## MAKE A BOAT AND SEE IF IT FLOATS!



# **CUSTOM HOUSE, LONDON, 1932**

By Henry Rushbury (1889-1968) Watercolour, ink and pencil on paper Glen Bott Collection, University of Nottingham

Today's activity is inspired by the painting, *Custom House* by Henry Rushbury, pictured above.

## **YOU WILL NEED:**

- A selection of recycled materials (toilet roll tube, milk carton, fruit tub etc.)
- Card plain or coloured
- Tape / Glue
- Scissors
- A vessel for water (bucket, washing up bowl, bath etc.)
- Decorative items (optional).

## FOR THE FULL-PROOF BOAT, YOU WILL NEED:

• Used plastic bottle, empty & clean

- Card plain or coloured
- Tape / Glue PVA or glue stick
- Elastic bands
- Cork, halved
- Cocktail stick
- Decorative items (optional)

#### **INSTRUCTIONS:**

- 1. Firstly, look at the boats in the painting. What sort of shape are they? Are they all the same? Do they look like boats you might see on rivers today?
- 2. Thinking about materials that you have access to at home, what properties are needed to design a good boat...
  - a. Is it waterproof? Will it float? Will it be steady enough to hold something? Is there potential to add decorative elements to improve the look of your boat?
- 3. Once you have thought about these things, it is now time to plan your design! On a piece of paper draw your ideas for your boat. Think about the materials you will need to use and label them on your design. (Make sure you have permission to use the items / materials before including them in your design!). If you have time and a few options of materials to use, you could design more than one boat.
- 4. Now it is time to make your boat! Remember to keep looking back at your design and include all of the elements you planned.
- 5. Once you have finished, now is the fun part... let's see if your boat floats!! With help from an adult, fill a washing up bowl or shallow bath with water. Put you boat on the water and see if it stays upright and afloat. If you have made more than one boat, test them all and see which is the best.
- If your boat floats congratulations! You have designed a successful boat.
- 7. If your boat does not float not to worry, have a look back at you initial design and think about what you could do differently.

## THE FULL-PROOF BOAT:

Create a full-proof floatable boat like ours using some easily accessible materials.

- 1) Assemble your boat. Take one half of a cork and place it in the centre of the empty bottle you are using. Secure in place using two strong elastic bands at either end.
- 2) Make a sail. Cut out two triangular shaped pieces of the same size from your choice paper. Glue the inside of one piece and place a cocktail stick in the centre with 1/3 of the stick unstuck and poking out at the bottom. Attach the other coloured piece down and press down hard to secure the cocktail stick in place. Poke the end of the cocktail stick into the centre of the cork to attach the sail to your boat.
- 3) Decorate! Add stickers, paint or additional features to your boat to make yours unique.
- 4) Take your boat to the water and enjoy watching them float. You can even have a race to see which boat wins.



