

# HOW TO HELP PENNSYLVANIA BUMBLE BEES

## IMPORTANCE OF BUMBLE BEES

Bumble bees are important pollinators of both crop and native flowering plants. Specifically, bumble bees are invaluable as pollinators of solanaceous crops such as tomatoes, peppers, and eggplants which require buzz pollination (buzzing at a high-frequency to acquire pollen from a flower).

However, some of our North American bumble bee species populations are drastically declining. One of these includes what previously was a common species observed in PA, *Bombus pensylvanicus*.

## CAUSES OF DECLINE



Pesticides



Parasites



Diseases



Poor Nutrition

## HOW YOU CAN HELP

### Pesticide Usage

Pesticides, such as neonicotinoids, can have harmful impacts on bumble bees including impaired memory, flight and death. Therefore, you can help by not applying pesticides to blooming flowers that bumble bees visit and reducing pesticide use when bees are foraging. Further, you can avoid purchasing plants that have been treated with neonicotinoids and create areas in your yard that have pollinator friendly flowers that are pesticide free.



### Providing Good Nutrition and Habitat

Bumble bees need an environment that is good both nutritionally and that provides habitat for both nesting and overwintering.

Good nutrition for bees is vital because poor nutrition weakens a bee's ability to fight diseases. Bumble bees feed on pollen and nectar. Good nutrition includes both a diversity of different flower types as well as food throughout the whole active season from spring to fall. For examples and information about creating a pollinator garden visit the following websites:

Xerces Society Pollinator Friendly plant lists:  
<http://xerces.org/pollinator-conservation/plant-lists/>

Local Pollinator Garden Initiatives:  
<http://ento.psu.edu/pollinators/public-outreach>

Furthermore, bumble bees need a good area to nest underground and an area to overwinter. You can provide bumble bees with these necessary habitats by leaving areas of your yard undisturbed.

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