

Exam Review

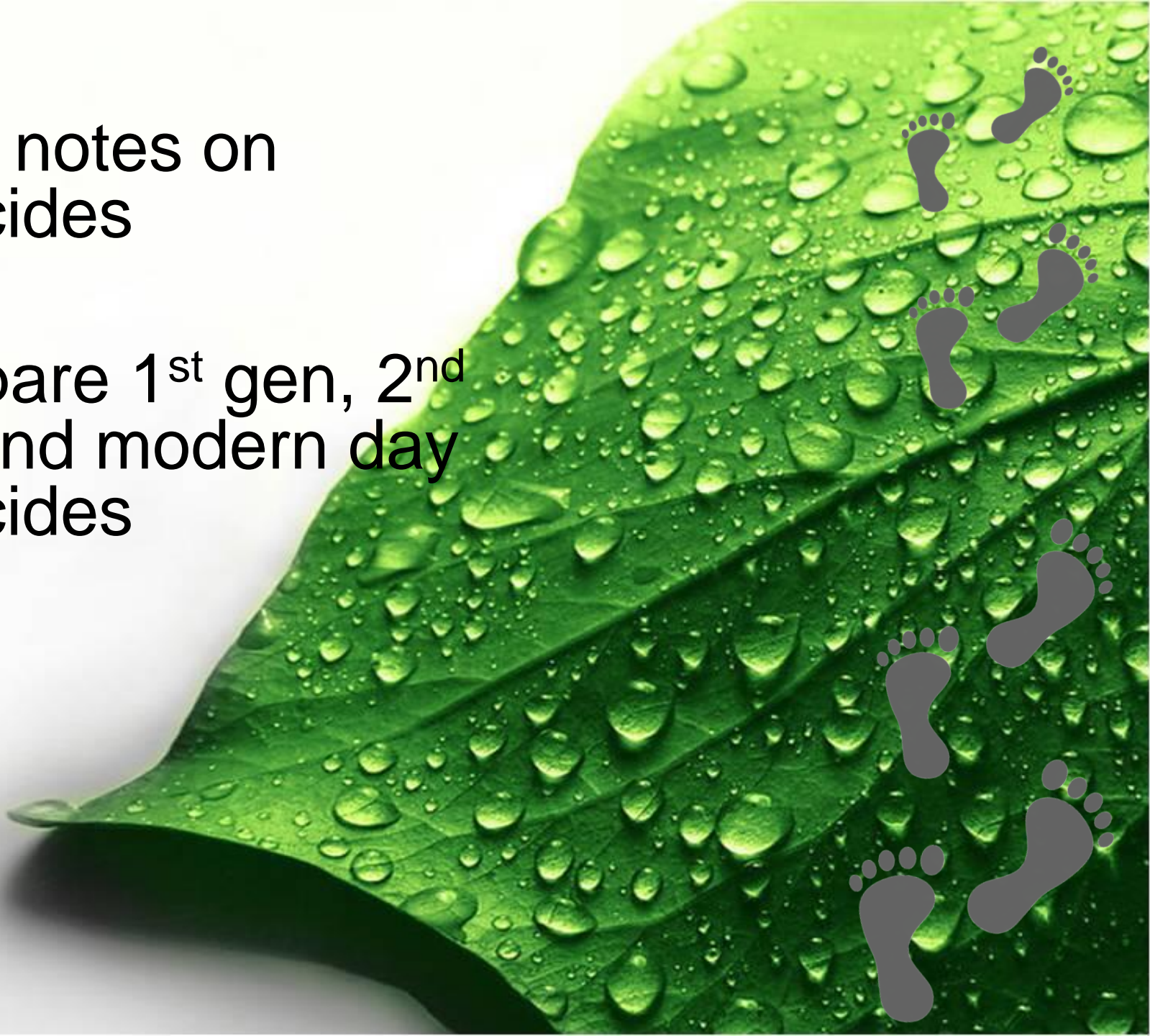
Part 1 Ecosystems

You must know **biodiversity**,
ecosystems, **deforestation**,
biotic and abiotic factors,
THE CARBON CYCLE



Open notes on
pesticides

Compare 1st gen, 2nd
gen and modern day
pesticides



a term to describe the relationships among the many species living in an environment and the relationship among those organisms and the non-living components of the environment.

