## **Bursledon Van**

This model is inspired by the guards van used on the Bursledon brickworks railway in Hampshire. It is remarkably small (and so a good match for our industrial wagons) and appears to be have been built an ex MOD railway wagon chassis.



### **Tools**

The following tools will be required:

- A sharp modelling knife or scalpel
- 2 mm drill bit
- A small file, sand paper or an emery board "nail file"
- A small "Philips" screw driver, size 0

The following tools are recommended

- A cutting matt
- A small steel ruler
- Some small clamps, bulldog clips or rubber bands
- A black permanent marker pen

# **General Assembly Instructions**

Do take time to read through the instructions and understand how the parts fit together before reaching for the glue pot. Where ever possible parts have been designed to be symmetrical but occasionally parts have to be left or right handed so take care to follow the instructions carefully at these points.

### **Plywood Parts**

Most of these parts are supplied in "frets" and will need separating by cutting through their connecting tabs with a thin sharp blade (e.g. a scalpel) on a cutting mat. The laser cutting process will leave a degree of edge discolouration. If you plan to leave you model unpainted now is the time to lightly sand the edges to remove this discolouration. Plywood parts may be glued with aliphatic wood glues (recommended) PVA wood glue, epoxy resin or Cyanoacrylate adhesive.

#### **MDF Parts**

Also supplied in frets and will need separating with a sharp knife. We use a quality MDF product (NOT from the DIY store) which already **has a good surface ready for priming and painting.** By all means clean up the "burnt" edges by light sanding but leave the main surfaces alone! MDF parts can be glued with the same glues as the plywood parts

### **SLS Nylon Parts**

Most of the detail components in this kit are 3D printed in an engineering grade nylon. Most of these are "sprued" together to reduce costs and need separating with a pair of miniature side cutters or a sharp scalpel. When "de-spruing" black components you will find white spots are left. These are best "coloured in" with a black permanent marker pen. The printing process may leave a nylon dust residue in crevices which can be removed with a medium bristle tooth brush.

Nylon components can be glued to the wood components using a good quality Cyanoacrylate adhesive (one which doesn't leave smoke marks).

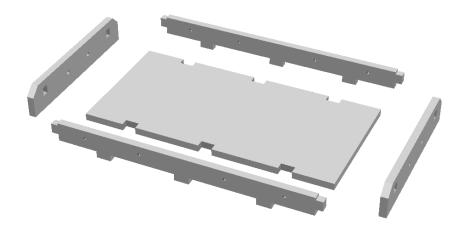
Aero modellers "canopy glue" can also be used. While pricy, it is easily cleaned up with a damp cloth before drying, and dries completely clear.

These components take paint well but they are slightly porous so probably will need more than one coat.

## Painting

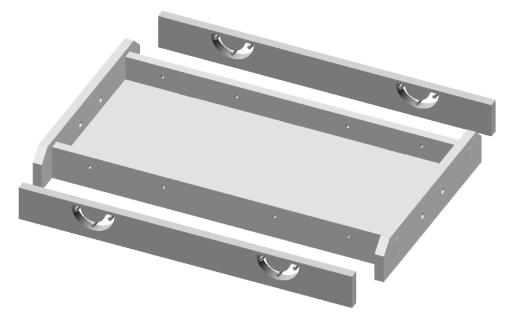
This is very much a matter of personal choice. As poplar plywood is used for the body, leaving the model mostly unpainted can be very attractive however if you plan to run your trains in all weathers, **some form of protection (especially on the MDF parts) will be needed**; a couple of coats of acrylic matt varnish from a "rattle can" is easy way of achieving this.

## **Step 1 – Chassis**



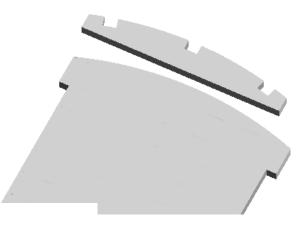
Glue the 2 MDF inner sole-bars and 2 MDF buffer beams to the MDF floor. The parts should fit together snugly but if necessary lightly file the lug edges if the fit is too tight. Make sure the parts are squeezed together properly. Wipe out any glue that oozes out of the joints

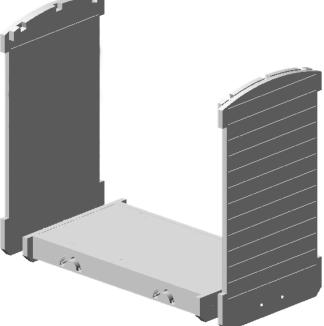
Glue the two plywood outer sole bars in place. Note the orientation of the "half moon" plates.



### **Step 2 – Main Body**

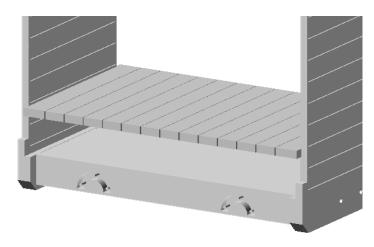
Glue the roof member support strips to the top of the plain sides of the body ends ensuring the top curved edges are flush and the gaps at either ends are equal.



