

NORTHWOODS MAMMALS

LESSON PLAN



WOLF RIDGESM
ENVIRONMENTAL LEARNING CENTER

NORTHWOODS MAMMALS



CLASS DESCRIPTION: A Tools and Processes of Science Class

Students will relate concepts and processes of science to adventure as they unpack key parts of science like exploration and observation. During Northwoods Mammals, students engage in wildlife tracking field surveys—scent post survey in Spring, Summer, and Fall, and transects in Winter. The focus is on building the story of mammals in the Northwoods at Wolf Ridge and asking questions rather than identification. Thank you to BEETLES for developing the lesson sequence "What do scientists do?" as much of the class is based on that.

Total time: 3 hours (two hours outdoors)

Audience: 6-20 students, 4th grade through adult

Activity level: strenuous

Travel: 1 1/4 mile

Total uphill travel: 320 feet

GUIDING QUESTION

How could we use a mindset and the tools of science to find out what mammals live in the northwoods?

CONCEPTS

1. Science relates to all of us and is not limited to laboratories.
2. Challenges provide opportunities for learning and growth.
3. All living and nonliving components of an environment interact with one another to form an ecosystem.
4. Scientific inquiry uses multiple interrelated processes to investigate questions and propose explanations about the natural world.

OUTCOMES

Upon completion of Northwoods Mammals students will be able to:

1. Learn about a variety of core practices of science.
2. Relate concepts and processes of science to adventure.
3. Reflect on science practices they engaged in after conducting a field survey.
4. Build a story of animal activity by asking questions and making observations.



Our mission is to develop a citizenry that has the knowledge, skills, motivation and commitment to act together for a quality environment.

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Wolf Ridge Environmental Learning Center and the USDA are equal opportunity providers and employers.



Equipment

Classroom

- skulls
- TV
- card reader

Field

- track guides
- datasheets
- track molds
- pencils
- memory card for camera
- What feeds on dead deer?
- scents (spring, summer, fall)

Appendices

- Glossary
- Additional Information
- Optional Activities
- References
- Sources
- Class Sheets
- Spiral Learning Sheet
- Outline

Set-up (15 min.)

- Classroom/class prep description
- Safety Management

I. What do scientists do? (20 min.)

- A. Mystery Object
- B. Question Generating
- C. Making Connections
- D. Evidence-based Explanation
- E. Uncovering Mystery

II. How do we investigate our mystery? (30 min.)

- A. Track Exploration
- B. Field Guides

III. What mammals live in the northwoods? (110 min.)

- A. Group Roles
- B. Seasonal Survey
 - 1. Winter
 - 2. Scent Posts
- C. Trail Camera

IV. What story will I pass on about science? (20 min.)

- A. Data Summary
- B. Debrief Science Practices
- C. Science = Adventure

Clean-up (15 min.)