Teacher(s): Tammara Purdin

Grade(s): 3-5

Subject(s): Integrated ELA, Social Studies, and Science

Title of Lesson: Global Warming and Comparisons

Learning Objectives:
- Students will visualize the Greenhouse Effect
- Students will compare and contrast Florida habitats
- Students will create a sequence map for climate change

Standards Addressed:

LAFS.3.RI.3.7 Use information gained from illustrations (e.g., maps, photographs, etc.)
SS.3.A.1.1 Analyze primary and secondary sources.

SC.4.L.17.4 Recognize ways plants and animals, including humans, can impact the environment.
SS.4.G.1.4: Interpret political and physical maps using map elements
SS.4.A.1.1 Analyze primary and secondary resources to identify significant individuals and events throughout Florida history.

SS.5.A.1.1 Analyze primary and secondary sources to understand history
SC.5.I.15.1 Describe how, when the environment changes, differences between individuals allow some plants and animals to survive and reproduce while others die or move to new locations.

Lesson Outline:
- TTW display a pan balance with 100 gram weights on one side and with 60 gram weights on the other side. TTW explain we are giving off 100 grams of carbon and only 60 grams of carbon are being taken away. We need it balanced. Due to the unbalance, this is causing the Greenhouse Effect and leading to climate change issues.
- TSW view video on Climate Change https://www.youtube.com/watch?v=ITpHgTh66tY
- TSW discuss one thing they learned with their shoulder partner
- TSW discuss one thing they can do to make a difference
- TSW read article “What brings about more Greenhouse gases?”, with a partner

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• TTW reread the article aloud, as students create notes in the margins (highlighting important facts/details, commenting, and/or questioning)
• TSW create a Multi Flow Map showing Greenhouse Effect
• TSW look at the 1995 South Florida habitat map and do Kagan Rally Robin (partner A gives one response, then partner B gives one response, repeat) on what they see (timed 30 seconds-1 minute)
• TSW look at the projected version of the South Florida habitat map and do Kagan Rally Robin (timed 30 seconds-1 minute)
• TSW create a Double Bubble Map using the South Florida’s habitat maps (1995 and projected version)
• TSW create a paragraph from the Double Bubble Map

Systems thinking connection (learning habits and/or tools used):

Habit: Changes over time
Questions to ask…
“What important elements have changed in the system?”
“How have the elements changed over time?”
“What changing elements represent amounts and how quickly/slowly are they increasing or decreasing?”
“What patterns or trends have emerged over time?”

Strategy:
visual and listening/speaking

Learning Strategies:
Close reading
Thinking Maps
Kagan (cooperative discussion)

Science Concept(s):
How humans can impact the environment.

Humanities Concept(s):
What humans are doing to heighten global warming.
What humans can do to make a difference in global warming.

Student Assessment Strategies:
The paragraph will show understanding of global warming and it’s affects.

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Benefit to my students:

Knowledge of global warming
Knowledge of greenhouse effect

Resources and Materials (supplies needed for activities):

Online access for online video
Reading selection
Habitat maps
Paper/pencil