Eco-system



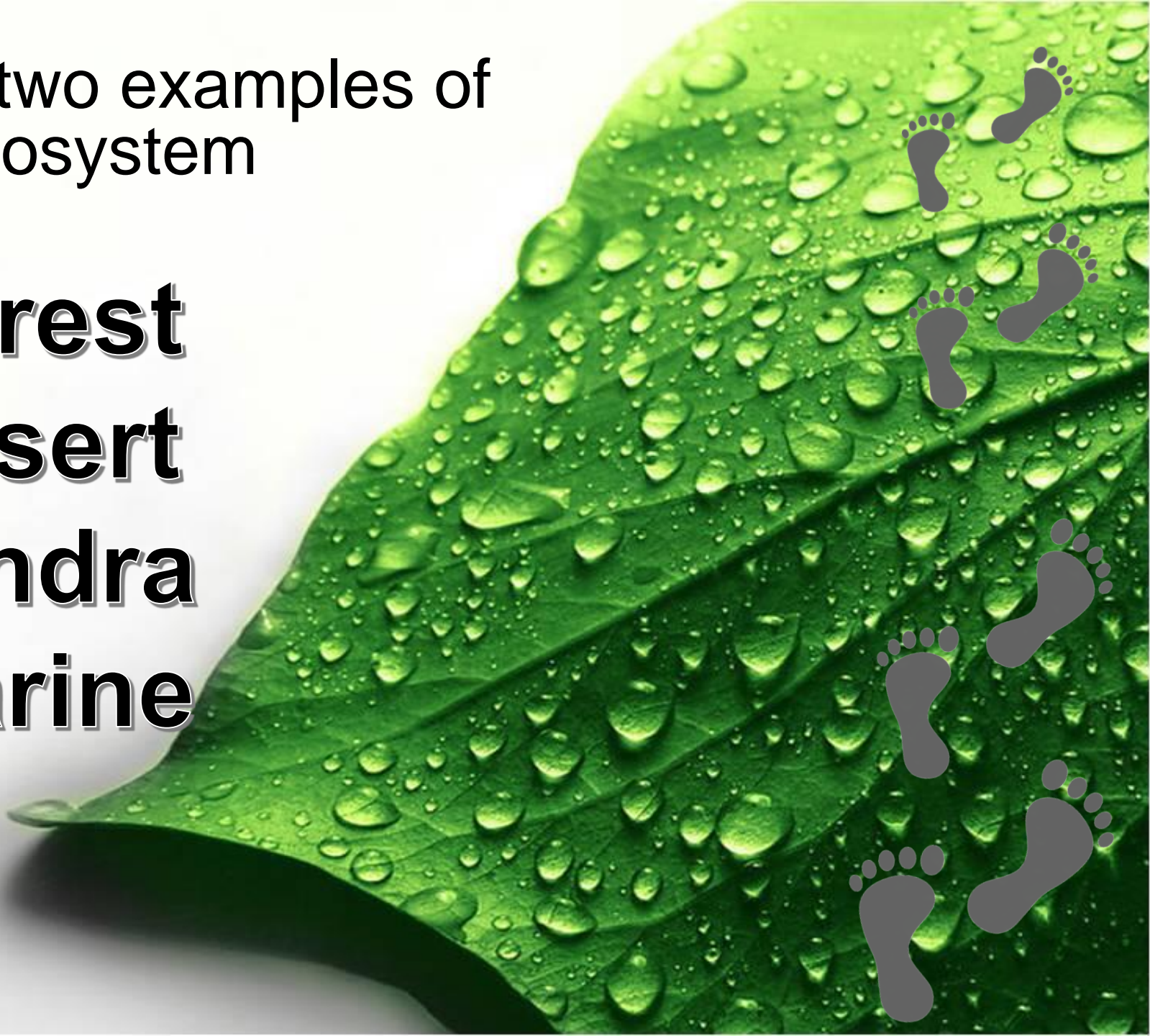
An organism's home

Habitat



Give two examples of
an ecosystem

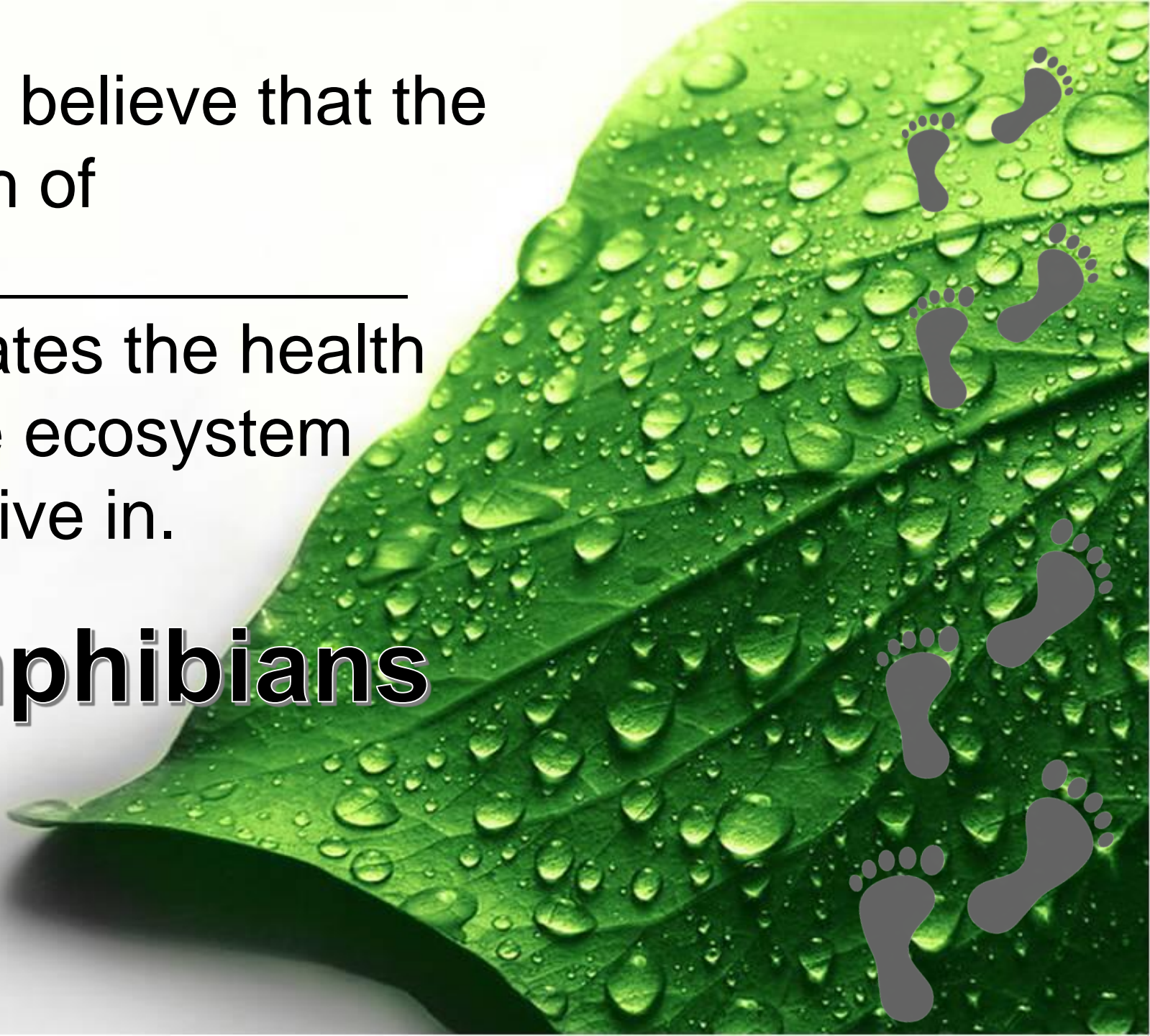
Forest
desert
Tundra
marine



Many believe that the health of

_____ indicates the health of the ecosystem they live in.

Amphibians

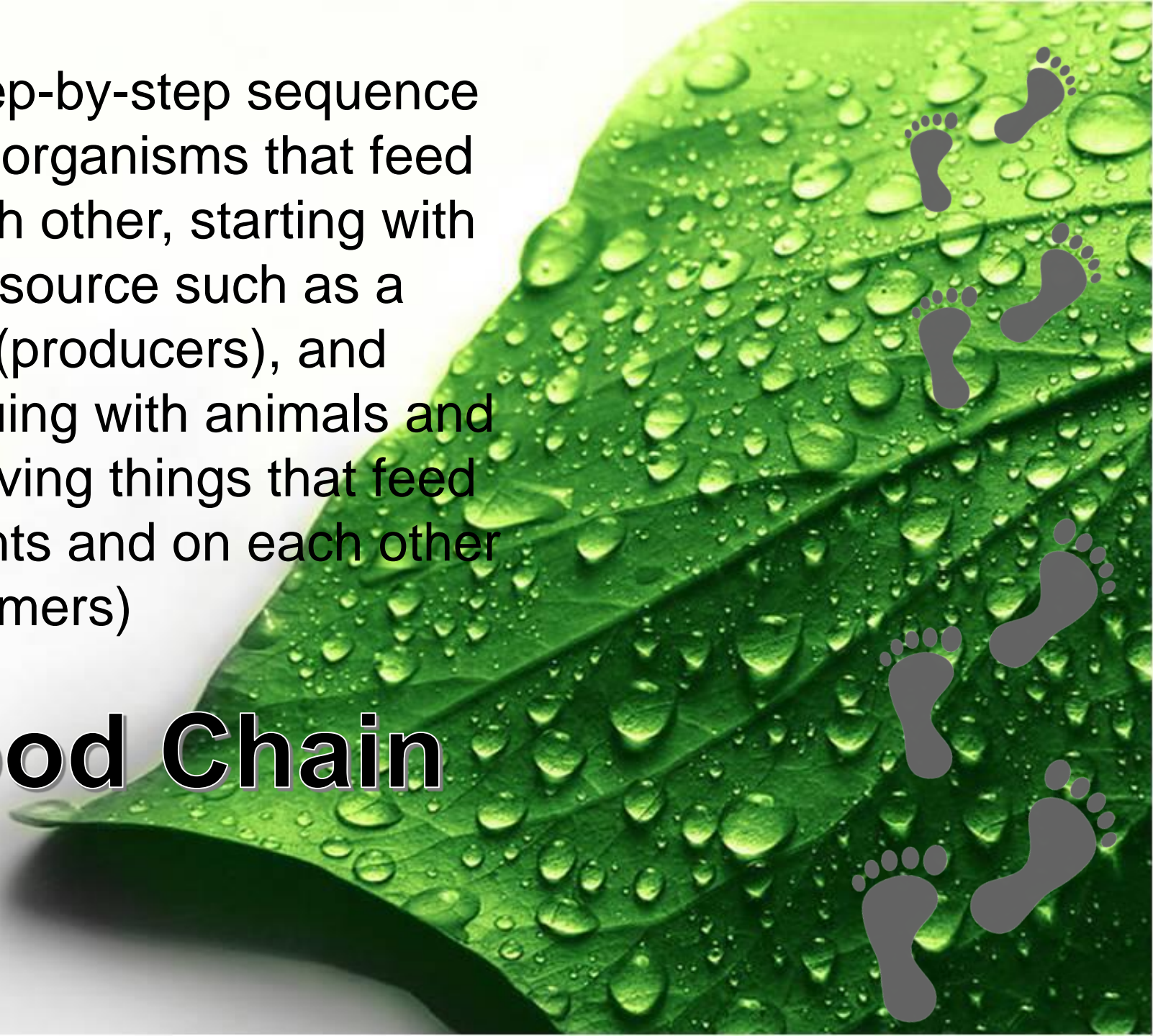


Identify 3 ways that ecosystems are affected by deforestation

Soil Erosion
