Fruit Fly Fact File

NAME: Common fruit fly

LATIN: Drosophila Melanogaster

Statistics

Wing rate: 200 times/second

Average speed: 0.7 m/s

Top speed: 2.0m/s

Estimated population: 1.5-2.5 million

Length: 3mm + 1mm

Legs: 6

Eyes: 2 (but they are compound eyes, meaning they are made up of thousands of

ommatidia)

Eggs/day: 20-50

Eggs/lifetime: 400-800 Lifespan: 40-50 days

Maximum instantaneous G-force tolerance: 300-400 G Oxygen usage (female): $4 \mu l$ O₂ per mg per hour Oxygen usage (male): $6 \mu l$ O₂ per mg per hour

Survival time in 1cm³ of air (only counting oxygen usage) (Female) 52h Survival time in 1cm³ of air (only counting oxygen usage) (Male) 35h

Favourite food: banana

Description:

The fruit fly (Drosophila melanogaster) is a small insect commonly found near ripe and decaying fruit. It measures about 3-4 mm in length and has red eyes, a tan-colored body, and transparent wings. Fruit flies are widely used in scientific research, particularly in genetics, due to their short life cycle and high reproductive rate. They undergo complete metamorphosis, progressing through egg, larva, pupa, and adult stages in approximately 10 days under optimal conditions. These insects are known for their ability to detect fermenting fruit using their highly sensitive olfactory system. While they can be a nuisance in homes and food industries, they play an essential ecological role by aiding in the decomposition of organic matter.

Life Cycle:

