*You are the voice of the environment. This includes all native species, biodiversity, clean water — everything! As the voice for the environment, your goals are to speak up, protect yourself and ask humans to be considerate of how they use you and harvest your gifts to them worldwide.*

**Background Information:**

* In the name of food security and productivity, biodiversity is often sacrificed. Modern intensive agriculture reduces agricultural biodiversity.1
* More diverse ecosystems, with more species or more genetic diversity within species have an overall higher productivity rate than simpler systems.
* The greater the diversity, the more stable the environment, which increases crop yield, in turn.
* More bio-diverse fields are often more labor intensive, but tend to provide more direct benefits to the people of the area in terms of production, income, and nutrition
* Diversity will be essential to improve productivity, to enhance ecosystem functions and to provide adaptability
* Higher diversity is more effective than higher management intensity in increasing productivity
* Genetic diversity greatly reduces risk of crop failure or loss due to disease, pests, etc.
* Genetic diversity slows the evolution of pathogens
* Increased diversity of pollinators can lead to an increase in productivity of different crops
* Climate change is resulting in new weather patterns and will influence agriculture extensively.
* Diversity needs to be considered at ecosystem, species, and genetic levels to ensure food security and be more environmentally friendly.
* Almost all approaches use to date, such as substitution and supplementation of the ecosystem through chemical products have led to increased greenhouse gasses, degraded soils, and water degradation/depletion
* Farming practices often lead to environmental degradation through deforestation, pollution by fertilizers, pesticides and animal wastes, etc.
* Farming, food processing and food transport all leave environmental impacts: energy use, land use green house gas emissions, etc. 20-35% of global gas emissions come from food production/processing.
* Different methods of farming have different effects on soil, different land use requirements, etc. Every year, an estimated 46,332,259 square miles of land are list to environmental degradation of some sort: erosion, desertification, pollution, etc.

**Vocabulary**

*monoculture:* the [agricultural](http://en.wikipedia.org/wiki/Agriculture) practice of producing or growing a single crop or plant species over a wide area and for a large number of consecutive years

*diversity:* the condition of having or being composed of differing elements; variety

*pathogens:* a bacterium, virus, or other microorganism that has the ability to cause disease.