What do you think of when you hear the word “agriculture”? The image of crops growing in a field or a barnyard full of animals may come to mind. But even if you don’t live on a farm, agriculture is all around you. As consumers, we depend on agriculture to provide food, clothes and other things we use every day. As you learn about crops and animals produced in West Virginia and the ways in which they are used, remember that agriculture is more than farming. Turning crops and animals into products we can use, transporting these products to stores in the United States and around the world, caring for sick animals, manufacturing farming equipment and protecting our land and water so plants and animals can grow – all of these activities, and many others, are part of the agricultural industry.

1. Cows provide the milk you pour over your cereal at breakfast and drink with your lunch at school. Milk from cows is used to make foods such as cheese and ice cream. Cattle are also raised for their meat, called beef. Which of the following meats come from cattle?
   a) sirloin steak  
   b) bacon  
   c) pork chops

2. This is a bale of hay. Hay is usually cut grass or plants such as clover or alfalfa gathered into bales or bundles. This crop ranks number 1 in West Virginia with more than a million tons produced each year.
   True or false: Most hay is used as animal feed.
   a) true  
   b) false

3. Farmers raise chickens for meat and eggs. Chickens are West Virginia’s most valuable farm animal. How many chickens does West Virginia raise in a year?
   a) 2 Million  
   b) 54 Million  
   c) 88 Million

4. This is a male sheep. What is it called?
   a) ram  
   b) ewe  
   c) buck

5. Apples are the leading fruit grown in West Virginia but we also rank 16th in the nation for production of this other particular fruit.
   a) pear  
   b) grapefruit  
   c) peach

6. More than half of the world’s food comes from four main crops. Wheat, grain and potatoes are three of them. What is the fourth?
   a) corn  
   b) rice  
   c) soybeans

7. Fish as farm animals? You bet! Some people raise fish in special ponds or tanks. When the fish are big enough, they are sold to restaurants and stores. What term is used to describe the raising of aquatic animals and plants?
   a) aquaculture  
   b) water farming  
   c) aqua farming

8. Fruits and vegetables are very nutritious and should be part of your daily diet. Actually, you should be eating between 3-5 servings of vegetables and 2-4 servings of fruit every day. This particular green vegetable has as much calcium as milk.
   a) green beans  
   b) broccoli  
   c) zucchini
Animal Crossword

Write the correct name next to each animal and then complete the crossword.

Across

1. f________
2. h________
3. sh________
4. P________
5. m________
6. d________
7. ch________

Down

1. Event: ________
2. Plural Noun: ________
3. Noun: ________
4. Noun: ________
5. Verb: ________
6. Verb + “ing”: ________
7. Adjective: ________
8. Plural Noun: ________
9. Plural Noun: ________


The Farmer

Write words on the lines below according to the correct parts of speech. Make sure you write something on each line. Don’t read ahead or you will spoil the fun!

1. Event: ________
2. Plural Noun: ________
3. Noun: ________
4. Noun: ________
5. Verb: ________
6. Verb + “ing”: ________
7. Adjective: ________
8. Plural Noun: ________
9. Plural Noun: ________

Farmers work long and hard hours, often starting before sunrise and not stopping until (1.)__________. They usually grow crops or raise (2.)__________. In the spring most farmers plow their (3.)__________ using a (4.)__________. After planting the seeds, the farmer (5.)__________ to keep the weeds and insects from (6.)__________ the crop. In the fall, the farmer hopes to harvest a crop of (6.)__________ (8.)__________. How many (9.)__________ do you wish to raise???

Helpful Hint:
Plural means more than one; a noun is a person, place or thing; a verb is an action word; an adjective is a descriptive word.

The big cows mooed all night long.

Adjective

Verb

Plural Noun

~ 2 ~
How many words can you make from the word NUTRITION?
A Trip to the Farm

Write words on the lines below according to the correct parts of speech. Make sure you write something on each line. Don’t read ahead or you will spoil the fun!


