Name \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Date \_\_\_\_\_\_\_\_\_\_\_\_\_

Ecosystem WebQuest

1. Go to http://www.zephyrus.co.uk/foodpuzzlechain.html and complete the food chain “quiz.” Make sure to answer these questions as you go. [In other words, all of these questions can beanswered by the information found as you work through this quiz.]

a. Green plants make their own food, so they are called \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

b. What is a predator?

c. What is an example of a producer that fish could eat?

d. What is the general term for organisms that live in soil and fallen leaves on the forest

floor? What is one example of them?

2. Go to http://www.sciencebob.com/lab/q-web-chain.html and answer this question:

What is thedifference between a food chain and a food web?

3. Go to http://www.cas.psu.edu/DOCS/WEBCOURSE/WETLAND/WET1/identify.html and answer these questions.

1. List the organism(s) that are producers.
2. List the organism(s) that are consumers.
3. Draw three food chains found within this food web.
4. How many different food chains can you find in the food web pictured?
5. What is missing from this food web?

4. Go to http://www.crickweb.co.uk/assets/resources/flash.php?&file=foodchains to answer these questions. This site will lead to a “title” page. Click on the green box that looks like a food chain. After reading through the introductory page that follows, click on the “next” button in the upper left-hand corner.

1. Select “River” Habitat: Write out the food chain.
2. Select “Woodland” Habitat: Write down the food chain.
3. Select “Seashore” Habitat: Write down the food chain.

5. Go to http://www.orma.com/sea-life/plankton-facts/ to answer these questions.

1. From the information provided, what do you think is the difference between phytoplankton and zooplankton?
2. Why are phytoplankton so important to the marine (water) ecosystem?

6. Go to http://www.vtaide.com/png/foodchains.htm to answer these questions.

1. In any ecosystem, there are fewer carnivores than herbivores. Why? [Your answer needs to specifically include a description of how energy is transferred.]
2. Why would it be extremely rare to find a food chain with nine links in it?

7. Go to http://www.elmhurst.edu/~chm/onlcourse/chm110/outlines/foodenergy.html to answer these questions.

1. As energy passes to a higher trophic level, approximately \_\_\_\_\_\_ of the useful energy is lost.
2. What is the benefit to a society if everyone reduces the amount of meat they eat? [Use the concepts discussed with energy in the ecosystems to answer this question.]

8. Go to <http://earthobservatory.nasa.gov/Experiments/Biome/index.php>.

1. Read about each of the biomes. Write a short description of each of the biomes, that includes the temperature range, precipitation, and examples of life.

-Tundra

-Shrubland

-Rainforest

-Grassland

-Desert

-Decidious Forest

-Coniferous Forest

1. Find the “To plant or not to plant” activity at the bottom of the page”. Read the description of each plant and determine which biome it belongs in. Explain why. Check your answers by clicking on “Enter Mission”.

-Saguaro Cactus

-Creosote Bush

-Flowering Dogwood

-Bluestem Grasses

-Lichen

-Orchid

-White Sage

-Spruce

**These are extra credit options. Answer them once you’ve completed the above work.**

9. Go to http://www.seafriends.org.nz/enviro/soil/depend.htm and browse the whole website. There are many controversial tidbits there, so take your time to understand what they are trying to say. After reading each section, *write a question* that you still have even after reading the site.

1. History:
2. Concern:
3. Food Requirements:
4. Meat or Vegetarian:
5. Why need soil:
6. Sustainability:
7. Overall, what do you think about the message(s) found in this website?

10. Go back to http://www.vtaide.com/png/foodchains.htm and scroll down until you find the “create a food web” link. Click on that link and follow the directions on the page. After you create your food web, don’t forget to put your name in the appropriate box and print the food web. Attach that food web to this paper.