

A Correlation of
Population Connection Materials

from

Sharing a Small World:
Environmental Activities for Young Learners

to

**New Jersey Core Curriculum
Content Standards**

Organized by:

1. Grade

2. Subject

3. Standard

4. Population Connection Activity

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Kindergarten

Language Arts

Language Arts.K.3.1 (Reading)

All Students Will Understand And Apply The Knowledge Of Sounds, Letters, And Words In Written English To Become Independent And Fluent Readers, And Will Read A Variety Of Materials And Texts With Fluency And Comprehension.

C. Decoding and Word Recognition

1. Recognize some words by sight.

Web of Life

Who Polluted the River?

D. Fluency

1. Practice reading behaviors such as retelling, reenacting, or dramatizing stories.

Crowding Can Be Seedy

Web of Life

Who Polluted the River?

4. Listen and respond attentively to literary texts (e.g., nursery rhymes) and functional texts (e.g., science books).

Web of Life

Who Polluted the River?

Sharing a Small World

E. Reading Strategies (before, during, and after reading)

3. Use picture clues to aid understanding of story content.

Web of Life

Who Polluted the River?

4. Relate personal experiences to story characters' experiences, language, customs, and cultures with assistance from teacher.

The Bare Necessities

F. Vocabulary and Concept Development

1. Continue to develop a vocabulary through meaningful, concrete experiences.

Creatures in Motion

Crowding Can Be Seedy

Earth Cookie

Go Fish!

Our Town

Web of Life

Who Polluted the River?

4. Use new vocabulary and grammatical construction in own speech.

The Bare Necessities

Creatures in Motion

Crowding Can Be Seedy

Earth Cookie

Go Fish!

Lend a Hand to the Earth

Our Town

Web of Life

Who Polluted the River?

G. Comprehension Skills and Response to Text

1. Respond to a variety of poems and stories through movement, art, music, and drama.

Web of Life

Who Polluted the River?

2. Verbally identify the main character, setting, and important events in a story read aloud.

Web of Life

Who Polluted the River?

Language Arts.K.3.2 (Writing)

All Students Will Write In Clear, Concise, Organized Language That Varies In Content And Form For Different Audiences And Purposes.

A. Writing as a Process (prewriting, drafting, revising, editing, postwriting)

1. Recognize that thoughts and talk can be written down in words.

The Bare Necessities

Lend a Hand to the Earth

7. Begin to sequence story events for writing using pictures, developmental spelling, or conventional text.

Web of Life

Who Polluted the River?

Language Arts.K.3.3 (Speaking)

All Students Will Speak In Clear, Concise, Organized Language That Varies In Content And Form For Different Audiences And Purposes.

A. Discussion

1. Share experiences and express ideas.

The Bare Necessities

Creatures in Motion

Crowding Can Be Seedy

Earth Cookie

Go Fish!

Lend a Hand to the Earth

Our Town

Web of Life

Who Polluted the River?

2. Participate in conversations with peers and adults.

The Bare Necessities

Our Town

3. React to stories, poems, and songs.

The Bare Necessities

Crowding Can Be Seedy

Web of Life

Who Polluted the River?

B. Questioning (Inquiry) and Contributing

1. Share in conversations with others.

The Bare Necessities

Crowding Can Be Seedy

Go Fish!

Our Town

Who Polluted the River?

2. Use oral language to extend learning.

The Bare Necessities
Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!
Our Town
Web of Life
Who Polluted the River?

C. Word Choice

1. Use language to describe feelings, people, objects, and events.

The Bare Necessities
Go Fish!
Our Town

Language Arts.K.3.4 (Listening)

All Students Will Listen Actively To Information From A Variety Of Sources In A Variety Of Situations.

A. Active Listening

1. Listen fully to understand instructions or hear daily messages.

The Bare Necessities
Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!
Lend a Hand to the Earth
Our Town
Web of Life
Who Polluted the River?

2. Listen to identify main characters and events in stories.

Web of Life
Who Polluted the River?

3. Listen to rhymes and songs to begin developing an understanding of letter/sound relationships.

Crowding Can Be Seedy

Language Arts.K.3.5 (Viewing And Media Literacy)

All Students Will Access, View, Evaluate, And Respond To Print, Nonprint, And Electronic Texts And Resources.

A. Constructing Meaning

2. Discuss favorite characters from books, film, and television.

The Bare Necessities

B. Visual and Verbal Messages

1. Begin to sequence a series of pictures or images to tell a story.

Web of Life
Who Polluted the River?

Kindergarten to Grade 2

Mathematics

Math.K-2.4.1 (Number And Numerical Operations)

All Students Will Develop Number Sense And Will Perform Standard Numerical Operations And Estimations On All Types Of Numbers In A Variety Of Ways.

A. Number Sense

1. Use real-life experiences, physical materials, and technology to construct meanings for numbers (unless otherwise noted, all indicators for grade 2 pertain to these sets of numbers as well).

- Whole numbers through hundreds.
- Ordinals.
- Proper fractions (denominators of 2, 3, 4, 8, 10).

Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!

5. Compare and order whole numbers.

Creatures in Motion
Crowding Can Be Seedy
Go Fish!

C. Estimation

1. Judge without counting whether a set of objects has less than, more than, or the same number of objects as a reference set.

Go Fish!

Math.K-2.4.3 (Patterns And Algebra)

All Students Will Represent And Analyze Relationships Among Variable Quantities And Solve Problems Involving Patterns, Functions, And Algebraic Concepts And Processes.

C. Modeling

1. Recognize and describe changes over time (e.g., temperature, height).

Crowding Can Be Seedy

Math.K-2.4.4 (Data Analysis, Probability, And Discrete Mathematics)

All Students Will Develop An Understanding Of The Concepts And Techniques Of Data Analysis, Probability, And Discrete Mathematics, And Will Use Them To Model Situations, Solve Problems, And Analyze And Draw Appropriate Inferences From Data.

A. Data Analysis

2. Read, interpret, construct, and analyze displays of data.

- Pictures, tally chart, pictograph, bar graph, Venn diagram.
- Smallest to largest, most frequent (mode).

Earth Cookie

D. Discrete Mathematics- Vertex- Edge Graphs and Algorithms

1. Follow simple sets of directions (e.g., from one location to another, or from a recipe).

Earth Cookie
Go Fish!

Science

Science.K-2.5.5 (Characteristics Of Life)

All Students Will Gain An Understanding Of The Structure, Characteristics, And Basic Needs Of Organisms And Will Investigate The Diversity Of Life.

A. Matter, Energy and Organization in Living Systems

1. Investigate the basic needs of humans and other organisms.
Crowding Can Be Seedy
Earth Cookie
Web of Life

Science.K-2.5.8 (Earth Science)

All Students Will Gain An Understanding Of The Structure, Dynamics, And Geophysical Systems Of The Earth.

B. Atmosphere and Water

1. Identify the sources and uses of water.
Earth Cookie
Who Polluted the River?

Science.K-2.5.10 (Environmental Studies)

All Students Will Develop An Understanding Of The Environment As A System Of Interdependent Components Affected By Human Activity And Natural Phenomena.

A. Natural Systems and Interactions

1. Associate organisms' basic needs with how they meet those needs within their surroundings.
Crowding Can Be Seedy
Web of Life
Sharing a Small World

B. Human Interactions and Impact

1. Identify various needs of humans that are supplied by the natural or constructed environment.
Crowding Can Be Seedy
Earth Cookie
Our Town
Who Polluted the River?
Sharing a Small World

Social Studies

Social Studies.K-2.6.1

All Students Will Utilize Historical Thinking, Problem Solving, And Research Skills To Maximize Their Understanding Of Civics, History, Geography, And Economics.

A. Social Studies Skills

1. Explain the concepts of long ago and far away.
Population Circle
Who Polluted the River?
2. Apply terms related to time including past, present, and future.
Population Circle
Who Polluted the River?

Social Studies.K-2.6.2 (Civics)

All Students Will Know, Understand And Appreciate The Values And Principles Of American Democracy And The Rights, Responsibilities, And Roles Of A Citizen In The Nation And The World.

A. Civic Life, Politics, and Government

1. Explain the need for rules, laws, and government.
Creatures in Motion

Go Fish!

3. Describe how American citizens can participate in community and political life.

Lend a Hand to the Earth

Our Town

5. Explain that a responsibility means something you must or should do.

Lend a Hand to the Earth

Web of Life

Sharing a Small World

6. Explore basic concepts of diversity, tolerance, fairness, and respect for others.

Go Fish!

Our Town

Social Studies.K-2.6.4 (United States And New Jersey History)

All Students Will Demonstrate Knowledge Of United States And New Jersey History In Order To Understand Life And Events In The Past And How They Relate To The Present And Future.

A. Family and Community Life

1. Recognize change and continuity in their lives.

Creatures in Motion

Go Fish!

Who Polluted the River?

3. Compare family life today with long ago.

Who Polluted the River?

Social Studies.K-2.6.5 (Economics)

All Students Will Acquire An Understanding Of Key Economic Principles.

