

Scientific Drawing

Erica Ross

KWL

- ▶ Have you heard of scientific drawings or scientific illustrations?
- ▶ How do you think doctors, scientists and engineers shared information before cameras, television and computers were invented?

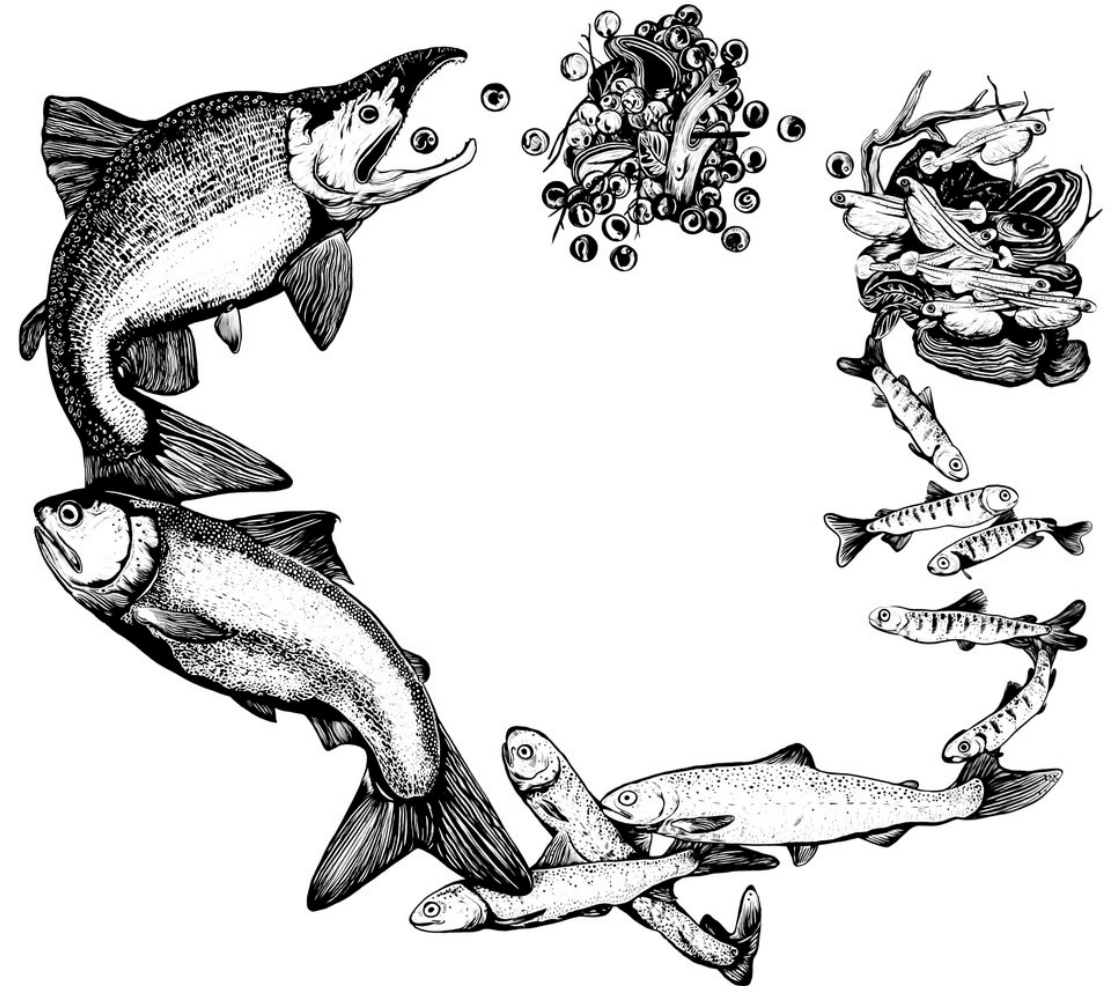
What is scientific drawing?

- ▶ Scientific drawings can be made using several methods, depending on the particular lab or experiment and the purpose of the drawing. These drawings show the relative size, shape, and location of different features of what is being drawn. Scientific drawings are labeled to show the different features.

7 scientific illustrators that paved the way

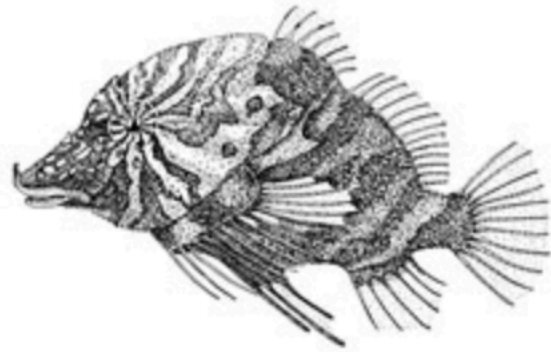
- ▶ <https://www.youtube.com/watch?v=FDfNtGw3lug>
- ▶ This art form can also be thought of as precise drawing. What professions need precise drawings or renderings?
- ▶ Try to write down at least one new or fun fact that you learn from the clip

Elizabeth Lent from Fairbanks Alaska



Catie Bursch is a Marine Educator and Scientific Illustrator

She works with the Alaska Department of Fish and Game, working at the Kachemak Bay Research Reserve in Homer



