

TEACHING APPRENTICESHIP PROGRAM

CONTEXT

Provide context for the lesson. How, if at all, does it fit within a unit? Who are the learners? How long will the lesson last?

This is a lesson introducing writing introductions for a scientific poster on seafood fraud. Students will read and annotate an exemplar introduction in order to determine what an intro consists of. 45 minutes

COMMON CORE STANDARDS

If applicable, provide specific standards that the lesson will target. Indicate if the standard is being introduced (I), practiced (P), or assessed (A) in this lesson.

(P) CCSS.ELA-LITERACY.RI.6.4

Determine the meaning of words and phrases as they are used in a text, including figurative, connotative, and technical meanings.

GOALS

What are your goals for the lesson? Specifically, by the end of the lesson, 1) what do you want students to *know*? 2) what do you want students to be able to *do*? and 3) what you want them to *understand*? Not all lessons will have all goal-types.

Students will know the main components of an introduction for a piece of scientific writing Students will be able to interpret highly specific writing using context clues

ANTICIPATORY PLANNING

Put yourself in the shoes of your students. Where in the lesson do you anticipate that they will struggle, and why? What questions, about procedures and/or about the content, do you anticipate that they might pose? How will you respond? (Math teachers can also use this more comprehensive anticipatory planning resource.)

Transition: 30 seconds to transition

Pass out papers beforehand

Emphasize that it's harder than we can understand; none of us are specialists. We're going to grapple with it even if we don't even know what it's saying.

Nobody knows how to pronounce these words. Try to say it like you know how to say it (this is practicing something called fluency-- reading smooth and fast like you know what you're doing. This helps it be more comprehensible) Read through it and see what you can figure out, see if you can impress yourself with how much you can figure out. You can kind of skip things you don't know and just try to get a sense.

PROCEDURE

Please provide specific descriptions of all activities, including estimated times and who/what/where, scripts of key points you plan to emphasize and questions that you plan to ask, and examples of what students might think or do.

Framing or Launching the lesson (connections, context, norms, or objective):

Instructions: (5 min)

We are going to look at a piece of scientific writing, an introduction from one of the scientific posters you all looked at, that's *way* harder than we can understand; none of us are specialists. We're going to grapple with it even if we don't even know what it's saying.

Nobody knows how to pronounce these words. As we read aloud, try to say it like you know how to say it (this is practicing something called fluency-- reading smooth and fast like you know what you're doing. This helps it be more comprehensible)

During the lesson:

Students read through independently 1 time (5 min)

- Read through it and see what you can figure out, see if you can impress yourself with how much you can figure out. You can kind of skip things you don't know and just try to get a sense.
- Annotate things you notice it's including

Students read aloud 1 time (Ask for volunteers. 1 sentence at a time.) (5 min)

 We're thinking about what sorts of things an intro includes, without getting hung up on what we can't figure out

Go through it together as a class (12 min)

- What sorts of things are you noticing an intro includes? As we're doing this, if you see something that you haven't added to your paper, you might add it

Focus on: What kinds of things are they saying? (color code)

Arrive at:

- Defining important terms (what are some of the words that you need to understand to understand this article?)
- Providing necessary background information that relates to their research on Alzheimer's
- Introducing their research project: this is what we did
- How they tested: this is how we did it
- Why it's important: this is what can be done with the results

Brainstorming for our project: (15 min)

- On the bottom section, thinking about the seafood fraud project, make a list of everything you think your intro might need to talk about (5 min)
 - Table groups discuss and come up with refined list-- what can you add so your table group has a really good idea (5 min)
 - As a class, arrive at: (5 min)
 - Defining seafood fraud
 - Why seafood fraud matters
 - What is DNA
 - How does seafood get to your plate (fishery systems)
 - What are some of the struggles with our current seafood system
 - Defining DNA barcoding and contextualizing it within this experiment
 - Explain how you will test

Closing the lesson (synthesizing, checking for understanding, or connecting to the future): Exit Card: Collaboration reflection for partner work on scientific poster

FORMATIVE ASSESSMENT

How will you assess students' thinking throughout the lesson? What are key moments to check for understanding?

Check that students are arriving at decided parts of a scientific intro and seafood fraud intro