

# EGG CARTON NURSERY

Attract helpful bees to your garden by making an egg carton nursery and planting flower seeds that bees like. Then observe bees pollinating the flowers as they travel from flower to flower.

## MATERIALS

- Egg carton (paper type, not Styrofoam)
- Pencil
- Potting soil
- Flower seeds like alyssum, geraniums, poppies, aster, lavender and black-eyed Susan
- Plate or tray
- Bowl
- Spray bottle
- Water
- Coffee grounds (optional)

## INSTRUCTIONS

Use a pencil to carefully poke three small holes in the bottom of each individual egg cup. Fill each egg carton cup three-quarters full with potting soil. As an option, you can mix used coffee grounds with potting soil in a ratio of three-quarters soil to one-quarter coffee grounds.

Place a few seeds in each cup, then cover with a thin layer of potting soil. Alyssum, geraniums, poppies, aster, lavender, and black-eyed Susan flowers are local, native wildflowers that are known to attract bees.

Place the egg carton on a waterproof plate or tray and place it in a warm, sunny spot inside your house.

Spray a small amount of water on the carton every other day, keeping the soil moist but not soaked. If you see water coming out of the bottom of the egg cups, you're adding too much water! Keep seeds indoors for four to five weeks. Once the seeds sprout and have multiple sets of strong leaves, they can be taken outside for the bees to enjoy.

Egg cartons made of paper can be planted directly in the ground because they will biodegrade. Egg cartons made of Styrofoam will not break down and should not be placed into the ground.

Cut the egg carton into individual cups and transplant the small plants into the ground or larger pots. Make sure you choose a sunny area for planting, depending on the type of plants that you sprouted. Check the seed packets for the best sunlight conditions for your plants.



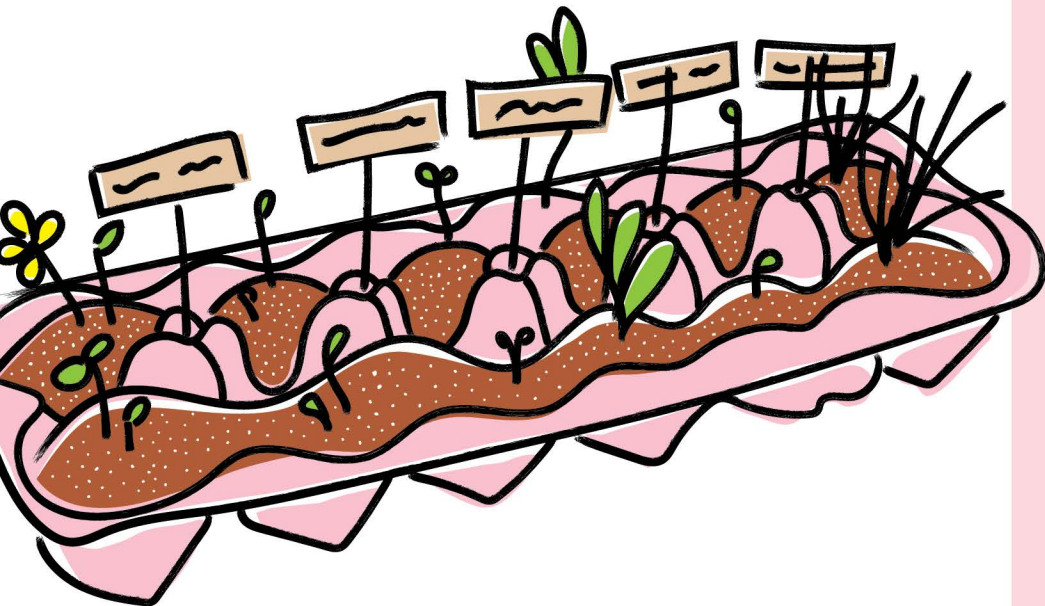


## WHAT'S HAPPENING?

For the first few days, you probably didn't see much going on in your garden but under the soil the seed has germinated. That means it started using the energy stored as food inside the seed to make its first root and leaves. The roots grow down and the leaves grow up. After about a week, little green stems should poke out of the soil. Once the first leaves appear, they capture sunlight to create food, allowing the plant to grow. The process of plants using sunlight to make food is called photosynthesis.

Flowers attract bees, and bees are important because they are critical in producing food. Bees pollinate crops. Pollination is required for plants to make seeds. Tiny grains of pollen carry the genetic information of a plant. Pollen grains are the yellow dust you see in flowers. Bees and other pollinators get those pieces of pollen stuck to their bodies as they travel between flowers. The pollen then gets stuck on other flowers of the same species. The pollen then fertilizes the flower, which is the first step in making a new seed.

Bumblebees, other wild bees and insects like butterflies, wasps and flies all pollinate. A lot of the food we eat depends on pollinating insects—fruits like peaches, strawberries, and apples are all pollinated by bees. Declines in bee populations in recent years have reduced crop yields for almonds in California.



## TIPS

Some people are allergic to bee stings, so when choosing a place to plant the seed cups outside choose an area that is good for the bees as well as for people.

## EXTENSIONS

Become a citizen scientist and volunteer for BeeSpotter. University of Illinois researchers need your help collecting information about bees. Sign up and submit your photos of bees at [beespotter.org](http://beespotter.org) Your data will become part of a nationwide effort to gather information on the population of these important pollinators.

## LEARN MORE

Explore innovations in farming and food production in MSI's *Farm Tech* exhibit.

## RECOMMENDED READING

*Give Bees a Chance,*  
by Bethany Barton

*From Seed to Plant,*  
by Gail Gibbons

