

Second Grade:  
Benchmark 4

*Parent Handbook*



*This handbook will help your child review material learned this quarter, and will help them prepare for their fourth and final Benchmark Test. Please allow your child to work independently through the material, and then you can check their work using the answer key in the back of the handbook. If you have any questions or concerns about this material, please contact your child's teacher.*

*Thank you for your support!*

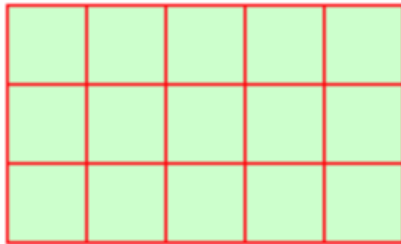
# Second Grade Essential Math Standards

*Learning Objective # 1:*

**2.M.OA.C.04 The Highly Proficient student can arrange objects into equal rows and columns, and write a multiplication equation using the information created with the array.**

*Practice:*

1. What is the total area of the shape below?



- a. 12 units<sup>2</sup>
- b. 10 units<sup>2</sup>
- c. 15 units<sup>2</sup>
- d. 20 units<sup>2</sup>

2. Explain **why** you think your answer is correct on the lines below:

---

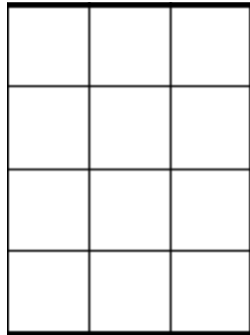
---

---

---

---

3. What is the total area of the shape below?

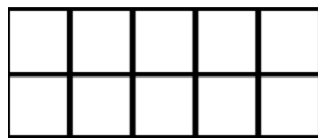


- a. 12 units<sup>2</sup>
- b. 10 units<sup>2</sup>
- c. 15 units<sup>2</sup>
- d. 20 units<sup>2</sup>

4. Draw an array that matches the following number sentence.

$$4 + 4 + 4$$

5. What number sentence matches this array?



- a.  $2 + 2 + 2$
- b.  $6 + 6 + 6 + 6$
- c.  $4 + 4 + 4$
- d.  $5 + 5$

*Learning Objective # 2:*



**2.M.OA.A.01 The Highly Proficient student can create a word problem and solve it by creating an equation; then explain the steps used throughout the process.**

*Practice:*

6. Which equation represents this word problem?

Terri is having a party at her house. She started the party with 50 cans of soda. At the end of the party there were 17 cans left. How many cans were used during the party?

a.  $\star + 17 = 50$

b.  $50 + \star = 17$

c.  $50 - \star = 17$

d.  $50 + 17 = \star$

7. Solve the following word problem.

Mrs. Leach's class collected 46 cans for the food drive. Mrs. West's class collected 32 more cans than Mrs. Leach's class. How many cans did Mrs. West's class collect?

a. 14 cans

b. 78 cans

c. 67 cans

d. 33 cans

8. Solve the following word problem.

There are 23 students in Mr. Smith's class. Mr Smith asked the class what their favorite flavor of ice cream was. 7 responded with chocolate, 8 responded with strawberry, and the remaining classmates responded with vanilla. How many students preferred vanilla?

- a. 5
- b. 8
- c. 9
- d. 7

9. 87 second graders are on a field trip to the pumpkin patch. The pumpkin patch is 54 miles from the school. They have traveled 26 miles so far. How many more miles do they have to go?

Write an equation to represent the following problem. Use a symbol for the unknown number. Solve the problem.

$$\underline{\hspace{2cm}} - \underline{\hspace{1cm}} = \underline{\hspace{2cm}}$$

**Learning Objective # 3:**



*2.M.G.A.02 The Highly Proficient student can create four different figures with an area of 24 and recognize that multiplication can be used to find area (area = length x width).*

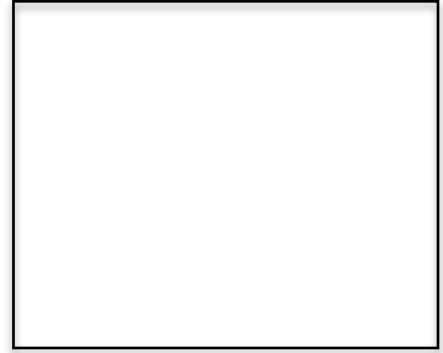
**Practice:**

10. How many same sized squares are on this geoboard?



11. Partition the rectangle into three rows and three columns. How many same size squares do you have?

- a. 6
- b. 9
- c. 12
- d. 3



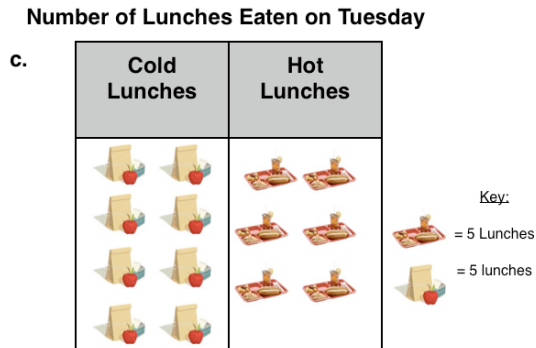
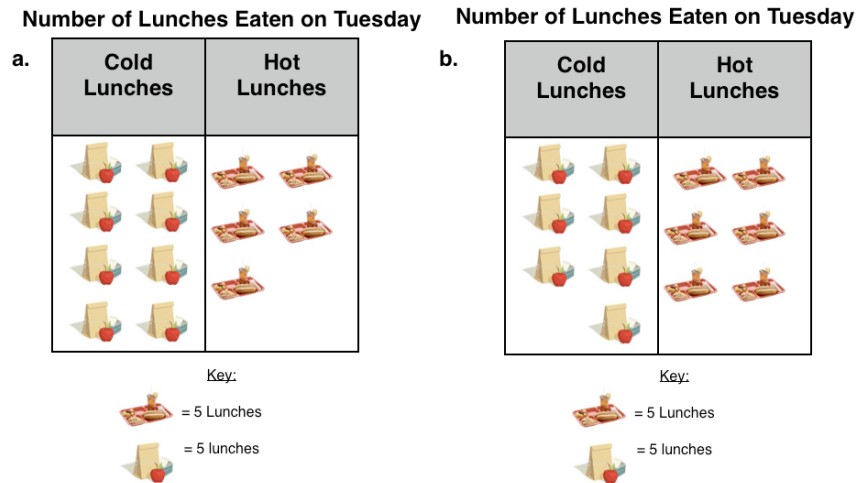
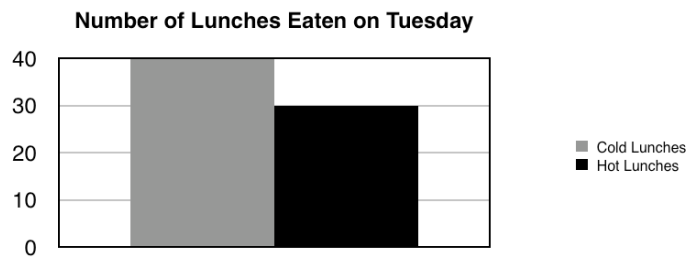
## Learning Objective #4



2.M.MD.D.10 The Highly Proficient student can create a survey to collect data, record, organize, and display the data using different types of graphs. They can also create word problems with solutions for each of their graphs. (Vail/BT expectation use tally charts and create and answer questions)


### Practice:

12. Which of the data tables below matches the bar graph?

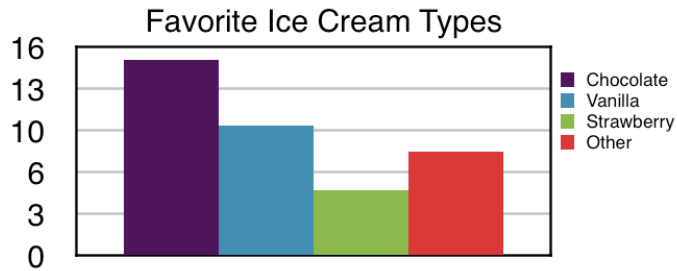


13. Which bar graph represents the data below?

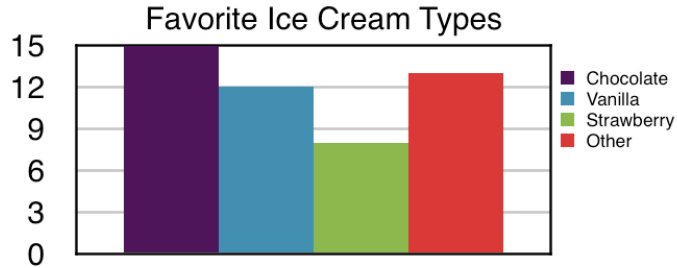
*2nd Grade's Favorite Types of Ice Cream*

Chocolate	Vanilla	Strawberry	Other
			

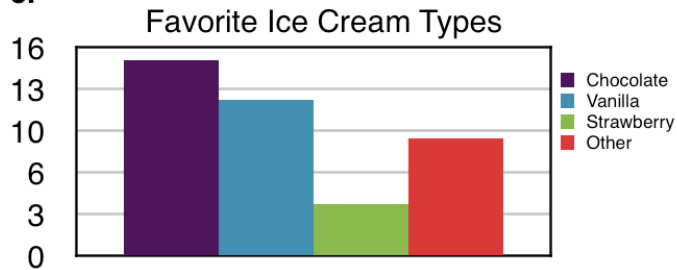
a.



b.



c.





## Benchmark 4 Essential Math Vocabulary

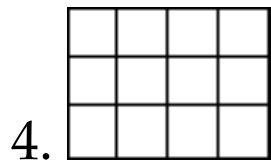
- \* **area** - measures the inside space in square units.
- \* **rows** - an arrangement of figures, side by side in a horizontal line.
- \* **columns** - an arrangement of figures, one above the other.
- \* **square unit** - the unit used for measuring area.
- \* **data**- information gathered from an experiment or survey
- \* **graph**- a diagram that represents data gathered from an experiment or survey.
- \* **tally marks**- a way of keeping track of numbers in groups of 5.
- \* **equation or number sentence** - a mathematical statement using an equal sign.
- \* **word problem** - also known as a story problem that requires math operations or equations to solve.
- \* **array** - an orderly arrangement, often in rows or columns.

## Math Answer Key

1. C

2. *Answers will vary.*

3. A



5. D

6. C

7. B

8. B

9.  $54 - 26 = X$        $X = 28$

10. 12

11. B

12. C

13. C

# Second Grade Essential Reading Standards

## *Learning Objective # 1:*

**2.R.RI.02 The Highly Proficient student can identify and summarize the main idea and supporting details of each paragraph within a multi-paragraph text.**

## *Practice:*

*Read the story below and answer the questions that follow:*

Cheetahs are large, spotted cats that live in Africa's grasslands. They are the fastest of all the land animals. Their speeds can top 70 miles per hour. Although they are fast, cheetahs can not maintain that speed for more than 100 yards at a time. The name cheetah comes from an Indian word meaning "spotted one".

1. What is the main idea of the passage above?
  - a. The name cheetah means "spotted one."
  - b. Cheetahs are large cats that live in Africa.
  - c. Cheetahs can run 70 miles per hour.
  - d. Cheetahs are spotted.
  
2. What did you learn from the passage?
  - a. Cheetahs live in the United States.
  - b. Cheetahs are not very fast animals.
  - c. Cheetahs can run at top speed for many miles.
  - d. Cheetahs are the fastest of all land animals.

*Learning Objective # 2:*

**2.R.RL.05 The Highly Proficient student can create their own literary tale using the basic structure of a story.**

*Practice:*

*Read the story below, then answer the questions that follow:*

Libby stood on a chair to watch her brother Max make cookies. He mixed sugar and butter. He added eggs and salt. He stirred in three cups of flour and three cups of chocolate chips. Then he spooned batter onto the pan. Finally, he baked the cookies in the oven for ten minutes. Libby and Max enjoyed their fresh baked cookies together!

3. What did Max do after he added the butter?
  - a. He added chocolate chips.
  - b. He spooned batter into the pan.
  - c. He added the flour.
  - d. He added eggs.
  
4. What is the first step Max did to make his cookies?
  - a. He stood on a chair.
  - b. He mixed sugar and butter.
  - c. He spooned batter onto the pan.
  - d. He added eggs and salt.
  
5. In what part of the story did Libby stand on a chair?
  - a. the end
  - b. the beginning
  - c. the middle

### *Learning Objective # 3:*



*2.R.RL.03 The Highly Proficient student can use a Venn Diagram to compare and contrast the response to major events or challenges of one character to the response of another character.*

## **The Closet Creature**

by Kelly Hashway

Bump! Bump! Scratch!

Adam opened his eyes and pulled the covers up to his chin. He stared around his room, searching the darkness for the thing that was making those scary sounds.

The closet door moved as something banged on it from the inside.

“Who’s there?” Adam asked in a shaky voice.

The closet slowly began to open. Adam jumped out of bed and ran to the closet door, slamming it shut with his palms. He grabbed his desk chair and propped it against the door handle. Then he ran out of his room and down the hall. His brother’s door was wide open, and Adam jumped onto David’s bed.

“Adam?” David asked in a groggy voice. “What are you doing in here?”

Adam tugged on David’s arm. “There’s something in my closet!” “You probably had a bad dream. Go back to bed.” Adam yanked the blankets off the bed. “It wasn’t a dream. I was awake, and the closet door started opening by itself!”

David sighed. “Fine. But when we don’t find anything, you have to promise to leave me. Adam nodded. David reached into his desk drawer and pulled out a flashlight. Then they headed to Adam’s room. Adam stopped in the doorway. He could hear something scratching his closet door. “Do you hear that?” Adam asked.

David nodded. He walked over to Adam’s bed and pulled the case off one of the pillows. He opened the pillowcase. “You open the door very slowly, and I’ll grab whatever it is.”

Adam slid the chair to the side and pulled the closet door open a crack. Something banged against the door, trying to force it open. Adam took a deep breath and opened the door a few more inches. A small furry creature ran right into the pillowcase.

“I got it!” David said, closing the pillowcase and holding it in the air.

“What is it?” Adam moved closer as David peeked inside.

David put the pillowcase on the bed and an orange cat climbed out. Adam scooped the cat up. "Apricot? How did you get trapped in my closet?" David laughed. "The poor cat. If I was locked in your closet with your stinky shoes, I'd be banging on the door to get out, too!" "Poor, Apricot," Adam said. "You were probably more scared than I was."

6. What was the major problem Adam was having in the story?
  - a. Adam's brother was sleeping.
  - b. Adam had stinky shoes.
  - c. Adam heard sounds coming from his closet and the door was moving.
  
7. How does Adam first react to the problem?
  - a. He jumps in his brother's bed.
  - b. He slams the closet door shut.
  - c. Adam stands in the doorway of his room.
  
8. What actions did Adam's brother take in solving the problem?
  - a. He took Adam's pillowcase and used it to catch the creature.
  - b. He told Adam it was a dream and to go back to bed.
  - c. He nodded at Adam that he could hear the scratching noise.
  
9. What word would best describe Adam's feelings when he realized it was his pet cat Apricot?
  - a. upset
  - b. scared
  - c. relieved
  - d. sad
  
10. At the end of the story Adam says to Apricot " You were probably more scared than I was". How did Adam act that would suggest he was scared too?
  - a. Adam stared around his room.
  - b. Adam ran out of his room and down the hall.
  - c. David grabbed a flashlight from his drawer.

## ***Learning Objective # 4:***



**2.R.RI.09** The Highly Proficient student can compare and contrast the same topic using several different texts and summarize their findings in their own words using evidence from their sources.

**Practice:** Read the following passages about two types of reptiles. Use the Venn diagram on the following page to compare and contrast.

### **Alligators**

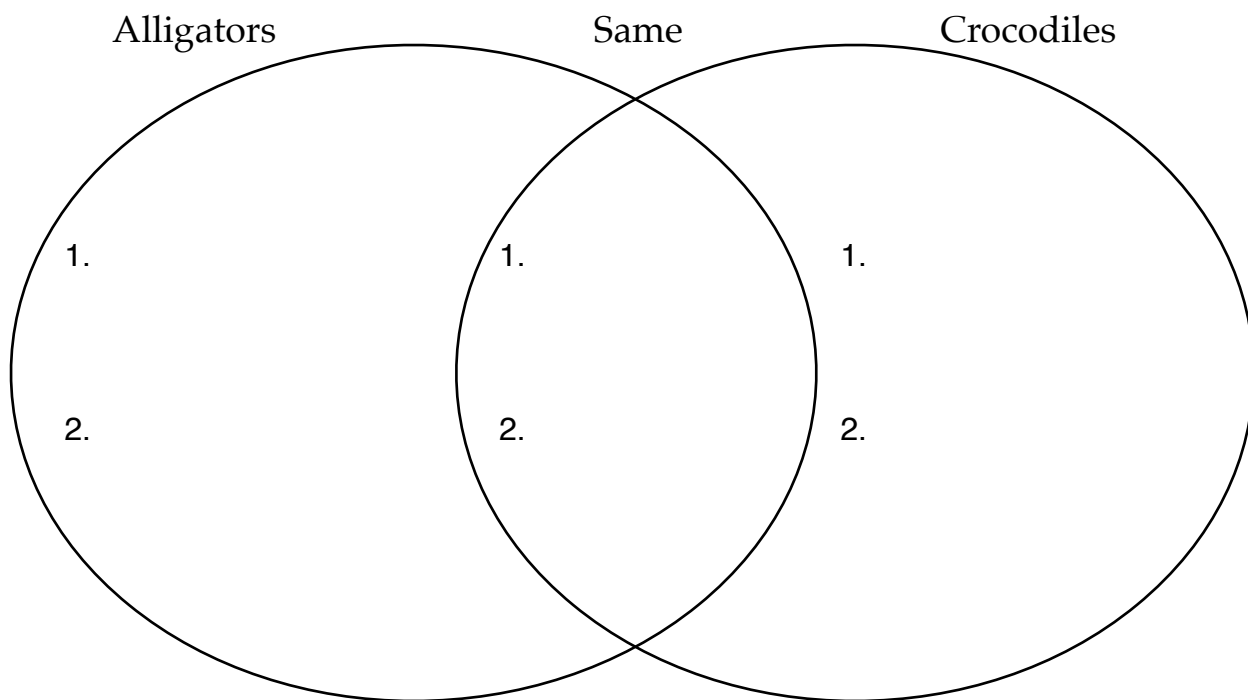
There are two types of alligators. The American alligator that can grow in length to almost 12 feet and the Chinese alligator which can grow to almost 5 feet. Alligators have a wide, rounded snout and are typically darker in color than crocodiles. What is fascinating about both these reptiles is they have excellent hearing. The slits on their heads close up when they dive in the water. When an alligator closes its mouth just the upper teeth are seen. You can find alligators spending their time mostly in freshwater areas such as swamps, ponds and rivers. They do not have the salt-secreting glands found on crocodiles, but can tolerate low levels of saltwater for a short period of time. Alligators living in the wild are only found in the United States and China. In 1987, Florida officially declared the alligator as their state reptile.

### **Crocodiles**

If you are wondering where crocodiles live you will find them in many places around the world such as Africa, Asia, Australia and America. There are thirteen species of crocodiles. One unique feature about the crocodile is they have salt glands on their tongues which allows them to live in saltwater habitats. Crocodiles have a longer more V shaped jaw. The fourth tooth on each side of their lower jaw can be seen even when they close their mouths. Like alligators, crocodiles are carnivores and eat whatever they can catch in the water or nearby. These tough skinned reptiles tend to be lighter in color for crocodiles. The world's most endangered species of crocodiles is the Cuban crocodile.

Resources used: <http://www.livescience.com/28306-crocodiles.html>, <http://www.sciencekids.co.nz/sciencefacts/animals/crocodilealligatordifferences.html>

11.



12. Which of the following statements is **true**?

- a. Alligators can tolerate saltwater for long periods of time.
- b. Both alligators and crocodiles have salt glands located on their tongues.
- c. Only crocodiles have salt glands which allow them to live in saltwater habitats.

13. Which of the following statements represents something similar for alligators and crocodiles?

- a. Both alligators and crocodiles live only in the United States and China.
- b. These reptiles have excellent hearing.
- c. Both alligators and crocodiles are the official state reptile for Florida.



## Benchmark 4 Essential Reading Vocabulary

- \* **story structure**: how a story is put together. It is made up of the beginning, middle and end.
- \* **characters**: the people, animals, or things in a story
- \* **plot**: the events in a story
- \* **setting**: where a story takes place
- \* **main idea**: what a story or passage is mostly about
- \* **details**: statements that support the main idea
- \* **facts**: are true statements that can be proved or found in the story or text
- \* **sequencing**: putting the events of a story in order
- \* **compare and contrast**: find similarities and differences
- \* **story event**: something important that happens in a story
- \* **challenge**: a difficult task or problem

## Reading Answer Key

1. B

2. D

3. D

4. B

5. B

6. C

7. B

8. A

9. C

10. B

11. Alligators: 2 types, wide rounded snout, darker in color,

Florida's state reptile, found only in US and China

Crocodiles: 13 species, salt glands, longer more V shaped jaw,  
can be found in many places around the world, 4th  
tooth can be seen.

Same: carnivores, tough skin, reptiles, excellent hearing

12. B

13. B