

# FINDING URBAN NATURE (F.U.N.)/ SEATTLE PUBLIC SCHOOLS ESSENTIAL LEARNING REQUIREMENTS

The FUN program addresses a very important issue in the education of children today. Because of easy access to movies, television and the internet, children today are becoming increasingly **information rich** but **experience poor**. FUN activities help remedy this situation by providing children with real hands-on experiences in the out-of-doors.

**GOALS AND OBJECTIVES:** The FUN activities are intended to extend classroom activities into the urban out-of-doors using the environment immediately around the school.

As a result of these activities the children should be able to do a number of tasks:

1. The student should be able to use scientific processes in the outdoor environment such as:  
Observing carefully, categorizing, identifying, measuring, describing, recording, questioning, hypothesizing and using models.
2. The student should be able to build on their current understandings to gain new knowledge about living things and their interactions with the environment such as:  
Describing the behavior of various animals, using scientific terms appropriately, recognizing interconnections between living things, identifying and grouping various animals and plants
3. Students should develop:  
Within their environment, a positive attitude of understanding, care and respect for living things, a curiosity about animals and plants, an ability to work in small groups, a respect for others opinions and ideas, and an understanding of the idea that it is okay not know something and have questions about it.

**SEATTLE PUBLIC SCHOOL DISTRICT K-5 LIFE SCIENCE FRAMEWORK:**

**ALL FUN ACTIVITIES** address the essential learning requirement # 4: The student uses effective communication skills and tools to build and demonstrate understanding of science. Each child keeps a notebook in which to record his/her observations. These are termed “Field Notes”.

- 4.1 Use listening, observing and reading skills to obtain science information
- 4.2 Use writing and speaking skills to organize and express science ideas.
- 4.3 Use effective communication strategies and tools to prepare and present science information.

<b>FUN ACTIVITY FALL 1999</b>	<b>ESSENTIAL LEARNING REQUIREMENTS ADDRESSED</b>
<p><b>ENVIROLOPES</b> The children work in pairs to gather natural materials according to specific directions given. These materials are then examined and sorted in a variety of ways.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of Life-learn about diversity and unity of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>
<p><b>WEB-IT</b> The children look for spider webs, discover that there are several different kinds of webs and then watch what a spider does if an insect gets caught in the web.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life and unit of life as well as interdependence of life 1.4 Recognize the components, structure and organizations of systems and the interconnections within and among them <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>
<p><b>TERRESTRIAL HI/LO</b> The children use a variety of scientific instruments to determine the physical characteristics of 6 different habitats. Using a thermometer, wind meter, light meter, moisture indicator, and compass, they record their findings and draw conclusions about the various habitats.</p>	<p><b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>
<p><b>NEIGHBORHOOD BIRDS</b> The children work in pairs to examine a number of prepared bird skins. They especially look at the beaks, feet, colors and size of each bird to determine relationships. For example, looking at the beak size and shape can you determine what this bird might eat.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of Life-learn about the diversity and unity of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>

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<p><b>PLANT PATTERNS</b> The children work in pairs and then with the whole group to map the dominant plants in their study site.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life-learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics 1.4 Recognize the components, structure and organizations of systems and the interconnections within and among them 1.6 Construct and use models to predict, test and understand scientific phenomena Interdependence of life - students learn how species depend on one another and the environment for survival</p>
<p><b>ROOTS AND SHOOTS</b> Children dig up plants and examine the root structures. They compare roots and group plants by the various root and shoot structures they find.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life- learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics</p>
<p><b>LITTER CRITTERS</b> Children look in leaf litter to discover what kind of animals live there. They use a simple dichotomous key to identify the animals that they find. They discuss the different habitats examined.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life- learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics</p>
<p><b>WORM WORLDS</b> The children work in pairs and use a slurry of mustard powder and water to bring worms to the surface. They count the worms in their sample and describe the habitat. During group discussions they determine which habitats were best for worms.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life- learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics. <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>

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<b>FUN ACTIVITY FALL 2000</b>	<b>ESSENTIAL LEARNING REQUIREMENTS ADDRESSED</b>
<p><b>PLANT HUNT</b> The children work in pairs to gather leaves from at least 5 to 10 different plants. These leaves are then brought back to the larger group and sorted according to their key characteristics. The characteristics could include size, shape, veining, color, texture, odor, etc.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of Life-learn about diversity and unity of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>
<p><b>WEB-IT</b> The children look for spider webs, discover that there are several different kinds of webs and then watch what a spider does if an insect gets caught in the web.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life and unit of life as well as interdependence of life 1.4 Recognize the components, structure and organizations of systems and the interconnections within and among them <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>
<p><b>SEED DISPERSAL</b> The children first discuss ways in which seeds are modified so they can move away from the parent plant. They then take a large bean seed and using a variety of materials modify their seed according to the card that they have been given. Following this they work in pairs and gather examples of various seeds that plants have made. They come back to the larger group and sort seeds according to the modifications</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of Life-learn about diversity and unity of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>
<p><b>NEIGHBORHOOD BIRDS</b> The children work in pairs to examine a number of prepared bird skins. They especially look at the beaks, feet, colors and size of each bird to determine relationships. For example, looking at the beak size and shape can you determine what this bird might eat.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of Life-learn about the diversity and unity of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>

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<p><b>BIRD NESTS</b> Children discuss types of bird nests and then using wire frames and natural materials they have found they make a bird nest. After a discussion of where birds put their nests and why, the children put their nest in nesting sites and other members of their team try to discover the nests. Discussion follows about where birds put their nests and why.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life-learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics 1.4 Recognize the components, structure and organizations of systems and the interconnections within and among them 1.6 Construct and use models to predict, test and understand scientific phenomena Interdependence of life - students learn how species depend on one another and the environment for survival</p>
<p><b>ISOPODS</b> Children look for isopods and discover that there is more than one type. They observe the isopods to discover the behavior of the different types.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life- learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics</p>
<p><b>WORM WORLDS</b> The children work in pairs and use a slurry of mustard powder and water to bring worms to the surface. They count the worms in their sample and describe the habitat. During group discussions they determine which habitats were best for worms.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life- learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics. <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>
<p><b>HABITAT DETECTIVES</b> The children recall all of the animals that they have worked with all year and think about what makes it possible for them to live in their school yard. After discussing what makes for good habitat, they then go into the school yard and search for other animals or evidence of animals that might be there. They work at drawing conclusions about the habitat.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life- learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics. <b>#2 Student conducts scientific investigations</b> 2.1 Plan and implement scientific investigations 2.2 Think logically, analytically and creatively 2.3 Practice principles of scientific inquiry 2.4 Understand the relationship between evidence and scientific explanation</p>

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<b>FUN ACTIVITY SPRING 2002</b>	<b>ESSENTIAL LEARNING REQUIREMENTS ADDRESSED</b>
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<p><b>FLOWER POWDER</b> Children look for flowers and test to see if there is pollen in the flowers. They examine the flower parts to determine where the pollen is coming from. Then they construct a flower with the flower parts and practice moving pollen from one flower to another using artificial bees.</p>	<p><b>#1 Student learns and understands scientific principles and concepts</b> Diversity of life-learn about the diversity and unity of life as well as interdependence of life 1.1 Use properties to identify, describe and categorize substances, materials and objects 1.2 Identify, describe and categorize living things based on their characteristics 1.3 Recognize the components, structure and organizations of systems and the interconnections within and among them 1.6 Construct and use models to predict, test and understand scientific phenomena</p>
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