A. Economic Literacy

1. Identify the basic goods and services a family needs for everyday life.

The Bare Necessities

Earth Cookie

Our Town

Sharing a Small World

2. Explain how the products individuals eat, wear, and use impact their health and safety and the environment.

Earth Cookie

Web of Life

Who Polluted the River?

Sharing a Small World

Social Studies.K-2.6.6 (Geography)

All Students Will Apply Knowledge Of Spatial Relationships And Other Geographic Skills To Understand Human Behavior In Relation To The Physical And Cultural Environment.

A. The World in Spatial Terms

1. Explain the spatial concepts of location, distance and direction, including:

- The relative location of the community and places within it.

Our Town

2. Explain that the globe is a model of the earth and maps are representations of local and distant places.

Earth Cookie

B. Places and Regions

1. Describe the physical features of places and regions on a simple scale.

Earth Cookie

Web of Life

Who Polluted the River?

2. Describe the physical and human characteristics of places.

Web of Life

Who Polluted the River?

D. Human Systems

1. Identify the types of transportation used to move goods and people.

Our Town

E. Environment and Society

1. Describe the role of resources such as air, land, water, and plants in everyday life.

Earth Cookie

Web of Life

Who Polluted the River?

Sharing a Small World

3. Act on small-scale, personalized environmental issues such as littering and recycling, and explain why such actions are important.

Earth Cookie

Lend a Hand to the Earth

Web of Life

Who Polluted the River?

Sharing a Small World

Kindergarten to Grade 12

Mathematics

Math.K-12.4.5 (Mathematical Processes)

All Students Will Use Mathematical Processes Of Problem Solving, Communication, Connections, Reasoning, Representations, And Technology To Solve Problems And Communicate Mathematical Ideas.

A. Problem Solving

1. Learn mathematics through problem solving, inquiry, and discovery.
Earth Cookie

B. Communication

4. Use the language of mathematics to express mathematical ideas precisely.
Earth Cookie

C. Connections

3. Recognize that mathematics is used in a variety of contexts outside of mathematics.
Earth Cookie
Go Fish!
4. Apply mathematics in practical situations and in other disciplines.
Earth Cookie
Go Fish!

E. Representations

1. Create and use representations to organize, record, and communicate mathematical ideas.
 - Concrete representations (e.g., base-ten blocks or algebra tiles).
 - Pictorial representations (e.g., diagrams, charts, or tables).
 - Symbolic representations (e.g., a formula).
 - Graphical representations (e.g., a line graph).Earth Cookie
2. Select, apply, and translate among mathematical representations to solve problems.
Earth Cookie
3. Use representations to model and interpret physical, social, and mathematical phenomena.
Earth Cookie

Grade 1

Language Arts

Language Arts.1.3.1 (Reading)

All Students Will Understand And Apply The Knowledge Of Sounds, Letters, And Words In Written English To Become Independent And Fluent Readers, And Will Read A Variety Of Materials And Texts With Fluency And Comprehension.

A. Concepts About Print

4. Interpret simple graphs, charts, and diagrams.
Earth Cookie

D. Fluency

1. Answer questions correctly that are posed about stories read.
The Bare Necessities

G. Comprehension Skills and Response to Text

1. Draw simple conclusions from information gathered from pictures, print, and people.
Web of Life
Who Polluted the River?

Language Arts.1.3.3 (Speaking)

All Students Will Speak In Clear, Concise, Organized Language That Varies In Content And Form For Different Audiences And Purposes.

A. Discussion

2. Offer personal opinions in discussion and retell personal experiences.
The Bare Necessities
Creatures in Motion
Crowding Can Be Seedy
Go Fish!
Our Town
Web of Life
Who Polluted the River?

3. Role-play situations and dramatize story events.
Web of Life
Who Polluted the River?

B. Questioning (Inquiry) and Contributing

1. Respond to ideas and questions posed by others.
The Bare Necessities
Our Town
Web of Life
Who Polluted the River?
2. Ask and answer various types of questions.
The Bare Necessities
Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!
Lend a Hand to the Earth
Our Town

Web of Life
Who Polluted the River?

Language Arts.1.3.4 (Listening)

All Students Will Listen Actively To Information From A Variety Of Sources In A Variety Of Situations.

A. Active Listening

1. Listen and respond appropriately to directions.

The Bare Necessities
Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!
Lend a Hand to the Earth
Our Town
Web of Life
Who Polluted the River?

B. Listening Comprehension

2. Follow simple oral directions.

The Bare Necessities
Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!
Lend a Hand to the Earth
Our Town
Web of Life
Who Polluted the River?

4. Retell, reenact, or dramatize stories or parts of stories heard.

Web of Life
Who Polluted the River?

