



Shape Island

You are a biologist exploring uncharted parts of the world in search of new species of animals. You sailed for days across the ocean and finally found Shape Island, south of Hawaii. This island has some very unusual life-forms. Each of them has some variation of a geometric shape. You have spent more than a year collecting specimens and classifying them according to Linnaeus's system. You have been able to assign a two-part scientific name to most species you have collected. You must assign all the names to the final 12 specimens before you begin your journey home.

MATERIALS
<ul style="list-style-type: none"> • pencil • paper

Procedure

1. Pictured below and on the next page are the organisms you have collected. Beside each organism, on the line provided, write its name. The first one has been named *Cycloplast quadantennae* (cylco + plast + quad + antennae). You have 12 more to name. Use the glossary of Greek and Latin prefixes, suffixes, and root words below to help you name the organisms. Look at the table to see which descriptive words seem to apply to the organisms shown.

Greek and Latin roots, prefixes, and suffixes	Meaning	Greek and Latin roots, prefixes, and suffixes	Meaning
ankylos	angle	mono	one
antennae	external sense organ	peri-	all around
tri-	three	-plast	body
bi-	two	-pod	foot
cyclo-	circle	quad-	four
macro-	large	stoma	mouth
micro-	small	uro-	tail



1. Cycloplast quadantennae



2. _____



3. _____



4. _____



Shape Island, continued



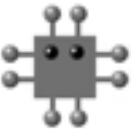
5. _____



6. _____



7. _____



8. _____



9. _____



10. _____



11. _____



12. _____



13. _____

Shape Island, continued

2. One more organism exists on Shape Island, but you have not been able to capture it. However, your supplies are running out, and you must start sailing for home. You have had a good look at the unusual animal and can draw it in detail. Draw an animal in the space below that is different from all the others, and give it a two-part scientific name.

Analysis

3. If you gave species 1 a common name, such as round-face-no-nose, would any other scientist know which of the newly discovered organisms you were referring to? Explain. (Hint: How many others have a round face and no nose?)

4. Describe two characteristics shared by all your newly discovered specimens.



Shape Island, continued

Going Further

Look up the scientific names listed below. You can use the library, the Internet, a taxonomy index, or field guides.

For each organism answer the following questions:

Is the organism a plant or an animal? How many common names does it have? How many scientific names does it have?

Mertensia virginica

Porcellio scaber

Think of the name of your favorite fruit or vegetable. Find out if it has other common names, and find out its two-part scientific name.
