How does the animal diversity in the prairie compare to the playground?

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[4th Grade Science]

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Our Team

Photographer:
Mrs. DiSalle

Experimenters & Data Recorders:

Paisley, Adalyn, and Landon

Why are Native Prairies Important?

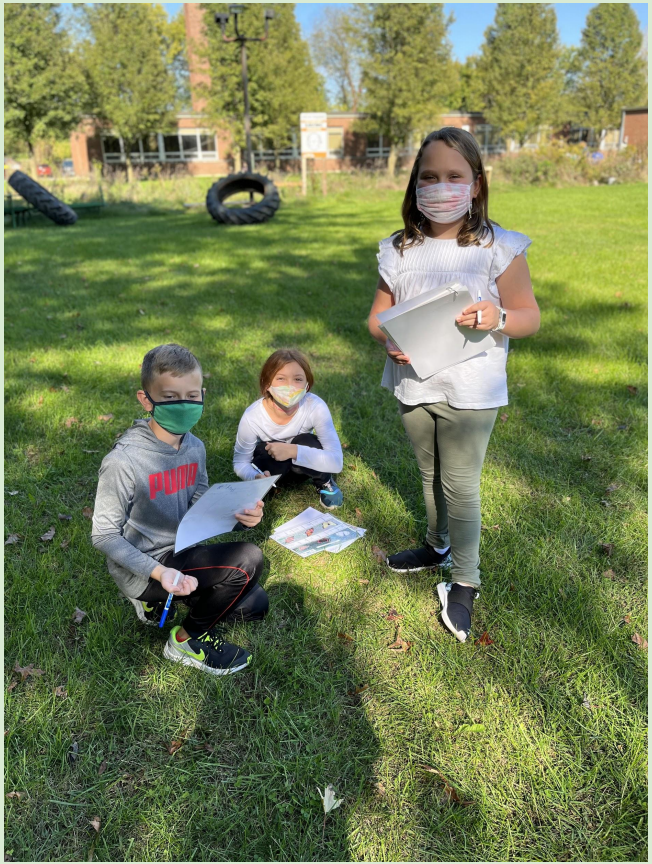
- Prairies are important because they are a great place for an animal to hibernate.
- Also a great spot for bees to collect pollen.

Research Question:

How does the animal diversity in the school prairie compare to the playground?

Research Hypothesis:

Hypothesis: We think the school prairie will have more animal diversity because there are more plants and animals in the prairie than the playground. Also the prairie has tall grass so it attracts more animals because they can hide in it or eat the grass.



Research Abstract

Our team researched animal diversity in the prairie. The data tells us that there are more animals in the prairie than the playground. Prairies are good for our environment, because the plants provide food and nutrients to insects, birds and animals. The soil is a home for worms and the native flowers give birds and bees nectar. Some solutions to benefit our environment is to plant more prairies and native plants. If we plant more prairies, we will have more animal diversity and a habitat for the animals.

Variables

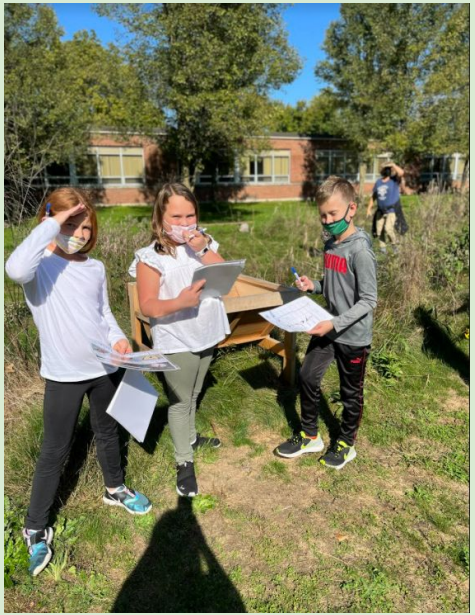
Independent Variables

The location was the independent variable. We counted the animal diversity in both locations.

The Playground

Dependent Variables

The animal diversity was the dependent variable. The plant diversity was measured in the number of different animal types counted.



The Prairie

Materials

- GLOBE cloud chart to identify cloud coverage on the observation day.
- Prairie animal checklist: insects, birds, butterflies, and mammals.
- Dry erase markers
- timer/watch