One bright and _(1.)_ day, my family and I packed up our _(2.)_ and headed to our farm. We took Laddie, our pet _(3.)_ because it loved to run in the fields. The drive to the farm seemed like days but, it was only _(4.)_ hours from home. When we arrived, we noticed four beautiful _(5.)_ on the far side of a large field. They were having fun _(6.)_. On our farm we grow _(7.)_. We also have a barn with lots of hay. Hanging from the rafters is a swing with a _(8.)_ attached. We played on it while my dad and _(9.)_ checked the fields. In the afternoon, we had a picnic under a huge oak tree. Next to the barn I noticed a baby _(10.)_. I tossed a _(11.)_ over to it. Much to my surprise he gobbled it up and ate another right from my hand! _(12.)_! That was cool! I called my mom and dad over and told them what had happened. We had a great time at the farm.

Helpful Hint:
An adjective is a descriptive word; a noun is a person, place or thing; plural means more than one; a verb is an action word; an interjection is a word that describes an emotion.

The buzzing bumble bees were yellow and black. Ouch! One bee stung me.
Help the cows find their way home!
FARM WORD JUMBLES

Unscramble the first four words in each set of jumbles. Then use the circled letters to unscramble the final word. Some of the words may unscramble into more than one word, but only one word is related to the puzzle.

1. ABOUT FARMS

A L U R R

S O I L

A D L N

A E F M R R

ANSWER 1:

2. PIGS

E G I L P T

A B C N O

A L I T

R R T Y S

ANSWER 2:

Answers: 1. Rural, Silo, Land, Farmer; 2. Piglet, Bacon, Tail, Sty; Answer 1: Animals; Answer 2: Pot Belly
West Virginia Farms

Make a check in the box next to those kinds of farms which can be found in West Virginia.

- Apple Orchard
- Dairy Farm
- Orange Grove
- Nursery
- Christmas Tree Farm
- Strawberry Farm
- Poultry Farm
- Vegetable Farm
- Wheat Farm
- Goat Farm

Answer: The only farm that is NOT found in West Virginia is the Orange Grove.
Lamb
Honeybee
Cow Word Search Puzzle

A H C O H E R B I V O R E W S
S E P Y O O T S A R E L D I K
L I V E S T O C K E F I O N F
G F E A Y R B V V P E R M E I
N E T R S O N O E Z T W E O C
O R I L V W S H A S A B S V E
T A H I E S A R L M E S T P O
D T N N S A G K E D A I I R Y
C E O G W G I C V H E S C N E
A C C S L A M I N A T F A R D
R A A L T W O R H U N A T D R
E D L T T T H O E U S A N E D L
G L V A T S S V E O S C D L O
F M E I L L K A O I N H U E R
L I S F T A E M E T I B M D E

COW WORD LIST

BEEF HEIFER BOVINE HERBIVORE
BULL HOoves CALVES LEATHER
CATTLE LIVESTOCK CUD MAVERICK
DAIRY MEAT MOO VEAL
GRAZE YEARLINGS DOMESTICATED DRAFT ANIMALS

Answers: Filly, Large, Mane, Hooves, Yearling

HORSE JUMBLES

Unscramble the words in each set of jumbles. Then use the circled letters to unscramble the final word.

L I L Y F
R E G A L

N A M E
E H O S O V

ANSWER: Filly, Large, Mane, Hooves, Yearling
All of the fruit below grows on trees except for one. Can you find which fruit does **NOT** grow on a tree and put an X through it? After you X out the fruit that does not grow on a tree, color all the pictures.

Can you help the hen through the maze to find her eggs?

Colonists raised chickens and ducks for meat and eggs. The chickens ran loose in the barnyard where they scratched for seeds and insects. They were much thinner and tougher than the plump, tender birds we eat today. Did you know that West Virginia ranks 16th in poultry production? Eggs produced in West Virginia are used almost exclusively to produce chicks for the broiler (meat chicken) industry.
Farmer Brown needs to pick the ripe strawberries and take them to the market to sell. Each ripe strawberry has a problem that totals 5. Work the problems to find the strawberries and color a path through them for Farmer Brown.
<table>
<thead>
<tr>
<th>Animal</th>
<th>Image</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cow</td>
<td><img src="image1.png" alt="Cow Image" /></td>
</tr>
<tr>
<td>Pig</td>
<td><img src="image2.png" alt="Pig Image" /></td>
</tr>
<tr>
<td>Calf</td>
<td><img src="image3.png" alt="Calf Image" /></td>
</tr>
<tr>
<td>Duck</td>
<td><img src="image4.png" alt="Duck Image" /></td>
</tr>
<tr>
<td>Chicken</td>
<td><img src="image5.png" alt="Chicken Image" /></td>
</tr>
<tr>
<td>Goat</td>
<td><img src="image6.png" alt="Goat Image" /></td>
</tr>
<tr>
<td>Goose</td>
<td><img src="image7.png" alt="Goose Image" /></td>
</tr>
<tr>
<td>Turkey</td>
<td><img src="image8.png" alt="Turkey Image" /></td>
</tr>
<tr>
<td>Horse</td>
<td><img src="image9.png" alt="Horse Image" /></td>
</tr>
<tr>
<td>Sheep</td>
<td><img src="image10.png" alt="Sheep Image" /></td>
</tr>
</tbody>
</table>

