

Ecology

Biology – Mr. Hall

UNIT OUTLINE

Homework/Activities

- **Engage: How Many Frogs?** (4 pgs.)
The Activity #1-2
Follow Up Questions #1-6
- **Explore: Food Web - Dominos (not the Pizza!)** (4 pgs.)
The Activity #1
Follow Up Questions #1-20
- **Explain: What Goes Around, Comes Around** (4 pgs.)
The Activity #1-23
Follow Up Questions #1-8
- **Elaborate: Predator/Prey Ups & Downs** (4 pgs.)
Follow Up Questions #1-5
- **Evaluate: Ecosystems, Habitats, and Niches** (4 pgs.)
The Activity #1-5
Follow Up Questions #1-7

Concepts/Topics

Basics

- Carbon and nitrogen cycles
- Energy flow through an ecosystem
- Population growth - curves: exponential, S-shaped, carrying capacity; limiting factors
- Population density - including how to calculate
- Predator/prey - population graphs, food webs
- Introduced species - fail, boom, or become interconnected
- Niche, habitat, competition, introduced/invasive species
- Ecosystems - biodiversity, sustainability

Beyond the Basics

- Introduced species - examples
- Introduced species - biocontrols
- Protection, reintroduction, hunting
- Succession - primary vs. secondary, pioneer species, climax community
- Population dispersion - clumped, uniform, random
- Survivorship curves

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