ACTIVITY 1.5 Making your own Potting Soil for Seedlings, Houseplants and More

Overview: Students will make potting soil while learning about soil composition and plant nutrition.

Lesson Background: Making potting soil costs less than buying commercial potting mixes from the store and allows you to make a mix to fit your plants different needs. It is fun and takes very little time.

Instructions:

Potting Soil for Established Plants:

Prepare Ingredients:

- 1-2 Parts Soil: Good Rich Garden Soil or Topsoil
- 1 Part Organic Material or a mix of: Peat Moss, Coconut Coir Fiber, or Leaf Mold
- 1 Part Drainage Material: Sand (not beach sand), Vermiculite, Perlite, or Rock Wool

Optional additions are screened compost, greensand, rock phosphate, azomite, earthworm castings, or dry organic fertilizer to add nutrients to new transplants.

1. Mix Together 1 part each of soil, organic material, and one part drainage material.
2. Moisten with warm water, but not too soggy.
3. Fill your pots with your fresh new soil.
4. Begin Planting

Making Soil for Sowing Seeds

Follow the steps from above. But instead of using garden soil or topsoil, use 1 part organic material, 1 part compost or leaf mold, and 1 part drainage material. For a soilless mix, use only drainage material and organic material since many young seeds prefer to germinate in a soilless potting mix. The soil causes more dampening off and molding and can carry more bugs that may be harmful to young seeds. Soilless mixtures are light in texture and weight and make it easy for young seeds to germinate and tender roots to take hold.

Core Subjects: Life Science

Grade Levels: Pre K and Beyond

Objectives: Students will work with measurements, and discuss soil composition and plant nutrients.

Duration: 20 minutes

Materials:

- 4 containers or large pots for mixing soil
- Measuring cups or large plastic yogurt cups
- Organic material (see examples)
- Drainage material (see examples)
- Garden or Topsoil
- Optional- use a sifter to remove large pieces (twigs, rocks and other debris that may be in the soil or compost)