Draw a line from the word to the animal it names.

Answers on page 34.
Victor Vegetable just loves fruits and vegetables. He wants to eat his way through the alphabet. Help him out by naming a fruit or vegetable that begins with each letter of the alphabet. How many can you find?

<table>
<thead>
<tr>
<th>A</th>
<th>B</th>
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<td>C</td>
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<td>W</td>
<td>X</td>
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<td>Y</td>
<td>Z</td>
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</tbody>
</table>
WORD SCRAMBLE
Hey Kids! Unscramble the words below to reveal a farm word.
The clues will help you!

rpcso - What’s grown in the fields. ________________

anrb - What do the animals sleep in? ________________

gisp - Pink, round little things. ________________

encfe - Keeps the animals in the pasture. ________________

nyobsea - Type of round bean. ________________

osreh - What rhymes with coarse? ________________

amrfer - Who takes care of the animals? ________________

actortr - Farmers ride these in the fields. ________________

onrc - Yellow things you eat. ________________

atewh - Grain, rhymes with sheet. ________________

ndrage - Vegetables grow in these. ________________

rgani - Lots of farm animals eat this. ________________

osrrteo - Crows at sunrise. ________________

Answers: Crops, Barn, Pigs, Fence, Soybean, Farmer, Tractor, Corn, Wheat, Garden, Grain, Rooster
HELP THE FARMER FIND HIS PIG
**Gardening Tools Word Search**

```
D O N O T P R T A H N U S U N
R E Y A R P S K N A T E E G V
E S P O L E P R U N E R R L W
G R R W K E L E N D S I N O A
T A H A E S S E P T R M L V S
I E R T N G R P V R O R A E G
W H E E L B A R R O W U W S N
N S E R E V E T R W H E N R I
G G R I E E H B I E N S M S N
S N D N U R S I N L G T O R U
H I E G D L E A F B L O W E R
O N R C M A G N T W I E E P P
M U T A E R D R E D A E R P S
N R O N K N E E S T O O L O N
T P H E S O H N E D R A G L S
```

**TOOLS WORD LIST**

- BROOM
- PRUNING SAW
- GARDEN HOSE
- PRUNING SHEARS
- GLOVES
- RAKE
- HAND TROWEL
- SHOVEL
- SPREADER
- HEDGE SHEARS
- KNEE STOOL
- SUN HAT
- LAWN MOWER
- TANK SPRAYER
- LEAF BLOWER
- TILLER
- LOPPERS
- WATERING CAN
- POLE PRUNER
- WHEELBARROW

---

**Funnies on the Farm!**

**Q:** What do you give a sick pig?
**A:** Oinkment!

**Q:** What is the easiest way to count a herd of cattle?
**A:** Use a cowculator!

**Q:** What do cows like to dance to?
**A:** Any kind of moosic you like!

**Q:** What game do cows play at parties?
**A:** Moosical chairs!

**Q:** What do you call a crate of ducks?
**A:** A box of quackers!

**Q:** What do you call an arctic cow?
**A:** An eskimoo!

**Q:** Why did the foal cough?
**A:** Because he was a little horse!

**Q:** Why do cows like being told jokes?
**A:** Because they like being amoosed!
FIND THE DIFFERENCE
There are 6 Differences Between the two Pictures Below. Can You Spot Them?

