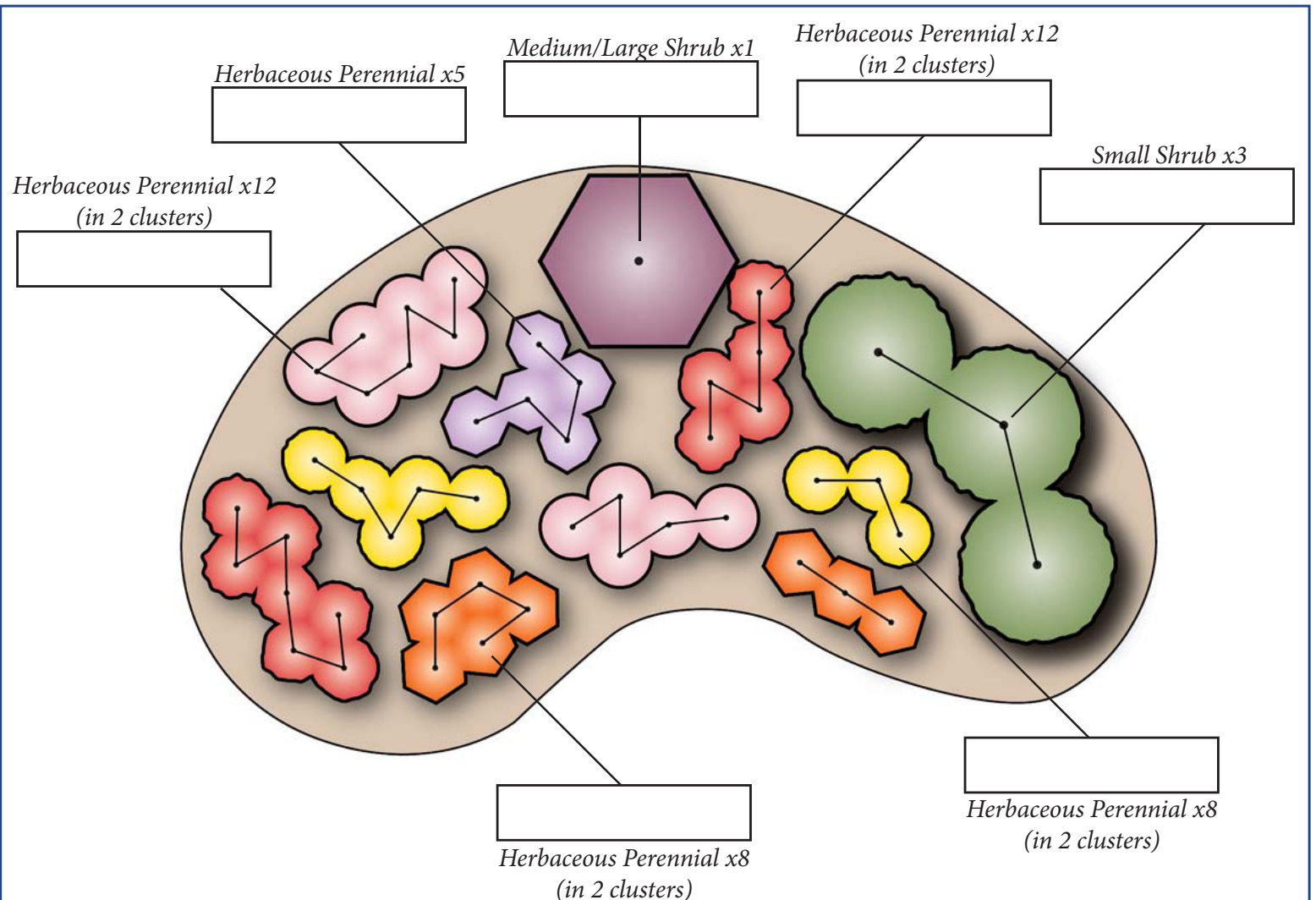


## Butterfly Garden – 120 square feet

*Part Sun, dry soils*

(contained in 17 x 10.5 foot area)



### Average Spacing between Plants

Refer to plant nursery tags and adjust as needed

Shrubs = 30"	Grasses = 18"	Perennials = 9-12"
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2 cubic feet of mulch covers ~12 square feet of the garden

Scale: 1 inch = 3 feet



Consider adding a rain barrel to your Conservation Landscape. For more info, visit the [Rainwater Harvesting chapter](#).