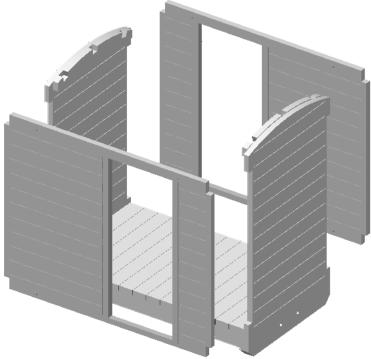


Glue the two body ends to the chassis ensuring the bottom edges are flush.

Glue the floor overlay in place between the two end walls.



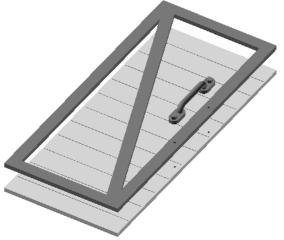
Bursledon Van Assembly Instructions : Page 4



Glue a body sides to the floor and end wall. Note that the section above the door opening is wider than the section below the door opening.

## **Step 3 - Doors**

Glue the plastic door strapping and handle to the 1.5 mm thick ply doors

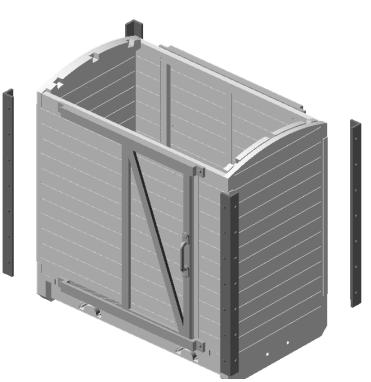




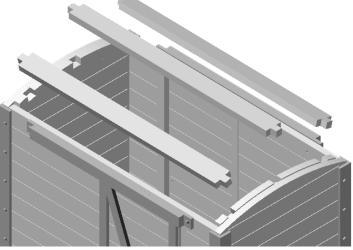
Glue the top and bottom door runners in place above and below the door openings, trapping the doors in place. Ensure no glue gets on the door edges.



Glue the four corner plates in place.



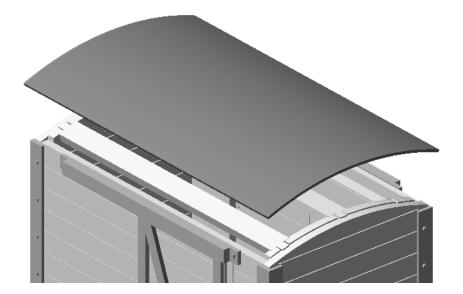
Step 5 - Roof



Glue the three roof supports in place and allow glue to set

Trim the preformed roof to size with a very sharp modeller's knife and steel rule. Suggest you trim the width first leaving about 2mm of the lip on and then trim to length.

Glue the roof in place. Epoxy resin glue (e.g. Araldite) or canopy glue is recommended.



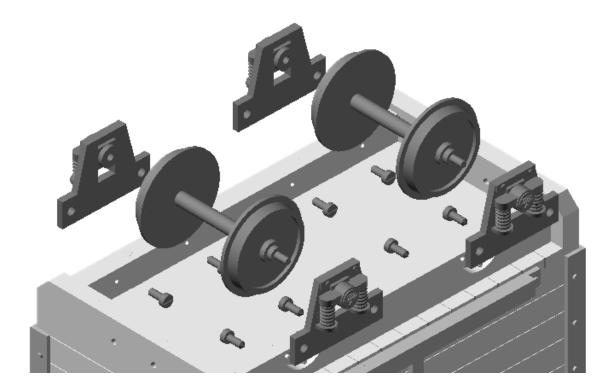
### **Step 6 – Wheels**

Note the supplied axle guards come with two little ring securing lugs sprued off their sides which are not needed for this kit. Trim them off and place in your "will come useful" tin. Clean out any printing dust in the axle journals by "twizzling" a 2mm drill bit in them.

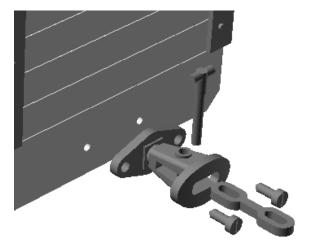


Fit the axle guards to the wheels and then screw the axle guards to the inner sole bars. Note pilot holes are provided on the inside of the sole bars to aid in accurate location of the axle guards

Give the wheels a flick, they should spin freely. Add a drop of light oil (e.g. 3in1) before the van enters service.



## 7 – Couplings



Screw the bell mouth couplers in place with 4 self-tapping screws

The modeller has the choice of using this coupling in a prototypical manner; i.e. keeping the link engaged in one buffer and sliding the tpin in and out of the other (tweezers recommended) to couple the wagons together. Alternatively dispense with the link bar and permanently glue the t-pins in place. The small coupling chain may then be slipped over the Tpins to couple in a more conventional garden railway like manner.

Job Done!