

Leaf litter invertebrates under the microscope

Objectives

- Children can use a low power stereoscopic microscope effectively
- Children know to treat living things with respect
- Children can identify invertebrates that live in leaf litter using a microscope and identification key
- Children can produce detailed line drawing diagrams of specimens with labels

Preparation

- Classroom is prepared for a microscopy workshop
 - One microscope per group table of four children
 - Newspaper laid out for leaf litter sample
 - One small paint brush and one plastic spoon per child
 - One Field Studies Council Woodland Trail key per table
- Children know how to set up a microscope and have been introduced to focussing and illumination

Collecting specimens

- Teacher collects a bucket of leaf litter in advance
- A trowel full of leaf litter is placed on newspaper on each table

Respect for living things

- Explain to the children that we will be observing living things and that we need to respect them
 - Search for specimens by carefully moving leaf litter about with a paint brush
 - Gently move specimen onto a plastic spoon using a paint brush
 - Observe specimen for a short while and then return to leaf litter
- The whole sample will be returned to where it was found at the end of the lesson

Observing, identifying and drawing specimens

- Children find specimens in leaf litter and observe them under microscope
- Children identify the invertebrates they have found using an FSC Woodland Trail key, answering yes/no questions and following arrows.
- Children practise using one eye to observe and one eye to draw with
- Children produce a labelled diagram of their specimen.
- Children visit each other's tables to see specimens of particular interest

Summary

- Children have reviewed setting up a microscope, focussing and illumination
- Children have handled specimens of invertebrates carefully
- Children have observed, identified and drawn invertebrates