

Coming to Terms with Native Plants



Rudbeckia hirta is a straight-species native plant.

We are constantly bombarded with terms for one thing or another. But if you are interested in providing for pollinators, having a native plant vocabulary is most helpful.

First, it's important to understand that a **native plant** is one that lives or grows naturally in a particular region without human intervention. It is generally accepted that these plants were growing here prior to European colonization. Sometimes native plants are referred to as "**straight species**" or "**wild-type**" plants.

Native plants are part of a balance of nature that developed over hundreds of thousands of years in a particular region. Living plants, animals, and the environment function as an ecological community, called an **ecosystem**.

Keystone plants are the native trees, shrubs and flowering perennials that most wildlife species rely on to complete their life cycles. These top plants are critical to the food web. 96% of our terrestrial birds rely on caterpillars (butterfly and moth larvae) and other insects supported by these keystone plants. Many of these top plants also support large numbers of native bees whose larvae require specific flower pollen. Without keystone plants in the landscape, many animal species will not thrive. For a list of keystone plants for our area, go to: [Garden for Wildlife Keystone Plants by Ecoregion - Eastern Temperate Forests](#).

It's Only Natural. Plants that reproduce naturally are known as **open-pollinated** plants. They include wind-pollinated plants such as grasses, weeds (think ragweed), and trees (pine, oak, maple). Many plants do have the ability to self-pollinate, but only a few are predominately self-pollinating (peas, peanuts). The vast majority of flowering plants require the assistance of insect pollinators. For this reason, plants have adapted a variety of shapes and sizes to attract pollinators with different body types and needs. A hummingbird, for example, is not visiting the same flower as a mason bee.

Finding just the right flower, a pollinator is rewarded with **nectar**, a sweet liquid containing amino acids, vitamins, and minerals that support a pollinator's metabolism and fuel flight. Flower **pollen** is a powdery substance collected by foraging bees. An essential source of protein, amino acids, carbohydrates, lipids and vitamins, pollen is absolutely crucial for developing bee larvae.

Native bees are our most significant pollinators. There are over 4,000 native bee species in America, from the tiny sweat bee to our most recognizable and beloved bumble bee. Many bees are **generalist pollinators**, meaning they are not too fussy and will collect pollen from a variety of native plant species. Bumble bees are generalist pollinators. There are however, many bees who will only collect pollen from a specific plant or plant species. They are called **pollen specialists**. Every native bee family includes pollen specialists. The activity of collecting pollen from a certain flower is similar to a Monarch butterfly only seeking milkweed to feed her caterpillars. A squash bee is one example of a pollen specialist for plants in the cucurbit family (squash, melon).

A **cultivar** is a cultivated version of a plant bred by horticulturists to enhance a specific characteristic of a plant (size, shape, color), usually created to entice us with something new and unusual. **Native cultivars** are bred without consideration for our pollinators needs and may represent only a fraction of the natural diversity of the straight species. As with any genetic change, a critical characteristic may be lost. Different colors may not be recognizable to pollinators. Patterns on flower petals acting as “runway lights” to guide pollinators are lost. Quality and quantity of pollen and nectar may be diminished or lacking. And double flowers, with tightly-packed petals, are inaccessible to pollinators. The term **nativar** is slang for a native cultivar and should not be confused with a true native plant.

Standard plant nomenclature is the formal, worldwide standard for naming plants using a scientific two-part naming system meant to eliminate confusion over regional names or language. The first name identifies a group of related plants while the second name identifies the specific **species**. For example, *Rudbeckia hirta* is our native black-eyed Susan. The cultivar, *Rudbeckia* “Cherry Brandy” while related is not the same species. When choosing plants for pollinators, look for the second name and reject plants with fancy names in “quotes”.

Photo credit: Tiny Meadow Farm, Danbury, CT.