Temperature Change
Habitat Loss
Carbon Cycle Change

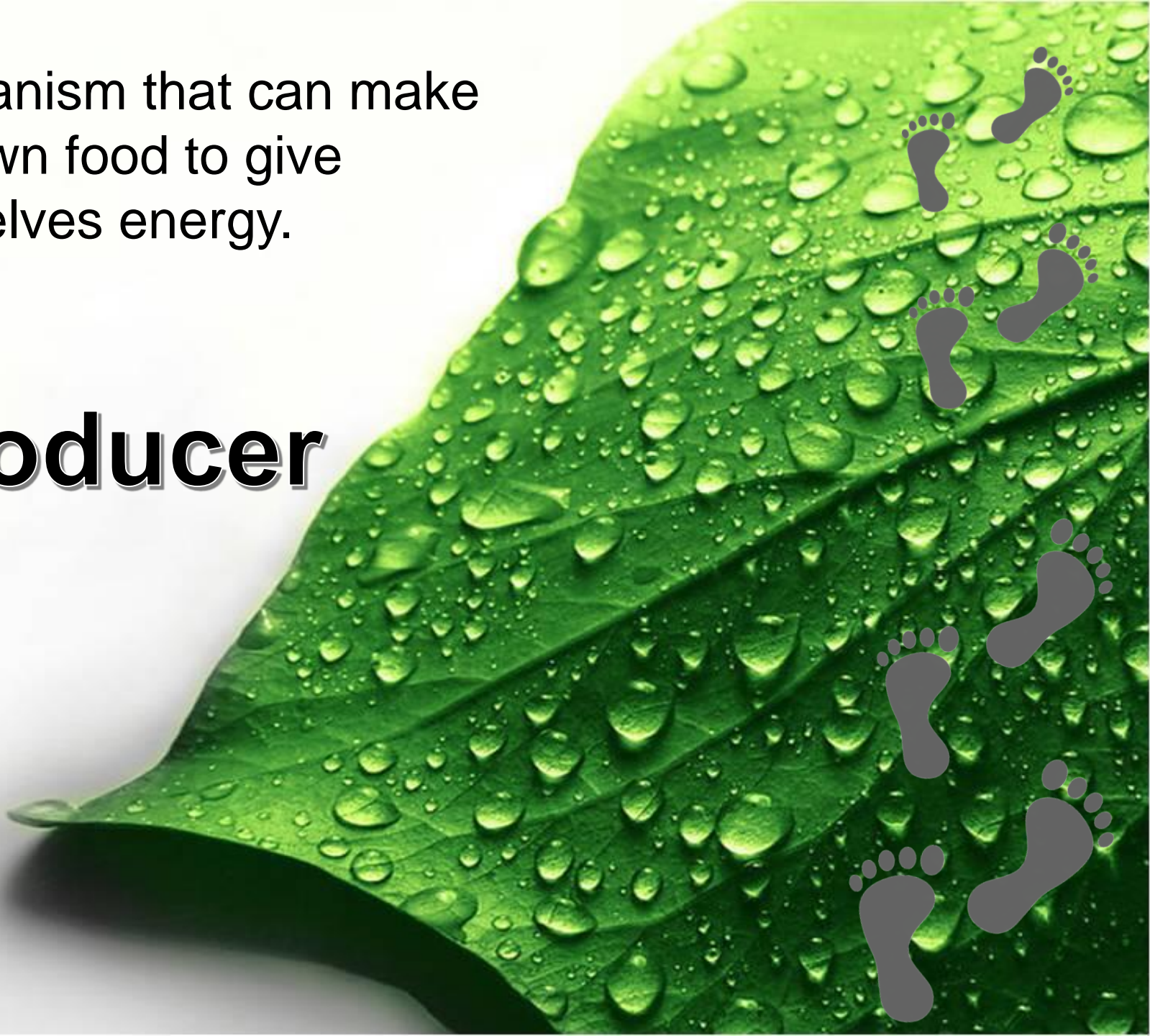
Is a step-by-step sequence linking organisms that feed on each other, starting with a food source such as a plants (producers), and continuing with animals and other living things that feed on plants and on each other (consumers)

Food Chain



an organism that can make their own food to give themselves energy.

Producer



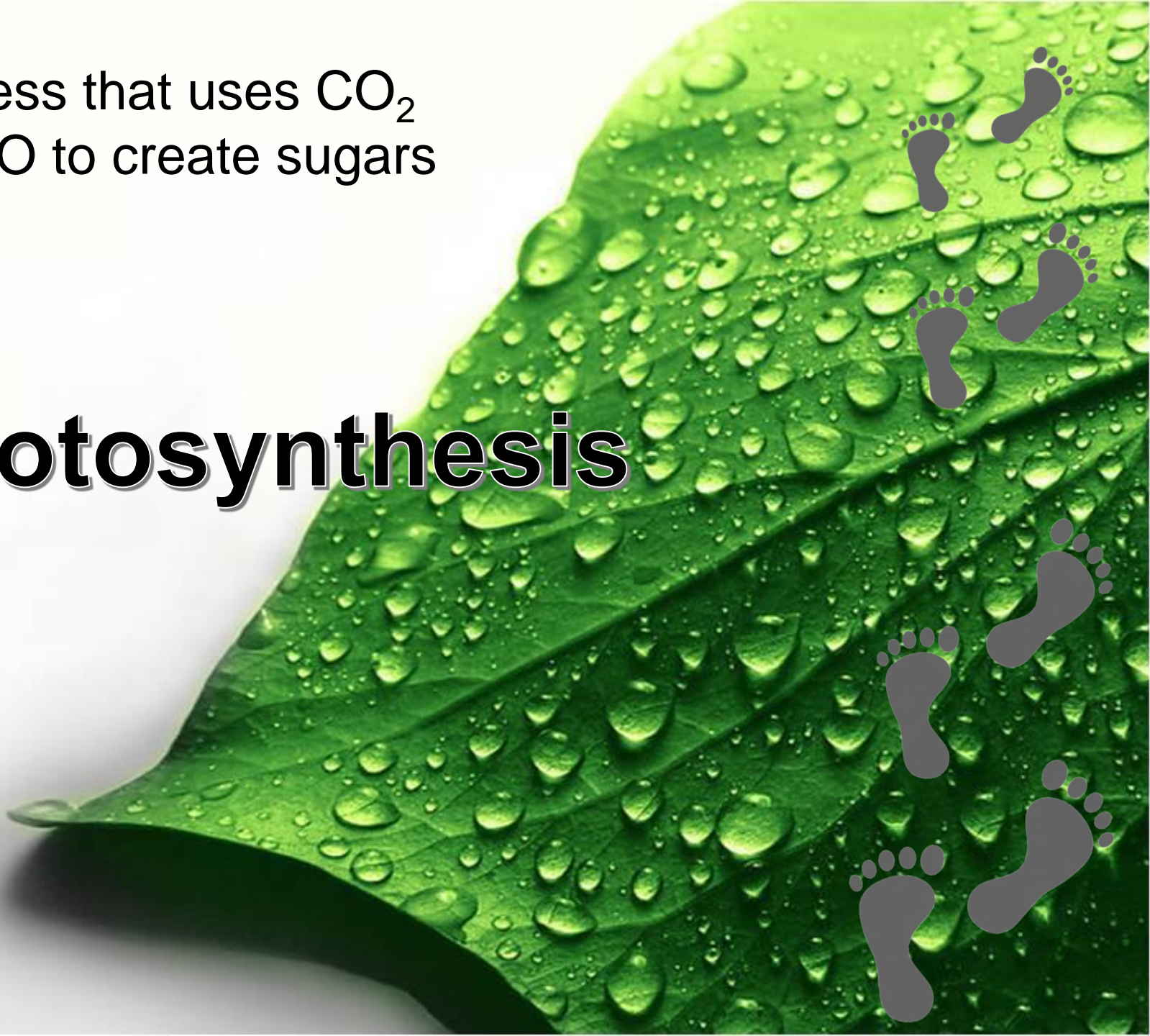
Dead plant matter inside a bog???

Peat



A process that uses CO_2
and H_2O to create sugars

Photosynthesis



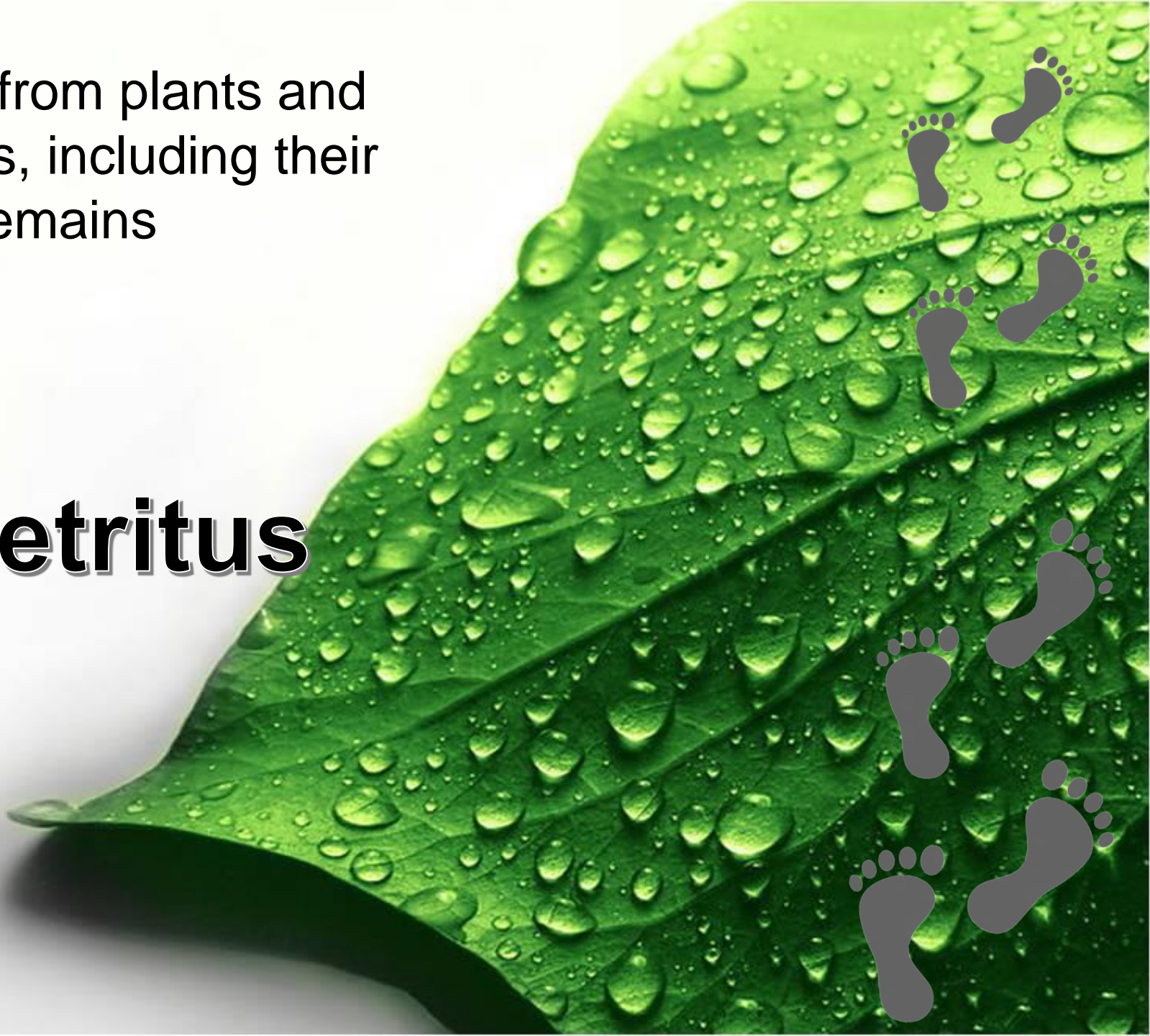
an organism that must get its energy by eating another organism (cannot make their own food)

Consumer



Waste from plants and animals, including their dead remains

Detritus



The study of organism and
environment relations

Ecology



Pesticide killing only weeds

Herbicide



What are some facts about Trophic Levels that you know?

- There are more organisms at the bottom of the pyramid
- Bioaccumulation is greater at the top
- Organisms at the bottom of the pyramid depend mostly on the sun for energy
- Energy is lost as you move up the pyramid



Give one reason why frogs
are disappearing

Chytrid



Give another reason why
frogs are disappearing

UV rays



Give a third reason why
frogs are disappearing

Pollution



ECOLOGY –

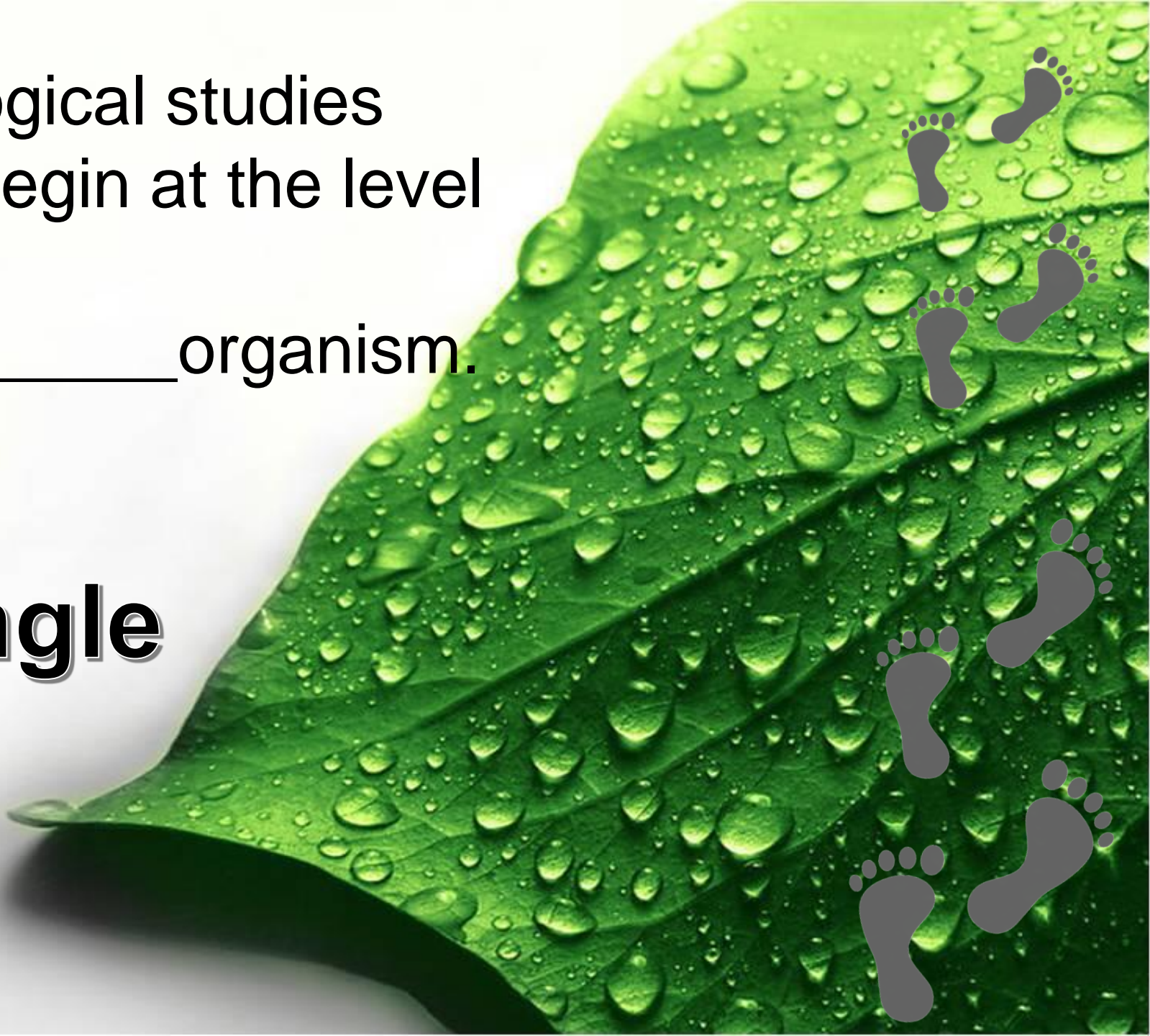
describes the study
of how organisms
_____ with each
other.

Interact



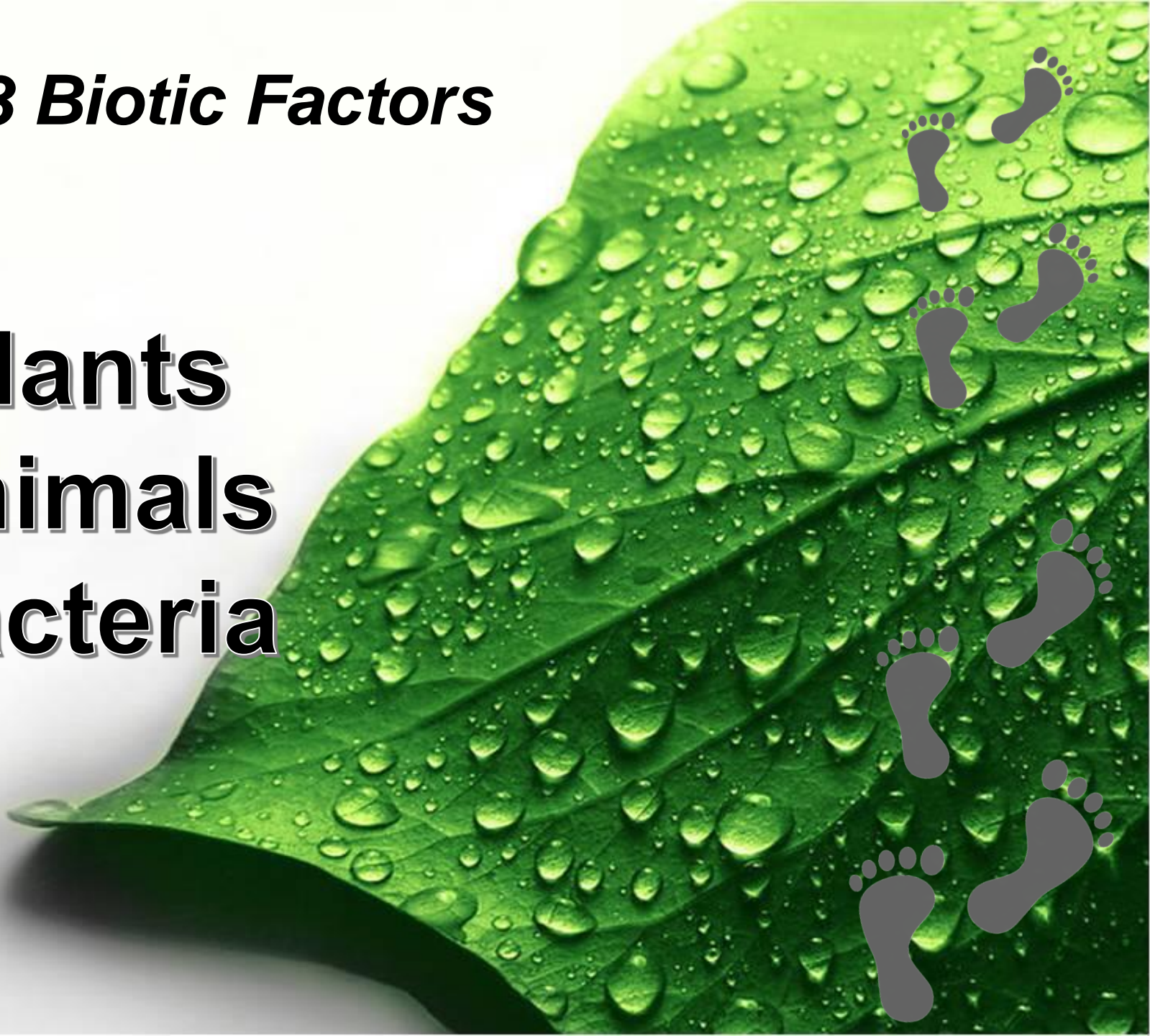
Ecological studies
can begin at the level
of a
_____organism.

Single



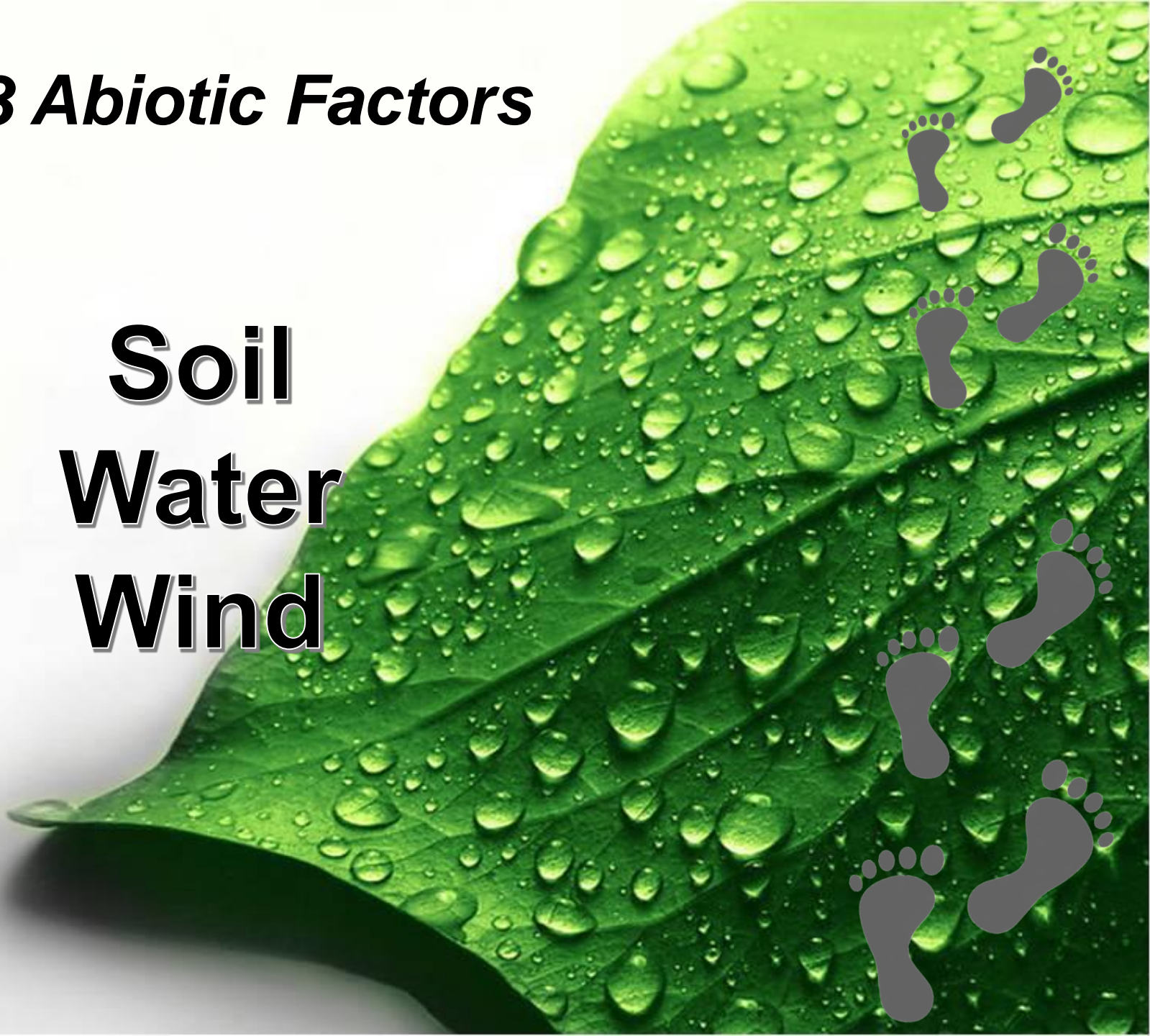
List 3 Biotic Factors

Plants
Animals
Bacteria



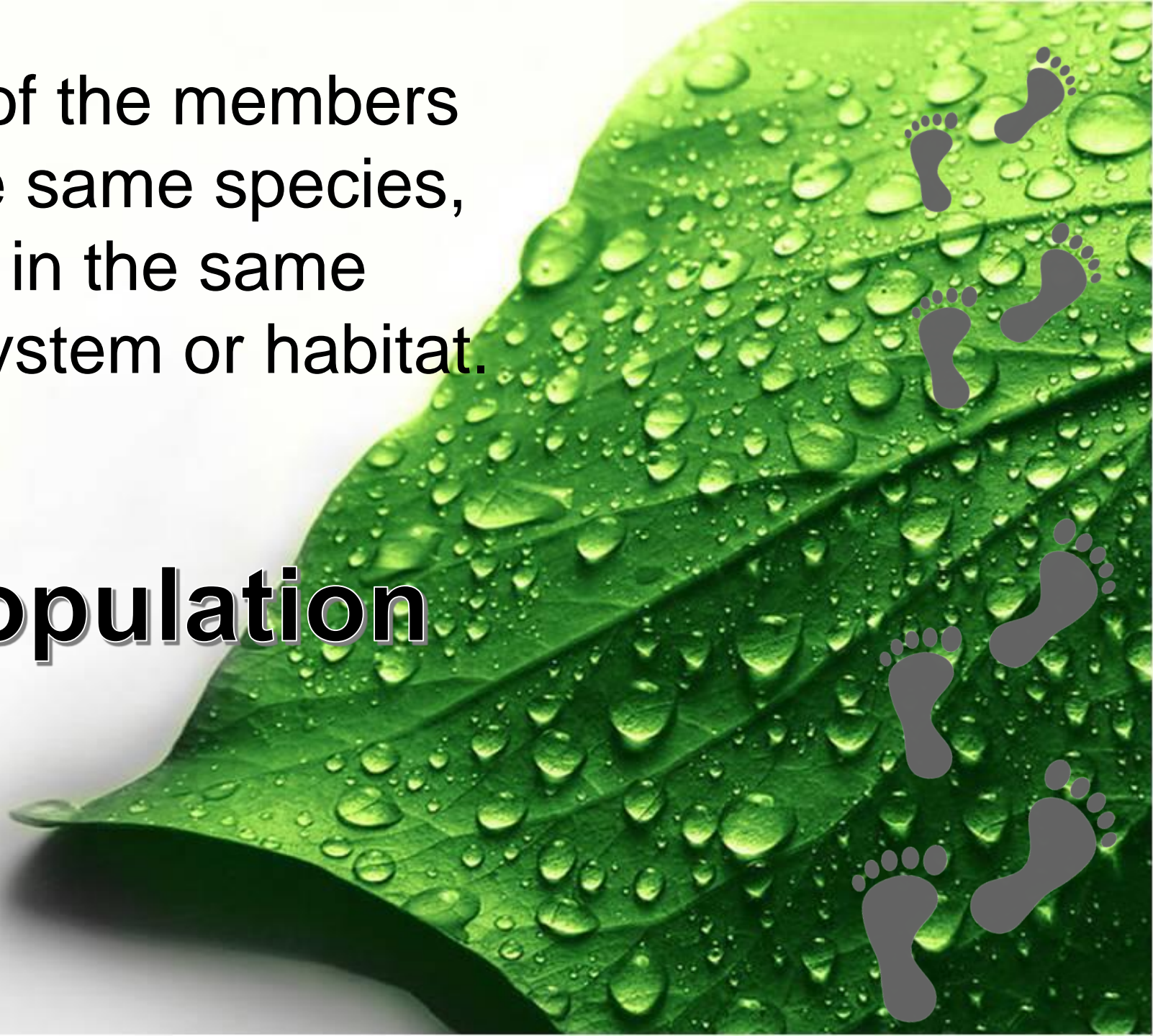
List 3 Abiotic Factors

Soil
Water
Wind



– all of the members
of the same species,
living in the same
ecosystem or habitat.

Population



potassium, nitrogen,
and phosphorus

3 components of fertilizer



– The collection of all the populations of all the species in an ecosystem or habitat.

Community



Transition areas or _____ contain species from both bordering ecosystems, so they often contain greater _____ (more species) than either ecosystem.

Ecotones Biodiversity



Currently, scientists project
that one species becomes
extinct every:

30 years

30 days

30 hours

30 minutes



Which is believed to be the major cause of the rapidly increasing extinction rate in recent years:

Human Interference



A species that is not found
anywhere

Extinct



A species that is close to extinction in all parts of Canada or in a significantly large location.

Endangered



Any species that no longer exists in one part of Canada, but can be found in others

Extirpated



Any species that is likely to become endangered if factors that make it vulnerable are not reversed.

Threatened



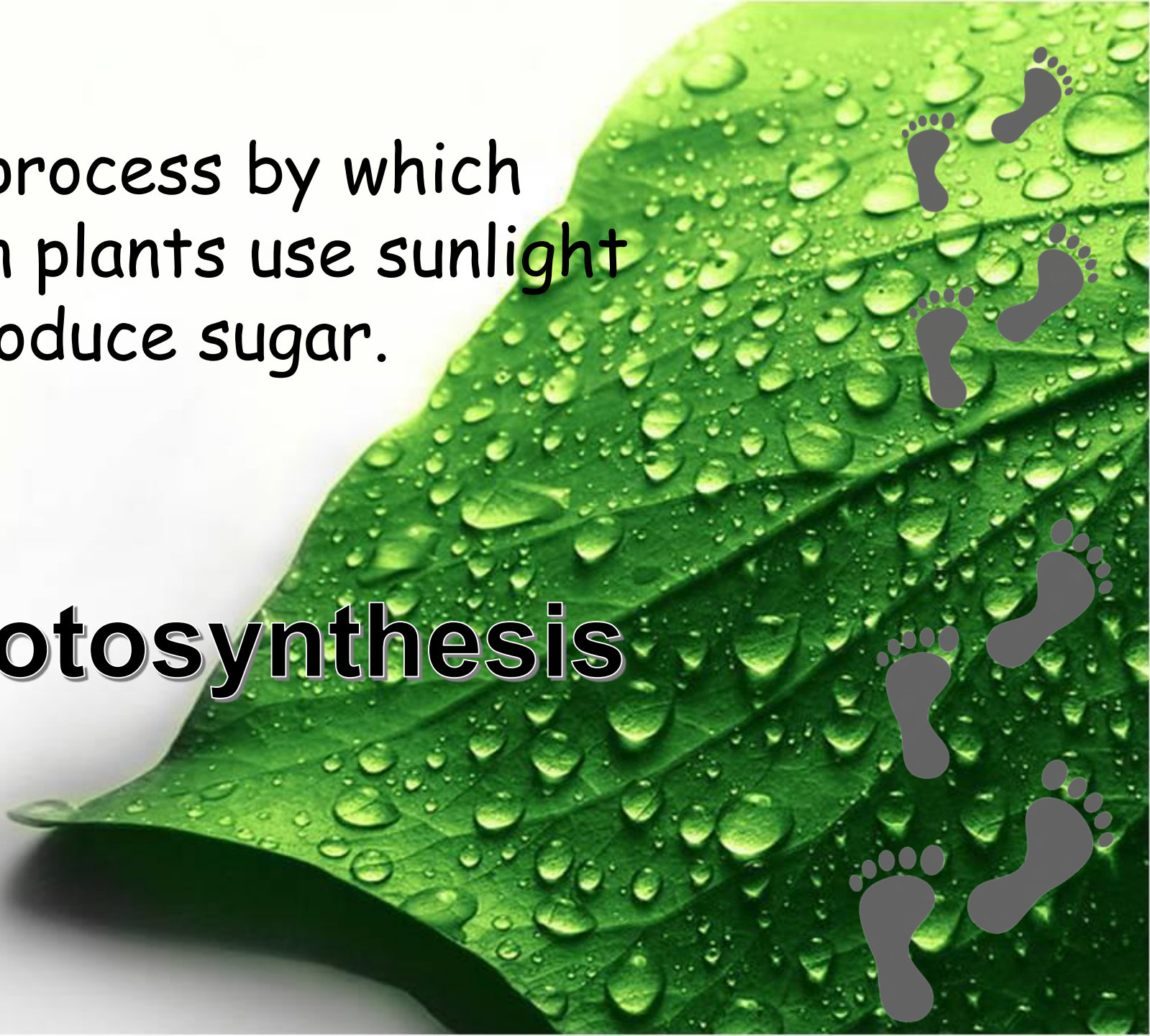
5 Reason why a species
might go extinct.

