**How Can You Help?**

**Pollinator Gardens**

1. Decide what type of garden you want; a single pot garden, a box garden, a patch of yard, or a full prairie area. Be sure to consider the soil area, a well-drained area may need to be treated differently than a moist soil area. Also consider how you want it to look, many native plants can get very tall and look weedy-if that’s not your thing a typical prairie style garden may not be for you.
2. Decide what you want to plant, perennials, biennials, annuals, trees shrubs, or even a veggie and herb garden. Be sure to consider your regional location and know what species are invasive. Note\* invasive species and species that re-seed may not mean the same thing to everyone.
3. Decide whether to use starter plants or seeds depending on your level of gardening skills and budget.
4. Plant plant plant! If you need gardening tips or ideas on what to start with below are some GREAT sources.

* Sources
  + Pollinator.org Planting guides: <http://pollinator.org/guides>
  + Plant Grow Fly: Create your garden <https://www.blankparkzoo.com/conservation/plantgrowfly/create-your-garden/>
  + The Xerces Society: <http://www.xerces.org/>
  + Resilience <http://www.resilience.org/stories/2015-05-29/bees-and-other-pollinators-love-these-flowering-plants/>

**Not ready to start a garden, join a conservation campaign-volunteer**

* Iowa Natural Heritage Foundation: <http://www.inhf.org/>
* Pollinator Partnership <http://pollinator.org/volunteer.htm>
* No time to volunteer? Lots of ways to give or have your own unused land turned into pollinator habitat, here I just one I like in particular:

<http://beeandbutterflyfund.org/about-us>

**Beekeeping**

1. Do research, read books, sign up for a class, or get a mentor. Remember you can’t learn everything that way, a certain amount of success comes from getting your hands dirty, observing your bees, and learning how to adapt and solve issues as they arise. Even a 30 year beekeeper still learns new things about their hives especially as new diseases arise and habitat availability continues to decline.
2. While stings can usually be avoided with proper care of bees and appropriate clothing, it is important to know how your body reacts to a bee sting before you start
3. Know the time, cost, and legal (reporting disease, proper hive treatment, food regulations if selling, etc.) commitments involved.
4. Obtain Tools and Equipment. The average cost to get started is between $500-$1000 depending on the quality and extent. The basic starter tool and equipment kit includes about 25 items (not including the hive and colony).
5. Obtain a bee colony from a beekeeping supplier, apiary neighbor, or a local association’s swarm list. Locally raised colonies are usually best as they are suited to the area and acclimated to the seasons-this can help overwintering success.
6. Once you’re all setup you can start care and maintenance.
   * Opening up and inspecting the hive (keep a records log)
   * Manage pests and diseases
   * Manage honey stores
   * Swarm watch -this is a natural event, but make sure to understand it as some consider it irresponsible to let them swarm. Often carrying out an artificial swarm may be necessary.
   * Prepare for winter
   * Winter monitoring
   * Changing combs in early to mid- spring

\*\*Remember this does not entail everything you encounter

1. Enjoying bee bounty
   * Honey
     + Food (as a topping or recipe ingredient)
     + Medicinal purposes for colds
   * Wax
     + Candles
     + Furniture polish
     + Salves, lotions, ointments, and balms
   * Propolis
     + Antimicrobial agents for tooth treatments sores and ulcers
     + Propolis powder

* Sources
  + American Beekeeping Federation: <http://www.abfnet.org/?page=34>
  + USDA Bee Research Laboratory-not particularly for how to start beekeeping but offers disease diagnostic and information on disease and pests:

<https://www.ars.usda.gov/northeast-area/beltsville-md/beltsville-agricultural-research-center/bee-research-laboratory/>

* + Scientific Beekeeping: <http://scientificbeekeeping.com/beginners-pages/>
  + Bee Apart Bee Together: <http://www.beeapartbeetogether.com/classes.html>
  + Bee Spotter: <http://beespotter.org/>

**Building bee houses is a great alternative if beekeeping doesn’t appeal to you**

1. Bamboo bee house
2. Clay bee house
3. Wood block bee house
4. Sod bee bank
5. Pallet bee hotel

**More Interesting Reads and Watches**

* **Hive Alive –Netflix documentary**
* ***The Bee Book***
* **American Bee Journal**
* ***The Hive and the Honeybee***
* ***The Joys of Beekeeping***
* ***Beekeeping A-Z***
* **Eva Crane books and documents** 
  + [**http://www.evacranetrust.org/documents**](http://www.evacranetrust.org/documents)
* **The Pollinator Partnership Website**
* **Bee Informed partnership Website**
* **The Honeybee Health Coalition Website**