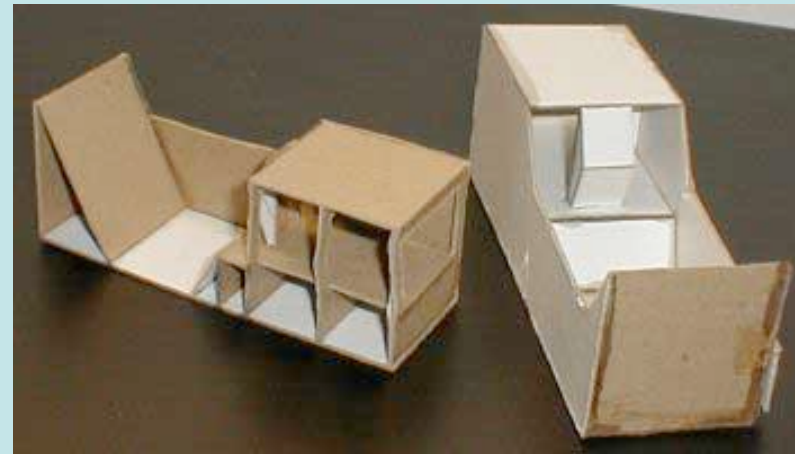


Making Mock-up Models



Why build a Model?

- To get a 3D (visual) idea of how the product might look.
- To show the client let them 'feel' - handle the product.
- To discover and explore any construction problems that may occur later.
- To explore possible solutions to these problems.
- To explore size and scale.
- To explore different materials, textures, finishes.

Material considerations

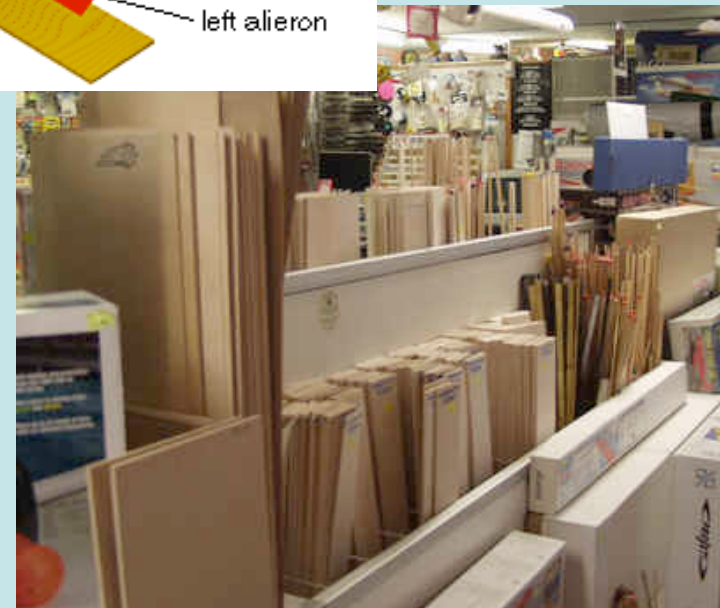
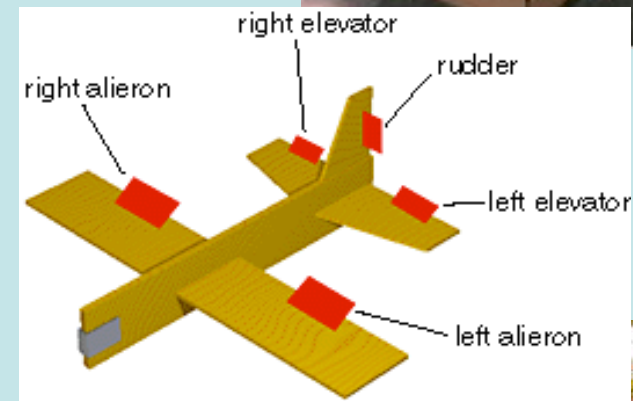
- **Balsa wood**
- **Card/ cardboard**
- **Paper**
- **Wire**
- **Mesh**
- **Clay**
- **Fabric (material)**
- **Plastics**
- **Anything else useful**

➤ Any of these materials by themselves or combined with others.

