


A close-up photograph of a bumblebee on a purple flower. The bee is positioned in the center, facing left, with its head buried in the flower's center. Its body is covered in thick, fuzzy black and yellow hair. The wings are transparent and slightly spread. The flower is a vibrant purple with white markings. The background is a soft, out-of-focus green, suggesting foliage.




**biodiversity
exploratories**
functional biodiversity
research



Floral abundance

Four circular petri dishes are arranged in a 2x2 grid on a white surface. Each dish contains a small amount of clear liquid and several small, dark, segmented larval samples. The dishes are labeled with handwritten text in black ink. The top-left dish is labeled '10/10/01' and '10/10/01'. The top-right dish is labeled '10/10/01' and '10/10/01'. The bottom-left dish is labeled '10/10/01' and '10/10/01'. The bottom-right dish is labeled '10/10/01' and '10/10/01'.



FOOD

Food is composed of carbon-rich molecules. Atoms of non-carbon elements are "diluted" in carbon. *Other elements ratio is high.*

CONSUMER'S DIGESTIVE TRACT

Symbionts inhabiting the consumer's digestive tract may rearrange atoms composing original food into different molecules but cannot change atoms. *Other elements ratio cannot be changed here.*

CONSUMER

Biomass composing the consumer's body is rich in atoms of non-carbon elements, extracted from its food. *Other elements ratio was changed and is low.*

Physiological studies and Stoichiometry (Element composition)