



## Lesson: Observational Nature Drawings

Ages: 5-18

Projected time: 1 hour

**Supplies needed:** Paper and pencil. Optional: magnifying glass, charcoal pencils, colored pencils, markers, pens, etc.

**Project Intro:** Let's look closely at natural objects and do observational drawings of them. By observing carefully as we draw we can get a better sense of the shapes of objects (and the spaces and shapes around them), and use our scientific and artistic minds at once!

**Artist or Medium Reference:** Maria Merian was a German Scientific Illustrator in the 1600s, check out her watercolor (image1) from *The Catterpillar Book*, which combined insect and plant illustrations. Also take a close look at Imao Keinen's woodblock print illustration from an 1891 series of woodcuts focusing on the 4 seasons (image 2). What do you see? How are these images similar and different? If you're interested in learning more check out: <https://hyperallergic.com/97027/when-art-was-the-scientists-eye-400-years-of-natural-history-illustrations/> , <https://www.nature.com/articles/d41586-019-03306-9> , <https://histsciart.com/tag/women-in-scientific-illustration/> , <https://collections.mfa.org/objects/532330>

**Vocabulary:** Scientific Illustration is how scientist have kept track of plants and animals since long before photography.

Botanical Illustration is the same type of thing, just focusing on plants.

Line is an important element of art, and is a point moving on a paper or in space.

### Project steps:

**Step 1:** Go right outside of your home and find 2 or 3 natural things to draw. These can be any kind of natural things – like leaves, acorns, sticks, pinecones, flowers, weeds, grass, rocks, shells, bugs, seeds, etc. Indoor potted plants (even small herbs in pots) are great too. Any kind of natural thing makes a great drawing.

**Step 2:** Look carefully at the objects you've chosen. Notice where their outlines are, and where they have lines that cross them, like leaf veins or stripes. Before you start drawing think about what kinds of lines you will use to draw.

**Step 3:** Start drawing, move your pencil slowly and press lightly with your pencil in case you want to erase later. Carefully draw everything you see. The lines you use may be different sizes or thicknesses, they may be wavy, jagged or straight – depending on what you are drawing. Observe and draw what you see.

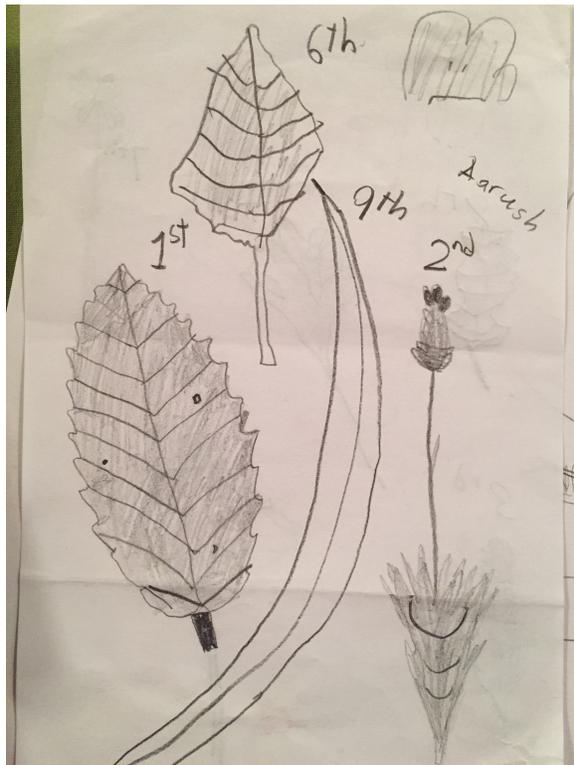
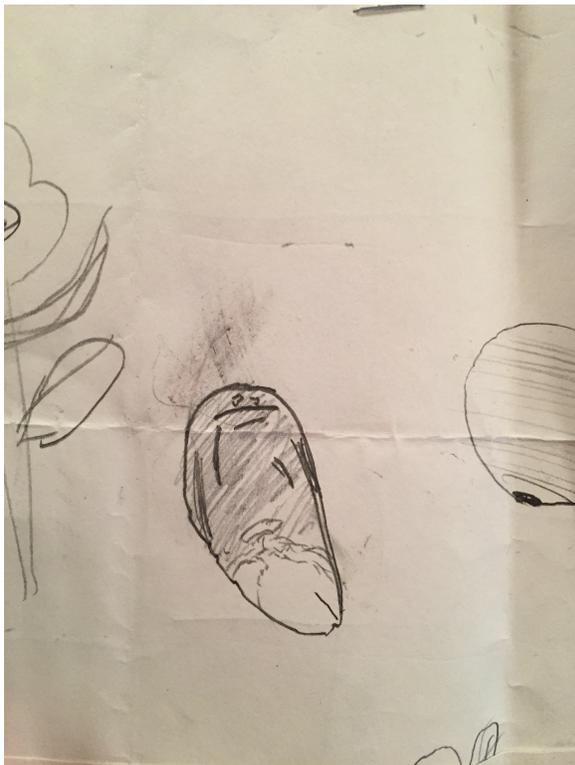
**Step 4:** When you're done drawing the first thing chose another one, and follow the same slow scientific approach. You can color them in if you'd like as well, with whatever you have on hand or want to use.

**Step 5:** Once you've filled up your paper with drawings of natural objects it's time to label them. You can label them with whatever information you think is important.

What are they called?

Where did you find them?

Don't forget your name and the date.



Here are a couple of student examples. The second one has labels of the order the plants were drawn in.



Image 1. *Plantago major* with metamorphosis of *Lacanobia oleracea*, Maria Sibylla Merian, 1679, Germany



Image 2. Spring Group (Four Seasons Series), Imao Keinen 1891, Japan