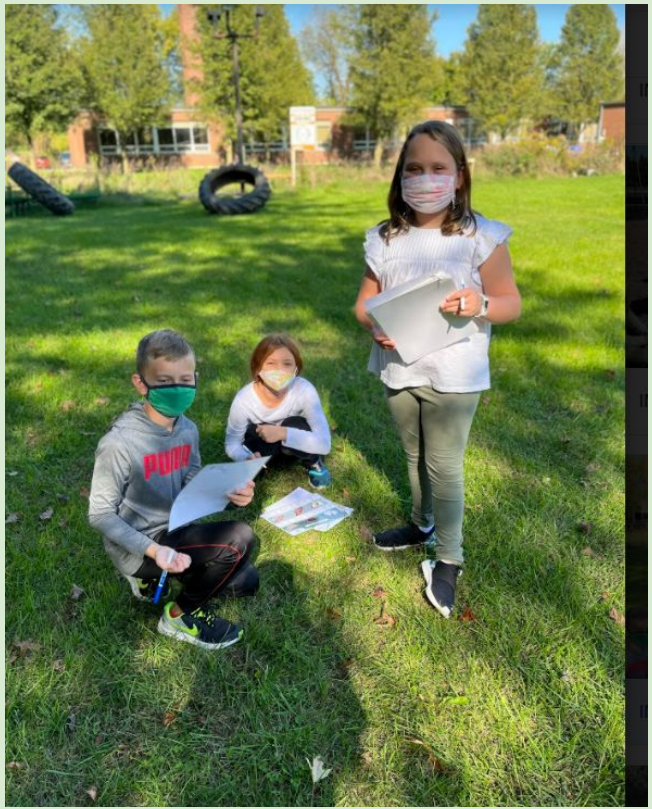
Step by Step Procedures

1. Use the GLOBE cloud chart to identify the cloud coverage.
2. Take the laminated animal checklist and dry erase markers.
3. Walk around all 4 quadrants of the prairie, observing very closely looking for animals for 10 minutes.
4. Tally the animal observations on the checklist.
5. Repeat steps 1-4 in the playground.

Playground observation: looking for birds

Weather Conditions Day of Research

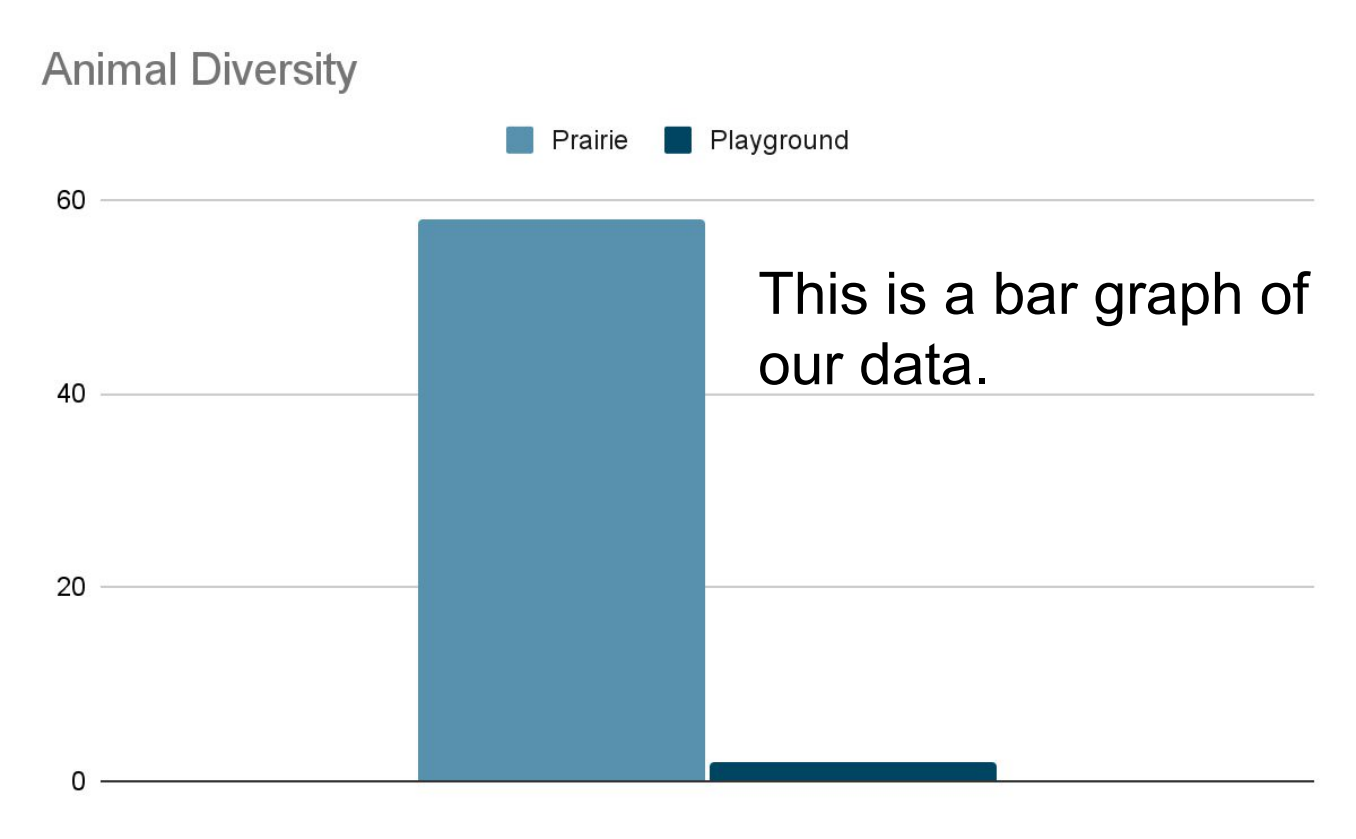
- Mostly sunny according to our GLOBE Cloud chart
- 72 degrees Fahrenheit
- Little to no wind
- No precipitation