## Number of plants

Herbaceous perennial type 1: 12 plants  
 Herbaceous perennial type 2: 12 plants  
 Herbaceous perennial type 3: 8 plants  
 Herbaceous perennial type 4: 8 plants  
 Herbaceous perennial type 5: 5 plants  
 Medium/Large Shrub: 1 plant  
 Small Shrub: 3 plants

## Recommended plant options for Anne Arundel County, MD and surrounding areas

These plants are native, and typically successful in the climate zone for Anne Arundel County. For more information about these plants, and for additional plant options, the [Ladybird Johnson native plant database](#) is recommended. (Note: for shady conditions, ferns can function in place of a grass/sedge/rush or an herbaceous perennial.)

Plant Type	Plant Latin Name	Plant Common Name	Planting Condition	Maintenance Type	Spacing
Grass/Sedge/Rush	<i>Carex glauca</i> 'Blue Zinger'	Blue Zinger Sedge	Part Sun/Dry	Minimal	18" apart
Grass/Sedge/Rush	<i>Chasmanthium latifolium</i>	Northern Sea Oats	Part Sun/Dry	Minimal	30" apart
Grass/Sedge/Rush	<i>Elymus arenarius</i> 'Blue Dune'	Blue Lyme Grass	Part Sun/Dry	Low	18" apart
Grass/Sedge/Rush	<i>Helictotrichon sempervirens</i>	Blue Oat Grass	Part Sun/Dry	Minimal	18" apart
Herbaceous Perennial	<i>Aquilegia canadensis</i>	Columbine	Part Sun/Dry	Minimal	18" apart
Herbaceous Perennial	<i>Boltonia asteroides</i>	False Aster	Part Sun/Dry	Minimal	18" apart
Herbaceous Perennial	<i>Geranium sanguineum</i> 'Rozanne'	Rozanne Cranesbill	Part Sun/Dry	Minimal	18" apart
Herbaceous Perennial	<i>Physostegia virginiana</i>	Obedient Plant	Part Sun/Dry	Minimal	18" apart
Herbaceous Perennial	<i>Physostegia virginiana</i> 'Vivid'	Vivid Obedient Plant	Part Sun/Dry	Minimal	18" apart
Herbaceous Perennial	<i>Rudbeckia fulgida</i> var. <i>fulgida</i>	Black Eyed Susan	Part Sun/Dry	Minimal	18" apart
Shrub	<i>Ceanothus americanus</i>	New Jersey Tea	Part Sun/Dry	Minimal	48" apart
Shrub	<i>Comptonia peregrina</i>	Sweetfern	Part Sun/Dry	Minimal	48" apart
Shrub	<i>Ilex glabra</i>	Inkberry	Part Sun/Dry	Minimal	48" apart
Shrub	<i>Rhus aromatica</i> 'Gro Lo'	Gro Lo Fragrant Sumac	Part Sun/Dry	Minimal	48" apart
Shrub	<i>Vaccinium angustifolium</i>	Low Bush Blueberry	Part Sun/Dry	Medium	48" apart
Shrub	<i>Viburnum acerifolium</i>	Mapleleaf Viburnum	Part Sun/Dry	Minimal	48" apart
Tree	<i>Acer saccharum</i> 'Monumental'	Monumental Fastigiate Maple	Part Sun/Dry	Minimal	60" + apart
Tree	<i>Betula nigra</i> 'Dura Heat'	Dura Heat River Birch	Part Sun/Dry	Minimal	60" + apart
Tree	<i>Cercis canadensis</i>	Redbud	Part Sun/Dry	Minimal	60" + apart
Tree	<i>Ilex opaca</i>	American Holly	Part Sun/Dry	Minimal	60" + apart
Tree	<i>Quercus pinus</i>	Rock Oak	Part Sun/Dry	Minimal	60" + apart



