

Name _____
Date _____ Hour _____

Questions: Nutritional Needs of Plants

Read p. 47 - 49 of the Organisms book and answer the following questions.

1. T / F Plants need us to give them food.
2. Why aren't minerals considered food? _____

3. How do minerals from fertilizers enter the plants? _____

4. How do soils get depleted? _____
What can be done to revitalize depleted soils? _____

5. What are the three macronutrients? _____

6. T / F You can tell by looking at a fertilizer label how much of each macronutrient it contains.
7. What does nitrogen do for a plant? _____

8. What does phosphorous do for a plant? _____

9. What does potassium do for a plant? _____

10. T / F Plants need large amounts of the micronutrients.
11. What are the proportions of the fertilizer you will be using? _____

Wisconsin Fast Plants- “Sprouting Up All Over”

Page 56-58

1. Who developed the Wisconsin Fast Plant?
2. What is the length of time for a life cycle of the Wisconsin Fast Plant?
- 3.
4. What is the Scientific Name for the Wisconsin Fast Plant? (page 46)
5. Explain the process Dr. Williams used known as “selective breeding”

6. What was the reported problem teachers were having with the fast plants in the classroom and what did Dr. Williams and how did his team fix the problem?

7. What are Crucifers?
8. What is the economic importance Crucifers for the future?

9. What was the job of the American and Russian astronauts when they took the Fast Plant Seeds to the Russian Space Station Mir?

10. What happen to the fast plant experiment up in the Mir space station?
11. Why was the Mir experiment important?

Name _____

Date _____ Hour _____

Questions: From Seed to Adult Plant and Back

Use the Reading in the Organisms book, p. 59-61

1. What is germination? _____

2. What kind of stage is a seed in after planting it? _____

3. Why can a seed withstand extreme temperatures? _____

4. What is endosperm? _____

5. A monocot has _____ cotyledon, or seed leaf, but a dicot has _____ cotyledons.

6. What happens to a seed underground that makes it get larger? _____

7. What is the purpose for root hairs? _____

8. What happens to the cotyledons as the stem pushes upward? _____

9. When do cotyledons die? _____

10. What happens to flowers produced by the plant in order for seeds to develop? _____

11. What is the function of fruit? _____

12. Look at the box at the bottom of the reading page. Give three reasons why seeds sometimes don't germinate. _____