Answers: Horse's Tooth, Pigs Spots, Goat's Horn, Cow's Horn, Goat's Smile
Farm Animal Word Search Puzzle

FARM ANIMAL WORD LIST

BULLS  FOALS  CALVES  HENS
CATS   HORSES  CHICKENS  KITTENS
CHICKS  LAMBS  COLTS  PIGLETS
COWS  PIGS   DOGS   PUPPIES

Help the cow and ducklings get back home!


FOOD GROUPS

Do you know what the four basic food groups are? To have a healthy and nutritious meal, we should eat something from each of the four basic food groups. How many things can you list under each of the food groups below?

<table>
<thead>
<tr>
<th>MEATS</th>
<th>DAIRY</th>
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<table>
<thead>
<tr>
<th>GRAINS</th>
<th>FRUITS &amp; VEGGIES</th>
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</table>
How Christmas Trees Grow

If your Christmas tree is a real tree, it was planted about 8 years ago by the tree farmer. The tree farmer planted the tree seedling when it was about six inches tall. He had to water it and keep it free from weeds, diseases, and insects.

The first year the tree was planted, it did not grow very fast because it had just been transplanted to the tree farm. The second and third year it started growing about six inches per year.

At about the fourth year, when it was about 24 inches tall, the tree farmer started to shape the tree so it would grow full and round. He shaped the tree by shearing it with a large knife. This shearing process cut back all the branches to help make the tree look nice.

Each year, as the tree grew larger, the tree farmer continued to shape the tree to give it a beautiful shape.

Finally, after the tree was about eight years old and about six feet tall, the tree was ready for someone to cut and take home for Christmas.

The next spring, when the ground was warm enough, the Christmas tree farmer planted another tree and the whole process started over again.

Christmas Tree Quiz

1. How long does it take a Christmas tree to grow? _____________________________

2. What does the tree farmer have to protect his trees from? _____________________________

3. How tall was the seedling the farmer planted? _____________________________

4. Why does the tree farmer shear and shape his tree? _____________________________

6. When does the farmer plant another tree to replace the one cut for Christmas? _____________________________

Answers: 1. 8 years, 2. Weeds, diseases and insects, 3. 6 inches, 4. To make the tree look nice, 5. 6 feet, 6. The following spring

---

Did you know that you depend on about 4 acres of land for all your food, clothes and lumber? This is about the size of four football fields. The chart above shows what an average person eats or uses in one year.
Match the Product
Match each animal product with the animal it comes from by writing the products in the correct box. If you’re not sure, use your dictionary to look up the products!

**Animal Products**

<table>
<thead>
<tr>
<th>Animal Products</th>
<th>Milk</th>
<th>Pork Ribs</th>
<th>Down</th>
<th>Steak</th>
<th>Lamb Chops</th>
</tr>
</thead>
<tbody>
<tr>
<td>Veal</td>
<td></td>
<td>Hamburger</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ham</td>
<td></td>
<td>Quills</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Ice Cream</td>
<td>Yogurt</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Drumsticks</td>
<td>Bacon</td>
</tr>
</tbody>
</table>

**COW**

**PIG**

<table>
<thead>
<tr>
<th></th>
<th>Cow: Milk, Steak, Veal, Hamburger, Butter, Ice Cream, Yogurt</th>
<th>Pig: Pork Ribs, Ham, Bacon</th>
</tr>
</thead>
</table>

**SHEEP**

**POULTRY**

<table>
<thead>
<tr>
<th></th>
<th>Sheep: Lamb Chops, Wool</th>
<th>Poultry: Down, Drumsticks</th>
</tr>
</thead>
</table>

**Barnyard Babies**

Here are some baby farm animals. Match them with their parents. Use a dictionary if you need help.