## Materials Needed

**Mulch:** 30 cubic feet (1.1 cubic yards) – this assumes 3" of mulch cover

**Compost:** 20 cubic feet (0.7 cubic yards) – this assumes the top 6" of soil is being amended with compost

**Soil media:** 120 cubic feet (4.4 cubic yards) – this is only required if replacing soil

**Soil removal:** 50 cubic feet (1.9 cubic yards) if amending soil, 150 cubic feet (5.6 cubic yards) if replacing soil

The plants recommended above are reliable, hardy, area-appropriate plants for central and eastern Maryland and the surrounding areas. However, many other options are available. Other references for appropriate plants include the [Maryland Stormwater Design Manual, Appendix A](#), the [Ladybird Johnson native plant database](#), and the [Piedmont Natives plant database](#).

There are alternative layouts possible with the same general character and plant makeup. [Click here for alternative layouts](#).

Also, if you use a custom size practice, by area or depth, the material quantities change. Use the following calculator to give you a more accurate set of material quantities. It will also calculate the amount of pollutant removal, which may be of interest. Note: this pollutant removal is not yet approved by the Chesapeake Bay Program, but is based on other Bay Program protocols for runoff reduction.

[Conservation Landscape calculator](#)

## Installation Steps

(For more detail on these steps, please see the Conservation Landscape chapter of the WSA Manual.)

1. Call Miss Utility to mark any existing utilities
  - a. (800) 257-7777 or 811 for most of Maryland, and Washington, DC
  - b. (800) 441-8355 for Eastern Shore Maryland
  - c. (800) 282-8555 for Delaware
2. Outline the area for the conservation landscape
3. Remove the turf grass
4. If amending existing soil:
  - a. Remove excess soil
  - b. Add compost
  - c. Till soil to work compost in
5. If replacing soil:
  - a. Remove existing soil
  - b. Replace with new soil mixture
6. Install stone inlet channel (if receiving water from uphill)
7. Install plants and mulch
8. Water!

## Maintenance Plan

### Recommended Maintenance Tasks for Conservation Landscapes

Maintenance Tasks	Frequency
<ul style="list-style-type: none"> <li>Water once every three days for the first month and then weekly during the first growing season (April-October), depending on rainfall.</li> <li>Expect up to 10% of the plant stock to NOT do well in the first year, and plan accordingly for replacement plants.</li> </ul>	Upon establishment
<ul style="list-style-type: none"> <li>Check inlets and overflow areas for debris or leaves that are blocking flow.</li> <li>Check and repair erosion areas.</li> </ul>	After heavy rains in 1 <sup>st</sup> month; periodically in subsequent years
<ul style="list-style-type: none"> <li>Remove weeds by hand.</li> </ul>	Monthly for first growing season; every 3 months in subsequent years
<ul style="list-style-type: none"> <li>For “meadow” type Conservation Landscapes consisting of grasses, mow in early spring.</li> <li>For other types of landscapes, check for winter damage and add mulch to bare spots as desired (2–3 inches)</li> <li>Cut back perennials and remove dead growth</li> </ul>	March or April
<ul style="list-style-type: none"> <li>Add reinforcement planting to maintain the desired vegetation density.</li> <li>Prune trees and shrubs; thin herbaceous plants as desired.</li> </ul>	Fall
<ul style="list-style-type: none"> <li>Remove invasive and non-native plants using recommended control methods.</li> <li>Remove any dead or diseased plants.</li> <li>Stabilize any eroded or bare areas</li> <li>Remove trash</li> </ul>	As needed

## Additional References

[WSA Rainscaping Manual](#)

[RainScapes Program \(Montgomery County, MD\)](#)

[U.S. Fish & Wildlife Service - BayScapes](#)