

# Ornaments & Pattern Design with Fuse Beads

Grades 3–6 | Creative & Mathematical

Name: \_\_\_\_\_ Date: \_\_\_\_\_

**Ornaments** are repeating, symmetrical patterns. They are found everywhere: on wallpaper, tiles, fabrics, and in nature. With fuse beads, you can design your own ornaments!

## What makes a good ornament?

### ✓ Symmetrical

The pattern has one or more axes of symmetry. It is regular and pleasing to the eye.

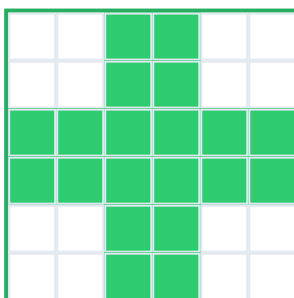
### ✓ Repeating

A basic pattern is repeated multiple times (e.g. in a row or in a grid).

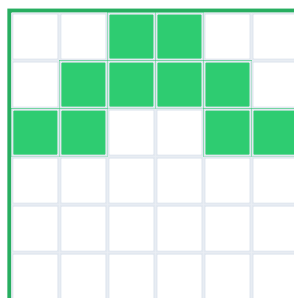
## Exercise 1: Ornament Analysis

Look at the ornaments below. What is the basic pattern? How many axes of symmetry does it have?

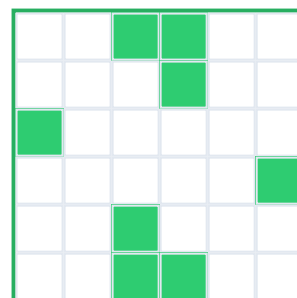
**Pattern A**



**Pattern B**



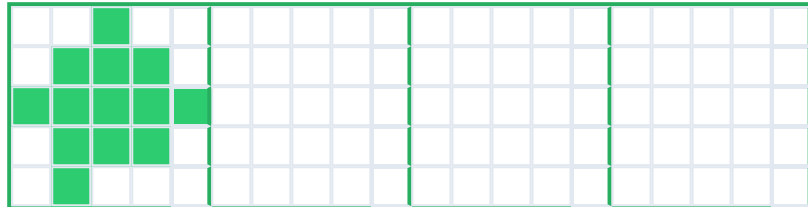
**Pattern C**



## Exercise 2: Your first simple ornament

Design a simple basic pattern (size: 4x4 or 5x5 beads) and repeat it 4 times next to each other. This will be your ornament!

Use max. 2-3 colors. Square grid paper helps!




## Exercise 3: Color swap ornament

Take a simple pattern. Swap the colors. The same pattern – but a completely different look! Design 3 color variants of the same pattern!

## Inspiration: Ornaments in Nature & Culture

- **Nature:** Snow crystals, honeycombs, leopard fur, bird feathers
- **Culture:** Persian carpets, Moroccan tiles, Japanese kimonos, African weaving patterns
- **Architecture:** Church windows, mosaic art, wall borders

 **Research task:** Find an ornament from your home or surroundings. Sketch it and explain what kind of symmetry it has!