

7.2: Sample answers to Analysis Questions:

1. What is a microhabitat? What is a microclimate?

Microhabitat: a small portion of a larger habitat with similar structure and microclimate, such as the area underneath a log or the fur on a dog's back.

Microclimate: the climate of a microhabitat, especially as differentiated from the larger climate

2. What relationship can you find between the abiotic characteristics of the different sites and the species found there? Support your answer with data from the class data set.

Answers will vary, however make sure students answers use data collected from the class data tables. Students should find correlations between similar abiotic characteristics and similar species, if they are available.

3. Which microhabitat contains the most unique species? Why might that be the case? What would happen to those species if that microhabitat were covered with a parking lot?

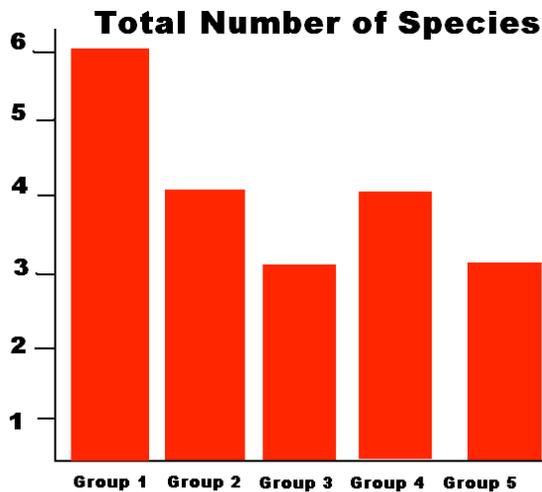
The answer is derived from the calculation on data sheet #1. The calculation is of the number of species only found in each microhabitat. Students should speculate reasons for this site having the most unique species – a particularly unique abiotic characteristic, for example. They should recognize the destruction of that habitat would lead to the death of that species within the study site as a whole.

4. What factors are most important in determining whether or not an organism will be found in a microhabitat?

Answers will vary, however should include concepts such as temperature, moisture, presence of food, mates, shelter, and protection from predators.

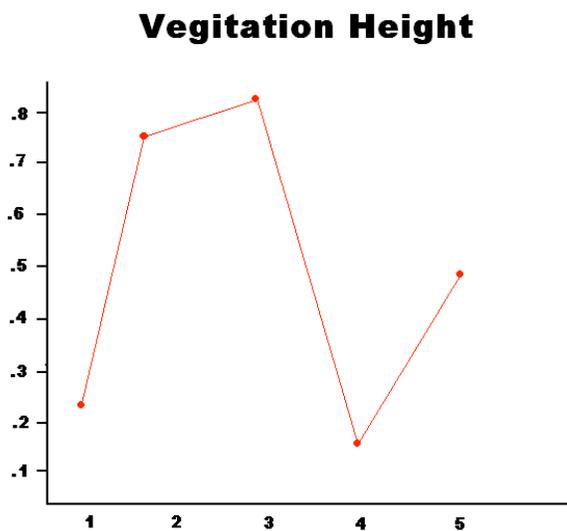
5. How does our study of the school site relate to our city as a whole?

Students should describe how the city is a larger example of an ecosystem with different microhabitats in which various organisms live.



What conclusions can you draw from this graph?

This graph shows that the number of species varies based on the location of the microhabitat. Specific conclusions will vary based on the study site. For instance, maybe group 1 was located furthest from the study site, leading to more species flourishing there.



What conclusions can you draw from this graph?

This graph shows that the height of vegetation varies based on the location of the microhabitat. This is related to the landscaping of the study site. Students should be encouraged to relate the results of this graph to other data, such as vegetation height may be related to the amount of species.