

AIR BEE N BEE





OVERVIEW

There has been a major decline in honeybee and native bee populations across the globe. Bees play an important role in the environment as pollinators and nutrient recyclers. Without these industrious pollinators, plants would not survive, and we would have less fresh food for our tables, spices, clothing fibers, and essential ingredients and herbal remedies.

In response, farmers and gardeners alike are questioning how to support these small, but powerful allies in our ecosystem. Some people have turned to beekeeping, though this may not be practical for everyone. Others, both urban and rural, are learning how to attract pollinators to their backyards by providing food, water, and habitat. It's true that this phenomenon affects us all and therefore it is our responsibility to help protect our bee populations.

One of the reasons our native bee population is declining is due to habitat loss and these shelters go a long way to help populations recover and it doesn't take much of our time. An Air Bee N Bee or bee hotel is any space designed to home native solitary bees. Native solitary bees, which include mason bees, leafcutter bees, and carder bees, are valuable pollinators. Unlike honeybees, native solitary bees are not social and so the typical hive boxes most people build won't attract these types of bees.

Native solitary bees typically live underground or inside holes of trees, hollow stems, or a crevice in a rock wall. It is here that they will safely lay eggs. Many town yards are kept too tidy and this lack of debris means there are fewer places for native solitary bees to take refuge and lay eggs. So, feel free to keep a small brush pile or wood pile in your yard or take a moment to build an Air Bee N Bee to give these insects a helping hand. You might also be surprised as how well your garden thrives with more bees around.

3-12

MATERIALS

- Can or bottle
- Paper bag
- Scissors
- Pencil or chopstick
- Tape
- String
- Paper (optional)
- Coloring tools (optional)



PROCEDURE

- 1. Cut paper bag in strips.
- 2. Use pencil to roll paper bag strips into a reed. Secure with tape and pull pencil out.
- 3. Fill can with paper bag reeds.
- 4. Decorate outside of can, if desired.
- 5. Affix a string around the can and hang outside in a warm, dry, low-wind location. Preferably near to your garden area.
- 6. The following year replace the paper bag reeds, as some may have been used by bee visitors or infected with fungus this can spread disease to future inhabitants of your bee hotel.

VARIATIONS

There are many possibilities for building a Bee Hotel that can be found online. Some are simple like the suggested activity and some are more complex. Whichever design you choose for your hotel, please be sure to maintain your hotel the following year.

FACTS

- There are 24,000 species of bee worldwide. Of this number, there are 4,000 species of bee in North America. Of this number, 450 species of bee are found in Missouri. Of this number 198 species have been identified in St. Louis alone. That's 45% of the different species of bees, which proves that bees can thrive in an urban landscape.
- Bees are responsible for the pollination of over 30% of our food supply. This means 1 in every 3 bites of food was pollinated by a bee. This accounts for over \$15 billion worth of food a year.
- A single bee tends to visit up to 5,000 flowers daily.

RESOURCES

For more detailed information about bees in our city, read the article, *A City Abuzz* from the Missouri Department of Conservation.

Shank, Erin. "A City Abuzz." *Missouri Department of Conservation*, 01 Feb. 2020, https://www.mdc.mo.gov/conmag/2020-02/city-abuzz.

COMMUNITY OF LEARNERS

Please share your feedback! Tell me about your successes, failures, or possibly new variations you have come up with. Email the Education Coordinator at lsawyer@towergrovepark.org.