

Pollinators

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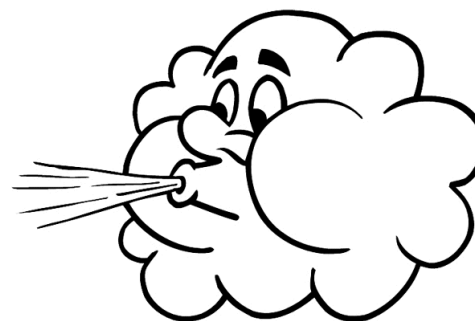


Welcome

Carloonan 27th June 2018

Pollination

The transfer of pollen to enable fertilisation



Insect Pollinators

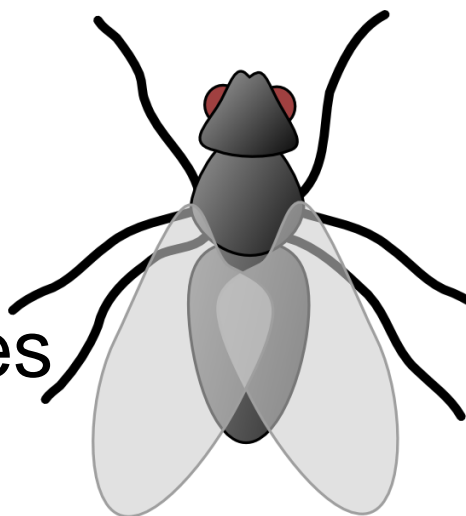
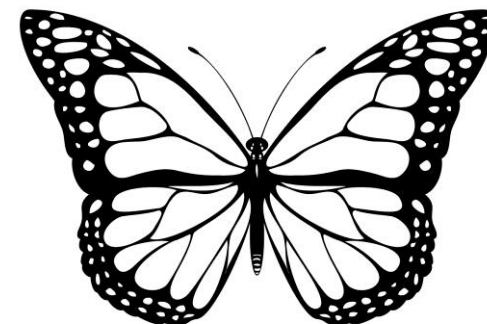
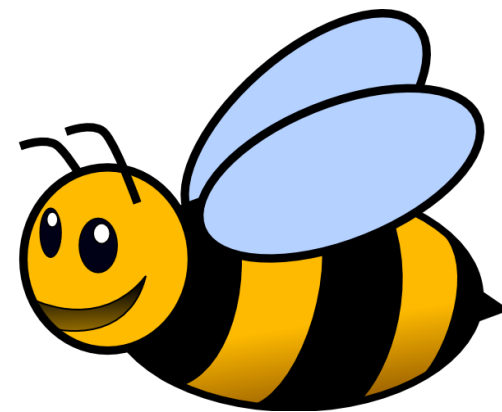
Bees - honey and Bumble

Butterflies

Moths

Flies

Beetles

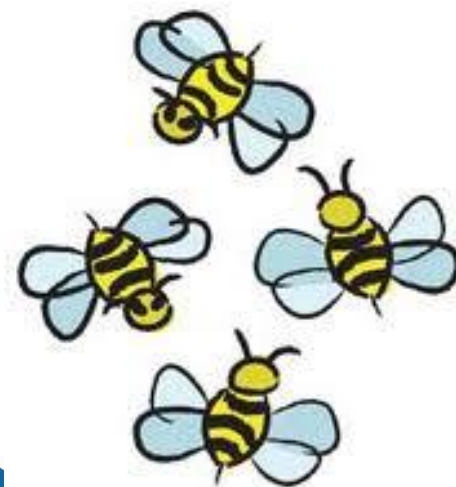


Pollinators

Pollinators are an important part of the Farming Industry

In the UK insect pollination contributes over £440 million to farm income (2010) directly

The value of pollinating insects is vitally important to the ecosystem and to food production



Honeybees are generally thought to be the most important pollinators in the farming industry

Pollinating insects are crucial for
Vegetables, fruit, oilseeds, legumes
fodder crops



It is estimated that one third of the human food supply depends on bees

Butterflies and Moths

What do we think the differences are between butterflies and moths?

Colourful and pretty
Fly by day.
Brown and drab
Eat clothes
Fly by night

There are around 50 species of butterfly and 2500 species of moths in the UK

Moth or butterfly?



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Wild Bumble bees, Solitary bees and commercial bees provide the majority of our pollination services

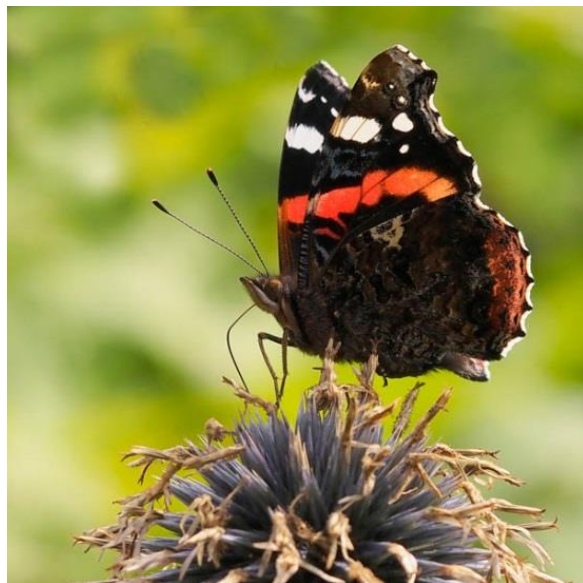
Bumble



Honey



Does size matter?



Long is not
always best:
We need the
right
pollinator for
the right
plant.



Did you know

- The cacao (chocolate) tree is actually pollinated by midgies
- Mosquitos pollinate some orchids
- A Hawk moth has a proboscis more than 1 foot long in order to pollinate the comet orchid



Why are we worried about pollinators



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A recent study in nature reserves in Germany show a 75% decline in flying insects over the last 25 years.

Causes are thought to be

- Loss of flower rich habitats
- Widespread use of Pesticides and Herbicides
- Intensification of agriculture and loss of hay fields and clover leys.

What do bees need

- A supply of food (pollen and nectar) from April to September
- Suitable nesting site. Mostly underground, in wall cavities or in tussocky grassland
- Suitable places to hibernate, underground, banks, ditches or in dead wood.



Wildflower rich grasslands are the most important habitat for bees.



Clover Leys



*Don't cut
too early
for bees*



Flower species important to bees

Early Season flowers

- Goat Willow
- White dead nettle
- Blaeberry
- Birds foot trefoil
- Wild Cherry
- Bugle

Mid to Peak Season

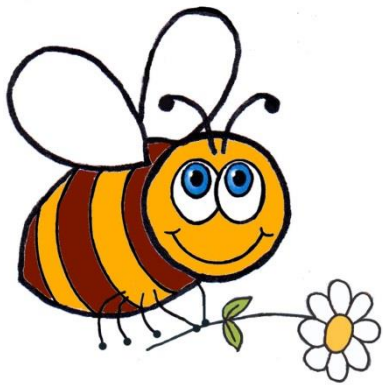
- White and red clover
- Yellow rattle
- Foxglove
- Raspberry
- Bramble
- Heathers
- Common knapweed
- Devils bit scabious
- Ivy



Farm
gardens are
important
too







So if you want to protect bees here are a few things you can do

- Protect areas of wild flowers such as field margins
- Create wildflower areas on suitable places
- Think of bees when planting a hedge or shelter belt
- Delay the cutting of clover leys until after flowering
- Don't use neonicotinoid pesticides on farm or garden



Take up bee keeping







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Thank you