

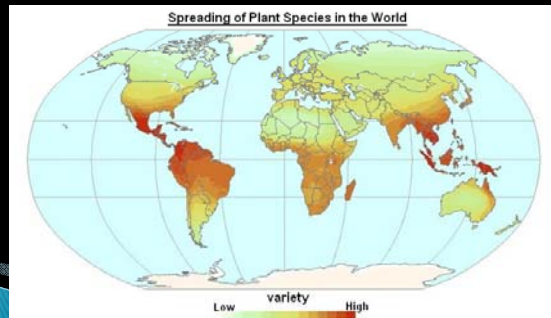
Biodiversity

Sections 3.3, 3.4 & 3.5



Importance of Biodiversity

- ▶ Biodiversity – the variety of life in an ecosystem
- ▶ Species richness – the number of species in an area (used to measure biodiversity)
- ▶ In general species richness tends to be greater near the equator



Biodiversity under Attack

- ▶ Extinct – no longer alive anywhere
- ▶ Extirpated – species that no longer exists in a specific area
- ▶ Endangered – a species facing imminent extirpation or extinction
- ▶ Threatened – a species that is likely to become endangered if factors reducing its survival are not changed
- ▶ Special Concern – a species that may become threatened or endangered because of a combination of factors

What causes risks to species?

- ▶ Loss of terrestrial ecosystems – making farmland and urban developments
- ▶ Fragmentation – dividing up a larger area into smaller fragments
- ▶ Loss of wetlands – building dams, draining wetlands
- ▶ Loss of aquatic ecosystems – dredging, over fishing

Native Species

- ▶ Species that have been present in a given location prior to human development
- ▶ Makes the ecosystem sustainable



Non-Native Species

- ▶ Species that have been transported to a given location
- ▶ Often don't have natural enemies
- ▶ Invasive Species – a non-native species whose introduction negatively impacts the natural ecosystem.



Purple Loosestrife

Controlling Introduced Species

- ▶ Chemical Control – pesticides – may kill other species too
- ▶ Mechanical Control – physical barriers or removal
- ▶ Biological Control – intentionally introducing a species that will control the invasive one.



Today's Tasks

- ▶ Pg. 86 #2, 4, 5, 6, 7
- ▶ Pg. 90 #4
- ▶ Pg. 94 #2, 4, 5