

Where does your food come from?

EDIBLE GARDEN PROGRAM (6-8)

INTRODUCTION

Overview

The Edible Garden, modeled after the Edible Schoolyard, provides students with garden and kitchen classrooms that can be used as a part of an integrated curriculum and potentially their lunch program. It involves the students in all aspects of farming in a garden setting and it allows them to prepare, serve and eat their food to awaken their senses and encourage appreciation of nourishment, community and stewardship of the land.

Using food production systems as a unifying concept, students learn how to grow, harvest and prepare nutritious seasonal produce. Experiences in the kitchen and garden foster a better understanding of how the natural world sustains us, and promotes the environmental and social well being of our school community.

A garden, whether at home, at school or in a community garden, is an example of a managed ecosystem. In a garden, the principles of ecology and systems thinking come alive. Through hands-on experiences students gain an understanding of cycles, from the life cycle of a plant to the nitrogen cycle. They experience webs of relationships, both social and biological, as they work with their classmates, teachers and families to prepare the soil for planting or observe pollinators as they dart from flower to flower.

The kitchen, as well as the garden, provides an environment rich in opportunities to experience human interactions. In the kitchen, students collaborate to transform their garden's harvest into a delicious seasonal dish. They work in small groups, each small group a system nested within the larger kitchen system. The individuals within each system prepare food, set the table, and share food and conversation. Working together, developing relationships, they cultivate a sense of community.

Sustainable Agriculture Edible Garden Program

The Edible Garden Program goal is to stimulate students' desire to purchase food grown locally in a sustainable way. This Program, designed for 6 – 8TH graders, which uses the garden as the classroom for students to gain hands-on experience implementing sustainable agriculture practices. The kitchen is the classroom for reaping the goodness created in their food grown using sustainable practices.

The curriculum begins with the students using the garden to gain basic knowledge of ecological processes and sustainable agricultural practices. From 6th through 8th grade the

students will revisit their garden and culinary activities, learning from their prior accomplishments and mistakes while building upon their social science and science knowledge as defined by the Illinois Learning Standards. By 8th grade this knowledge can be expanded into the study of agricultural-scale production using sustainable agricultural practices, which can be found in the Extensions section of each Activity.

What is Sustainable Agriculture?

For this purposes of this curriculum sustainable agriculture shall be defined as “a system of food production, supported by consumers, where farming operations, practices and technologies *work in harmony* with the natural systems that sustain life on earth.”

Food is a basic human need. Yet for most of us in the United States, it is merely an inexpensive commodity that we take for granted. Issues surrounding how, where, or by whom it is grown are not generally the topic of conversation around the dinner table. Considering the current situation in agriculture, perhaps they should be. Food in the United States travels an average of 1200 miles from the farm to the market shelf. Almost every state in the USA gets 85-90% of its food from some place else. In Massachusetts, for example, their food import imbalance amounts to \$4 billion dollars. University of Massachusetts estimates that the state could produce 35% of its own food, which equates to over \$1 billion food dollars returning to the local economy.

Increased local food production would add considerable food dollars to the economy of many other states. Meanwhile, the nation's best farmland is being lost to commercial and residential development at an accelerating rate. At the same time, the retirement of older farmers, increasing land and production costs, low food prices, competing land uses, the lack in incentive for young people to enter farming, and the fundamental restructuring of the national and global economy all combine to make farming and local food production in the United States an increasingly difficult task.

More will be added to this section.

Comprehensive Edible Garden Pogram

This curriculum program has been designed as an integrated hands-on approach to teaching science and social studies. Mathematical concepts and language arts can easily be added to the program, but it is not within the scope of the curriculum. Therefore in order for this Program to meet most of the needs of Illinois State Learning Standards, a teacher, school or school district will need to add activities that fulfill the Learning Standard requirements that are not addressed in this curriculum.

The comprehensive Edible Garden Program is designed to last the entire school year. Garden Planning, Planting and Summer Care will be the focus in the Spring and Summer. The Fall will bring the Harvest and Kitchen Activities. During the winter the students can focus on all of the support Activities that enhance their knowledge of sustainable agricultural practices.

Recommended order of and season to do Activities

Spring

Planning the Garden

Planting the Garden

Summer

Summer Garden Care

Fall

Soil Conservation: Composting

Harvesting the Crop-Evaluating the Garden

Soil Conservation: Nutrient Management

Knowing Nutrition for Meal Planning

Soil Conservation: Water Soil Erosion

Planning the Meal

Shopping for the Meal

Preparing for the Meal

Winter

Water Cycle

Water Quality

Abbreviated Edible Garden Program

The Abbreviated Edible Garden Program is just that. The key activities for the Program are singled out for implementation by those schools who desire to implement the curriculum in a phased-in approach. Maybe the Edible Garden concept fits in with the school's existing curriculum and the abbreviated Program can enhance that curriculum. Or simply, maybe there are time restrictions that only allow for the implementation of the abbreviated program.

The Activities in this Program are not limited to use only in a Program approach. If a single Activity is intriguing, it has been developed to stand alone. Maybe an Activity can be use as a preview to, or post visit from a field trip to a working farm.

The Garden Activities – Abbreviated Program

For those of you who have been energized by the Edible Garden Program and want to pilot it at your school, or find that the comprehensive program is too time consuming, then it is recommended that at minimum you run the Garden Activities listed below. The total time to administer this program is approximately 6 hours and 15 minutes. Parent volunteers for Garden Planning, Planting the Garden, and Summer Garden Care Activities and purchase of garden materials is essential to the success of this program.

<u>Activity</u>	<u>Time Involved</u>	<u>Comment</u>
Trash to Treasure	30 min. instruction	On-going to make compost.
.... about all those weeds	30 min. instruction	
Soil: The Key Resource....	60 min. instruction	
Garden Tools	15 min. instruction	May be done while planting
Garden Planning	120 min.	Mainly activities.
Planting the Garden	120 min.	
Summer Garden Care	60 min./family/summer	

The Kitchen Activities – Abbreviated Program

For those of you who have been energized by the Edible Garden Program and want to pilot it at your school, or find that the comprehensive program is too time consuming, then it is recommended that at minimum you run the Kitchen Activities listed below. The total time to administer this program is approximately 5-1/2 hours. Parent volunteers for Harvesting the Crop Planning the Meal, and Preparing the Meal Activities are essential to the success of this program.

<u>Activity</u>	<u>Time Involved</u>	<u>Comment</u>
Harvesting the Crop	90 min.	Garden or classroom
Planning the Meal	90 min. 45 min.	Instruct/Activity Classroom Activity
Preparing the Meal	90 min. 120 min.	Kitchen Basics Activity Kitchen Activity – Meal

PARENT VOLUNTEERS

Part of community building is bringing the family into the learning process of the students. For the Edible Garden Program to be successful it is often necessary that the students work in small groups. This allows the students the opportunity to have their questions answered when they are involved in their hands-on learning. When smaller groups are desirable, the Group size recommended for these Activities is 7 students to one adult.

It is suggested that a teacher find out the talents, expertise and interest of the class parents and ask for their help with this Program when needed.

References

1. Edible Schoolyard website, www.edibleschoolyard.org
2. http://www.agr.gc.ca/pfra/flash/robocow/en/robocow_e.htm. Fun video showing common sustainable ag practices to prevent soil erosion and to protect watersheds.