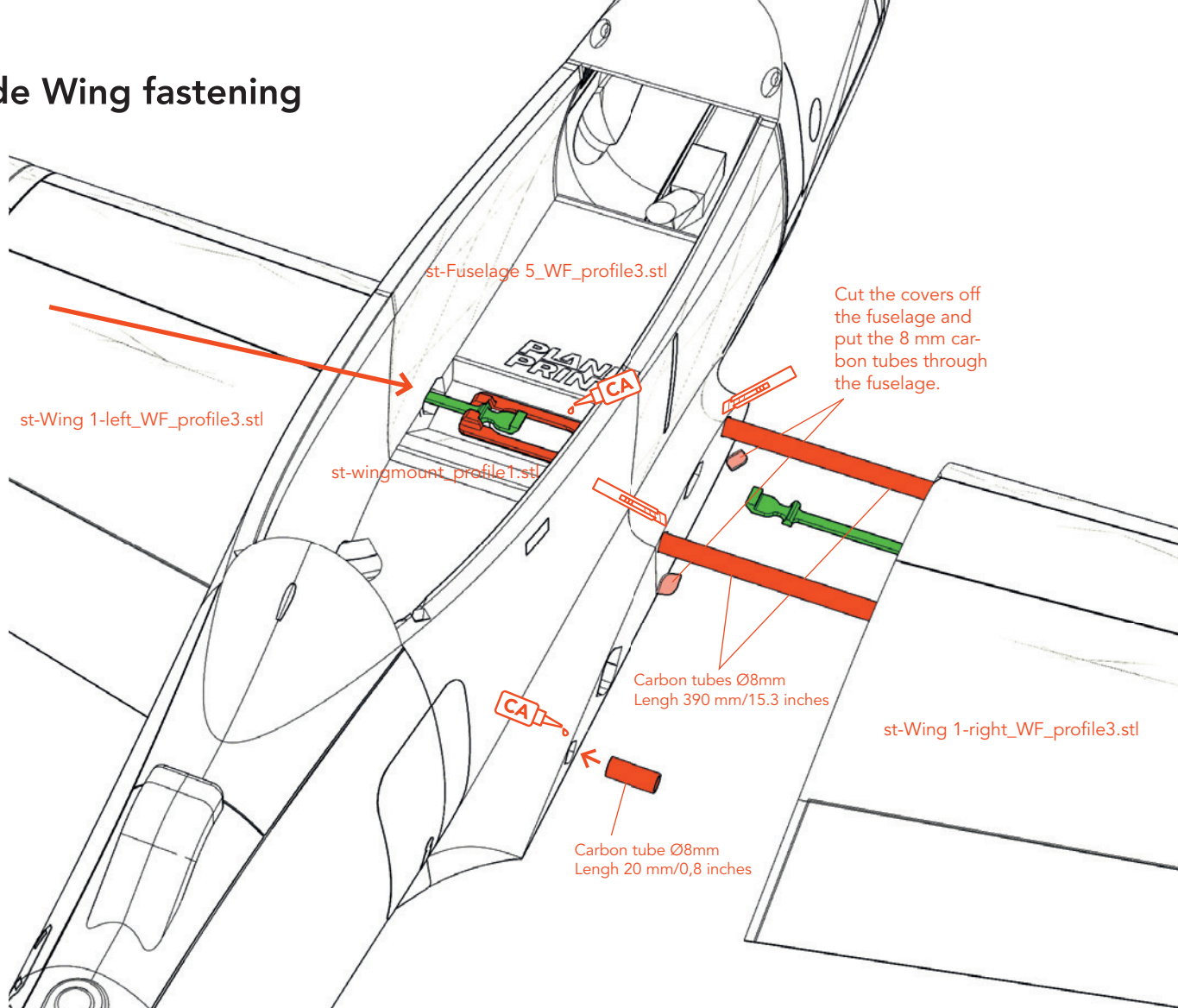Weight: ~ 3 g

• Wall Line Count 10

Tension belt lenght
In the folder Individual parts you will find the tension belts also as a single file. If you want to change them slightly in length, you can simply change the dimension of the X-axis in Cura (Uniform scaling must NOT be selected).

Upgrade Wing fastening

st-Fuselage 5_WF_profile3.stl

Cut the covers off the fuselage and put the 8 mm carbon tubes through the fuselage.

st-Wing 1-left_WF_profile3.stl

CA

st-wingmount_profile1.stl

Carbon tubes Ø8mm
Lengh 390 mm/15.3 inches

st-Wing 1-right_WF_profile3.stl

CA

Carbon tube Ø8mm
Lengh 20 mm/0,8 inches

2mm flat screws

Drill a 1.5mm hole here.

Screw the TPU tensioners into the wings, attach the wings to the fuselage and clip the tensioners into the frame (st-wingmount_profile1.stl).

st-Tension belt_profile4.stl