

SeaWorld/Busch Gardens Animal Migrations

K-3 Classroom Activities

Butterfly Buddies

OBJECTIVE

Students will demonstrate an understanding of butterfly life cycles and the migration of painted lady butterflies.

ACTION

Before activity: Print or copy map of North America on overhead transparency. Using overhead, project image of North America on butcher paper mounted on wall. Adjust image to fit, and trace outline. Draw in borders between Mexico, US, and Canada. Label the school's hometown. You may add any other features (*mountains, rivers, cities*) if you wish. Also copy and cut apart individual butterflies, one per student.

- 1. Begin a class discussion by showing the picture of a painted lady butterfly. Can students identify the animal? (*butterfly*) What type of animal? (*insect*) Does anyone know its name? (*painted lady*) Has anyone seen this butterfly?
- If you decided to purchase and raise caterpillars, introduce the animals. If not, show on an overhead the life cycle of the butterfly. (You can find the life cycle at <u>http://www.enchantedlearning.com/subjects/butterfly/activities/printouts/paintedladylifecycle.shtml</u>) Explain how the butterfly's body changes from a crawling caterpillar to a flying butterfly.
- 3. Distribute paper butterflies to students. Ask them to color their butterflies and write their names on the front.
- 4. Put up the map on bulletin board. Show the location of your hometown. Explain that painted ladies begin in Mexico and move north with spring.
- Have student pin butterflies in Mexico. Depending on your location, have students move butterflies from Mexico to your area. Or have students choose a destination to fly to. See distribution map on this Web site. http://www.npwrc.usgs.gov/resource/distr/lepid/bflyusa/usa/225.htm

Some suggestions for moving butterflies: Make five moves, one for each day of the week; reward students' good actions with a move; time your move with the actual migration (see Web site in **Background Information**).

BACKGROUND INFORMATION

The painted lady butterfly (*Vanessa cardui*) is one of the most common butterflies in the world, occurring in North and South America, Europe, Asia, and Africa. Because of its wide range, it is sometimes called the "Cosmopolitan."

In North America, painted ladies winter in the deserts of northern Mexico. In spring, they migrate and temporarily colonize the United States and Canada south of the Arctic. In years of plentiful rainfall, population explosions in Mexico cause massive northward dispersals. During these events, not all butterflies make the return trip south to wintering grounds.

Painted lady caterpillars are available from biological supply companies and will undergo their complete life cycle under controlled conditions in the classroom

More information on painted lady butterflies

http://www.enchantedlearning.com/subjects/but terfly/activities/printouts/paintedlady.shtml

Web site with information on migration pattern: <u>http://www.public.iastate.edu/~mariposa/homepage.html</u>

Distribution map for painted ladies: http://www.npwrc.usgs.gov/resource/distr/lepid /bflyusa/usa/225.htm

This site focuses on Monarch butterflies, similar in appearance to painted ladies:

http://www.monarchwatch.org/index2.html

MATERIALS

Per class:

•butcher paper to cover bulletin board

- •pattern of North America (next page)
- •overhead projector
- •overhead transparency sheet
- •markers
- •push pins (one per student plus 5) or tape
- •butterfly pattern (next page)
- •picture of painted lady butterfly (from insect field guide or from web such as <u>http://mamba.bio.uci.edu/~pjbryant/biodiv/lepi-</u> dopt/nymph/plady.htm

Optional: painted lady caterpillars (Available from biological supply catalogs and on Web.) Caterpillars are available from March through July. See

http://www.earthsbirthday.org/activitykit/contact.html http://www.earthsbirthday.org/activitykit/2.html

Map of North America



Butterfly pattern

