## Species of the Week



Orange-tip Butterfly

Anthocharis cardamines Barr buí

The Orange-tip Butterfly is one of many butterfly species that makes Ireland its home. They are widely distributed across the country where they prefer wet conditions in grassland, hedgerows and forest edges. What's interesting is that the sex of the individual determines the habitats they prefer. Males tend to stay along the edges of forests and travel the same familiar area, while the females tend to spend their time in open fields and meadows. They can also visit the edges of forests and travel into forests sometimes too and seldom visit the same area twice.

They are aptly named from the vivid orange colouration on the wings of the males. The females have dark grey or black tipped wings instead. Both sexes have a mottled green underside on their wings. While the males are distinct from other species, the females can often get mistaken for other species while flying.

If a male and a female meet in flight the male will court and attempt to mate with the female. Once mating had occurred the female will lay a single egg on a plant that the caterpillars fed on. Only one egg is laid on each plant because the larva or caterpillars will cannibalise one another if they meet. The caterpillar will eat throughout the summer. Once it is fully grown it will leave the plant and forms its pupa or chrysalis and remain there over the course of the winter, emerging in spring as an adult Orange-tip Butterfly.

Sexual dimorphism is the name given when there are different characteristics between the sexes of a given species beyond just their sexual organs. The Orange-tip is a clear example of sexual dimorphism as the males and females have a very clear difference in their colouration. Why has this happened though? It is the result of Sexual Selection. This is where certain traits in the colour of the animal are being selected for by females. In the Orange-tip case, the female may only decide to mate with a male with bright orange wing tips and so any male with dull wing tips won't pass their genes down to the next generation. Over time, the males will have a brighter and brighter orange because females won't be impressed by anything less. Given enough time males can end up looking quite different from females. In certain species you wouldn't even recognise that they were of the same species. Some well-known examples of sexual dimorphism would be the peacock and peahen, the male and female mallard duck and the African lion and lioness.