

## **Plant Families and Crop Rotation**

The Linnaean classification system of organisms was developed in 1758 by a Swedish botanist named Carl Linnaeus. The two-part naming system is the method for used for naming and identifying species - the genus name is the first name, and the species name is the second name. All plants are classified into a genus, which is part of a wider plant family, such as Asteraceae or Iridaceae.

Plants (genera/genus) in the same family share physical characteristics that can help us identify them. For example, plants in the Asteraceae (daisy) family usually form the shape of a daisy, while those in the Fabaceae (pea and bean) family hold their seeds in a pod such as a pea or bean. Learning to identify plant families will help you notice similarities between plants, understand their growth habits and growing requirements, and even identify seedlings.

As disease can run in plant families it helps to be able to identify which plant belongs to which so that if disease is encountered you can make a note to rotate what is grown in that space.

This allows any disease to die out for a few years before trying again, prevents failed crops and also maximises crop yield. For example, if you suspect white rot in onions you should not grow any leeks or garlic in the same place for a few years because they all belong to the same Amaryllidaceae family and would be similarly prone to the same disease. You could then choose to plant broccoli, which is from a completely different family, Brassicaceae, instead.

It is common and good practice in growing edible crops to rotate crop families each year within your growing space to avoid any build-up of disease or pests. It also helps to maintain good soil fertility as different crops can give back different nutrients to the soil through their roots or by letting plants break down into the soil for the following year.

The image below shows a good example of crop rotation groups that follow each other well:

