

MMLA Mathematics Assessment Items

Name: _____

Date: _____

Multiple Choice Questions

Select the one best answer for each question.

1. Mrs. Enyart said that she was born in the year one thousand, nine hundred forty-two. In what year was she born? (MEAP)
 - A. 1429
 - B. 1492
 - C. 1924
 - D. 1942

2. Which correctly completes the number sentence? (MEAP)
 $53,277 < \underline{\hspace{2cm}}$
 - A. 49,999
 - B. 50,400
 - C. 52,388
 - D. 61,003

3. The number of people living in Mycount, MI is nine thousand, five hundred thirty six. Which number is this?
 - A. 9536
 - B. 95036
 - C. 9000536

4. Which number is fifty-two thousand, three hundred nine?
 - A. 5,239
 - B. 52,039

C. 52,309

5. Which of the following is 60,189 in written form?

A. sixty thousand, one hundred eighty-nine

B. six thousand, one hundred eighty-nine

C. six hundred eighty nine

6. What is the digit in the ten-thousands place of the number 68,173 ?

A. 1

B. 6

C. 8

7. Which number is fifty-two thousand, three hundred nine?

A. 5,239

B. 52,039

C. 52,309

8. What is the place value of the 8 in the number 5,280? (MEAP)

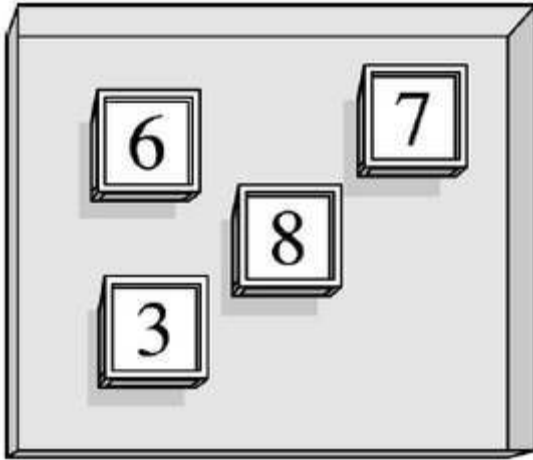
A. ones

B. tens

C. hundreds

D. thousands

9. What is the *least* number you could make using all the numbers on these blocks? (MEAP)



- A. three thousand, six hundred seventy-eight
- B. three thousand, eight hundred seventy-six
- C. six thousand, three hundred seventy-eight
- D. six thousand, eight hundred seventy-three

10. Which number is equal to 5,912? (MEAP)

- A. 5 hundreds, 9 tens, and 12 ones
- B. 5 thousands, 91 hundreds, and 2 ones
- C. 5 thousands, 9 hundreds, and 12 tens
- D. 5 thousands, 9 hundreds, 1 ten, and 2 ones

11. The number 9,036 is equal to which of the following?

- A. $900 + 30 + 6$
- B. $90 + 30 + 6$
- C. $9000 + 30 + 6$

12. Look at the number 68,173. What is the digit in the ten-thousands place?

- A. 6

B. 7

C. 8

13. Which number means 7 thousands, 4 tens and 5 ones?

A. 745

B. 7,045

C. 7,450

14. What number comes next in this pattern 41, 43, 45, 47, ___?

A. 48

B. 49

C. 50

15. Which of these numbers is a multiple of 2?

A. 21

B. 18

C. 15

16. Which of these numbers is even?

A. 3,456

B. 6,445

C. 3,597

17. Odd numbers end in _____

A. 1, 3, 5, 7 or 9

B. 0, 2, 4, 6 or 8

C. 0, 1, 2, 3 or 4

18. Which number can be shared in two equal groups with no remainder?

A. 85

B. 490

C. 223

19. Martina has a new box of 64 crayons. She drops the box and 17 crayons are broken.

How many crayons are **NOT** broken? (MEAP)

A. 47 crayons

B. 57 crayons

C. 53 crayons

D. 81 crayons

20. There are 31 desks in Mrs. Smith's classroom and 29 desks in Mrs. Jones's classroom. How many desks in all are in both rooms? (MEAP)

A. 70 desks

B. 60 desks

C. 58 desks

D. 50 desks

21. Alonzo takes 88 steps from his house to Sherry's house. He takes 27 more steps to walk from Sherry's house to the store. How many steps does it take Alonzo to walk from his house to Sherry's house to the store? (MEAP)