Loss of habitat
Disease
Pollution
Climate Change
Hunting



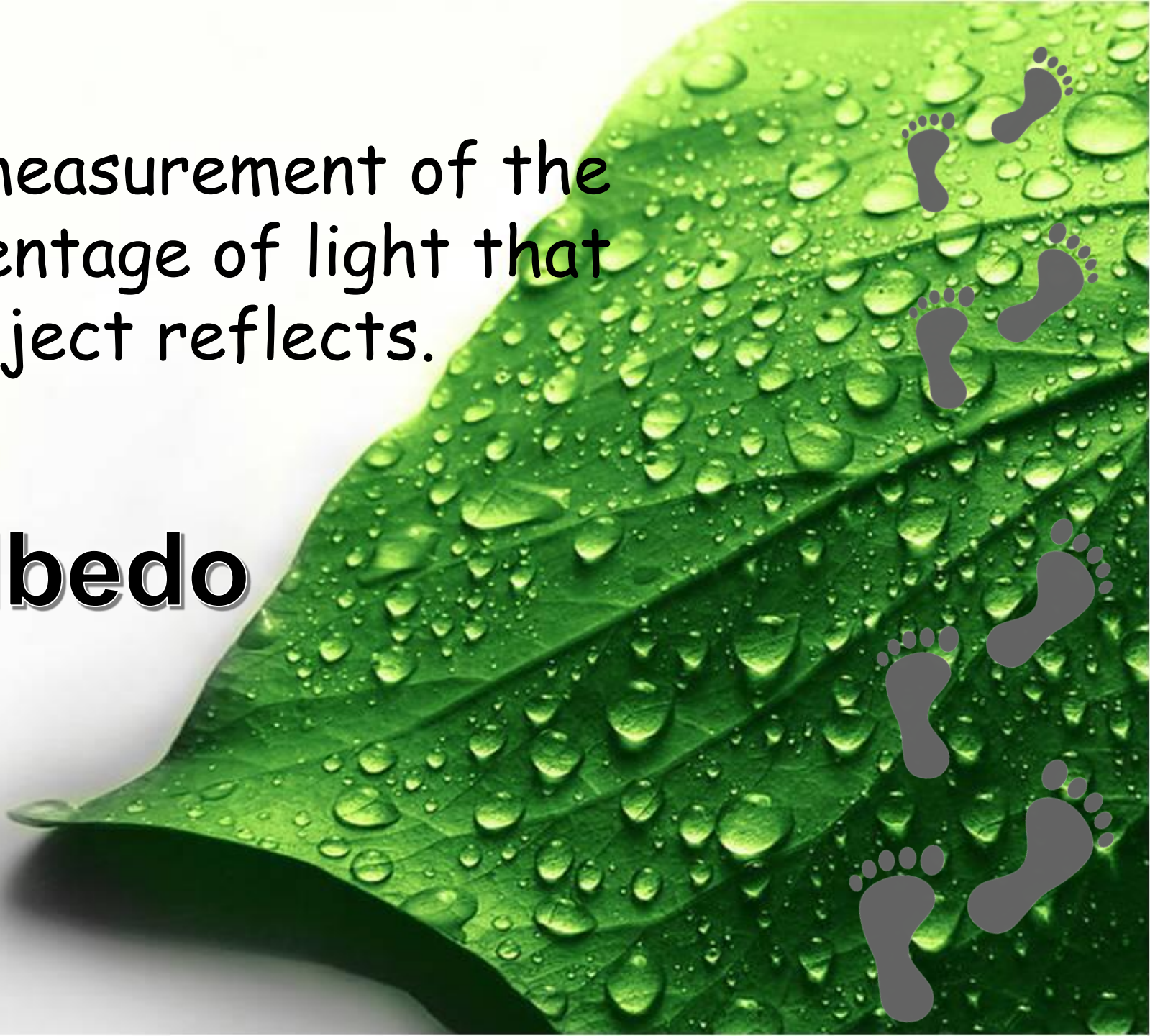
The process by which green plants use sunlight to produce sugar.

Photosynthesis



is a measurement of the percentage of light that an object reflects.

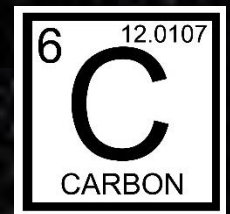
Albedo



The Carbon Cycle

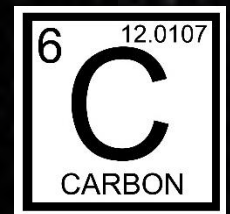
- Explain “why the carbon cycle is in fact a cycle”. Consider the complementary processes
- Photosynthesis and cellular respiration are complementary processes, and because the carbon that they use is repeatedly cycled through both processes, this relationship is often called the

CARBON CYCLE



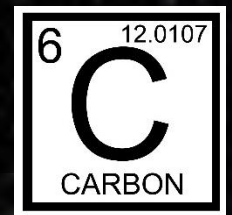
The Carbon Cycle

- Most of the carbon that forms living organisms is released to the atmosphere or water as carbon dioxide from dead organisms decays.



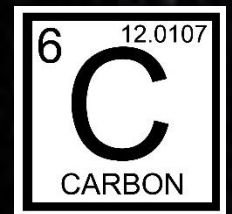
Where do fossil fuels come from

- Under certain conditions the decay process is delayed, and the organic matter may be converted into rock or fossil fuels such as coal, petroleum and natural gas.
- This carbon is not released until the combustion process takes place through burning the fuels.



What is a Carbon Sink

- Any place on Earth where large amounts of Carbon is found



- 
- **List 2 advantages and 3 disadvantages for pesticides?**

Advantages...

Increases Food Yields

Controls unwanted populations

Prevent diseases

Disadvantages...

Pollution

Bioamplification

Ecosystem Decline