5. Respond appropriately to questions about stories read aloud.

Web of Life
Who Polluted the River?

Language Arts.1.3.5 (Viewing And Media Literacy)

All Students Will Access, View, Evaluate, And Respond To Print, Nonprint, And Electronic Texts And Resources.

B. Visual and Verbal Messages

2. Sequence a series of pictures or images to tell a story.

Web of Life
Who Polluted the River?

Grade 2

Language Arts

Language Arts.2.3.2 (Writing)

All Students Will Write In Clear, Concise, Organized Language That Varies In Content And Form For Different Audiences And Purposes.

A. Writing as a Process (prewriting, drafting, revising, editing, postwriting)

1. Generate ideas for writing: hearing stories, recalling experiences, brainstorming, and drawing.
The Bare Necessities

Language Arts.2.3.3 (Speaking)

All Students Will Speak In Clear, Concise, Organized Language That Varies In Content And Form For Different Audiences And Purposes.

A. Discussion (small group and whole class)

3. Offer personal opinions related to topics of discussion.
The Bare Necessities
Crowding Can Be Seedy
Go Fish!
Our Town
Who Polluted the River?

B. Questioning (Inquiry) and Contributing

2. Respond to ideas posed by others.
The Bare Necessities
Our Town
Web of Life
Who Polluted the River?
4. Identify a problem and simple steps for solving the problem.
Crowding Can Be Seedy
Go Fish!
Who Polluted the River?

D. Oral Presentation

1. Participate in a dramatization or role play.
Web of Life
Who Polluted the River?

Language Arts.2.3.4 (Listening)

All Students Will Listen Actively To Information From A Variety Of Sources In A Variety Of Situations.

A. Active Listening

1. Listen critically to identify main ideas and supporting details.
Web of Life
Who Polluted the River?
3. Listen and contribute to class discussions.
Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!
Our Town

Web of Life
Who Polluted the River?

B. Listening Comprehension

1. Follow one- and two- step oral directions.

The Bare Necessities
Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!
Lend a Hand to the Earth
Our Town
Web of Life
Who Polluted the River?

Grade 3

Language Arts

Language Arts.3.3.3 (Speaking)

All Students Will Speak In Clear, Concise, Organized Language That Varies In Content And Form For Different Audiences And Purposes.

A. Discussion (small group and whole class)

1. Listen and follow a discussion in order to contribute appropriately.

Earth Cookie

Mathematics

Math.3.4.1 (Number And Numerical Operations)

All Students Will Develop Number Sense And Will Perform Standard Numerical Operations And Estimations On All Types Of Numbers In A Variety Of Ways.

A. Number Sense

1. Use real-life experiences, physical materials, and technology to construct meanings for numbers (unless otherwise noted, all indicators for grade 3 pertain to these sets of numbers as well).

- Whole numbers through hundred thousands.

- Commonly used fractions (denominators of 2, 3, 4, 5, 6, 8, 10) as part of a whole, as a subset of a set, and as a location on a number line.

Creatures in Motion

Crowding Can Be Seedy

Earth Cookie

Math.3.4.4 (Data Analysis, Probability, And Discrete Mathematics)

All Students Will Develop An Understanding Of The Concepts And Techniques Of Data Analysis, Probability, And Discrete Mathematics, And Will Use Them To Model Situations, Solve Problems, And Analyze And Draw Appropriate Inferences From Data.

A. Data Analysis

2. Read, interpret, construct, analyze, generate questions about, and draw inferences from displays of data.

- Pictograph, bar graph, table.

Earth Cookie

Grade 3 to Grade 4

Science

Science.3-4.5.1 (Scientific Processes)

All Students Will Develop Problem-Solving, Decision-Making And Inquiry Skills, Reflected By Formulating Usable Questions And Hypotheses, Planning Experiments, Conducting Systematic Observations, Interpreting And Analyzing Data, Drawing Conclusions, And Communicating Results.

A. Habits of Mind

1. Raise questions about the world around them and be willing to seek answers through making careful observations and experimentation.

Creatures in Motion
Crowding Can Be Seedy
Earth Cookie
Go Fish!
Our Town

B. Inquiry and Problem Solving

1. Develop strategies and skills for information-gathering and problem-solving, using appropriate tools and technologies.

Crowding Can Be Seedy
Earth Cookie
Go Fish!

2. Identify the evidence used in an explanation.

Earth Cookie
Go Fish!

Science.3-4.5.3 (Mathematical Applications)

All Students Will Integrate Mathematics As A Tool For Problem-Solving In Science, And As A Means Of Expressing And/Or Modeling Scientific Theories.

