

Teaching the layers of the forest through poetry and writing

By Beth Chitwood

Overview: This lesson will introduce participants to the layers of the forest through sensory observations and poetry.

National Geography Standards:

Essential Element: Places and Regions

Geography Standard 6: How culture and experience influence people's perceptions of places and regions

Essential Element: Physical Systems

Geography Standard 8: The characteristics and spatial distribution of ecosystems and biomes on Earth's surface

Essential Element: Environment and Society

Geography Standard 15: How physical systems affect human systems.

Oregon Geography Content Standards:

6.12 Collect and analyze data to describe regions of the Western Hemisphere.

Oregon Language Arts Content Standard: Common Core: Text Types and Purposes Writing Standard 3

6.W.3 Write narratives to develop real or imagined experiences or events using effective technique, relevant descriptive details, and well structured event sequences.

6.W.3.d. d. Use precise words and phrases, relevant descriptive details, and sensory language to convey experiences and events.

Connections to Human Geography:

When people think about Oregon they often think about lush green forests and visually stunning old trees. The feeling we get when we go camping and hiking not only helps our mental health, but studies show experiences with nature improve overall self-esteem, community involvement, academic performance, and personal health.

Forests provide us a place for recreation and relaxation. Forests also supply renewable resources for lumber, paper and heating. How would our daily life change without forests? In Oregon, almost 50% of our states 61 million acres is forestland.

In 1971, Oregon was the first state in the nation to enact forest protection laws. These laws are continually reviewed in response to new scientific research. The Oregon Forest Practices Act requires:

- Reforestation within 6 years
- Protection of water sources close to streams to protect fish and drinking water
- Protection of wildlife habitat including trees, snags, and fallen logs
- Limits on clear-cuts to no more than 120 acres by the same owner

Objectives:

In completing this activity, participants should be able to:

1. Recognize the layers of the forest including emergents, canopy, understory, and forest floor.
2. Use sensory images and descriptive language to write an “I Am” Poem based in the setting of a forest, from either the student’s perspective or a creature's perspective.

Grade Levels: 6th **Time:** 2 days (45 min. periods)

Materials:

Sensory chart (see appendix A)
Old Growth Forest photo (appendix B)
“I Am Poem” template (appendix C)
“Layers of the Forest” (appendix D)
“I Am Poem” Scoring Rubric (appendix E)
Pens
Clip board or something hard to write on.

Background for teachers:

The Pacific Northwest old-growth forest is dominated by conifers. The old-growth forest trees are generally 350-750 year old. The Pacific Northwest forest is unique because of the size and age of the trees. The climate includes mild wet winters and warm dry summers.

Using the O.W.L.S. acronym below, introduce kids to the parts of the forest. Parts of the old-growth forest include: Old trees, Woody debris, Layers in the canopy, Snags

The old-growth forest has 4 main components:

Old trees- The huge trees bring energy into the forest through photosynthesis. Each tree stores organic material and nutrients which are eventually recycled back into the ecosystem. The ancient trees eventually produce snags.

Woody debris- As a tree falls onto the forest floor, it creates woody debris. This decay process takes decades to complete. During the decomposition process, the tree becomes home for a variety of living creatures including shrews, salamanders, centipedes, carpenter ants and spiders. Eventually the rotting tree becomes a “nurse log” for new trees to grow on. Mushrooms and other fungi also like to grow on “nurse logs”. “Nurse logs” tend to help specific species such as Western Hemlock.

Layers- The old-growth forest has many layers in the canopy. The old large branches require the younger smaller trees to spread their branches to reach the sun light. The historic Pacific Northwest forest is very different from the dominant Douglas Fir forest of today. Douglas Firs need lots of light and don’t do well in a layered forest. Logging has changed our forests over time because of the value of Douglas Fir Trees. Shrubs such

as rhododendrons create another layer. The picture in Appendix B shows a natural setting including the four layers of the forest.

The four layers from the top are:

- Emergent
- Canopy
- Understory
- Forest Floor

Appendix D give an example of plants, trees and animals that might live in each level of the forest.

Snags- Snags are standing dead trees that serve a critical role in the forest. A tree can die for a variety of reasons, including: insect, disease, lightening, wind or snow damage. As it dies, it becomes a snag. Young trees also can become snags through fire, disease or other forces. Snags provide homes for wildlife such as spotted owls or the pileated woodpecker.

Ancient old-growth trees are part of a special ecosystem. An ecosystem is dynamic and alive. Energy, organic materials, or living organisms in the ecosystem fuel all the life and activity. Trees and plants bring life and energy into the ecosystem through photosynthesis. Trees provide organic matter in their wood and needles. The soil stores huge amounts of water. Did you know recycling happens in the forest as well? As an animal or tree decomposes, the organic material provides nutrients to become food or energy for the living organisms in the ecosystem. If these forests were cut down, imagine the massive impact this has on the plant life, wildlife, and healthy living for us all.

Procedures:

1. In class, have a discussion about the five senses. Brainstorm what they are and examples of using each. Introduce the “I Am Poem” (Appendix C) in class. Students use descriptive language and their imagination to write a poem about him or herself using the template provided. This poem should represent who they really are and things they dream or think about.
2. In the old-growth forest students will observe the layers of the forest using the O.W.L.S. acronym and record data on the sensory chart provided. (Appendix A)
3. At camp or back at class, students will use the data they collected and sensory observations to create another “I Am Poem” based on the observation data they recorded in the forest setting. This poem could be written from the perspective of an animal that lives in the forest or from the student’s point of view of how the forest impacts them.

Assessment:

Using the rubric provided, the student’s writing is scored based on the Oregon Writing Scoring guide and the assignment requirements. Along with exceptional writing practices, students will include four of the five senses not including taste. The writing will relate to the old-growth forest.

Extensions and/or Adaptations:

Students needing an extension will write a 3-5 paragraph narrative story as if they are an animal living in the forest. The story should include the parts of the forest along with tree/shrub identification.

Sources:

Forests and Old Growth. (n.d.). Retrieved August 11, 2016, from <http://www.oregonwild.org/>

Oregon Forest Resources Institute. *Into the Forest* Student and Teacher Guide. [Publication]. (2015). Portland, OR.

Sensory Observation Sheet

Appendix A

Sights	Smells
	
Touch	Sounds
	

Appendix B



http://pages.uoregon.edu/ecostudy/elp/ee_forest_07/Educational_Resources.

Appendix C

Writing an "I Am" Poem

MODEL

FIRST STANZA

I am (2 special characteristics you have)
I wonder (something of curiosity)
I hear (an imaginary sound)
I see (an imaginary sight)
I want (an actual desire)
I am (the first line of the poem repeated)

SECOND STANZA

I pretend (something you actually pretend to do)
I feel (a feeling about something imaginary)
I touch (an imaginary touch)
I worry (something that bothers you)
I cry (something that makes you sad)
I am (the first line of the poem repeated)

THIRD STANZA

I understand (something that is true)
I say (something you believe in)
I dream (something you dream about)
I try (something you really make an effort about)
I hope (something you actually hope for)
I am (the first line of the poem repeated)

