

## **Beef-O Bingo**



**Purpose:** Students will learn about by-products of the beef industry. The student will be able to identify beef by-products that are used in everyday living.

**Background:** The U.S. beef industry supplies consumers with an abundant supply of safe, healthy, protein rich beef. In fact, American ranchers are able to export large quantities of beef to countries that are not able to produce enough beef for their populations. Many countries are very crowded and do not have space to raise beef cattle so they welcome beef imports. U.S. cattle usually graze in areas of the country that are not suitable for other agricultural ventures, making the land productive. When beef cattle are processed, none of the animal is wasted. After the meat is removed, other products are made from the bones, hide, hooves and horns. These products are called **by-products** since they are not the primary products of a beef animal. Almost the entire beef animal can be used to benefit man in some way. From a typical 1,000-pound steer, 400 pounds is used for beef that we eat, and the remaining 600 pounds are used as by-products. Beef is a good source of protein (which builds, maintains, and repairs body tissues), iron (which helps the red blood cells carry oxygen to body cells and tissues), zinc (which is a mineral used for growth and maintaining the immune system), and B-vitamins (which promote healthy skin, keep the nervous system healthy, and are important for digestion and metabolism). Beef by-products are anything made from a beef animal other than beef. You probably use more beef by-products than you think! Here are some examples:

**Bone, Horn, Hooves, & Gelatin:** Combs, gelatin candy (Gummy Bears), marshmallows, mayonnaise, pet food, and vitamin capsules/gel coatings, toothbrush, piano keys, bandages, ice cream, dice, shampoo, conditioner, and cake mix.

**Hide & Hair:** Paint brushes, glue, leather boots, luggage, saddles, furniture, automobiles, volleyballs, basketballs, and baseball gloves.

Fats & Fatty Acids: Shampoo, soaps, shaving creams, make-up, deodorants, candles, crayons, detergents, plastics, insecticides, paints, perfumes, medicines, gum, margarine, and synthetic rubber.

## Florida Beef Facts:

- Cattle were first introduced to North America in Florida in 1521 by Spanish explorer Juan Ponce de Leon.
- One Florida ranch owns the largest brood cow herd in the United States.
- Florida is home to four of the United States' 10 largest cow-calf operations.
- Florida ranks 12th in the nation in number of beef cows.
- Nearly one-half of all Florida Agricultural land is involved in cattle production. Florida has 4 million acres of pastureland and 1 million acres of grazed woodland.
- Much of "Natural Florida" remains in the working landscape of Florida's cattle industry.
- Wildlife and plant systems are well-balanced and thriving on Florida's ranchlands.
- Florida ranks 4th in the southeast and 11th nationally in the production of beef calves.
- The three top ranking counties for cattle are Okeechobee, Highlands, and Osceola counties.
- Today, there are almost one million head of cattle and 15,000 beef producers throughout the state of Florida.

- Beef cattle are raised for meat production while dairy cattle are raised for milk production.
- Farmers care about the quality of their meat and provide their animals with safe environments.
- Florida is a cow-calf state. This means that our cattle operations will breed their herd of females and have calves or babies. The producer will raise the calves until they are ready for the next segment of the industry which takes place in other states.
- Farmers are Environmental Stewards meaning they responsibly use and protect the environment.

**Materials:** Bingo Board Pieces\* and Bingo Playing Card\* - 1 copy per student, Caller Card Playing Pieces\*, grab bags, bingo markers (marshmallows, candy, etc.)

## **Activity:**

- 1. Discuss the background information with your students.
- 2. Make enough copies of the Bingo Playing Card and Bingo Board Pieces so each student has one of each.
- 3. Have the students cut out the Bingo Board Pieces, next have them select 24 of them and glue them to the Bingo Playing Card. The center square is a free spot so nothing should be glued there. You may want to laminate boards after they are put together. (Or you could put the boards together before-hand instead of having the students do it.)
- 4. The teacher should laminate one by-products sheet to keep track of what by- products have been called. Mark with dry erase markers as you call them. Another by-products sheet can be cut up and put into a container to —call the products.
- 5. Give the students —markers for their game boards. Markers can be miniature marshmallows (cattle byproduct), peanuts, corn kernels, buttons, etc.
- 6. The teacher or caller reaches into the container and draws out a by-product piece. They call this out to the group.
- 7. The students look at their board to see if they have that by-product. If they do, then they cover it up with a marker.
- 8. The first students to have five squares in a row covered, either vertically, horizontally, or diagonally wins. (Make sure the students understand the meaning of vertically, horizontally, and diagonally before beginning.)
- \* Additional materials can be found on FAITC's website under Teacher Resources, under Make N' Takes.