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Pay Attention to Fruit Tree Pollination Requirements

To many people, the word "pollen" brings to mind the misery of allergy season: itchy eyes, sneezing and runny nose. A world without pollen would be heavenly, it would seem, for allergy sufferers. However, without pollen many plants would not be able to produce the seeds and fruit that humans and other animals rely on for sustenance. Without pollen, these plants could not reproduce and pass on their genes. In most plants, the male part of the flower, the stamen, produces the powdery pollen containing the male gamete. This substance must find its way to the female part of the flower, the pistil. The pollen then travels to the base of the pistil entering the ovary, where it fertilizes the ovum or female gamete. Fertilization of the ovum initiates the formation of the seed of the plant. The ovary, surrounding the ovum or seed then begins to mature and toughen, eventually becoming the fruit of the plant.

How does the pollen get from the stamen to the pistil? This process, called pollination, is accomplished in several different ways. In self-pollinating plants, the wind may blow the pollen from one part of the flower to another. Plants, such as sour cherries, crabapples and peaches fall into this category. Many fruit trees, however, require the presence of a tree of another variety to "cross-pollinate" them. Most apples, sweet cherries, and pears, for example, must be planted in proximity to a different variety of each respective species, in order for fruit to be formed on the tree.

Ideally, the second tree should be within 50 feet of the first, so that the pollinators, typically honeybees (some birds and butterflies also serve as pollinators), will find their way from the first to the second. Pollen from the first rubs off on them while they are gathering nectar from the flowers to make honey. When they visit the second the pollen rubs off on the female parts of that flower. Trees further than 50 feet away may work as cross-pollinators (could even be a neighbor's tree), but the pollination will less effective the further away the second tree is.

Another important requirement for good cross-pollination is that the second tree flowers at same time as the first. If a bee picks up pollen from one tree, it can't drop it off at another tree that has finished or has not yet started flowering. Fortunately lists of compatible trees are easy to find on the internet. When starting an orchard or adding a fruit tree to an existing orchard, you must understand the pollination requirements of each tree in order to ensure a good crop of fruit.

The next time your eyes begin to itch during pollen season, remember the important role pollen plays in the plant world. Your discomfort may become just a little bit easier to bear.