

Collecting Native Seed

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MASTER GARDENER

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Why Collect Seed?

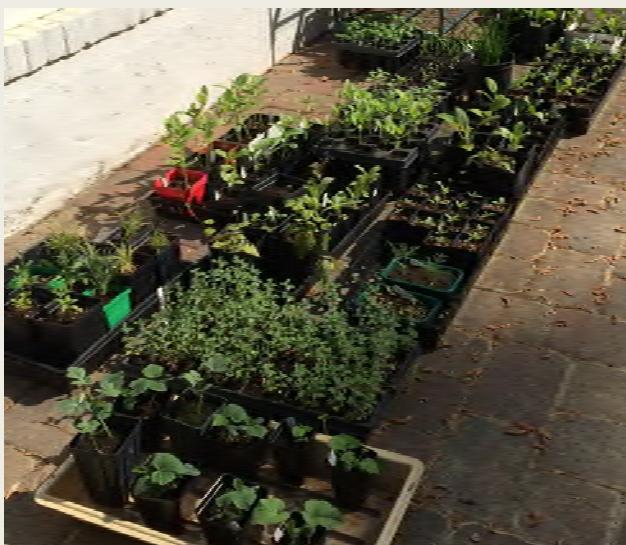


Photo by Janet Mackey

- Save money
- Plant selection for your environment
- Hard-to-find species
- Scientific exploration
- Genetic diversity or preservation

Topics

- Plant types
- Location & Species
- Characteristics of Seeds to Collect
- Techniques
 - *Gathering*
 - *Cleaning*
 - *Storing*
- Suggested Species for Seed Collecting



Types of Seeds

Annual

- Bears seeds the year they are planted
- Most likely will **not** overwinter
- *Impatiens capensis* (orange jewelweed)

Biennial

- Bear edible fruit the first year they are planted, flowers and seeds in the 2nd year
- *Oenothera biennis* (common primrose)

Perennial

- Grows year-after-year from established root system
- May grow more slowly in the first 1-2 years

Before Starting:

1. Select species based on location or project
2. What is the purpose?
3. Collection/propagation techniques will be dependent on genus
4. Takes patience and time!



Location

- Select the right species for your project or purpose
- **Identify the species**- don't wait until seed head stage!
 - Mark plants in bloom
- Permission of property owner or entity
 - Avoid public parks or spaces
 - Private property easiest
- Large population size
 - Genetic diversity
 - Ethics

Above: *H. moscheutos* in bloom
Below: *H. moscheutos* seed head



Ethics Note: Wild Collecting

- Take no more than 5-10% of a wild population
 - *20 Rule*
- You **must** have permission from landowner/entity
- **Do not** take seeds from [rare, threatened, and endangered plants](#)
- **Do not** collect seed from public parks, recreation areas, or other public regions
- **Do not** collect from small populations
 - *Larger populations best for both ethics and genetics*



Marking and Protecting Seeds



Columbine



Native Azalea

Collecting Seed

- Determine location
 - *Garden, roadside, wild, etc.*
- What you need:
 - Pruners, loppers, or scissors
 - Gloves for stripping
 - Paper bags, pillow cases, wide buckets, tarp
 - Labels or marker
 - *Optional:* Organza sachets, hand lens
- Selecting specimens
- Look for dry seed heads 6-8 weeks after bloom period

Preparing and Cleaning Seed

- Paper bags for collection
 - *Seed heads should face down, with stems upward*
 - *Can be stored here for 1-2 weeks while seeds dry*
- Remove “extra” plant material
 - *Chaff, stems, leaves, etc.*
- Mesh sieves (not necessary)
- Winnowing & debearding
- Organization helps
 - *Storing bags in boxes, envelopes upright in smaller boxes*

Cleaning Seed

- Line work area with newspaper, keep bucket on-hand
- Work with a single type of seed at a time
 - Small seeds can be tricky!
- Some may need several rounds of cleaning
- “Threshing” with pillow cases, rolling pin
- Use mesh sieves to separate chaff

Easy-to-Collect Seeds



Blue flag iris
Iris Versicolor



Sallow Sedge
Carex lirida



Columbine
Aquilegia canadensis



More Easy-to-Collect Seeds:

- *Aquilegia canadensis*- wild columbine (summer)
- *Iris versicolor*- blueflag iris (late summer- fall)
- *Panicum virgatum*- switchgrass* (fall)
- *Asclepias* spp. – milkweed species* (fall)
- *Verbena hastata*- blue vervain (fall)
- *Hibiscus moscheutos*- marsh mallow, hibiscus (fall)
- *Chasmanthium latifolium*- northern sea oats* (fall)

*indicates prolific behavior



Seeds Requiring Special Techniques



Swamp Milkweed



Pawpaw

Seeds with Pappus



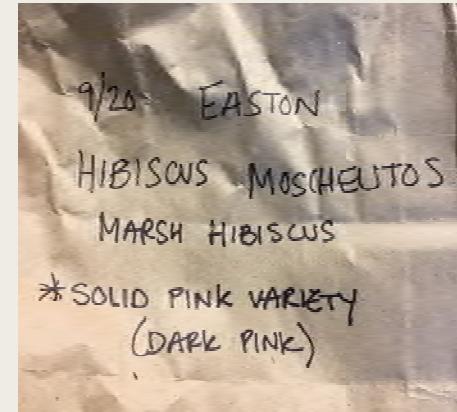
Golden Groundsel

Seed Heads



Taking Care of Collected Seed

- Coin envelopes are a good size for most seeds
- Mix with damp sand in plastic baggie for stratification
- LABEL the seed envelopes
 - *WHAT the plant is (common name and botanical name)*
 - *WHERE it was collected*
 - *DATE collected (at least the year)*
- Store them properly
 - *Dry*
 - *Away from insect pests or animals*
 - *Out of the light*



What Seeds Should I Collect?



Hard-to-Find Species



Pink Fuzzy Bean
Strophostyles umbellata

Genetic Variation



Photo Credit: Park Seeds

Genetic Variation



Great Blue
Lobelia
Lobelia siphilitica



White
Variation



Other Methods...



Propagation Methods: Transplant



Propagation Methods: Layering



Virginia Sweetspire
Itea virginica

Propagation Methods: Cuttings & Dividing



Blue-eyed grass
Sisyrinchium scoparium



Foamflower
Tiarella cordifolia

Self-Seeding Types



What should you collect?

- Easy to collect
- Easy to clean
- Easy to grow



Grasses



Bottlebrush Grass
Elymus hystrix



Splitbeard bluestem
Andropogon ternarius

- Most do not need stratification-
but it doesn't hurt!
- Dry, brown seeds (hand lens)
- Will germinate at temperatures
>70 degrees
- Warm-season vs. cool-season
- Bearded seeds
 - *May need “de-bearding”*
 - *Can be difficult to clean*



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Sedges



Fringed sedge (*Carex crinita*), Sallow sedge (*C. lutea*), and Frank's sedge (*C. frankii*)



- Some Carex are “hydrophilic”
- Sow immediately, or store in damp sand (plastic bag)
- Cold stratification is good MB2
- Have papery coating- can be removed for better germination

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Flowering Perennials



Slide 31

MB2 Need photo of sedge seeds under microscope, with and without perigynium

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Slide 32

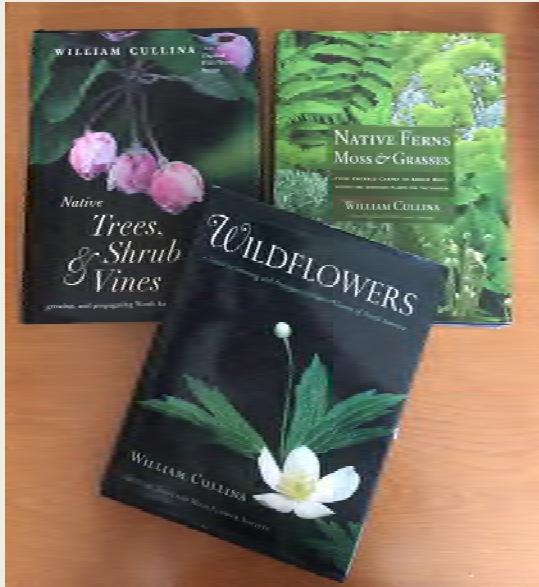
MB3 Need picture of seeds/seedhead

Mikaela Boley, 9/23/2020



Foxglove Beardtongue-
Penstemon digitalis

- More variation in treatment and collecting
- Most require stratification (cold)
- Some require scarification
- Watch for hybridization (species)
- Lots of variability



Resources

- Xerces Society- Collecting and Using Your Own Wildflower Seed
 - <https://xerces.org/publications/guidelines/collecting-and-using-your-own-wildflower-seed>
- Tallgrass Prairie Seed Collecting Guide
 - https://tallgrassprairiecenter.org/sites/default/files/techguide1_seedcollecting_2015_web.pdf
- Pleasant Valley Conservancy seed collecting chart
 - <https://pleasantvalleyconservancy.org/seedcollectingtimes.html>

Talbot County Free Seed Library

<https://www.facebook.com/talbotcountyfreeseedlibrary>



COLLECTING seeds is not enough



Seeds need a purpose!



Winter Sowing



“Sowing Native Seeds”

Friday, November 13th at 1:00 PM

Registration:

<https://go.umd.edu/nativeseeds>



<https://go.umd.edu/ENRTEACH>

Name: Boley, Mikaela
Date: September 30th, 2020
Topic: Master Gardener



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