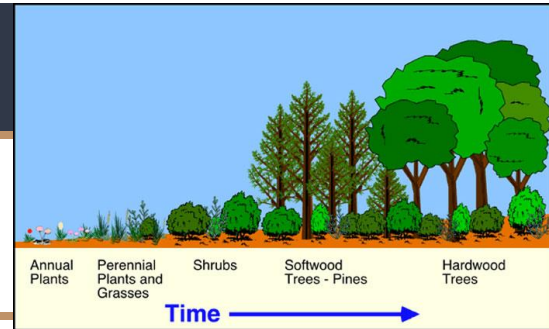


# Notes – Quiz 6B



## Define Biotic and Abiotic

In your own words ... **What do biotic and abiotic mean?**

<type here>

## REVIEW —

**Ecosystem** – a biological community of interacting organism and their physical environment

## Changes in Ecosystems

**Changes** in biotic or abiotic things will create changes in the ecosystem – that means living organisms (especially humans) and nature can change the environment.

- **Example: Tsunami** – an **abiotic cause** of environmental change
  - **What is a tsunami?**  
<type here>
  - *Fill in the Blanks:* **Environmental Impacts:**
    - Coral reefs, wetlands, and forests were severely \_\_\_.
    - Pollution and sewage were spread over a \_\_\_ area.
    - The most significant ecological impact: the \_\_\_ contaminated the soil and freshwater, killing important plants and soil microorganisms.
  - **How could changes in ecosystems impact food webs?**  
<type here>

## VOCABULARY —

**Rapid Environmental Change** – caused by sudden event or natural disasters; within minute or hours organisms may be faced with new challenges

- Organisms that can get out of the way may survive.

**Slow Environmental Changes** – change over time

- **Succession** – the transition of an environment from one type to another over time (see image above)

## Rates of Environmental Change

*Fill in the Blanks:* **Examples of Environmental Changes**

- Weather: can be a \_\_\_ change (temperature, precipitation, air pressure) or \_\_\_ change (seasons)
- Global Warming: a very \_\_\_ climate changes of the Earth's temperature
- Volcanic Eruptions: usually a \_\_\_ change that results in habitat destruction

**How do rapid environmental changes impact adaptations?**

- Humans can usually \_\_\_ fast happening environmental changes and survive.
- Adaptations take \_\_\_ to implement in a population.
- Organisms not able to escape will not \_\_\_ from specific rapid changes.

**How do slow environmental changes impact adaptations?**

- Adaptations take time to implement in a \_\_\_.
- It is possible for organisms to \_\_\_ and adapt to slow environmental changes.

**Eruption**

On a warm May morning at Mount St. Helens, the wildlife was going about its business when there was a rumble and then a blast. The volcano erupted, spewing lava, ash, smoke, and gases all about. Trees were destroyed, animals died, and the entire ecosystem was devastated. It was catastrophic.

Over the next days, weeks, and years, the wildlife of the area rebuilt the habitat. The process of succession turned Mount St. Helens from a desolate area of ash into a thriving ecosystem again.

**WATCH:** [https://www.youtube.com/watch?v=-H\\_HZVY1tT4](https://www.youtube.com/watch?v=-H_HZVY1tT4)



**BEFORE:** (1975)



**ERUPTION:** (May 18, 1980)



(May 18, 1980)



**AFTER:** (1992)



(2016)