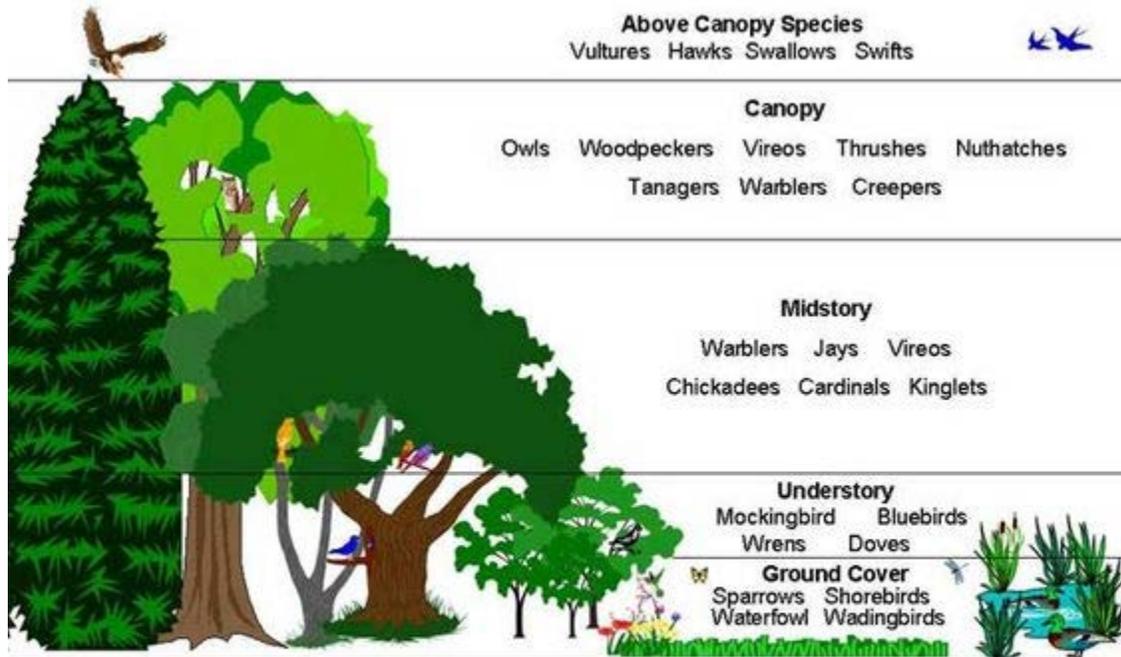
EXAMPLE

I am polite and kind
I wonder about my kids' future
I hear a unicorn's cry
I see Atlantis
I want to do it all over again
I am polite and kind

I pretend I am a princess
I feel an angel's wings
I touch a summer's cloud
I worry about violence
I cry for my Gram
I am polite and kind

I understand your love for me
I say children are our future
I dream for a quiet day
I try to do my best
I hope the success of my children
I am polite and kind.

Appendix D



Canopy		Midstory	Understory		Ground Cover	
Junipers	Hickories	Ash	Tall Shrubs	Low Shrubs	Prairie	Wetland
Pines	Oaks	Maples	Dogwoods	Agaritas	Gramas	Sedges
Cedars	Elms	Sweetgum	Viburnums	Yaupons	Bluestems	Rushes
Maples	Pecans	Hackberries	Hawthorne	Wax Myrtles	Paspalums	Cattails

"I Am Poem" Scoring Rubric

Appendix E

CATEGORY	4	3	2	1
Ideas and Content	The entire writing is related to the assigned topic. The writing is exceptionally clear, focused, and interesting. It holds the reader's attention throughout.	Most of the writing is related to the assigned topic. The writing is clear and focused. The reader can easily understand the main ideas.	Some of the writing is related to the assigned topic, but slightly offtopic	No attempt has been made to relate the story/poem to the assigned topic. The writing lacks a central idea or purpose.
Organization	The writing is very well organized. One idea or scene follows another in a logical sequence with clear transitions.	The writing is pretty well organized. One idea or scene may seem out of place. Clear transitions are used.	The writing is a little hard to follow. The transitions are sometimes not clear.	Ideas and scenes seem to be randomly arranged.
Creativity	The writing contains many creative details and/or descriptions that contribute to the reader's enjoyment. The author has really used his imagination.	The writing contains a few creative details and/or descriptions that contribute to the reader's enjoyment. The author has used his imagination.	The writing contains a few creative details and/or descriptions, but they distract from the story. The author has tried to use his imagination.	There is little evidence of creativity in the story. The author does not seem to have used much imagination.
Conventions	Writing is easy to read aloud. The writing demonstrates exceptionally strong control of conventions (e.g., punctuation, spelling, capitalization, grammar). Errors are so minor that the reader can easily skim right over them..	Minor errors, while perhaps noticeable, do not impede readability. The writing demonstrates control of standard writing conventions (e.g., punctuation, spelling, capitalization, grammar and usage).	The writing demonstrates little control of standard writing conventions. Frequent, significant errors impede readability.	Numerous errors in usage, spelling, capitalization, and punctuation repeatedly distract the reader and make the text difficult to read.

Observation Exercise: Layers of the Forest

Directions:

In the old-growth forest you will find a quiet location and observe the layers of the forest using the four senses (sight, smell, sound, touch). You will have 15 minutes to record data on the sensory chart provided.

At camp or back at class, you will use the data collected on the sensory chart to create another “I Am Poem”. This poem should be written from the perspective of an animal that lives in the forest or from your own point-of-view of how the forest makes you feel.

Take 15 minutes to find a quiet spot to record observations. Use the Sensory Observation sheet on the next page.

Follow up discussion questions:

1. What would happen if there were no snags?
2. How would our daily life change without forests?
3. How would the forest change if there were no salamanders, centipedes, or carpenter ants?

Be prepared to share your sensory observations with a partner and discuss observations with the class. Volunteers will be asked to read their poem to the class.