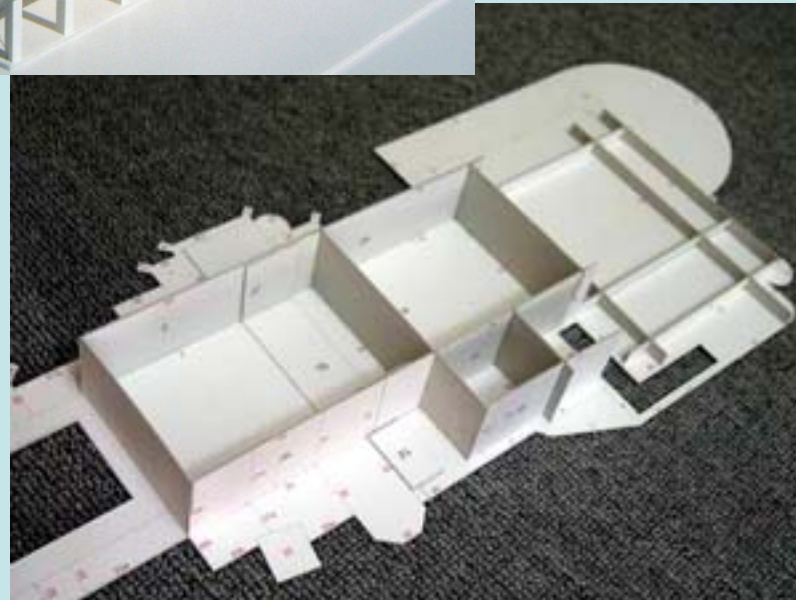


Balsa wood

- Supplied in sheet or block form.
- Thin veneers wide variety of thicknesses
- Easy to cut and join.
- Lightweight.
- Clean lines – good for geometric designs.
- Not easily curved/bent.
- Smooth surface – can attach to other materials easily.



Cardboard



- Easily cut, but still strong.
- Can be joined without glues by making incisions, slots in the card.
- Can be bent, but not as easily curved as paper.
- Easily coloured, painted and easy to attach other materials to.
- Clean lines – good for geometric designs (straight lines)
- Lightweight.

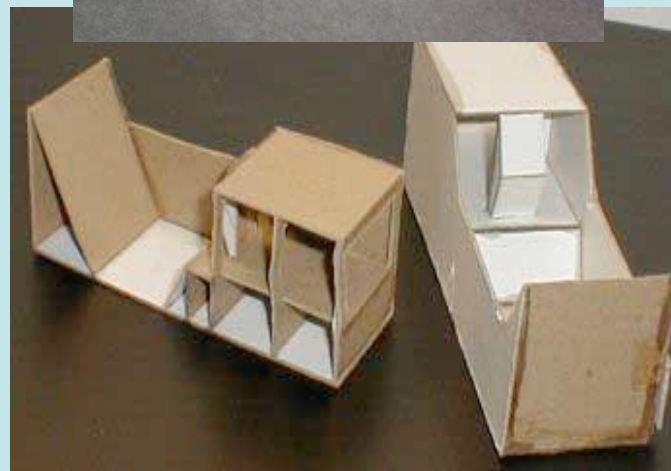
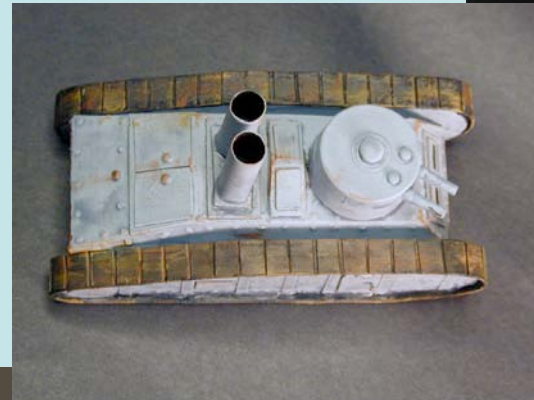
Card models and mock ups

