

2ND GRADE

BOULDER COUNTY ENVIRONMENTAL EDUCATION GUIDELINES DEVELOPED BY THE BOULDER COUNTY E MOVEMENT

2nd Grade Learning Objectives

We want our students to be inspired to understand that there is interdependence among animals, humans, and their environment. We want to facilitate opportunities for them to identify how problems arise when environments change, and to work with their peers to solve problems and answer questions.





2nd Grade Environmental Education Guidelines

Progression of place: The appropriate scale is school community within the local environment, with a focus on immediate surroundings.

NATURAL CONCEPT

Living things (including humans) meet their needs from their environment.

SOCIAL CONCEPT

Communities depend upon and make choices about resources.

The Guidelines

Head

ACADEMIC SKILLS AND KNOWLEDGE

- · A habitat includes food, water, shelter and space in a particular arrangement that meets the needs of the plants or animals living there. [CAS: SC.2.2.2.a.] [NGSS: 2-LS4-1]
- Organisms depend on their habitats' nonliving parts to satisfy their needs.

[CAS: SC.2.2.2.a.] [NGSS: 2-LS4-1]

- Each plant or animal has different structures or behaviors that serve different functions. [NGSS: Structure and function]
- Weather and the changing seasons impact the environment and organisms such as humans, plants, and other animals.

[NGSS: 2-ESS1-1]



- People in communities manage, modify, and depend on their environment. [CAS: SS.2.2.2.a.-d.]
- Maps show where things are located. One can map the shapes and kinds of land and water in any area.
- Water is found in the ocean, rivers, lakes, and ponds. Water exists as solid ice and in liquid form.

[CAS: SC.2.3.2.b; SC.2.3.2.c] [NGSS: 2-ESS2-3]

- Patterns in the natural world can be observed. [NGSS: Patterns]
- Learning can happen through observation including that of simple shapes, colors, and patterns. [NGSS: Patterns]



Heart

SOCIAL-EMOTIONAL LEARNING, AFFECTIVE NEEDS, SENSITIVITY, ATTITUDES AND SELF-EFFICACY

- Nurture care and respect for living things and natural areas.
- Foster a love of the natural world by modeling curiosity, appreciation, and wonder.
 Allow for and encourage imagination and creativity, questions, and stories.
- Provide unstructured time outdoors for play and imagination or time to sit/walk (goal: make this part of your routine with consistency and increased frequency).
- Practice skills in active listening in whole group settings, and during one-on-one interactions.

- Work together productively and collaboratively in small and whole groups for common goals and celebration of accomplishments.
- Model your thinking about how you feel when you go outside with your students.
 (For example, "Today, when we were outside, I noticed... I felt... I thought of...").
- Learn to rely on ourselves and on each other.
- Model and identify empathy and humility, especially in the resolution of problems.
- Learn how to disagree.



Hands

ACTION AND SERVICE

- Provide time for cooperative and social play in natural settings.
- Support a classmate—promote acts of kindness.
- Facilitate students in defining a simple problem based on evidence (For example, a classroom plant is not thriving. Why not?).
- Take action to make a positive impact or solve a problem in the classroom.
- Keep the playground free from trash and litter
- Complete a project to improve the school or schoolyard.

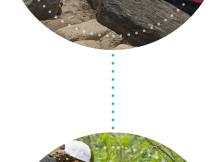
Feet

CONNECTION TO PLACE

- Build appreciation of, and familiarity with, surroundings—natural and built, including wildlife, people, plants, and neighborhood structures (streets, buildings).
- Foster understanding of our natural and cultural communities and how they extend from the school community to the local scale.
- Organize field trips that get students outside the classroom to see something from a new perspective.
- Provide for multiple encounters with a place over time.









Recommended Activities

Activities listed are intended to provide inspiration for how to connect to a local natural area, or plan a field trip with a partner organization.

- Engage in outdoor play in a natural area (schoolyard or park). Play with the students. Make this a regular part of your daily schedule.
- Grow a plant or plant a garden.
- Investigate nonliving needs of plants (sun, water, soil).
- Plan and conduct an investigation to determine if plants need sunlight and water to grow.
 [NGSS: 2-LS2-1]
- Develop a simple model that mimics the function of an animal in dispersing seeds or pollinating plants. [CAS: SC.2.LS.1] INGSS: K-2-ETS1-2]
- Observe and journal about one plant in the garden over time. (For example, watch for pollination and investigate behaviors and what function it serves, and describe how plants are impacted by seasons and weather.)

[NGSS: 2-ESS1-1]

 Dissect a plant when it is mature to see basic structures and relate to functions. Make observations of plants and animals to compare the diversity of life in different habitats.

[CAS: SC.2.LS.2] [NGSS: 2-LS4-1]

- Write a story/poem about connection with a special plant or animal.
- Conduct a photo study of a site over time.
 [CAS: SC.2.ESS.1]

[NGSS: 2-ESS1-1]

- Visit a local natural area on a field trip.
- Engage in senses through a silent hike or sit spot.
- Explore diversity of life in an ecosystem through observation and collection. [NGSS: 2-LS4-1]
- Highlight one plant and one animal that can be found in an ecosystem to talk about structure and behaviors that serve a function.

[NGSS: 2-LS4-1]

 Discuss resources available and human impact on the area.