A. 61

B. 105

C. 113

D. 115

22. Pete had 89 cards and Alonzo had 57. How many cards did they have altogether?

A. 136

B. 139

C. 146

23. How much is $38 + 42$?

A. 80

B. 81

C. 710

24. How much is $2,470 + 1,423$? Show your work.

A. 1,053

B. 3,763

C. 3,893

25. $82 - 65 =$

A. 17

B. 23

C. 27

26. How much is $8,965 - 3,525$? Show your work.

A. 5,440

B. 5,480

C. 6,440

27. Ridgewood Elementary School had an election for student body president. Greg received 221 votes. Ellen received 109 votes. Which of the following is *closest* to the difference in the number of votes received? (MEAP)
- A. 100
 - B. 200
 - C. 300
 - D. 400
28. John had 307 T-shirts for sale. He sold 194 T-shirts. Which of the following is *closest* to the number of shirts that John has left? (MEAP)
- A. 100
 - B. 200
 - C. 300
 - D. 500
29. The lunchroom serves only hamburgers and pizza on Mondays. Last Monday, 314 students bought a lunch. There were 97 students who bought hamburgers. Which of the following is *closest* to the number of students who bought pizza? (MEAP)
- A. 100 students
 - B. 200 students
 - C. 300 students
 - D. 400 students
30. Use estimation to find the problem that has an answer of about 300.
- A. $1,010 - 695$
 - B. $851 - 652$
 - C. $906 - 651$

31. Sue has 617 pennies. Her Mom gives her 298 more pennies. About how many pennies does Sue have now?
- A. 1,000
 - B. 900
 - C. 750
32. The best estimate of the sum of 389 and 403 is:
- A. 600
 - B. 700
 - C. 800
 - D. 900
33. Which of these equations is NOT a member of the fact family 6, 4, 24?
- A. $4 \times 6 = 24$
 - B. $24 - 6 = 4$
 - C. $24 \div 4 = 6$
 - D. $24 = 6 \times 4$
34. Which division statement is related to 6×4 ?
- A. $24 \div 4$
 - B. $64 \div 4$
 - C. $10 \div 6$
 - D. $24 \div 3$
35. Complete the following fact family. (MEAP)

$$36 \div 3 = 12$$

$$36 \div 12 = 3$$

$$3 \times 12 = 36$$

$$12 \times 3 = \underline{\quad}$$

- A. 15
- B. 24
- C. 33
- D. 36

36. Complete the following fact family. (MEAP)

$$6 \times 4 = 24$$

$$4 \times 6 = 24$$

$$24 \div 6 = 4$$

$$\underline{\quad} \div 4 = 6$$

- A. 4
- B. 6
- C. 12
- D. 24

37. Complete the following fact family. (MEAP)

$$4 \times 7 = 28$$

$$7 \times 4 = 28$$

$$28 \div 4 = 7$$

$$\underline{\quad} \div 7 = 4$$

- A. 35
- B. 32
- C. 28
- D. 24

38. Which of the following equations would complete this fact family? (MEAP)

$8 \times 2 = 16$
$2 \times 8 = 16$
$16 \div 8 = 2$

- A. $8 - 2 = 16$
- B. $8 \times 16 = 2$
- C. $16 \times 2 = 8$
- D. $16 \div 2 = 8$

39. The division $354 \div 6$ can be used to solve which of the following problems?

- A. How many school children there will be if 6 new students enroll at a school with 354 students?
- B. How many school children will there be in a school if 6 students move away from a school with 354 students?
- C. How many tables for 6 are needed to sit 354 people?
- D. How many celery plants are planted in 6 rows if each row has 354 plants?

40. A third grade sports club raised money to buy t-shirts. There were 10 students on the team. Each student raised 4 dollars.

Which of the following could be used to find out how much money the students raised all together?

- A. $10 + 4$

B. $10 - 4$

C. 10×4

D. $10 \div 4$

41. There are 36 pieces of gum in a bag. Mom empties the bag by giving 6 pieces to each of her children. How many children does she have?
- A. $36 \div 6 = 6$ children
- B. $36 + 6 = 42$ children
- C. $36 \div 9 = 4$ children
- D. $36 - 30 = 6$ children
42. A classroom has 5 rows of desks with 5 desks in each row. Which number sentence shows how to figure this out?
- A. $5 + 5 = 10$ desks
- B. $5 \times 5 = 25$ desks
- C. $2 \times 5 = 10$ desks
- D. $5 \div 5 = 25$ desks
43. Which of the following is a true statement? (MEAP)
- A. $8 \times 2 = 4 \times 4$
- B. $1 \times 1 = 1 + 1$
- C. $10 \times 3 = 10 + 10$
- D. $6 \times 6 = 5 \times 5 + 1$
44. There are 8 socks in Viv's drawer. How many pairs are there? (MEAP)
- A. 2
- B. 3

C. 4

D. 16

45. Which of the following is true? (MEAP)

A. $6 \times 3 = 4 \times 4$

B. $20 - 5 = 19 - 3$

C. $9 + 8 = 10 + 7$

D. $2 \times 3 = 2 + 3$

46. How much is 6×8 ?

A. 48

B. 56

C. 84

47. Find the product of 5 and 8 (what is 5×8 ?)

A. 13

B. 30

C. 40

48. Which multiplication fact can be used to find the answer to $56 \div 7$?

A. 7×5

B. 7×8

C. 56×7

49. Solve without a calculator: $4 \times 6 =$

A. 10

B. 20

C. 24

D. 46

50. Solve without a calculator: $2 \times 9 =$

A. 11

B. 16

C. 18

D. 29

51. Solve without a calculator: $8 \times 5 =$

A. 13

B. 35

C. 40

D. 85

52. Solve without a calculator: $32 \div 4 =$

A. 6

B. 8

C. 16

D. 28

53. Solve without a calculator: $72 \div 9 =$

A. 8

B. 9

C. 12

D. 63

54. Solve without a calculator: $18 \div 2 =$

A. 6

B. 8

C. 9

D. 16

55. How many cookies are in 5 boxes if each box has 9 cookies?

A. 14

B. 18

C. 40

D. 45

56. Susie wants to share 30 candies among 6 friends. How many candies will each friend get?

A. 8

B. 7

C. 6

D. 5

57. The word problem is part of Ben's homework.

Cathy bought 25 packages of balloons. Each package has 4 balloons. How many balloons did she buy in all?

Which of the following number sentences can Ben use to solve this problem?

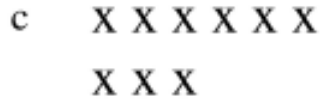
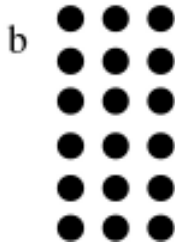
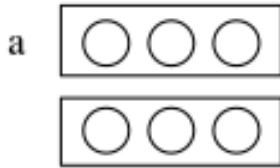
A. $25 \times 4 = \underline{\quad}$

B. $25 + 4 = \underline{\quad}$

C. $25 - 4 = \underline{\quad}$

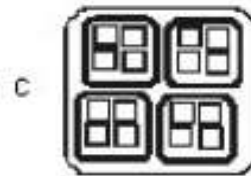
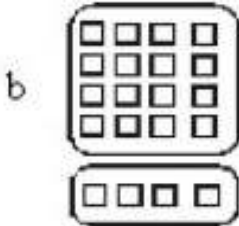
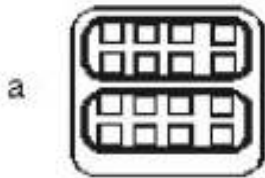
D. $25 \div 4 = \underline{\quad}$

58. Which picture shows the product of 6 and 3?



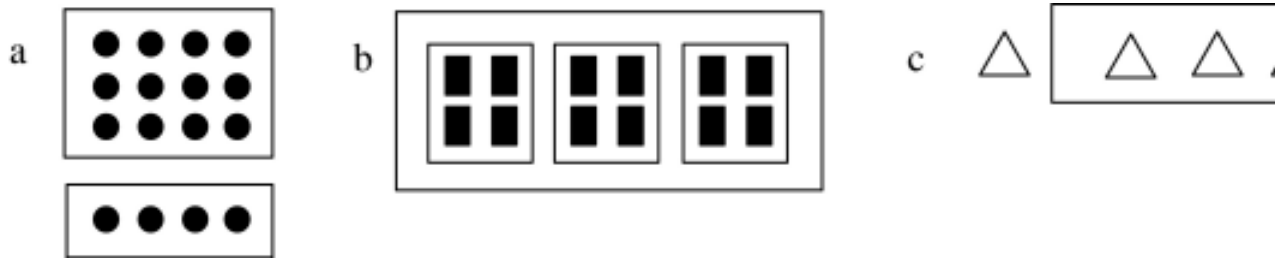
- A. a
- B. b
- C. c

59. Which picture could be used to find $16 \div 4$?



- A. a
- B. b
- C. c
- D. d

60. Which picture represents the equation $12 \div 3 = 4$



- A. a
B. b
C. c

61. A teacher marks 10 of her students' tests every half hour. It takes her one and one half hours to mark all her students' tests. How many students are in her class?

- A. 5
B. 15
C. 20
D. 30

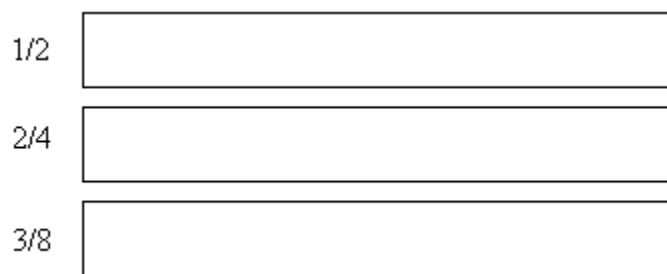
62. What fraction is shown by this strip?



- A. $\frac{3}{4}$
B. $\frac{3}{6}$
C. $\frac{3}{7}$

63. Which of these two fractions are equivalent? Draw fraction strips to help you figure this out.

$$\frac{1}{2} \quad \frac{2}{4} \quad \frac{3}{8}$$

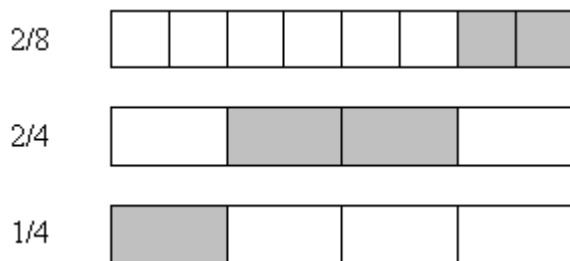


A. $\frac{1}{2} = \frac{2}{4}$

B. $\frac{1}{2} = \frac{3}{8}$

C. $\frac{2}{4} = \frac{3}{8}$

64. Which two of these fractions are equivalent?

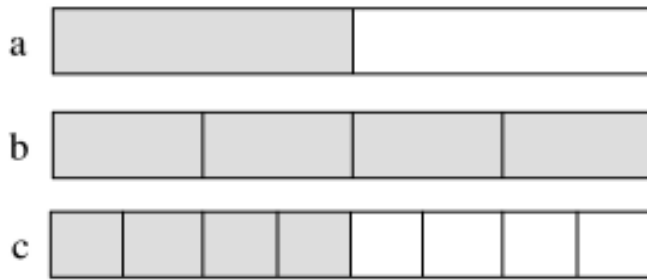


A. $\frac{2}{8} = \frac{2}{4}$

B. $\frac{2}{8} = \frac{1}{4}$

C. $\frac{2}{4} = \frac{1}{4}$

65. Which two of these fractions are equivalent?

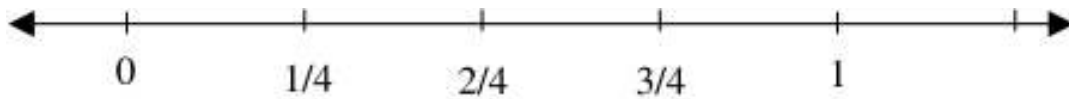


- A. a and b
- B. b and c
- C. a and c

66. What is another way to represent the fraction $5/8$?

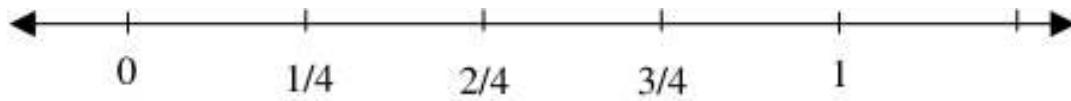
- A. $\frac{3}{5} + \frac{2}{3}$
- B. $\frac{1}{8} + \frac{1}{8} + \frac{1}{8} + \frac{1}{8} + \frac{1}{8}$
- C. $\frac{8}{5}$

67. Using this number line and another identical number line cut out of paper, find $1/4 + 2/4$.



- A. $\frac{1}{2}$
- B. 1
- C. $\frac{3}{4}$

68. Using this number line and another identical number line cut out of paper, find $3/4 - 2/4$



A. $\frac{1}{4}$

B. $\frac{1}{2}$

C. 0

69. Theo has a stack of quarters that equal \$1.50. How many quarters does Theo have?

A. 6 quarters

B. 15 quarters

C. 20 quarters

70. How many half dollars are there in \$4.50?

A. 9 half dollars

B. 18 half dollars

C. 10 half dollars

71. Ben, Susan, Alex, and Tonya each received $\frac{1}{4}$ of a dollar. How much is that?

A. \$25

B. \$.025

C. \$0.25

D. \$2.5

72. A soft drink costs \$0.50. How many quarters would you need to buy it? (MEAP)

A. 1

- B. 2
- C. 3
- D. 4

73. Eva has \$4.00 to spend on apples. Each apple costs \$0.50. How many apples can Eva buy?

- A. 2
- B. 4
- C. 6
- D. 8

74. Michelle has a string which is 3 feet and 6 inches long and John has a string which is two feet and eight inches long. How much longer is Michelle's string?

- A. 2 inches
- B. 10 inches
- C. 1 foot and 2 inches
- D. 1 foot and 10 inches

75. Using your centimeter ruler, measure the following line to the nearest half centimeter.



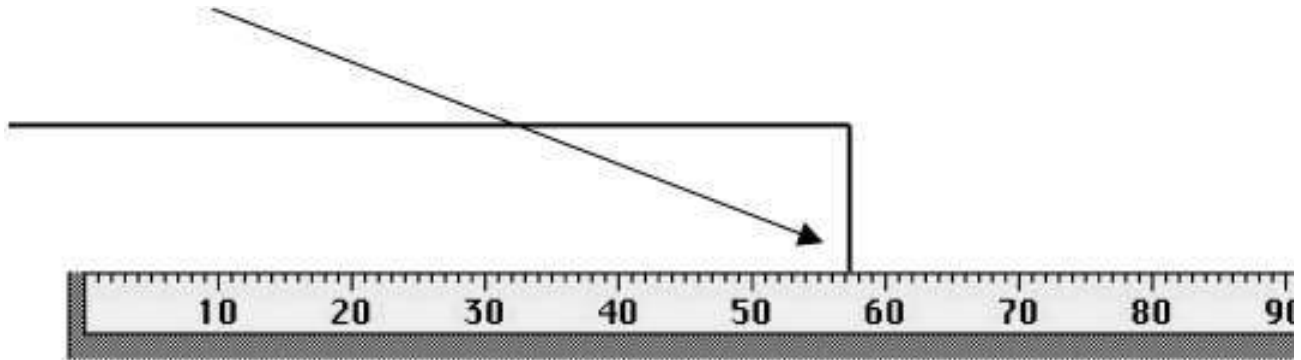
- A. 6 1/2 cm.
- B. 7 cm.
- C. 7 1/2 cm.
- D. 8 cm.

76. Mike began his bike ride at 2:40 p.m. and finished the ride at 3:20 p.m. How many minutes did Mike ride?

- A. 20 minutes

- B. 40 minutes
- C. 60 minutes

77. Beth was using meter sticks to measure a long table in her classroom. She put the meter sticks end to end. The third meter stick went over the edge of the table like this. How long was her table?



- A. 3 Meters
 - B. 58 Centimeters
 - C. 58 Meters
 - D. 2 Meters 58 Centimeters
78. Mary has a piano recital on May 25. Today is April 28. How long must she wait before the recital day?

APRIL						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30				

MAY						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30	31	

- A. 3 weeks 2 days
- B. 3 weeks 6 days
- C. 4 weeks 2 days

79. Joey is meeting Tom at the movie at 1:45. The clock below shows what time it is now. How much time does Joey have to wait before he meets Tom?



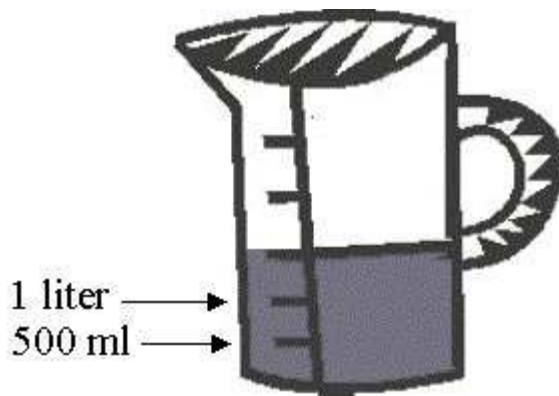
- A. 4 hours 45 minutes
- B. 5 hours 20 minutes
- C. 7 hours 20 minutes

80. What is the date two weeks after June 8?

JUNE						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

- A. June 10
- B. June 15
- C. June 22

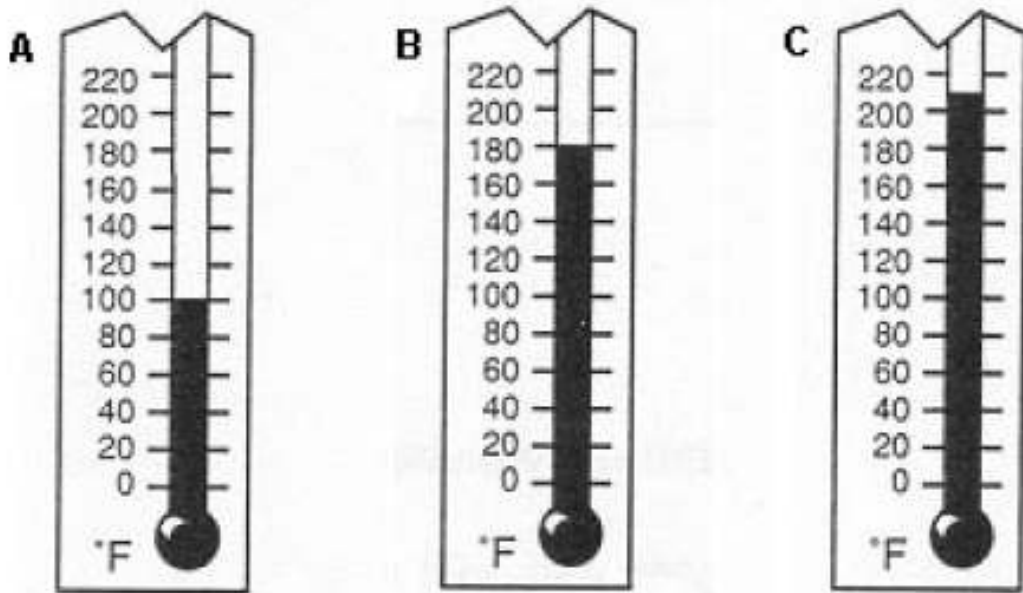
81. How much grape juice is in this pitcher? Each mark is 500 milliliters (ml).



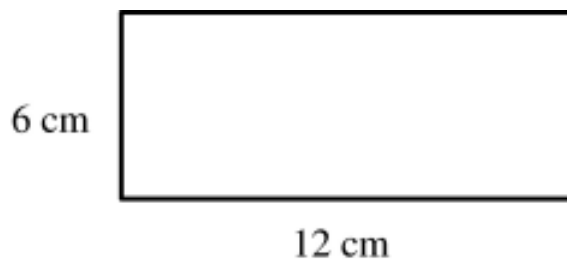
- A. 500 ml
 - B. 1 liter
 - C. 1 liter and 500 ml
 - D. 2 liters
82. Kim's little sister just turned 2 years old today. How many months old is her little sister?
- A. 2 months
 - B. 12 months
 - C. 24 months

- 83.** Eric's desk measures 27 inches. How many feet and inches is that?
- A. 1 foot 3 inches
 - B. 2 feet 3 inches
 - C. 2 feet 7 inches
- 84.** It took Lily 35 hours to drive from Michigan to Texas. How many days and hours did she drive?
- A. 1 day and 11 hours
 - B. 1 day and 19 hours
 - C. 3 days and 5 hours
- 85.** Brad can long jump 1 meter 9 centimeters. How many centimeters is that?
- A. 19 centimeters
 - B. 109 centimeters
 - C. 1,009 centimeters
- 86.** Which temperature is hotter than the boiling point of water?
- A. 58°C
 - B. 98°C
 - C. 107°C
- 87.** Chris just put his liquid grape juice in the freezer to make Popsicles. At what temperature will the Popsicles start to freeze?
- A. 32°F
 - B. 0°F
 - C. -32°F

88. Brandon and Ashley are building a snowman on their day off of school. Which is the best estimate of the outdoor temperature?
- A. 20°C
 - B. 35°C
 - C. 45°C
89. Which thermometer shows the boiling point of water?



- A. A
 - B. B
 - C. C
90. What is the perimeter of this rectangle?

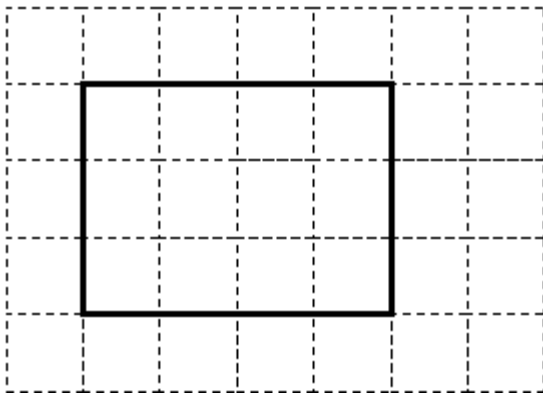


- A. 18 cm
- B. 30 cm
- C. 36 cm

91. Draw a rectangle with one side of 1 inch and the other side of 3 inches. Then find the perimeter of the rectangle.

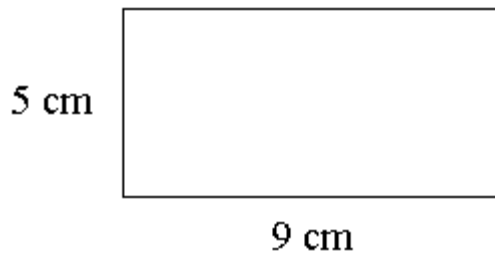
- A. 3 inches
- B. 4 inches
- C. 6 inches
- D. 8 inches

92. Find the area of the rectangle. A unit grid is covering the rectangle to help you.



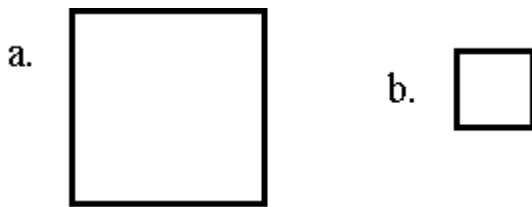
- A. 7 square units
- B. 12 square units
- C. 14 square units
- D. 35 square units

93. What is the area of this rectangle?



- A. 14 cm
- B. 14 square cm
- C. 45 cm
- D. 45 square cm

94. Which of these squares is closer to 1 square centimeter?



- A. a
 - B. b
95. Victoria has 15 dollars and 67 cents. If she borrows 10 dollars and 58 cents from her dad, how much money will she have?
- A. 25 dollars
 - B. 25 dollars and 25 cents
 - C. 26 dollars
 - D. 26 dollars and 25 cents
96. Andy had \$9.85. He bought a toy for \$5.52. How much money does Andy have left?
- A. \$3.24

- B. \$4.33
- C. \$5.43
- D. \$15.37

97. Anna had \$2.25. She was given \$5.50 for her birthday. Anna then spent \$4.35 on a new book. How much money does Anna have now?

- A. \$1.15
- B. \$3.25
- C. \$3.40
- D. \$7.75

98. Andy had \$9.98. He bought a baseball glove for \$5.56. How much money does Andy have left over?

- A. \$3.44
- B. \$4.42
- C. \$4.56
- D. \$4.72

99. Lance has \$5.62. If he wants to buy a book that costs \$16.95, how much more money will Lance need?

- A. \$5.93
- B. \$9.66
- C. \$11.33
- D. \$22.57

100. Sue had \$14.00. She bought a gift for a friend that cost \$9.62. How much money does Sue have left after buying the gift?

- A. \$4.38

- B. \$4.42
- C. \$4.48
- D. \$23.62

101. Tom had \$11.52. Jane gave him \$4.35 more. How much money does Tom have now?

- A. \$7.17
- B. \$7.27
- C. \$15.87
- D. \$16.87

102. Steve has \$32.25, and he gives \$12.12 to his friend Bill. After he gives the money to Bill, how much will Steve have left?

- A. \$19.03
- B. \$20.13
- C. \$22.03
- D. \$22.13

103. If you had \$2.35 and someone gave you \$1.50, what would be the sum of the money you have now?

- A. \$0.85
- B. \$1.85
- C. \$2.85
- D. \$3.85

104. Victoria has \$15.67. If she gets \$10.00 from her dad, how much money will she have?

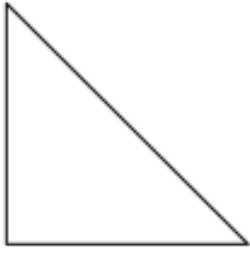
- A. \$5.67
- B. \$15.67

C. \$25.67

D. \$30.67

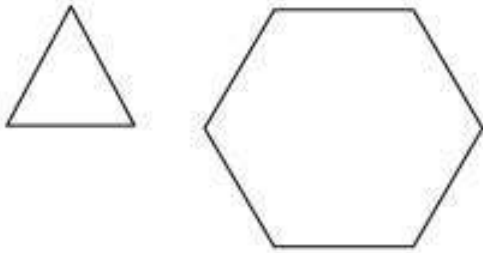
- 105.** Sally is 5 years and 5 months old. Her brother, Kevin, is 8 years and 6 months old. How much older is Kevin than Sally?
- A. 2 years and 1 month
- B. 2 years and 11 months
- C. 3 years and 1 months
- D. 3 years and 11 months
- 106.** Kim wanted to see a movie on the weekend. The tickets cost \$6.50 each. Kim has saved \$4.30. How much more money will Kim need to buy one ticket?
- A. \$2.10
- B. \$2.20
- C. \$2.50
- D. \$2.80
- 107.** School bus A takes 1 hour and 35 minutes to travel its route and arrive at school. School bus B takes 25 minutes to travel its route. How much longer does it take bus A to travel its route than bus B?
- A. 50 minutes
- B. 1 hour and 10 minutes
- C. 1 hour and 30 minutes
- D. 1 hour and 50 minutes
- 108.** Sadia will be 15 years and 11 months old on New Year's Eve. Her sister, Karen, will be 21 years and 7 months old. How much older is Karen than Sadia?
- A. 5 years and 4 months

- B. 5 years and 8 months
 - C. 6 years and 4 months
 - D. 6 years and 8 months
- 109.** Annie and Carla earned \$3.00 for raking the lawn. They wanted to share the money equally, so they split each dollar in half, one at a time. When they added up their money, how much did each girl receive?
- A. \$1.00 each
 - B. \$1.50 each
 - C. \$1.75 each
- 110.** Stan wants to buy enough paint to cover one wall of his bedroom. The wall is 8 feet high and 10 feet wide. How many square feet will the paint need to cover?
- A. 18
 - B. 36
 - C. 80
 - D. 88
- 111.** Which figure has four sides?
- A. trapezoid
 - B. circle
 - C. triangle
 - D. pentagon
- 112.** How many right triangles would it take to make a square? Answer the question below, then show your answer by making a drawing.



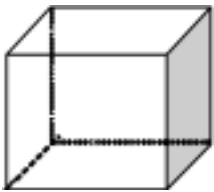
- A. 2
- B. 3
- C. 4
- D. 6

113. How many triangles would it take to make this hexagon?



- A. 2
- B. 3
- C. 4
- D. 6

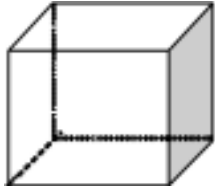
114. How many vertices are on the cube?



