

Discover the Fauna of Our Campus

Housefly

Order: Diptera (Two-winged insects)

Family: Muscidae (True flies)



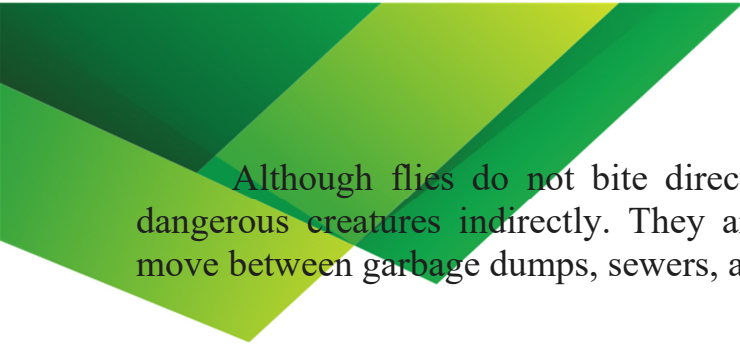
Genus: *Musca*

Species: Housefly (*Musca domestica*)

The housefly (*Musca domestica*) is the most widely distributed insect species on Earth, found in every point inhabited by humans. Although it may seem like just an annoying creature at first glance, its biology, movement mechanism, and disease-carrying potential are quite complex.

The housefly is one of evolution's most perfect flying machines. Its body consists of three parts—head, thorax, and abdomen. The fly has two giant eyes that occupy most of its head. Each eye consists of approximately 4,000 small lenses (ommatidia). This provides them with a 360-degree field of vision. They perceive movement many times faster than the human eye, which is why catching them by hand is almost impossible. Flies do not have the ability to chew. Their mouth is like a sponge. To consume food, they first vomit digestive juice (enzymes) onto it, liquefy the solid matter, and then suck it up. Flies taste with their feet. The tiny hairs under their feet are rich in chemoreceptors. Also, thanks to a special sticky substance on their feet, they can easily walk on smooth surfaces like ceilings and walls.

A female fly can lay between 500 and 1,000 eggs during her lifetime. Eggs are usually laid on moist and decaying organic matter (garbage, manure, etc.). Only 8-20 hours after the egg is laid, white, legless larvae emerge. They grow rapidly by feeding. After completing its development, the larva retreats into a hard, brown shell (pupa). In warm weather, this entire process takes only 7-10 days. This means that during one season, the number of flies can increase in a geometric progression.



Although flies do not bite directly, they are considered one of the most dangerous creatures indirectly. They are "mechanical carriers." Flies constantly move between garbage dumps, sewers, and food products.

More than 100 types of pathogens (microbes) have been detected on their bodies and in their digestive systems. Cholera, dysentery, typhoid fever, tuberculosis, and various eye infections can be transmitted to humans through flies.

When a fly lands on food, it both leaves microbes from its feet there and transmits internal infections when it vomits to liquefy the food.

We often see flies rapidly rubbing their front legs together. This is not just a habit, but a vital cleaning procedure. When the taste receptors on their feet are covered with dust or food residues, the fly's "sense of taste" becomes dull. Therefore, they must keep their sensory systems constantly clean and sensitive. Although the housefly plays a role in the decomposition of waste in nature, it is a serious risk factor for human health. Seeing a fly in the house can be a harbinger of a potential source of infection or an unsuitable sanitary situation nearby.

