Prototyping Activity
To support students developing 3D modelling skills

Purpose of activity:
To practice hands-on making and creating in teams
To appreciate scale and ways of making using different media
To move students on from 2D drawings to 3D modelling and prototyping when generating ideas

The goal:
Students create a new 3D object by taking turns to add new materials and elements.

How:
Students can do this activity in their teams.
Timing: 20 - 30 mins

You need:
3 materials for each team (e.g. clay, straws, existing objects, blue-tack, string…)

Hygiene, Health & Safety:
Hygiene standards should be considered for activities, including: regular hand washing, the use of gloves for object handling and cleaning any shared materials with antibacterial wipes/spray between handlings.

The activity:
Each member of the team starts by making something in one material then passes it on to the next team member to add something but using a different material.

You can time the students, giving them a set amount of time (maybe 3- 5 minutes each) before passing it on to the next member of their team. Make sure all team members contribute.

Discussion
Once they have created an object, get students to discuss the following in their teams:
Function: What has been created? What could it do?
Target User: Who could it be used by? How would they use it?
Materials: What could It be made of?
SWOT analysis: What is good about it? What are its weaknesses? How could it be improved?
Once they have tweaked their object based on the above, they should present it to the rest of class for further feedback.

Presentation and feedback
Get students to present their object, its function, target user and materials to the rest of the class. Other students can ask questions or offer feedback.

(OPTIONAL) Paper Forms Workshop Video
For a similar workshop, see the Design Ventura Paper Forms Workshop, a standalone, hour long workshop that can be run alongside the video, by pausing at the appropriate moments. This also aims to help students starting working in 3D by using function to follow form.