## Eccentricity

Eccentricity is a modular assembly puzzle.

The challenge is to assemble six simple asymmetric modules into an eccentric cube i.e. one which shows a different pattern of lighter and darker areas on every face.

The picture to the right shows a way of putting the modules together so that every face is the same. This
 is the exact opposite of what is required to solve the puzzle.

I designed the modules for Eccentricity in 2009. The design was revisited and the puzzle restated in 2016.

You will need six squares of irogami or dup paper. Begin folding the modules with your paper arranged coloured or darker side up.


1. Make a tiny crease to mark the centre of the right edge.

2. Fold in half sideways.

3. Turn over sideways.

4. Fold the right edge of just the front layer inwards so that the crease forms one third of the way across the paper. You should be able to do this fairly accurately by eye alone

## 5 <br> 



5. All three areas should be approximately the same width. Adjust if necessary then turn over sideways.

## 7


7. Open out both front flaps to right angles.
6. Fold the top and bottom edges to the centre using the tiny crease made in step 1 as a guide.
8

8. The module is finished. Turn over sideways.

9. Make all six. The module has two flaps and two pockets, which are indicated by the arrows. The object of the puzzle is to put the modules together in such a way that every face of the cube shows a different pattern of lighter and darker areas. Several different solutions are possible.

10. This is not the solution to the puzzle! This picture shows you how to put the modules together to produce the cube shown in the picture on page 1 in which every face of the cube shows the same pattern of lighter and darker areas.

## 11


11. By turning the cube over forwards you can see that the front and back of this version of the cube are identical. There are many interesting ways to put these modules together which are also not solutions to the puzzle! Enjoy!

## Assembling the pieces

## 11 <br> 12

16. 