Mock ups are meant to be quick representations of possible ideas

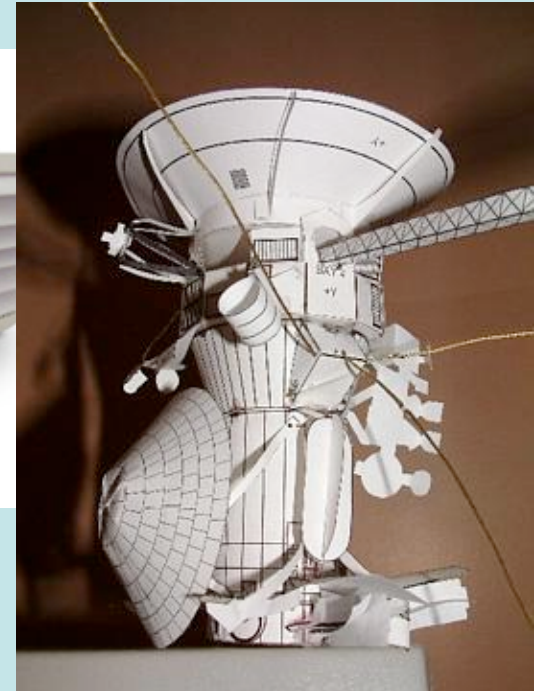
Examples of colours added.

They do not have to be works of art!

They are there to develop your ideas towards the final product.



Paper

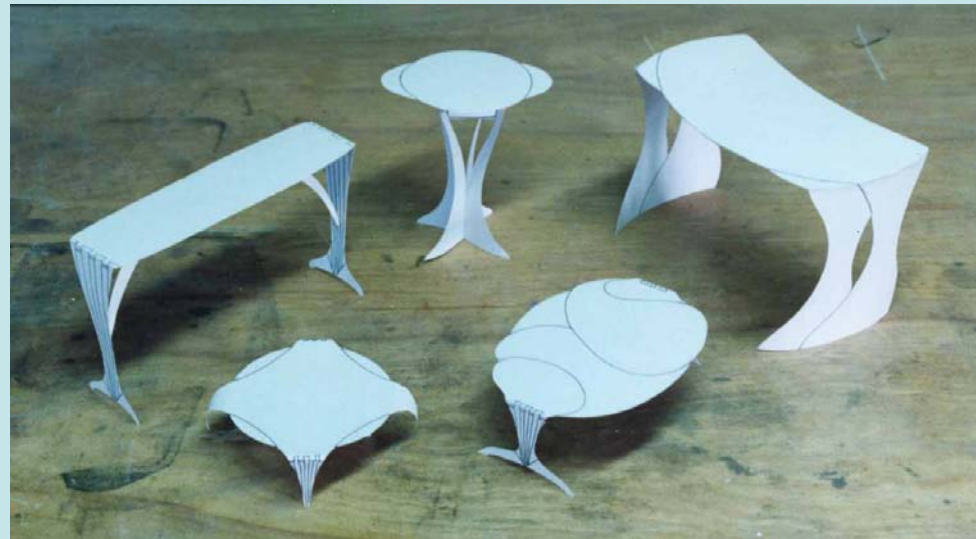
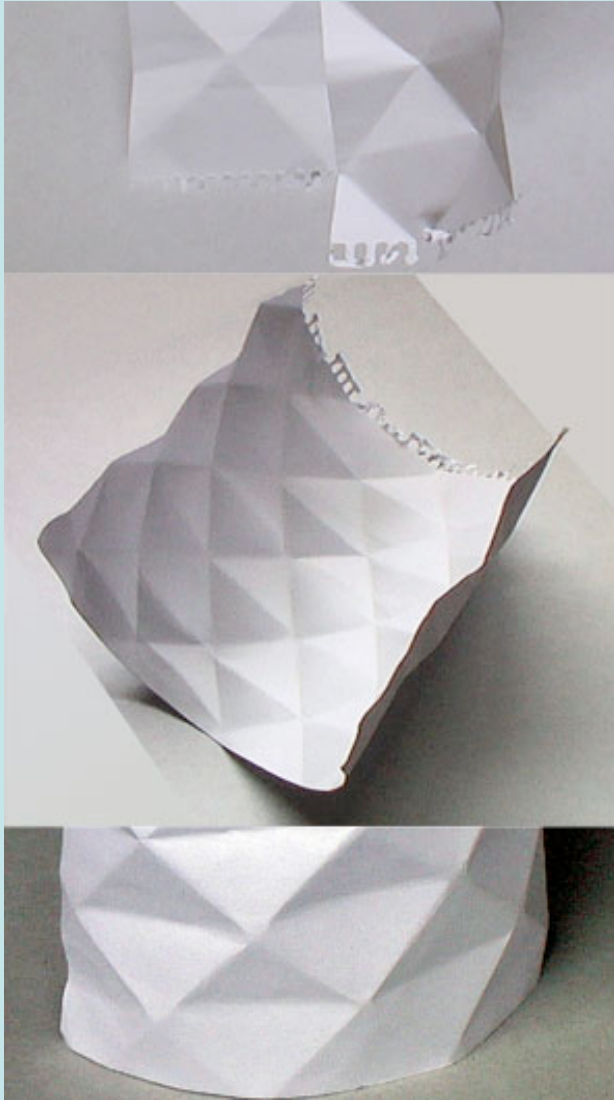


