



NATURE'S CLASSROOM

Outdoor Learning Engages the Whole Child

by Meredith Montgomery

For youngsters at Tiny Trees Preschool, in Seattle, nature is their classroom—rain or shine; tuition even includes a rain suit and insulated rubber boots. At Schlitz Audubon Nature Preschool, in Milwaukee, children use downed wood to build forts and fires. Students of Vermont's Educating Children Outdoors (ECO) program use spray bottles of colored water to spell words in the snow.

Forest Schools

Based on the publicly funded forest kindergarten model used by Scandinavian countries since 1995, Tiny Trees encompasses seven urban park locations throughout the city, ranging from 15 to 160 acres. With no buildings, playgrounds or commercially produced furniture and 30 percent less overhead, "We can make exceptional education affordable," remarks CEO Andrew Jay.

"Most of the day is spent exploring the forest. If children see salmon in the stream, we observe them from a bridge,

and then search out the headwaters to see where they're coming from," explains Jay.

Nature Preschools

The launch of Earth Day in 1970 and America's nature center movement in the 1960s yielded another immersive nature-based model that includes indoor learning.

The preschool at the Leadership in Energy and Environmental Design-certified Schlitz Audubon Nature Center includes three nature-focused indoor classrooms and three outdoor areas—two with manmade structures like a slide and picnic tables, and one left completely natural. Founding Director Patti Bailie says the children spend most of their day outside and teachers can take them beyond the play areas to explore 185 acres of prairie, forest, wetlands and lakefront beach habitats.

Public School Programs

ECO currently collaborates with seven

Vermont public schools from preschool to high school, offering year-long programs for students in inquiry-based outdoor learning for up to four hours a week.

"We immerse ourselves in nature with a 10-minute hike into the forest," says program coordinator Melissa Purdy. Students first learn safety protocols and how to set up camp. Introducing skill-appropriate tools, preschoolers whittle sticks, third-graders build teepees and lean-tos, and high school students build bridges across streams.

Building Resiliency

Sharing space with insects and plants requires special safety protocols and preparation, but the injury rate of outdoor learning is no higher than that of indoor schools. "Children are building risk literacy—they climb trees, but only to safe heights; they step on wet rocks, but learn how to do so without falling," says Jay. Classrooms without walls work because students have a sense of freedom within reasonable boundaries.

"In winter, we dress warmly and do more hiking to generate body heat. We use picnic shelters in heavy rains. Children don't have anxiety about the future—rain means puddles to splash in and snow means building snowmen," says Jay.

Developing the Whole Child

Outdoor learning naturally creates knowledge of local ecosystems, environmental stewards and a sense of place, but teachers also observe many other developmental benefits.

At the Magnolia Nature School, at Camp McDowell, in Nauvoo, Alabama, Madeleine Pearce's agile and surefooted preschoolers can hike three miles. Located in a rural county with a 67 percent poverty rate, the school partners with Head Start to secure tuition-free opportunities for families. Pearce attests how exploring the 1,100-acre property fosters language skills. "With less teacher instruction, children have more time to talk freely with each other."

Instead of loudly calling kids in, Purdy uses bird calls or a drum, which fosters a sense of peace and

respect. During daily sit time students observe themselves as a part of nature. “As birds sing and wildlife appears, children see the rewards of quiet and stillness, so self-regulation becomes natural,” agrees Bailie.

Bailie sees how children in forest kindergartens express better motor skills, physical development and cognitive abilities than those restricted to traditional playgrounds. Natural playscapes change with the season, are sensory-rich and provide extra

oxygen to the brain—all factors that correlate to brain development. Such benefits are reported in *Brain-Based Learning* by Eric Jensen, *Brain Rules* by John J. Medina and the *Early Childhood Education Journal*.

Outdoor preschools also foster microbial exposure, essential for healthy immune system development. “Without this exposure, children are at increased risk for developing allergies, asthma, irritable bowel disease, obesity and diabetes later in life,” says B. Brett

Finlay, Ph.D., author of *Let Them Eat Dirt*, which cites supporting science.

Kindergarten readiness is a goal of all preschools, but Pearce doesn’t believe a traditional academic focus is required. “By putting nature first, children are socially and emotionally ready for kindergarten,” she says. “They know how to conquer challenges and are ready to take on academics.”

Meredith Montgomery publishes Natural Awakenings of Gulf Coast Alabama/Mississippi (HealthyLivingHealthyPlanet.com).

NATURE JOURNALING TIPS

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Nature journal content is highly personal, ranging from scientific species accounts to wildlife-inspired stories. With just a notebook, pencil and fully engaged senses, nature enthusiasts of all ages can foster observation skills, creativity and outdoor exploration.

Prompt open-ended questions. “Nature journals encourage children to ask questions and search for answers,” says Tiny Trees Preschool CEO Andrew Jay, of Seattle. Ask why flowers are blooming, how slugs suddenly appeared and what type of tree a leaf came from. Build upon findings with drawings and notes.

Make a sound map. Project Learning Tree, a nationwide environmental education program funded by the American Forest Association, suggests drawing an “X” in the middle of the page to represent where the child is sitting. Then use pictures, shapes

or words to show the relative locations of surrounding sounds.

Consider the macro perspective. Vermont’s Outdoor Education Coordinator Melissa Purdy shows students close-up shots of moss or sticks without revealing what the abstract image is. Students note what they observe and wonder as they try to solve the mystery. Alternatively, challenge children to draw their own macro images by looking at an object with a magnifying glass.

Find a sit spot. Give children the time and space to write and draw freely in their journal as they sit quietly in nature. “Return to the same spot regularly and see how things have changed,” advises Patti Bailie, a professor of early childhood education at the University of Maine, in Farmington. If kids are too busy exploring and learning while outside, reflections can be captured once they’re back inside, too.