

Name _____

1. Estimate the solution.

The average thickness of the ice cap over the South Pole is the nine times the height of the Eiffel Tower. The Eiffel Tower is 1,052 feet tall. About how thick is the ice cap?

2. Which expression matches the words?

three times the square of a number (n)

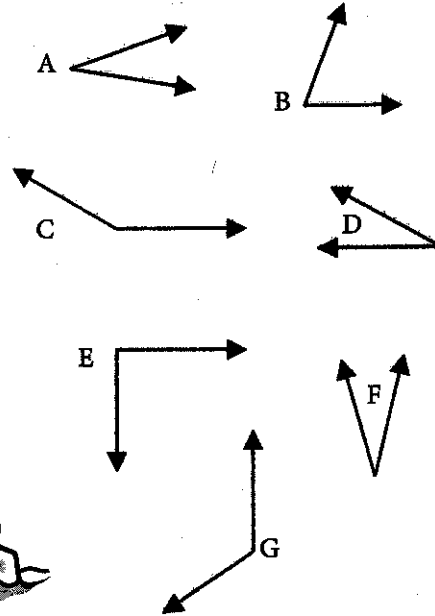
- a. $3n^2$ b. n^3 c. $3 + n^2$ d. $3^2 + n$

3. Compute:

$$\begin{array}{r} 17,963 \\ - 1,298 \\ \hline \end{array}$$

4. The name of each month is written once on a slip of paper and put into a bag. Without looking, you choose one slip. What are the possible outcomes?

5. Which angles are $< 90^\circ$?



Name _____

1. What is the value of the digit 6 in the number?

33,602,541

2. How many **terms** are in this expression?

$$34 + 2x - x$$



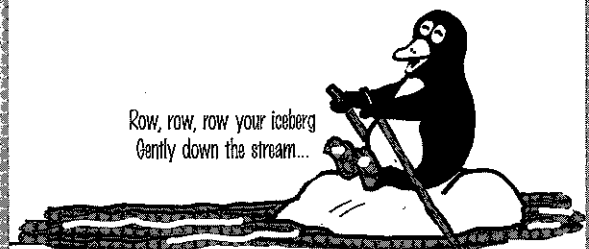
3. Compute: **$5.2 \times 0.3 =$**

4. Which of these is the best unit for measuring the height of an iceberg?

- inches square centimeters
 meters kilometers
 millimeters square kilometers

5. What operations are needed to solve this problem?

Some 20 to 30 million tons of ice break off the Jakobshavn Glacier in Greenland every day, forming icebergs. Approximately how many pounds of icebergs break off from the glacier in an hour?



Name _____

1. In the year 2000, a huge iceberg broke off the Ross Ice Shelf in Antarctica. Possibly the largest iceberg ever, it measured 783 miles long and 23 miles wide. What was the area of its top surface?

5. About what percent of Earth's surface is covered with water?

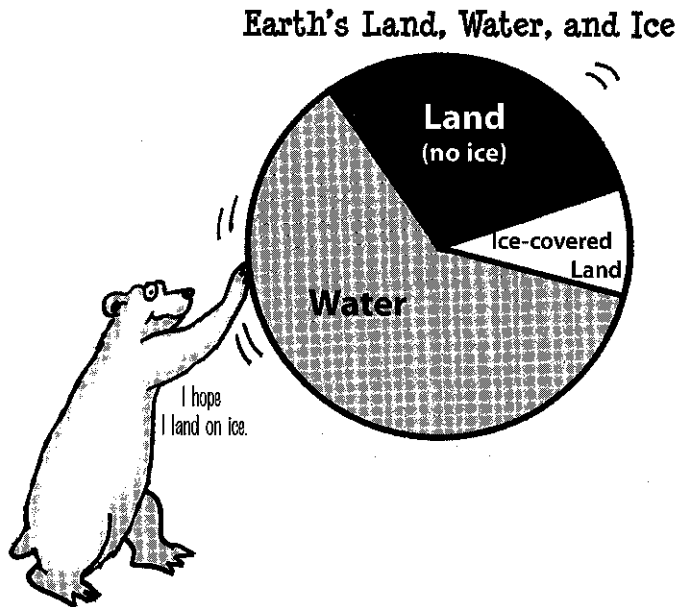
2. Name this figure.



3. What is the **variable** in this expression?

$$300 - 25b + b$$

4. Compute: $-5 \times 12 =$



Name _____

1. What is the value of **n**?

$$400n = 0$$

2. Compute: $\frac{1}{2} \times \frac{2}{3} =$

3. Wes and Leslie create an ice rink by spraying water on an area that is 28 feet by 21 feet. The ice is 6 inches thick. Estimate the volume of the ice in their rink.



4. Round **37,406** to the nearest ten.

5. Louisa is monitoring the melting of ten different glaciers. She has compiled data about the number of feet each of the glaciers has receded each month for the past six months. Now, she's ready to find out which glaciers had the most and the least melting.

Which strategy is best to help solve this problem?

- Draw a diagram.
- Use trial and error.
- Create a table.
- Translate the problem into an equation.

Name _____

1. Compute:

$$-\frac{2}{8} + \frac{1}{4} + \frac{1}{3} =$$

3. In the following equation, what is the **coefficient** of the variable?

$$5 + 100n - 15 = 390$$

2. Which demonstrates the **commutative property for multiplication**?

- a. $3(a + b) = 3a + 3b$
- b. $25 + 6 = 6 + 25$
- c. $8 \times (4 \times 7) = (8 \times 4) \times 7$
- d. $35 \times 12 = 12 \times 35$

4. What is the **mean** of this set of data?

23 ft	8 ft	7 ft
12 ft	3 ft	8 ft
16 ft	11 ft	20 ft

5. Challenge Problem

Tyson wants to paddle his kayak around the outside edge of each iceberg to see all sides. He can paddle about 12 miles an hour. Estimate the amount of time it will take him to get around each iceberg.

A. The part of this glacier above water is almost a perfect **cube**.

B. The part of this glacier above water is **cone-shaped**.

C. The part of this glacier above water is shaped like a **rectangular prism**.