Data Table: Comparing Animal Diversity in the Prairie to the Playground

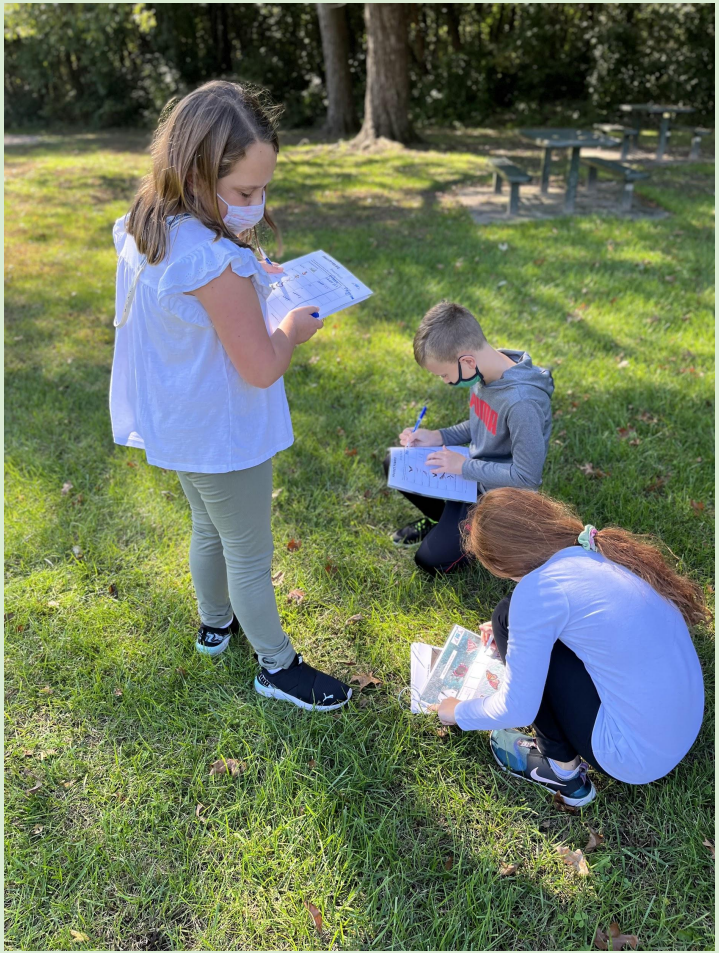
Locations	Prairie # of animal species	Playground # of animal species
Spot 1	7	1
Spot 2	1	0
Spot 3	7	1
total	**15 species**	**2 species**

Results: How does the animal diversity in the school prairie compare to the playground?



Conclusions:

- Clearly, there are more insects in the prairie than the playground.
- There are a few more birds in the prairie than playground.
- There is more animal diversity in the prairie than the playground.



Discussion: What does this mean?

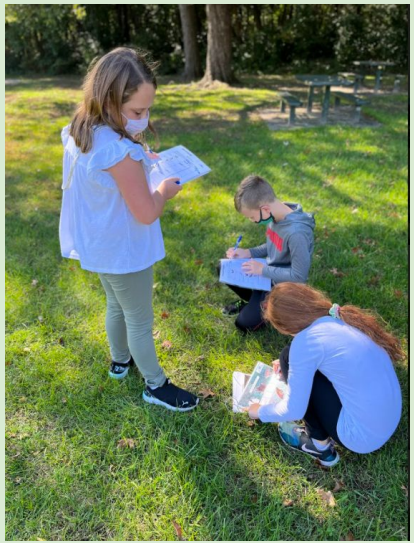
- There is more animal diversity in the prairie because
  There are more places for the animals to hide eat and make a home
- The prairie is a better habitat for animals because there is more plant diversity, so it attracts more animal species.

Discussion: Possible Solutions to help our part of the Earth!

- Create more animal habitats by planting native prairies, or even just a few native plants in your yard.
- Plant more trees and native plants to attract native animals and insects.
- You can increase the number of animals in our neighborhood by creating more habitats for them.
- Don’t use plastic bags & use refillable cups.

Questions? Collaboration? Thank You.

- Thank you to Mrs. DiSalle and Dr. Haney for helping us with the research and slides
- Please, feel free to ask us any questions you may have about our research.



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