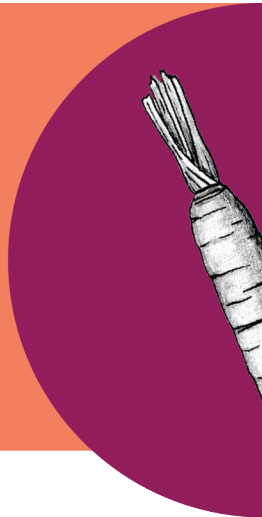


THE **EDIBLE**
SCHOOLYARD
PROJECT



GROWING FROM YOUR FOOD SCRAPS

Summary: Did you know that a lot of the produce in your kitchen will sprout new growth just by putting it in water or soil? This activity explores growing food from the ends and scraps of produce in your kitchen.

Time: 30 minutes

Before you get started: For this lesson, you will need to look in your kitchen and see if you have any of the following vegetables:

Potato

Green onions

Celery

Garlic

Lettuce

Daikon

Carrots

Beets

Turnips

Ginger

Bok Choy

Leeks

Radishes



GROWING FROM YOUR FOOD SCRAPS

DO: Once you have identified the vegetables you want to grow, look at the Growing From Your Food Scraps Guide (page 3 of this document) for directions on growing techniques for specific food scraps.

WRITE: Now that your food scraps are beginning to grow, record your observations in the Growing Food Scraps Observation Chart (page 5 of this document).

Student Notes:

- If you can, take a picture of your vegetable twice a week for two weeks. Describe what you see in each photo.
- Growing from food scraps is an experiment; sometimes things grow, other times they don't. Make a hypothesis for how each different food scrap will grow. What do you think will grow best?

References:

Growing Food from Kitchen Scraps. (n.d). *Temple University*. Retrieved from

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Retrieved from <http://www.eatingwell.com/article/290729/how-to-grow-fruits-vegetables-from-food-scraps/>

Science made simple.(n.d). The Scientific Method Retrieved from

https://www.sciencemadesimple.com/scientific_method.html#hypothesis

Disclaimer: Any outside materials referenced in this document are for educational purposes only. The Edible Schoolyard Project does not endorse any brands, labels, organizations, or businesses included in this lesson plan.

Teacher and Parent Notes:

- In the *student notes* section of this document, we make recommendations for extending the lesson. This lesson can be easily adapted to become a science lab that incorporates students practicing the scientific method. Extend the garden Growing Food Scraps Observation Chart (attached below) and integrate scientific terms and concepts.



Growing from Your Food Scraps Guide

This sheet describes how to grow for the following vegetables.

Potato	Green onions	Celery
Garlic	Lettuce	Daikon
Carrots	Beets	Turnips
Ginger	Bok Choy	Radishes

Materials:

- A jar (for some vegetables)
- Shallow container (for some vegetables)
- Food scraps
- Soil (for some vegetables)



Sprouting in Water Before Planting

Beets, Turnips, and Carrots:

- Cut off the top 2-3 inches of the vegetable. Place in a shallow bowl of water. Do not submerge. Replace the water every couple of days. Once you can start to see roots and new shoots, transplant into soil.

Celery, Lettuce, and Bok choy:

- Cut off roughly 2-3 inches from the base of the plant. Place in a shallow bowl of water. Do not submerge. Replace the water every couple of days. Once you can start to see roots and new leaves and shoots, transplant into soil.

Green Onions:

- Take the white ends of the plant where roots are attached. Place in a jar in the water. Replace the water every couple of days. Once you can start to see roots and new shoots, transplant into soil.

Plant in Potting Soil

Potatoes:

It is best to use older potatoes where you can see little sprouts from the “eyes” of the potato. Cut the potato into two or more pieces, making sure that each piece has at least one eye. Leave the pieces on the counter overnight until dry. Plant them in a container of soil at least 4 inches deep, once you see some leaves, plant outside.

Ginger:

Take a piece of ginger and place it in potting soil. Make sure the bud of the ginger is facing up. In a week or so, you should notice new shoots and roots. Leave in the container or re-pot in a larger container. Ginger grows best in warm climates. Depending on where you live, it is best to keep it indoors and not transplant outside.

Garlic:

Pull the cloves of the garlic apart. Plant the individual cloves in potting soil with the blunt end of the garlic facing down. Place garlic in a sunny place. Once it begins to grow a shoot, you can replant outside.

General Tips:

- Growing from food scraps won't have the same results as if you grew from seed or a plant start. We recommend you grow the food scraps indoors for a while before growing them outside!
- Sometimes the vegetable scrap part that is submerged in the water will become slimy – that is normal. Make sure that you are replacing the water frequently. If it starts to smell, throw it out.
- Not everything will sprout. If after a week you don't see new growth, start over and try again.
- Once the scraps start to have new growth, make sure they get plenty of light.



GROWING FROM YOUR FOOD SCRAPS

OBSERVATION SHEET

Food Scraps Growing Observation Chart

Vegetable: _____

Over the course of the next couple of weeks, draw and write your observations of your food scraps growing. Make your observations at least every 3-4 days.

Day: _____

Draw what you see:

Describe what you see:

Day: _____

Draw what you see:

Describe what you see:

Day: _____

Draw what you see:

Describe what you see: