



Farmers' Market

Class: _____

Grade: _____

Bed: _____

Crop: _____

Thank you for participating in Grant's First Annual Student-run Farmers' Market. On the following pages you will find information to assist your class in preparing for and participating in the market. Also included are optional activities and lessons to enhance your classes' learning experience.

Goal: Give ALL students an opportunity to participate in a school-wide science and math project that centers around the *Gecko Garden* and culminates in a student-run Farmers' Market.

Whether growing plants in a garden or performing scientific experiments, we can predict, but not guarantee the outcome. In the first year of this project there are many unknowns - weather, seed viability, timing etc. It is important to emphasize to students that farming is an experiment with some factors beyond our control. It is possible that some crops may not thrive - this is OK. Take note of conditions and students will learn to improve what they can in the following years. If a class crop does not have a significant yield and students would still like to participate in a market, they can provide another product such as baked goods or seedlings - be creative!

Target date for first harvest and market: May 11th, 2007

Crops: This first year each class has been assigned a crop. The reason for the assignment is twofold. First, increase the chances of a decent yield by having several beds of the same item. Second, select plants that have the best chance of thriving in the winter/spring season. For some plants, such as carrots, we have selected several different varieties. Let the students observe and calculate which varieties and crops have the best yield. The students can use this information in future years to determine the best ones to plant.

When to plant: Based on the growth rate of your crop have students back calculate the time to plant the seeds. Growth information on your crop can be found on the following pages and seed pack. Because the Gecko Garden is somewhat shady and some crops will start in winter, you should probably plan for the longer growth time in the given 'time to harvest'. You may want to coordinate with the other classes in your grade to stagger your plantings one week apart to ideally target a 3 week spread.

Gardening time: If class time is tight - and I expect it is for all teachers, you might find it possible to dedicate one recess/week to plant and maintain your crop. Another option might be to divide gardening time between homeroom teachers and lab teachers.

Volunteers: If you would like a parent volunteer to assist your class in the garden and do not yet have one, please contact Tracey McNeil (mcneils3@cox.net) or your room representative.

Prior to planting: If the soil in your bed has not already been turned, have the students do so prior to planting. You may also want to saturate the bed with water prior to planting seeds as you may need to turn the soil as you water to really get it saturated.

Watering: After your class has planted the seeds or transplanted seedlings keep the soil moist for the first couple weeks until the seeds germinate. The automatic watering system will be on but some crops may require extra watering at certain times. This can be done by hose. To turn on the hose use the water key in the shed. Be sure to put it back when you are done.

Pest: Known Gecko Garden pest include: snails, crows, gophers and various insects. Hopefully the gophers have been controlled for by lining all beds with chicken wire. Some crops, such as peas and beans may require bird netting to keep out the crows from eating the fruit. If you have problems with pest try to deal with them organically. Included is an activity titled, 'Pest or Pal' that will give students ideas on how to recognize and deal with pest. If you need additional assistance or supplies contact a member of the Garden Team (a.k.a. Pest Busters)

Fertilizer: If you would like to add additional nutrients to soil keep in mind that we would like to keep the Gecko Garden organic.

Harvest: As we get close to harvest we will work together to find ways to store and/or refrigerate produce that may be ready early. When the bulk of crops are ready for harvest then we will schedule the first market. If individual crops are ready much earlier than the bulk of others and can not be stored these can be used by the students at their discretion.

Market: This year the 6th grade class will run the market and be in charge of sales. We will aim to have the market in the lunch arbor during pickup for approximately 20 minutes. Volume of produce will dictate the number of market days we have.

Journal: Keep a record of planting information with this notebook for the class the following year. This can be done by the garden instructor and/or the students. A template is on the following page and can be copied if you would like students to keep their own journals.

Suggested General Activities

1. Have students calculate the planting date based on May 7th harvest.
2. How many seeds are necessary based on the bed size and planting density?
3. Keep a *Garden Journal* of dates and observations. These will be particularly useful in subsequent years as students try to improve on crop yields and timing.
4. Measure and chart growth
5. Determine a suggested price per pound based on production cost and market value.
6. Recipe ideas to be distributed with produce.
7. Reports on plant history and cultural uses.
8. Nutritional value.
9. When multiple crops are growing students can study their diversity and adaptations.
10. When multiple crops have matured have students identify the plants and name edible part, i.e. root, stem, leaf or flower.