- Easy to work with
- Cheap
- Ready Coloured or coloured
- Readily available
- When put together in the right way it can be very strong (layered)
- Easily curved/folded/bent
- Easily attached to other materials

They do not have to take lots of time to build, many can be made in one lesson.

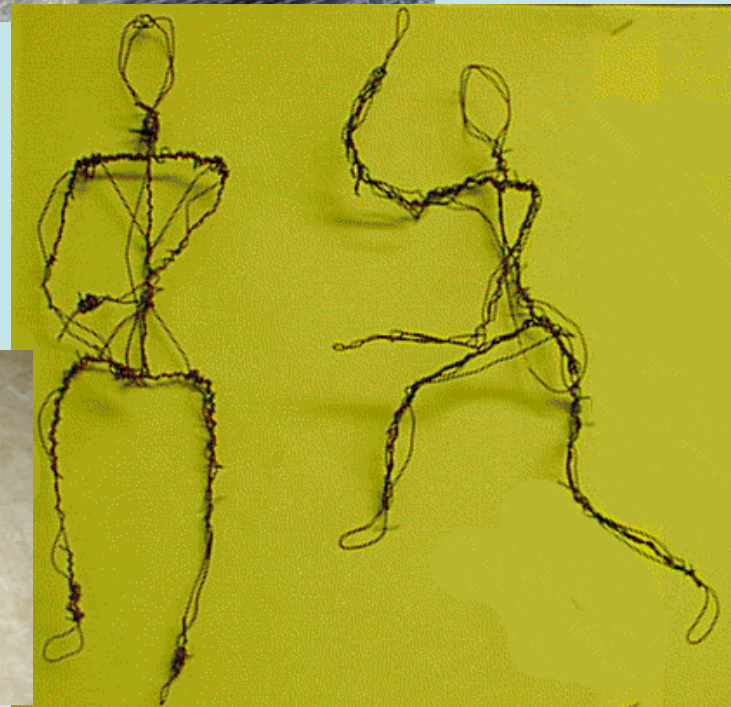
Paper can be used to form or represent the texture of the surface.

They are not big (to scale) but can in fact be very small.



Wire and mesh

- **These materials are very good when used in conjunction with other materials.**
- **They are strong, therefore strengthen your model.**
- **Easily bent and twisted to form shapes (good for making curves.)**



Clay



- Easy to mould into any shape, both geometric and curved.
- Can show a very smooth surface or can be cut into to show texture.
- Sturdy once dry, but can crumble if not fired.
- Remember it will dry and set so one model may need to be completed within the lesson.
- May not attach well to other materials, but wire can be incorporated well.
- Heavy

Fabrics

- **Used to show possible texture and colour of the design.**
- **Not strong – needs to be used with other materials.**
- **Lightweight.**



Things to remember!

- This is not the final design, but just part of the development process towards the final design.
- You are looking for ways to improve your design, it will take more than one prototype to get it right.
- Experiment with different materials as much as possible – thinking which material represents my concept idea the best.
- What combination of materials could be effective?
- Will my client understand my model?
- These prototype models are not going to be actual size, but made to a smaller scale.
- You can build parts/ sections of your design. You do not have to make a whole model each time e.g. joints, table legs, seat of a swing.