A. Numerical Operations

1. Determine the reasonableness of estimates, measurements, and computations of quantities when doing science.

Earth Cookie

3. Express quantities using appropriate number formats, such as:

- integers.
- fractions.

Earth Cookie

B. Geometry and Measurement

2. Use a variety of measuring instruments and record measured quantities using the appropriate units.

Earth Cookie

D. Data Analysis and Probability

1. Use tables and graphs to represent and interpret data.

Earth Cookie

Science.3-4.5.5 (Characteristics Of Life)

All Students Will Gain An Understanding Of The Structure, Characteristics, And Basic Needs Of Organisms And Will Investigate The Diversity Of Life.

- A. Matter, Energy and Organization in Living Systems
 - 1. Identify the roles that organisms may serve in a food chain.
Web of Life

Social Studies

Social Studies.3-4.6.2 (Civics)

All Students Will Know, Understand And Appreciate The Values And Principles Of American Democracy And The Rights, Responsibilities, And Roles Of A Citizen In The Nation And The World.

- E. International Education: Global Challenges, Cultures, and Connections
 - 5. Identify current issues that may have a global impact (e.g., pollution, diseases) and discuss ways to address them.
Earth Cookie

Social Studies.3-4.6.5 (Economics)

All Students Will Acquire An Understanding Of Key Economic Principles.

- A. Economic Literacy
 - 4. Discuss how natural, human, and capital resources are used to produce goods and to provide services.
Earth Cookie

Social Studies.3-4.6.6 (Geography)

All Students Will Apply Knowledge Of Spatial Relationships And Other Geographic Skills To Understand Human Behavior In Relation To The Physical And Cultural Environment.

- B. Places and Regions
 - 1. Identify the physical and human characteristics of places and regions in New Jersey and the United States (e.g., landforms, climate, vegetation, housing).
Earth Cookie
Our Town
 - 4. Discuss factors involved in the development of cities (e.g., transportation, food, marketplace, religion, military protection).
Our Town
- C. Physical Systems
 - 1. Describe the basic components of the Earth's physical systems, including landforms, water, erosion, weather, and climate and discuss their impact on human development.
Earth Cookie
- E. Environment and Society
 - 1. Differentiate between living and non-living natural resources.
Earth Cookie
 - 2. Explain the nature, characteristics, and distribution of renewable and non-renewable resources.
Earth Cookie

Grade 4

Mathematics

Math.4.4.1 (Number And Numerical Operations)

All Students Will Develop Number Sense And Will Perform Standard Numerical Operations And Estimations On All Types Of Numbers In A Variety Of Ways.

A. Number Sense

1. Use real-life experiences, physical materials, and technology to construct meanings for numbers (unless otherwise noted, all indicators for grade 4 pertain to these sets of numbers as well).

- Whole numbers through millions
- Commonly used fractions (denominators of 2, 3, 4, 5, 6, 8, 10, 12, and 16) as part of a whole, as a subset of a set, and as a location on a number line
- Decimals through hundredths.

Earth Cookie

B. Numerical Operations

3. Construct, use, and explain procedures for performing whole number calculations and with:

- Pencil-and-paper.
- Mental math.
- Calculator.

Earth Cookie

Math.4.4.4 (Data Analysis, Probability, And Discrete Mathematics)

All Students Will Develop An Understanding Of The Concepts And Techniques Of Data Analysis, Probability, And Discrete Mathematics, And Will Use Them To Model Situations, Solve Problems, And Analyze And Draw Appropriate Inferences From Data.

A. Data Analysis

2. Read, interpret, construct, analyze, generate questions about, and draw inferences from displays of data.

- Pictograph, bar graph, line plot, line graph, table.
- Average (mean), most frequent (mode), middle term (median).

Earth Cookie

Grade 5

Mathematics

Math.5.4.1 (Number And Numerical Operations)

All Students Will Develop Number Sense And Will Perform Standard Numerical Operations And Estimations On All Types Of Numbers In A Variety Of Ways.

A. Number Sense

1. Use real-life experiences, physical materials, and technology to construct meanings for numbers (unless otherwise noted, all indicators for grade 5 pertain to these sets of numbers as well).

- All fractions as part of a whole, as subset of a set, as a location on a number line, and as divisions of whole numbers.

- All decimals.

Earth Cookie

Grade 7 to Grade 8

Science

Science.7-8.5.10 (Environmental Studies)

All Students Will Develop An Understanding Of The Environment As A System Of Interdependent Components Affected By Human Activity And Natural Phenomena.

B. Human Interactions and Impact

1. Compare and contrast practices that affect the use and management of natural resources.
Our Town