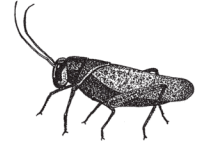


The World of Crickets



PART I: Making Observations of Crickets in Petri dishes

- Get a separate piece of paper using the “T” format below!
- You and a partner obtain a Petri dish with a cricket.
- Look at the organism carefully without the microscope.
- Make 5 good observations of each organism in the observation column (this can include detailed drawings). Observations may be both quantitative (numerical) and qualitative (color, shape, sight, smell, touch, taste, hearing). See examples below!
- Include the cricket’s mass(g) using a balance, and their length(cm) using a ruler.
- Discuss your observations with each other.

EXAMPLE:

Observations	Inferences
<i>Washingtonia robusta</i> – a California palm tree <ol style="list-style-type: none">1) fronds are 50 cm long *2) leaves have fibers in them *3) has fruits to reproduce4) the frond has sharp thorns *5) the male plants are bigger because they make more hormones than the females	

PART II: The Difference Between An Observation And An Inference

- Put a * next to all the “true” observations in the Observation Column and cross off any inferences. An Inference is “what you think” or based on prior knowledge.
- Recopy the inferences into the Inference Column on the other side of your paper.
- Make an inference for as many (*) observations as possible, i.e. because it has flowers it makes a fruit.
- How does this organism fit into the food chain of the community in which it lives? i.e, is it a *consumer* or a *producer*. (See pages 6 - 10 in your text for help!)
- What might it eat, or what might eat it?

PART III: Observations Using The Dissecting Microscope

- Plug the microscope into the outlet.
- Place the Petri dish with the cricket on the circular display area.
- Adjust the light to the setting that allows you to best see the specimen.
- Turn the lens to 2x to get the most magnification.
- List 5 new observations using the microscope and the same “T” diagram as earlier.

Note: you should have more than 5 observations by now!

PART IV: Specific Questions About The Cricket

- Using the T diagram, write down the mass & length of your cricket (if you haven't yet).
- Collect the mass (g) & length (cm) from 3 other group's cricket.
- Put the 3 cricket's measurements with your cricket's measurements in a data table.
- What is the relationship between *cricket mass (g)* and *cricket length (cm)*? Is it *positive*, *negative*, or *neutral*?
(you must make a line graph with 4 points to answer this question – use graph paper)
- Do crickets have wings?
- How many legs does a cricket have?
- Are there any differences in their legs? If yes, how are they different?
- Where do you think crickets live?
- In *what ways* do you think the cricket is *adapted to its habitat*?

Conclusions:

- What are 2 observations you made that you did not know about crickets before?
- Make a food chain with at least 3 steps that include the cricket.
- What were 2 difficulties with observing a cricket out of its natural habitat?