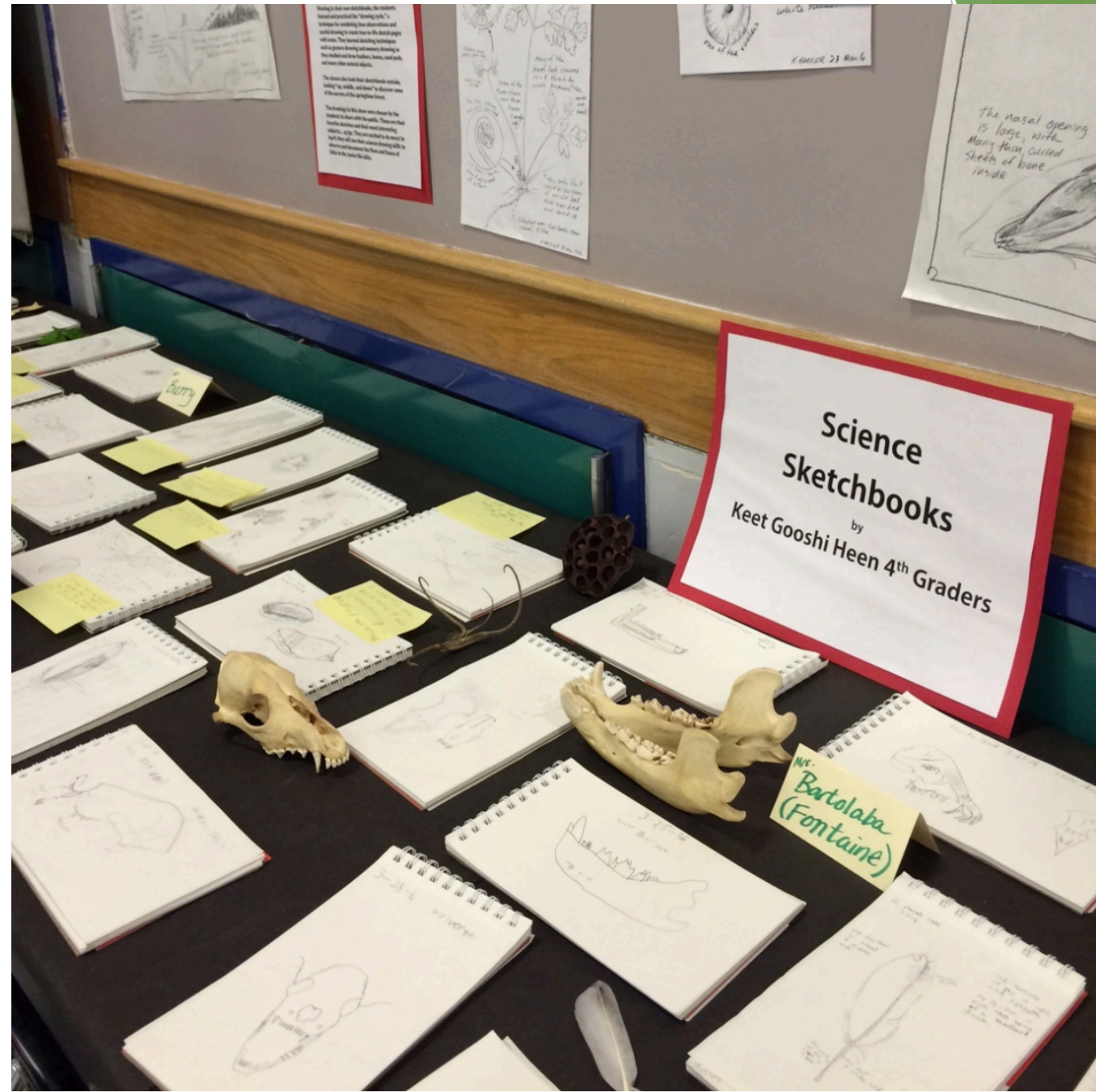
© Bursch - 2008 *grunt sculpin* *Ampelisca nassidensis*

An illustration of a grunt sculpin by Catie Bursch



A dissection microscope and preserved specimens are part of Catie Bursch's workspace

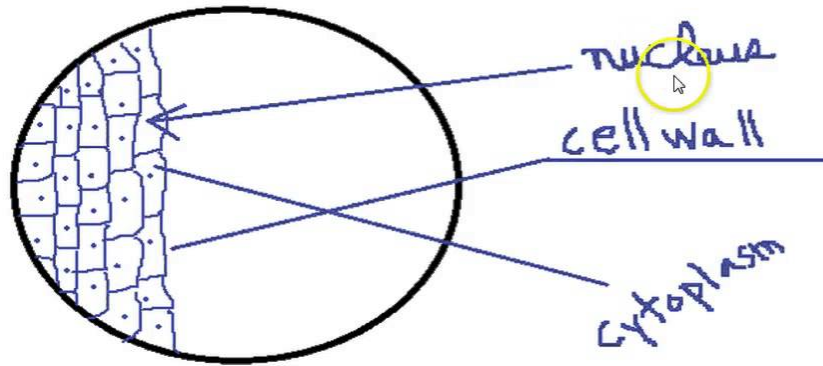
Examples from students in Sitka



Technique practice

time to practice what we have discussed

Can you name 6 mistakes in this drawing?



Practice drawing what you see!

- ▶ Remember to take your time!
- ▶ Only draw what you see
- ▶ Use a ruler or a straight edge
- ▶ Use interesting clear fonts
- ▶ Add the date and your title
- ▶ Pencil first and pen last
- ▶ All labels go on the right side
- ▶ Use clear printing
- ▶ Only use color if it is necessary

Other resources for educators from professional scientific illustrators from around the state of Alaska

<http://www.hannahpmode.com/juneau-icefield>

http://www.adfg.alaska.gov/index.cfm?adfg=wildlifeneews.view_article&articles_id=416

<https://www.juneauempire.com/news/youth-art-activity-focuses-on-artifacts-and-scientific-sketches/>

<https://medicalart.johnshopkins.edu/katelyn-mcdonald/>