



## Pollinator Gardens

In 2019, the Pennsylvania Horticultural Society (PHS) partnered with the National Wildlife Federation (NWF) to transform a network of 50 vacant lots in West and Northwest Philadelphia into climate-smart pollinator gardens that improve the connectivity and diversity of habitat within the city. Managed through the PHS LandCare Program, these gardens are designed to be resilient to the projected impacts of climate change, including hotter and wetter conditions. Each site contains a random mixture of 4-12 perennial native plant species – meaning the gardens will come back each year – which will be monitored for their impact on wildlife and the communities in which they reside. At the end of this research project, PHS and our partners will identify the most successful garden designs with the hope of installing and maintaining them at other LandCare sites throughout the city.

### The Importance of Pollinators

Wildlife gardens attract and support important pollinators such as butterflies, birds, and bees. Pollination is essential to life on earth-- 90% of plants, including fruits and vegetables, rely on pollinators to produce fruit and seeds. Without these animals, life on Earth would be drastically different. These unique gardens help to create a stronger ecosystem and more robust food web, which ultimately ensures a healthier and more resilient Philadelphia.

### Why Plant Native?

Pollinator gardens contain a variety of native plants that provide pollinators with food, shelter, and places to raise young. The use of native perennials (plants that continuously grow year after year) is crucial for optimal environmental benefits because these plants have co-evolved alongside the insects and animals native to the region. This has resulted in long-lasting mutually beneficial relationships such as higher nutrient content in native seeds/berries, a plant's ability to host or feed certain species of caterpillars, and the need for less inputs such as water and fertilizers/pesticides. For example, a native White Oak tree can host 450+ caterpillar species whereas the common, non-native Ginkgo tree only supports one!

### Pollinator Garden Benefits

- Increases wildlife habitat by providing food, water, shelter, and places to raise young
- Requires less water for long-term maintenance
- Requires no pesticides or fertilizers, which damage pollinator populations
- Improves air quality
- Beautifies neighborhoods and communities
- Increases water infiltration and reduces flooding due to the removal of grass and other compacted surfaces
- Better adapted to this area than non-native, traditional landscaping practices

The 50 pollinator gardens installed in Mantua and Strawberry Mansion contain a variety of native plants, which are listed below. As part of the research component to this project, Professor Chris Swan from University of Maryland Baltimore County, will be conducting research regarding plant survivability and overall successes of the gardens. These gardens will look and function differently than traditional landscapes. These gardens mimic nature in their wilder appearance and the abilities to support wildlife!

For more information about Gardening for Wildlife in your own home or community, visit: [www.NWF.org/Garden-for-wildlife](http://www.NWF.org/Garden-for-wildlife).

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# List of Plants

Anise Hyssop - reference A  
*Agastache Foeniculum*

Bloom time: June- September

Attracts: Hummingbirds, Butterflies

Scarlet bee balm- reference B  
*Monarda didyma*

Bloom time: July- August

Attracts: Hummingbirds, Butterflies, Bees

Grey headed coneflower - reference C  
*Ratibida pinnata*

Bloom time: June- August

Attracts: Butterflies

Prairie Dropseed- reference D  
*Sporobolus heterolepis*

Bloom time: August- October

Attracts birds

Blazing star- reference E  
*Liatris spicata*

Bloom time: July- August

Attracts: Birds, Butterflies, Bees; host plant for Painted lady and Silvery checkerspot butterflies

Blue Grama- reference F  
*Bouteloua gracilis*

Bloom time: July- October

Attracts: Birds, Butterflies; host plant for Skippers

A



B



C



D



E



F



## List of Plants

Lyreleaf Sage - reference G  
*Salvia lyrata*

Bloom time: March- June

Attracts: Hummingbirds, Butterflies, Bees

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Giant Coneflower- reference H  
*Rudbeckia maxima*

Bloom time: July- September

Attracts: Birds, Bees, Butterflies

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Rough Goldenrod - reference I  
*Solidago rugosa*

Bloom time: September- October

Attracts: Bees, Butterflies  
\*Important for Fall pollinators

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Aromatic Aster- reference J  
*Aster oblongifolius*

Bloom time: August- October

Attracts: Bees, Butterflies  
\*Important for Fall pollinators

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Iron butterfly- reference K  
*Vernonia lettermannii*

Bloom time: August- October

Attracts: Butterflies, Bees

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Sweet Coneflower- reference L  
*Rudbeckia subtomentosa*

Bloom time: July- October

Attracts: Butterflies, Bees, Birds

G



H



I



J



K



L



# List of Plants

Butterfly Weed - reference M  
*Asclepias tuberosa*

Bloom time: June- August

Attracts: Butterflies, Bees  
\*Host plant for Monarchs

Purple Coneflower- reference N  
*Echinacea purpurea*

Bloom time: May- September

Attracts: Birds, Bees, Butterflies

M



N



## Pollinators to Look For

### Bees:

Eastern Bumblebee, Honey bee, Carpenter bee, Sweat bee, Mason bee

### Butterflies/Skippers/Moths:

Monarch, Black Swallow tail, Eastern Tiger swallow, Common Buckeye, Variegated fritillary, Pearl crescent, American lady

### Birds:

Ruby throated hummingbird, American Goldfinch, Northern Mockingbird

Sweat Bee



American Lady Caterpillar



Common Buckeye



Variegated Fritillary



Goldfinch



Northern Mockingbird

