

Name: _____

Jane Goodall

By Sharon Fabian

Jane Goodall loved to read about wild animals. She hoped to work with animals when she grew up. Many young people who like animals grow up work in a veterinarian's office; others become farmers. Some work in zoos or parks. Some work in pet shops. Jane didn't want to do any of those things. She wanted to go to Africa to study the wild animals there.

When she was 23 years old, Jane had the chance to visit Africa. While she was there, she contacted the famous anthropologist, Dr. Louis Leakey. Dr. Leakey offered her a job as his assistant. This gave Jane the chance to stay and work in Africa. It was interesting work, but it still wasn't what she really wanted to do. Jane wanted to work with living animals.

With Dr. Leakey's help, Jane found the perfect job - studying the wild chimpanzees in Gombe National Park in Tanzania.

Wild chimpanzees were not easy to study. They were afraid of humans and ran off whenever Jane Goodall approached them. It took months of patient work before she could get close enough to observe the chimps.

Her patience paid off. Gradually, her presence became accepted by the chimps. She spent whole days observing the chimps from the time they woke up in the morning until the time they went to sleep at night. She was able to observe their behavior as no one had done before.

Jane Goodall made some amazing discoveries about chimpanzees. She discovered that they were more like humans than anyone had suspected. She discovered that chimps are smart and sociable. She found that they developed close family ties but that they also liked to fight. She learned that chimps used tools, and even more surprising, that they were beginning to learn to make tools. This was one of her most amazing discoveries because, up to that time, it was believed that only humans could make tools.

She made this discovery while watching a chimpanzee catching termites to eat. The chimp took a small twig and stripped off its leaves. Now, he had a termite-hunting tool. Over and over, he poked the twig into a termite hole; it was a little bit like fishing for termites. When he pulled the twig out of the hole, it was coated with tasty termites. Later she learned that chimps used not only twigs, but also stems, branches, seeds, leaves, and rocks as tools to help them do their chores.

Jane continued to work with the chimpanzees at the Gombe National Park for almost 40 years, but now she has taken on a new role. She has started sanctuaries in Africa for orphan chimps. Many chimps are orphaned when their mothers are killed for meat by poachers. Sometimes, the baby chimps are sold for pets, but that is illegal; it is not good for chimps to live as pets. With the help of the government, chimps are rescued and sent to Jane's sanctuaries. There, they are cared for in an environment that is as close to their natural home as she can make it. They live outdoors in open spaces, eat healthy food, and enjoy the company of other chimpanzees.

Jane also writes and travels the world, giving speeches and lectures about the chimpanzees. She wants to make people aware of the problems faced by chimpanzees. She wants to let people know that the chimpanzees are on the verge of extinction. The number of chimps in Africa has decreased in the last 100 years, from well over a million to less than 200,000. If their numbers continue to decline, chimps could disappear from the earth altogether.

She has also started a web site to help the chimps. It encourages people to donate money to help the chimps and provides lots of information including "biographies" of several chimps. There you can read about Baluku, a two-year-old with scars around his waist from the time when poachers had him tied up with a rope and were trying to sell him. You can also read about Nani, a baby chimp who liked to roughhouse and once even broke her arm while playing with the other chimps.

Jane Goodall has led an unusual life. Her work is the kind that many people only dream about. Now, she is making good use of the opportunities that she has had by trying to give back to the chimpanzees. Everything that



Name: _____

she does is part of her mission to save the chimps.

Jane Goodall

Questions

- _____ 1. Jane Goodall studied _____.
A. Africa
B. elephants
C. anthropology
D. chimpanzees
- _____ 2. Jane Goodall wanted to go to Africa to _____.
A. start a farm
B. take a vacation
C. go to college
D. work with wild animals
- _____ 3. Which happened first?
A. Jane Goodall went to Africa.
B. Jane Goodall started a web site.
C. Jane Goodall contacted Dr. Leakey.
D. Jane Goodall observed the chimps.
- _____ 4. She observed the chimps in _____.
A. a zoo
B. a lab
C. their natural habitat
D. none of the above
- _____ 5. She discovered that chimps were _____ than people had expected.
A. more like humans
B. more afraid of humans
C. taller
D. less like humans
- _____ 6. She observed the chimps making a tool for _____.
A. cutting wood
B. carrying heavy loads
C. catching fish
D. catching termites
- _____ 7. We can tell that Jane cared about the fate of the chimpanzees because she _____.
A. worked with them for many years
B. created sanctuaries for the chimps
C. encouraged other people to help the chimps
D. all of the above
- _____ 8. Nani is _____.
A. Jane Goodall's grandmother
B. a chimp
C. an anthropologist
D. a researcher

Name: _____

Rose and her friends wanted to play Cat and Mouse. Rose was chosen to be the cat and Mary was chosen to be the mouse. The rest of the girls joined hands and made a big circle. The diameter of the circle was 10 feet. What was its circumference? Round your answer to the nearest hundredth.

The theater was packed. This was to be Houdini's most exciting performance ever. There were rumors that he was going to do something no magician had ever tried before. It would certainly be a death-defying act! All 837 tickets had been sold. The tickets cost \$25.99 each. How much money in all had been paid for the 837 tickets sold?

In what quadrant would you find the point $(-4, -18)$?

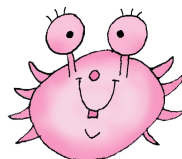
$$0.7 (0.2 (0.7 \times 4)) =$$

$$(0.2)(0.11)$$

Mrs. Martin bought three pizzas to share with her class. The pizzas were very large and had lots of pepperoni and cheese on them. Each pizza was cut into 10 pieces. Twenty-four pieces were eaten. What fraction of the pizzas was left?

Three pounds of chocolates in a special tin costs \$28.67. The store will gift wrap the tin for \$3.95. The cost to ship the candy is \$0.12 per ounce. How much is the total cost to buy the candy, have it gift wrapped, and shipped?

Emma has a recipe for making 10 cups of wild bird food. It calls for $1 \frac{1}{2}$ cups of rye seed. How much rye seed will she need to make 6 cups of wild bird food?



Name: _____

"How old are you?" Ava asks Mrs. Thompson.

Mrs. Thompson could not stop laughing. "Well, I'm not going to tell you all my age. But I will say I have a dog, Max. I like to count his age in dog years. Every birthday his age increases by 7 dog years. This year on his birthday his age in dog years will be 11 years less than my age."

"Oh, and time flies fast. On Max's first birthday, I was 23 years older than his dog years."

On Max's birthday this year, how old will Mrs. Thompson be?

Show your work.

Name: _____

William Clinton

By Meg Leonard

William Clinton was our forty-second president. He was born in Arkansas in 1946. Clinton met a president when he was in high school. He met President John F. Kennedy. This meeting made Clinton want to serve the public. He went to law school. Clinton began his career in politics when he finished law school. He ran for Congress. He did not win. Clinton became the attorney general of Arkansas. He was elected governor two years later. He was 32 years old. He was the youngest governor in the country. He was not re-elected. But, Clinton ran again four years later. He won this time. He was governor of Arkansas until he ran for president. Clinton was elected president in 1992. He served for two terms. While he was president, the country was peaceful. The federal budget was balanced. Clinton was the first Democratic president to be re-elected since Franklin Roosevelt. He was also the second president to be impeached. This means he was accused of crimes. He was found not guilty during a trial in the Senate. He was not removed from office. Clinton was a very popular president. Clinton stays busy even though he is no longer president. He has written several books. He has helped the small island nation of Haiti after a devastating earthquake there. Clinton still works to help others.



William Clinton

Questions

- _____ 1. Who was William Clinton?
- A. the thirty-eighth president
 - B. the forty-second president
 - C. the fortieth president
 - D. the forty-first president
- _____ 2. Which former president did Clinton meet while he was in high school?
- A. Lincoln
 - B. Carter
 - C. Kennedy
 - D. Franklin Roosevelt
- _____ 3. How old was Clinton when he was first elected governor?
- A. 32 years old
 - B. 25 years old
 - C. 60 years old
 - D. 45 years old
- _____ 4. Clinton was the _____ president to be impeached.
- A. third
 - B. last
 - C. second
 - D. first

Name: _____

5. What did President Clinton do after leaving office?

What is the remainder of 112 divided by 18?

If $j = 5$ and $b = -12$ then what is $6j + 13b - 3b = ?$

$$(8 + 13) + 5 = 2(2 + 11)$$

What is the prime factorization of 63?

Rewrite as an algebraic expression or equation.

Add 17 to the product of c and 9

$$y = x + 17$$

$$y = 22$$

What is the value of x ?

$26 - 16 + t = 16$
What is the value of t ?

Rewrite $\frac{2}{25}$ as a decimal.

If $t = -9$ and $s = 37$ then what is $5t + 13s + 4s = ?$

$$0.4 (0.8 (0.4 + 3)) =$$

Circle the percentage that is closest to 20 out of 59:

96%

5%

52%

$$(8 + 13 + 6) =$$

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Guess the number in your head. Keep guessing until your numbers are correct.
Then write the correct answer!

$$\text{😊} + \text{😊} + \text{😊} + \text{😊} = 68$$

$$\text{😊} + \text{😎} = 37$$

$$\text{😊} + \text{😎} + 3 = 40$$

$$\text{😎} - \text{😊} = \underline{\hspace{2cm}}$$

$$\text{😊} = \underline{\hspace{2cm}} \quad \text{😎} = \underline{\hspace{2cm}}$$

5 before 12 _____

6 after 19 _____

7 before 13 _____

6 before 18 _____

7 after 14 _____

1 before 16 _____

9 before 15 _____

2 after 17 _____

3 before 14 _____

8 before 11 _____

5 after 13 _____

2 before 17 _____

4 before 19 _____

9 after 12 _____

2 before 15 _____

5 before 57 _____

1 after 40 _____

8 before 24 _____

Name: _____

Ready to make equations? There is a missing equation in each box.
Circle the numbers once you find it!

A

98	80	50
-	57	17 83
	88	70 76
	27	67 11

Find a subtraction fact.

B

54	81	46
-	61	92 33
	83	47 96
	66	95 59

Find a subtraction fact.

C

86	96	82
-	64	57 83
	35	70 20
	28	67 50

Find a subtraction fact.

Equations:
Write the equation facts you found.

A	67	-	17	=	50
B	92	-		=	
C	70	-		=	

Write as a decimal.
Six and twenty-six hundredths

Write as a decimal.
Thirty-four thousandths

Write as a decimal.
 $19\frac{4}{10}$

What is the area of a rectangle with sides 4 cm and 11 cm?

Round 13,606 to the nearest thousand.

$3 \times 8 \times 11 + 12$

Name: _____

Leap Year

By Sharon Fabian

Do you know any leaplings? Leaplings are like the rest of us in most ways - but there is one big difference. Leaplings have only one real birthday every four years.

That is because leaplings were born on February 29 - a date that occurs only once every four years.

Some people wonder why we even have leap years. It doesn't seem fair that certain people don't have a birthday for three years in a row!

And what about when it's time for a leapling to get his driver's license? If he doesn't turn sixteen in a leap year, he doesn't have a 16th birthday. Does he have to wait until March 1 for his license? How fair is that?

Some teens have actually had to wait much longer, months even! It seems that computers didn't recognize that they were sixteen at all. Maybe the computers thought they were only four since they had only four real birthdays in their first sixteen years.

But there is a reason why we have leap years, and it's really not just to give leaplings a hard time. The reason we have leap years is because we need them to keep our calendar synchronized with the Earth's revolution around the sun.

Our calendar has 365 days in a year, which is just about the length of time that it takes for the Earth to orbit the sun - but not quite. The actual time span is more like 365.242199 days.

So every once in a while, once every four years, we have to add a day to keep the calendar on track. One day has been added every fourth year since the Julian calendar came into use about two thousand years ago. The change brought our calendar much closer to the true schedule of the Earth's revolution around the sun, but it still wasn't perfect.

Over four hundred years ago, a further correction was made when the Gregorian calendar came into use. Since that time, a day has been added to the calendar every fourth year except for the years that can be divided evenly by one hundred. So the years 1700, 1800, and 1900 were not leap years. An even further refinement dictated that if a year was evenly divisible by four hundred, then it would have the extra day. That meant that the year 2000 was a leap year.

Now, our calendar is very, very close to the actual schedule of the Earth's revolution.

But still, for some people, the new calendar may not be an improvement. Certain people have to wait even longer than four years for a true birthday. For example, since 1900 was not a leap year, people born on February 29, 1884, did not have even one birthday during all of their teenage years.

Will the calendar need to be revised again in the future? Maybe, but it's too soon to tell. With all of the corrections currently in place, our calendar is accurate to 8,000 years. So maybe, years in the future, someone will have to make a rule that years divisible by 8,000 will not be leap years. But that is something that we don't know for certain since the revolution of the Earth may change slightly in a few thousand years.

We probably don't need to worry about that yet. Meanwhile, leap year is important for other reasons. For example, presidential elections in the United States take place in leap years. Summer Olympic Games happen in leap years, too. And of course, if you happen to be a leapling, then leap year is very important to you because it is your birthday year.

Name: _____

Leap Year

Questions

- _____ 1. Leap years have _____ days.
- A. 366
 - B. 365
 - C. 364
 - D. 367
- _____ 2. In leap years, the extra day is added at the end of the month of _____.
- A. November
 - B. December
 - C. January
 - D. February
- _____ 3. Leaplings are _____.
- A. people born on February 29
 - B. certain kinds of frogs
 - C. the people who figured out that we needed to add days to the calendar
 - D. leap year calendars
- _____ 4. Leap days occur _____.
- A. approximately once every four years
 - B. exactly once every month
 - C. exactly once every four years
 - D. approximately once every month
- _____ 5. Our calendar will not need to be revised again to synchronize it with the Earth's revolution for _____.
- A. one thousand years
 - B. thousands of years
 - C. one year
 - D. four years
- _____ 6. The Earth revolves around the sun in _____ days.
- A. about $365 \frac{1}{4}$
 - B. $29 \frac{1}{4}$
 - C. 365
 - D. 29
7. Suppose that you were a leapling, born on February 29, 2008. In what years would you have your first two real birthdays?
- _____
- _____
8. Why do we have leap years?
- _____
- _____

Name: _____

Mr. Garcia is trying the latest fad diet. He has to choose one food from each of three lists. There are six vegetables on the first list, three meats on the second list, and four fruits on the third list. How many different combinations of foods are there?

Connor and Holly were working together to make a bulletin board display for National Honesty Day. Connor wanted a blue background, but Holly wanted a yellow background. Holly wanted quotes from famous people, but Connor wanted quotes from other students. It seemed like they couldn't agree on anything. They had started their discussion about the board at 9:43 a.m. Here it was 2:12 p.m. and nothing was done. How long had they been arguing about what to put on the bulletin board?

In what quadrant would you find the point $(-3, 5)$?

$$20 \div 4 + 5$$

Simplify.

$$\begin{array}{r} 308 \\ 396 \end{array} =$$

There are 20 students in Ms. Young's class. During Let Reading Be Your Haven Month, the students read an average of 3.5 books each. How many books did the students read in all?

Last year Mr. Jackson planted corn on 4.3 acres of his farm. His neighbor planted 3.5 times as many acres of corn. How many acres of corn did Mr. Jackson's neighbor plant?

Mr. Hernandez went to breakfast at Brennan's while he was in New Orleans. His breakfast cost \$30. He left an 18% tip for the server and paid 7% sales tax on the food. What was his total cost for breakfast? (hint: He did not pay tax on the tip.)

Name: _____

A weird new bowling game has been invented at the local bowling alley. Each player gets one roll of the ball. Before the roll, the pin machine places ten pins at the end of the alley, with each pin having an integer written on it. The pins are selected randomly and set in the normal arrangement of ten pins (4 in the back row, 3 in the next row, 2 in the next, and 1 in the front). Before rolling, the players look through binoculars to see what numbers are written on the pins. The players must knock down at least one pin or they automatically lose. After the roll, the player who knocked down pins resulting in the greatest integer sum wins. Player one knocked down pins with the numbers -9, -7, 3, 4, and -5. Player 2 knocked down pins with the numbers -1, -3, -4, and 2. Which player won the roll?

Mr. Fleep had a new flying disk design. He made some calculations and decided if he could make a flying disk that had a perimeter exactly four times the diameter that it would be more aerodynamically stable than a "standard" flying disk and thus fly further. Is his design possible? Why or why not?

Smallville had a great football team last year. They outperformed their opponents in almost every category of play. One of their more impressive statistics was that, on average, they outscored their opponents by 3:1 in every game they played. If they scored an average of 27 points per game, what was the average number of points scored by their opponents per game?

If a solution of MgCl is $\frac{1}{3}$ M, what will its concentration be if it is diluted by 20%? Express your answer as a fraction.

Name: _____

Vultures

By Brandi Waters

Vultures are large birds. They are big and sometimes clumsy. They are not very pretty birds. Vultures do not have feathers on their heads. Many people do not like vultures. People do not like them because of what they eat. Vultures eat the remains of dead animals. Many people think that this is gross, but vultures do an important job. Vultures help to clean up nature's messes. They eat things that are smelly and that can make people and other animals sick. Vultures will eat the remains of a dead animal even if it died from an illness. This could make other animals sick. A vulture's body can kill germs in the food that it eats. Even though vultures do dirty work, they are very clean animals. This surprises many people. Vultures always keep their feathers clean. Some even take baths! Vultures are not so bad. We need vultures to keep our world clean.



Vultures

Questions

_____ 1. Vultures are _____.

- A. graceful
- B. dirty
- C. large
- D. all of the above

2. What is one reason why people do not like vultures?

_____ 3. Vultures eat the remains of dead animals. This is important because _____.

- A. vultures help to keep other animals healthy
- B. vultures get rid of smelly things
- C. vultures help to keep nature clean
- D. all of the above

_____ 4. A vulture's body will _____.

- A. not have feathers
- B. be dirty
- C. kill germs in the food that it eats
- D. all of the above

5. What is something that many people find surprising about vultures?

Name: _____

Complete each analogy with the best word.

Thanksgiving	Earth	weather
crimson	travel	Mars
ant	turkey	telegraph
apples	family	eat
caterpillar	megaphone	fruits
sunshine	butterfly	telephone
storms	cocoon	

egg : larva ::

chrysalis : _____

vacation : holiday ::

journey : _____

Edison : light bulb ::

Bell : _____

diet : food ::

climate : _____

$$799 \div 10$$

$$\frac{4}{8} \times \frac{10}{11}$$

Rewrite in scientific notation.

81,050,000,000

$$4 \times 14 \div 2$$

$$16z - 15.3 = 112.7$$

$$z =$$

If $a = 6$ and $b = 50.3$,

then

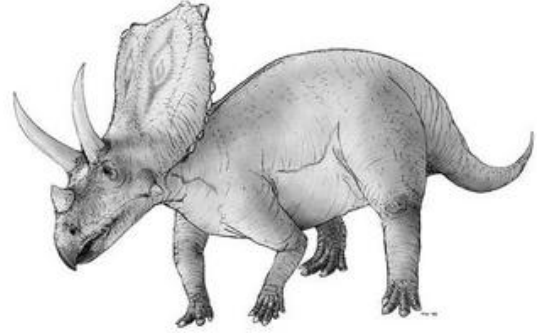
$$3a + 50.3 - a =$$

Name: _____

Chasmosaurus, Chasm Reptile

By Cindy Grigg

Chasmosaurus (KAZ-moe-sore-uss) was an herbivorous dinosaur that lived about 70 million years ago during the late Cretaceous period in what is now Canada. It had an enormous knobby neck frill that was edged with small, sharp bones. First thought to have used to ram predators, the long, heart-shaped frill was not made of solid bone and was probably too flimsy to inflict damage. There were large openings inside the outer framework of bone that gave *Chasmosaurus* its name: chasm (or gap) reptile. The frill's openings probably were covered with muscle tissue and skin. This would have made the large frill lighter in weight than solid bone would have been, but it also made it less effective as protection.



So, what was the purpose of the neck frill? Did it protect the dinosaur's neck from attacks by predators? Was it used for display - to make *Chasmosaurus* look bigger and more frightening to other dinosaurs? Did it help *Chasmosaurus* identify members of its own kind or its own herd? Was it used to attract mates, like the brightly colored feathers of some male birds? Or was it used for thermoregulation - controlling a steady body temperature - by providing a large skin area to collect the sun's heat?

When the first fossils of *Chasmosaurus* were found, there seemed to be two basic kinds. One had shorter facial horns than the other, but the fossils of both were found together in the same rocks. One idea is that these two kinds were males and females of the same species. Many of today's animals that have horns show distinct differences between males and females of the same species.

One *Chasmosaurus* fossil included fossilized skin that had many large circular bumps in evenly spaced rows among smaller scales. It was impossible to determine what color the skin may have been from the fossil.

Chasmosaurus had three horns on its face as *Triceratops* did. Also like *Triceratops*, *Chasmosaurus* had a parrot-like beak used for grasping and tearing off plants. At the back of its mouth were rows of flat teeth that were used for chewing. It was a quadruped; it walked on four feet. Each foot had four short toes. Its rhinoceros-like body was as long as a large car and taller than a man. *Triceratops* and *Chasmosaurus* belonged to the same family, but *Chasmosaurus* lived about five million years before *Triceratops*. *Chasmosaurus* was most likely the oldest and smallest member of the group known as chasmosaurine ceratopsians. Other members of this group are *Pentaceratops* and *Torosaurus*.

Chasmosaurus, Chasm Reptile

Questions

- _____ 1. "Quadruped" means that it _____.
 A. was a plant eater
 B. walked on four feet
 C. laid eggs
 D. all of the above

2. Where did *Chasmosaurus* live?

Name: _____

3. *Chasmosaurus* lived about _____ years ago.

_____ 4. The author's main purpose for writing this story was to _____.
A. entertain with humor
B. persuade readers to save the dinosaurs
C. express personal feelings about dinosaurs
D. inform with facts

_____ 5. *Chasmosaurus* _____.
A. had a large, bony neck frill
B. had three horns on its face
C. had teeth for chewing
D. all of the above

_____ 6. *Chasmosaurus* ate plants. What word describes this type of animal?
A. carnivorous
B. herbivorous
C. omnivorous
D. none of the above

_____ 7. *Chasmosaurus* was named for which body feature?
A. gaps in the bones of its neck frill
B. rifts between its beak and back teeth
C. large openings in its hollow leg bones
D. none of the above

_____ 8. Which of these animals lived first?
A. *Triceratops*
B. *Torosaurus*
C. *Pentaceratops*
D. *Chasmosaurus*

$$|-15| - c = 21$$

$$c =$$

$$0.9 (0.3 (0.9 \times 8)) =$$

$$|-11| - z = 9$$

$$z =$$

$$\text{If } 3x = 48, \text{ then } x =$$

$$\frac{2}{4} \div \frac{7}{12} =$$

Rewrite $\frac{3}{100}$ as a decimal.

Name: _____

Organic compounds of varying carbon chain lengths have boiling points that increase as the number of carbon atoms increases. Methane (CH_4) boils at -164°C . If another carbon compound with a longer carbon chain boils at a temperature that is 116°C higher than the boiling point of methane, what is its boiling point?

Sarah's mother is a nurse. She came to school to check our posture and our backs. She told us that about 4.6% of children have a problem called scoliosis. There are one hundred three students in our school. If our school is like the average, how many children will have scoliosis? Express your answer to the nearest whole number.

Connor and Amy are a team. Connor makes robots, and Amy fits them for fancy robot clothes. They have two models. Model One is very small at only 8.4 inches. The other is bigger, but Connor only gave Amy a calculation as the robot is still in production. Connor wanted it to be 4 times the size of Model One, but it turns out the prototype is 8.4 inches shorter than that. How big is the prototype?

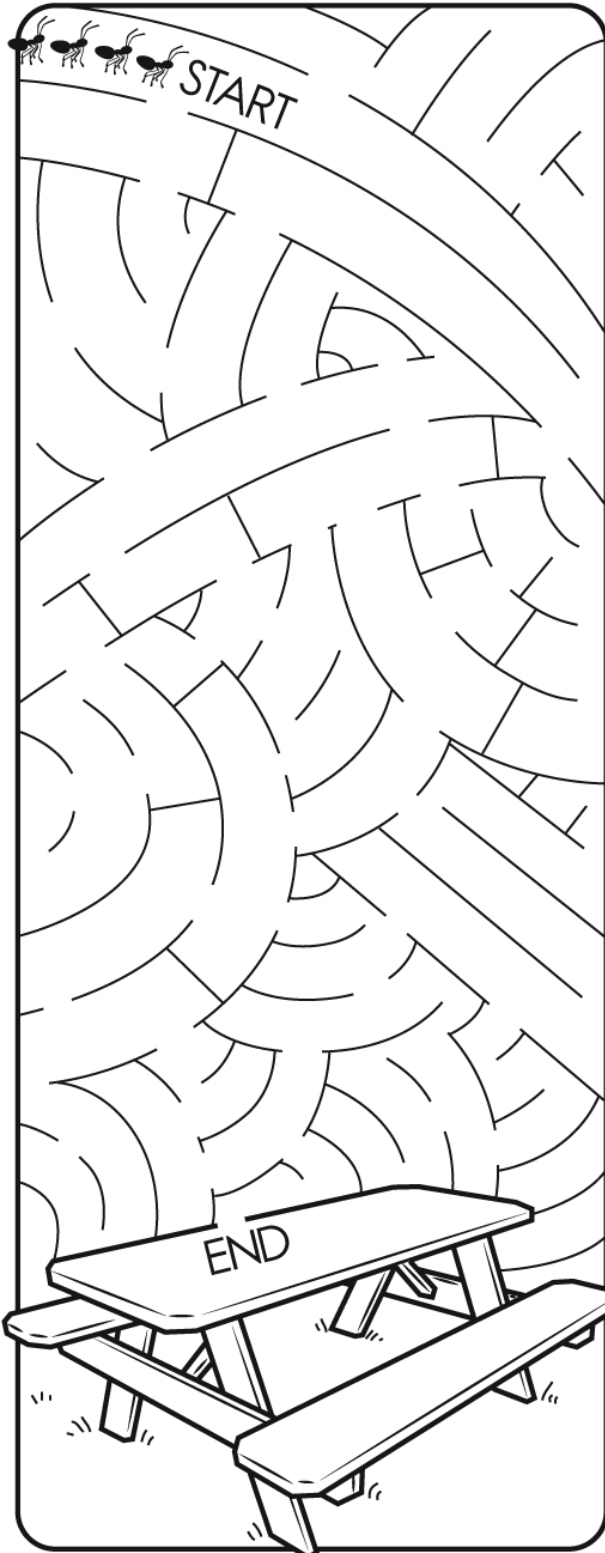
$$-11 \times 1 =$$

$$-6 - -3 =$$

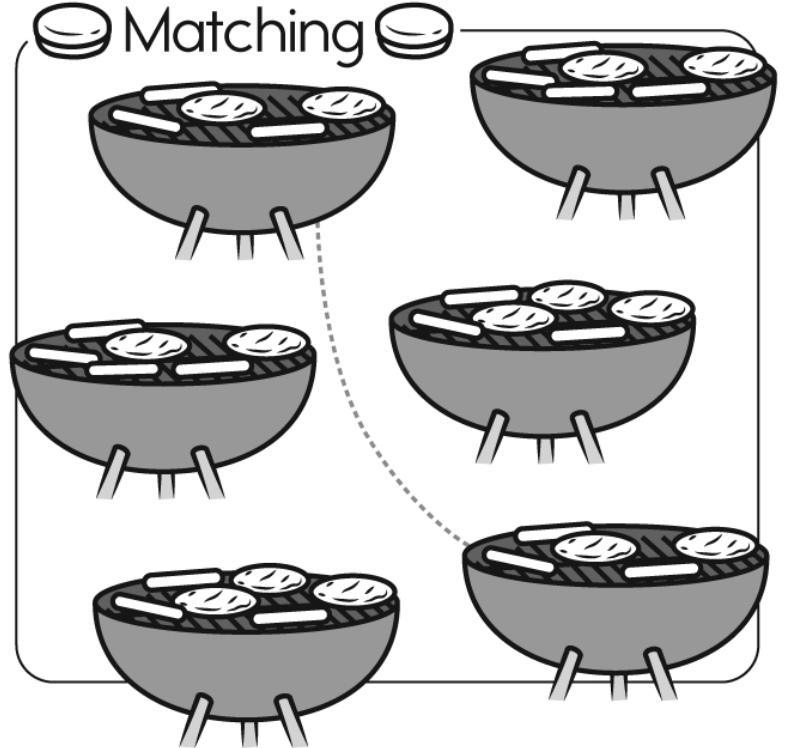
$$96 \div -12 =$$

word root **dox** can mean **opinion****paradox, orthodox**

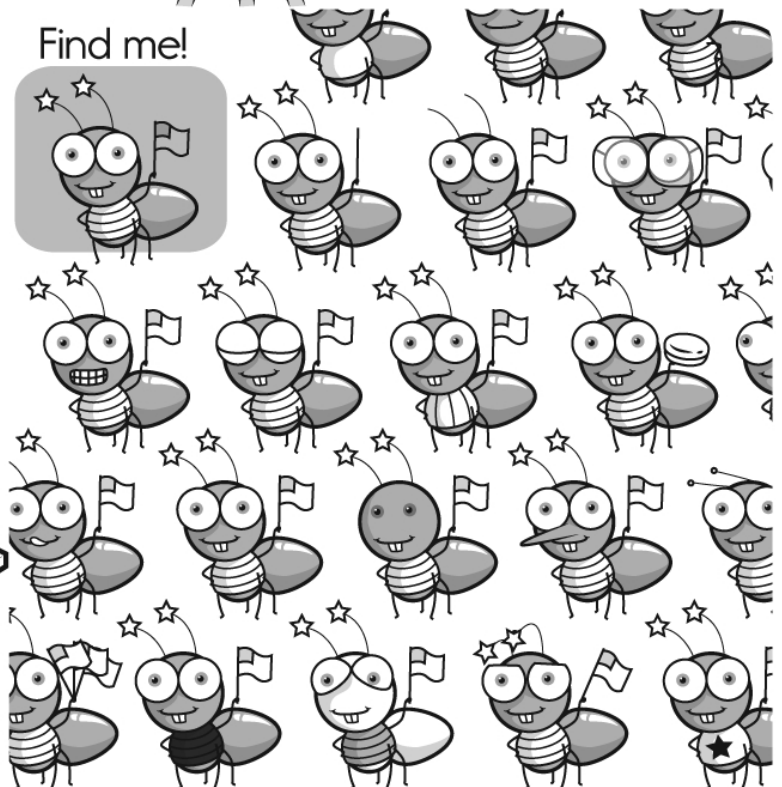
Name: _____



Matching



Find me!



Name: _____

Round 87,573 to the nearest hundred.

What is 50% of 730?

Round 12,305 to the nearest thousand.

9, 32, 23, 36, _____,
40, 51, 44, 65, 48, 79,
52, 93, 56

Draw a number line with 0, $\frac{1}{2}$, and 1. Show where $\frac{5}{7}$ would go. Is $\frac{5}{7}$ closer to 0, $\frac{1}{2}$, or 1?

How much money is 1 quarter, 5 dimes, 1 nickel, and 1 penny?

$$4.1515 \times 10^2 =$$

$$0.5 (0.6 (0.5 + 7)) =$$

$$7 \times (77 \div 7) - 24 \div 6 =$$

What is the prime factorization of 54?

A circle graph has five sections. Only four sections are labeled. The labels are 28%, 17%, 16%, and 19%. What should the missing section be?

$$p - \$70 = \$32$$

What is the value of p?

Name: _____

What Is Paper-mache?

By Colleen Messina

I will never forget my first paper-mache project. It started out as a giraffe, but it ended up being a four-foot figure of Charlie Brown's beagle, Snoopy. He was easy to make, but then we had to figure out how to get Snoopy to school. My mother finally put it in the car with a seat belt! My paper-mache Snoopy made me famous in fourth grade. He was so simple to make that paper-mache became one of my favorite art projects.



Paper-mache means "chewed paper" in French. Paper strips are held together with wet paste. When it dries, it makes solid objects that can be painted. Often, objects like balloons are used to form the basic shape of paper-mache projects. The materials are easy to find, and paper-mache is a versatile craft. It can create almost anything. And the best thing about paper-mache is that there is no wrong way to do it.

Paper-mache has been used by different cultures for hundreds of years. Imperial Russian artists in the 18th century perfected one kind of paper-mache. At first, they used paper-mache to create religious icons. Later, artists made special paper-mache boxes, trays, and desk sets. After the artists made the objects, they painted them with black lacquer. Then, the artist painted scenes on the shiny black surface. This kind of art was called Russian lacquer art.

Paper-mache was also used in Great Britain to create dolls in the 19th century. It was a good material for craftsmen to use before plastic was invented. An American company also made boats out of paper-mache. One famous canoe was called the *Maria Theresa*. A man named Nathaniel Holmes Bishop used it to travel from New York to Florida in 1874 and 1875. He wrote a book about his travels. It was called *Voyage of the Paper Canoe*.

Before starting any paper-mache project, spread newspapers over your work area and collect your materials. You will need paper, flour, water, and a mixing bowl. The first step in any paper-mache project is to cut up strips of paper. Any kind of paper can be used, but newspaper works well and can be found easily. Then, you mix the paste. The paste for paper-mache projects is made with one-part flour and one-part water. If it is too thick or sticky, you can add a little more water. Some people boil the paste to make it smooth, but that is not necessary.

After creating the paste, you dip the strips of paper into it. You can use two fingers like scissors along the strip of paper to take off the extra paste. Then, you can put the wet paper on a balloon or bunches of newspaper to make different shapes. If you use a balloon, you can later insert a pin through the dry paper-mache to pop it, which is almost as much fun as doing the paper-mache itself. Your round, dry shape can become a pig or a bird...or just about anything.

Paper-mache is fun, gooey, and messy. My fond memories of gooey, sticky paper-mache have lasted long after Snoopy disintegrated. Paper-mache is a versatile and forgiving craft. You can always change your mind about what you created...and it might still make you famous at school.

Name: _____

What Is Paper-mache?

Questions

- _____ 1. Which language does the term "paper-mache" come from?
- A. French
 - B. Spanish
 - C. Latin
 - D. English
- _____ 2. What does the term "paper-mache" mean?
- A. chewed paper
 - B. soggy paper
 - C. messy paper
 - D. none of the above
- _____ 3. What do you use to make the paste in most paper-mache projects?
- A. soap
 - B. salt
 - C. flour
 - D. baking soda
- _____ 4. What color lacquer did Russian artists use on their projects?
- A. white
 - B. clear
 - C. red
 - D. black
- _____ 5. What was the name of a famous American paper boat?
- A. *Sister Theresa*
 - B. *Mary Louise*
 - C. *Maria Patricia*
 - D. *Maria Theresa*
- _____ 6. What replaced paper-mache as a material for making dolls?
- A. metal
 - B. fiberglass
 - C. rubber
 - D. plastic
- _____ 7. After using a balloon as the basis for paper-mache, what usually happens to the balloon?
- A. It is popped with a pin.
 - B. It is painted.
- _____ 8. Imperial Russian artists in the 18th century used paper-mache to create _____.
- A. religious icons
 - B. dolls
 - C. boats
 - D. religious altars

Name: _____

April wanted to buy an art print for her mother. She had looked at many prints, and had chosen two. Now she had to make her final choice. Print A cost \$25.80. Print B cost \$30. What was the ratio of the cost of Print A to Print B? Write your answer as a fraction in lowest terms.

Jason was still hungry after he finished his TV dinner, so he decided to have some ice cream. He found strawberry, rocky road, and butter pecan in the freezer. His mother said he could put one topping on the ice cream. They had strawberry syrup, chocolate fudge sauce, and chopped nuts. How many different combinations can Jason make?

Lucas has a headache. He can't stand long lists. "Can you repeat that again?" he asks. "It's easy. Name a number that is greater than 10, less than 20, is a multiple of 5, and FINALLY is a factor of 30," replies Justin.

Kevin took a big bowl from the kitchen to see what kind of fun party mix he could create. He added $1\frac{1}{4}$ cups of pretzels, $1\frac{2}{3}$ cups of raisins, $2\frac{5}{7}$ cups of Cheerios, and $\frac{2}{3}$ cup of Goldfish crackers. How much food is now in the bowl?

Name: _____

I am a whole number. When rounded to the nearest hundred, the answer is 400. The sum of my digits is 10. If you add 450 to this number and then round the new number to the nearest hundred, the answer becomes 500. What number am I?

Megan lives in Brisbane where it is currently Sun. at 3:15 a.m. She made a phone call to Anne who lives in Kolkata. It is 10:45 p.m. and Sat. in Kolkata. What is the difference in time?




















Use any of these digits. Cross off a digit after you use it.

0 0 1 3 6 9 2 4 0

Write the smallest 2-digit number that you can come up with that is divisible by 3.

Name: _____


Puzzle:


					17
			4	4	35
			4		41
			4		38
4			4		41
32	48	31	18	43	+


Work Area:

					17
			4	4	35
			4		41
			4		38
4			4		41
32	48	31	18	43	+


The sum for each column and row is given.

 = _____

 = _____

 = _____

 = _____

 = _____

E, M, G, N, I, O, K,
_____, M, Q

What is the greatest common factor of the numbers 126 and 98?

Rewrite $\frac{19}{25}$ as a decimal.

If $h = 5$ and $s = -54$ then what is $7h + 15s - 4s = ?$

$6 \times 6 \times 6 \times 6 \times 6 = 6^x$
What is the value of x ?

$0.2 \cdot 3 =$



Name: _____

Benjamin Banneker - Who Was He?

By Jane Runyon

Have you ever heard of Benjamin Banneker? Do you know what made him special? Many Americans have never heard of this early black American. Yet he was very important in America's colonial period.

Benjamin Banneker was born on November 9, 1731. At that time in history, if a child's mother was a slave, the child was a slave. If the mother was not a slave, the child was a free black. Benjamin's grandmother, Molly, was a white woman.

Molly worked hard. She saved enough money to buy a small farm. She bought a slave named Banna Ka. He helped her work the farm.

Molly fell in love with Banna Ka. They married. To sound more American, Molly and her husband changed their name to Bannaky. Finally, the name changed to Banneker. Molly and her husband had a daughter, Mary. Because Molly was a free woman, Mary was a free black.

Mary married a former slave. They had a son they named Benjamin. The family worked the small farm that Benjamin's grandmother Molly had owned. They didn't have a lot of money, but they were free.

Benjamin didn't get much schooling growing up. Quakers who lived near the family gave him the only formal education he got. Most of what he learned came from his own curiosity and desire. He was a true scientist. He wanted to learn about everything he saw.

At age 21, Benjamin borrowed a pocket watch from one of his neighbors. With great care he took the watch apart piece by piece. He drew pictures of each piece. When the pictures were finished, he put the watch back together perfectly.

Banneker studied his drawings. He took pieces of wood and carved an exact duplicate of each piece. He put the pieces together and created a wooden clock. The clock kept perfect time for over forty years.

He became interested in mathematics and astronomy. He accurately predicted a solar eclipse in 1789.

Benjamin Banneker became well-known in the colonies for his almanacs. He loved charting events, stars, and facts of all kinds. He put all of his collected information into a book called an almanac. He could tell people just exactly what time the sun would rise and set years ahead of time. Many farmers used his almanac to plant their crops. Today, farmers still use a Farmer's Almanac for planting.

Banneker was part of the team that surveyed the land for the new nation's capital, Washington, D.C.

Banneker's intelligence did not make everyone in the colonies happy. Slave traders and slave owners had convinced many colonists that it was a waste of time to educate blacks. They maintained that blacks didn't have the mental ability to learn anything. Benjamin Banneker was an example of how wrong this theory was.

Benjamin Banneker died on October 9, 1806. He fought for the freedom of slaves until his dying day. He wrote to President Thomas Jefferson scolding him. How could he write a constitution stating that all men are created equally? Jefferson still owned slaves. Benjamin Banneker accomplished many things in his lifetime. He would have liked to have seen freedom for his fellow blacks.



Name: _____

Benjamin Banneker - Who Was He?

Questions

- _____ 1. Benjamin Banneker was born to slave parents.
- A. false
 - B. true
- _____ 2. What determined the slave status of a newborn baby in colonial times?
- A. the birth certificate
 - B. the status of the owner
 - C. the slave status of the mother
 - D. the slave status of the father
- _____ 3. What object did Benjamin Banneker carve from wood?
- A. a book
 - B. a clock
 - C. a birdhouse
 - D. a statue
4. Why do you think slave traders and slave owners wanted to keep slaves uneducated?
- _____
- _____
5. How did Benjamin Banneker get most of his education?
- _____
- _____
- _____ 6. What was different about the clock Benjamin Banneker made?
- A. Its parts were made of wood.
 - B. It was digital.
 - C. It is still running today.
 - D. It was larger than usual.
- _____ 7. What type of book did Benjamin Banneker create?
- A. constitutional law
 - B. dictionary
 - C. farmer's almanac
 - D. encyclopedia
- _____ 8. Why did Benjamin Banneker scold Thomas Jefferson?
- A. Jefferson didn't want Banneker to run for Congress.
 - B. Jefferson talked about freedom and equality for all men and still owned slaves.
 - C. Jefferson didn't think Banneker was very smart.
 - D. Jefferson didn't like Banneker's work.

Name: _____

		+		+		+		=		
			B		C		B		?	37
x			B		C		A		C	27
-										
			C		C		B		B	30
=										
			117		12		77		33	

Equations and Hints:

Each letter is a whole number.

Fill in the equations using the chart:

$$B \times B - C = 117 \quad C \times C - \underline{\quad} = 12$$

$$\underline{\quad} + \underline{\quad} + \underline{\quad} + \underline{\quad} = 27 \quad \underline{\quad} + \underline{\quad} + \underline{\quad} + \underline{\quad} = 30$$

$$\underline{\quad} \times \underline{\quad} - \underline{\quad} = 77$$

Additional hints:

$$A > 2 \quad B = A + 3$$

Solve:

$$? = \underline{\quad}$$