<table>
<thead>
<tr>
<th>Goose</th>
<th>Horse</th>
<th>Goat</th>
<th>Turkey</th>
<th>Rabbit</th>
<th>Sheep</th>
<th>Hog</th>
<th>Duck</th>
<th>Chicken</th>
<th>Cow</th>
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</table>

1. A PULLET is a young ____________________________
2. A LAMB is a young ____________________________
3. A FOAL is a baby ______________________________
4. A GOSLING is a baby __________________________
5. A CALF is a baby ______________________________
6. A KID is a young ______________________________
7. A DUCKLING is a baby _________________________
8. A PIGLET is a baby __________________________
9. A KIT is a baby ______________________________
10. A POULT is a young __________________________

**Handprint Lamb**

**Materials:**
- Black construction paper (or grey)
- Glue
- White pencil crayon or a silver marker
- Cotton balls
- Scissors
- **Optional:** wiggly eyes

**Instructions:**
1. Place your hand on the black (or grey) construction paper. Your fingers should be slightly spread but the thumb should be out as far as possible. Fingers are legs and your thumb is the head.
2. Trace and cut out your handprint.
3. Glue cotton balls all over the handprint but leave the tips of the fingers and thumb cotton free.
4. Glue small wiggly eyes onto the head (tip of thumb) or use a pencil crayon.
5. Use a white pencil crayon or silver marker to add a smile.

**Cow Door Hanger**

**Materials:**
- 1 dinner sized paper plate
- 1 dessert sized paper plate (can be substituted with construction paper)
- 1 piece of black and pink/peach construction paper or card stock
- 1 black pipe cleaner
- 1 black marker
- Hole punch (scissors will work)
- 1 Bell (optional)
- 1 small piece of ribbon/yarn/twine to attach bell (optional)
- Scissors
- Glue
- Pencil

**Instructions:**
1. Glue the small plate onto the big plate. The edge of the small plate should be around ¼ inch from the edge of the big plate (see picture).
2. From your black construction paper, cut your “cow spots” in different shapes and sizes. Glue them onto your big plate to make the cow’s body.
3. Cut out an oval from your pink construction paper the same width as your small plate. Using the same paper, trace generously around your index finger twice, to make the cow’s ears, and cut out. Using the black paper, cut a 2”x2” square and then cut in half diagonally to make the cow’s horns.
4. Glue all the cow’s parts into place. With a black marker draw on the cow’s eyes, mouth and nostrils.
5. Punch a hole in the top of the paper plate, thread pipe cleaner through hole, fold in half and curl.
6. Punch a hole in the bottom of the small plate. Using a piece of ribbon, yarn or twine, tie on a bell to the “cow’s neck.”
**Horse Footprint**

*Materials:*

Construction Paper
- brown, blue, pink, green and white

Glue

2 Wiggly eyes

Scissors

Black crayon

*Instructions:*

1. Trace your foot onto a piece of brown construction paper. You just want a general shape, so don’t define the toes too much or your horse will have a very bumpy face! Cut the footprint out.

2. Cut a rectangle out of brown construction paper. This will be the horse’s neck. Cut small slits into one side of the paper to create a mane.

3. Glue the non-cut area of the rectangle down at an angle on a piece of blue construction paper (cut off any extra paper that hangs off the side of the blue paper).

4. Glue the footprint to a piece of blue construction paper with the heel of the foot at the top of the page, so that it covers the rectangle slightly.

5. Cut two small triangles out of brown construction paper (ears) and glue to the top of the footprint (the top of the heel). Cut two smaller triangles out of pink construction paper and glue them inside the ears.

6. Cut a third small triangle out. Cut small slits in the bottom of the triangle and then glue the triangle upside down to the top of the horse’s head (between the ears).

7. Glue two wiggly eyes onto the footprint.

8. Use the black crayon and draw two small circles at the bottom of the footprint (near the toes), and a smile.

9. Cut a piece of green construction paper out and glue at the bottom of the page for grass.

10. Cut thin strips of white construction paper out and glue them down to create a fence on top of the grassy section.

**Fuzzy Chick Cookies**

*Materials:*

Small Cookies (Vanilla wafer cookies work well)

Icing

Yellow food coloring

Coconut

Zipper baggie

Candy corns

Mini chocolate chips

*Instructions:*

1. In a zipper baggie mix 6-8 drops of yellow food coloring and ½ cup of coconut. Seal the bag and squish it around until all the coconut is yellow.

2. Add some yellow food coloring to the icing and spread it onto your cookie. Sprinkle on some of the yellow coconut to make your chick fuzzy.

3. Now stick in your candy corn beak and chocolate chip eyes and enjoy!

**½ cup of yellow coconut will cover 10-15 cookies (depending on the size of cookies you buy).**
Why are farms and farmers so important?
Draw a picture to illustrate