- A. 6 vertices
- B. 8 vertices

C. 12 vertices

115. How many faces are on the cube?



A. 4 faces

B. 6 faces

C. 8 faces

116. The shape of an orange is similar to a _____.

A. cone

B. cube

C. prism

D. sphere

117. What figure has four triangular faces and one square?

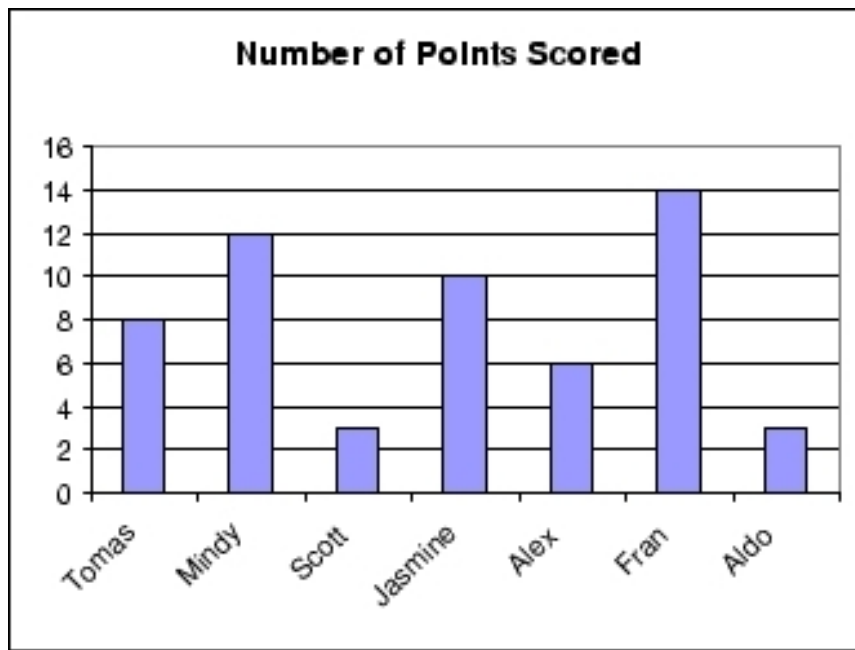
A. square prism

B. triangular prism

C. triangular pyramid

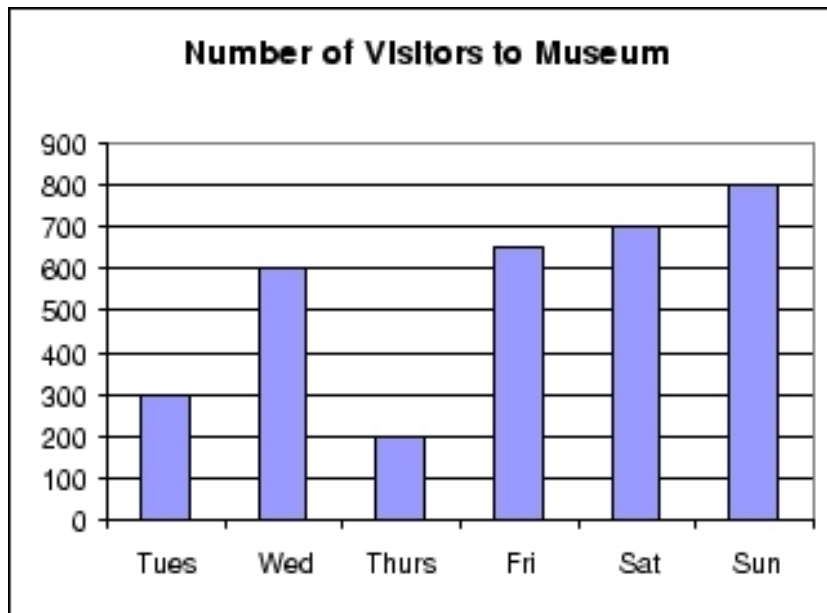
D. square pyramid

118. This chart shows how many points were scored by members of a basketball team. How many players scored 10 or more points?



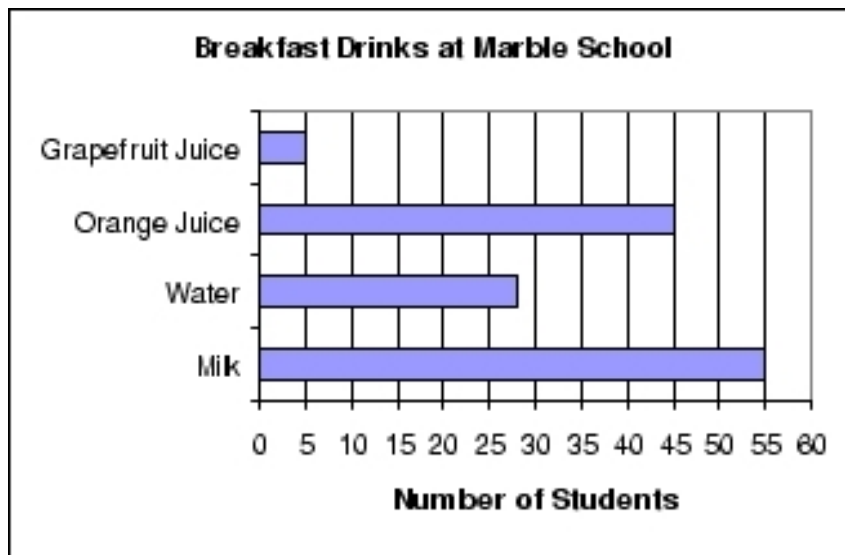
- A. 1
- B. 2
- C. 3
- D. 4

119. Which day at the museum had the fewest (minimum) visitors?



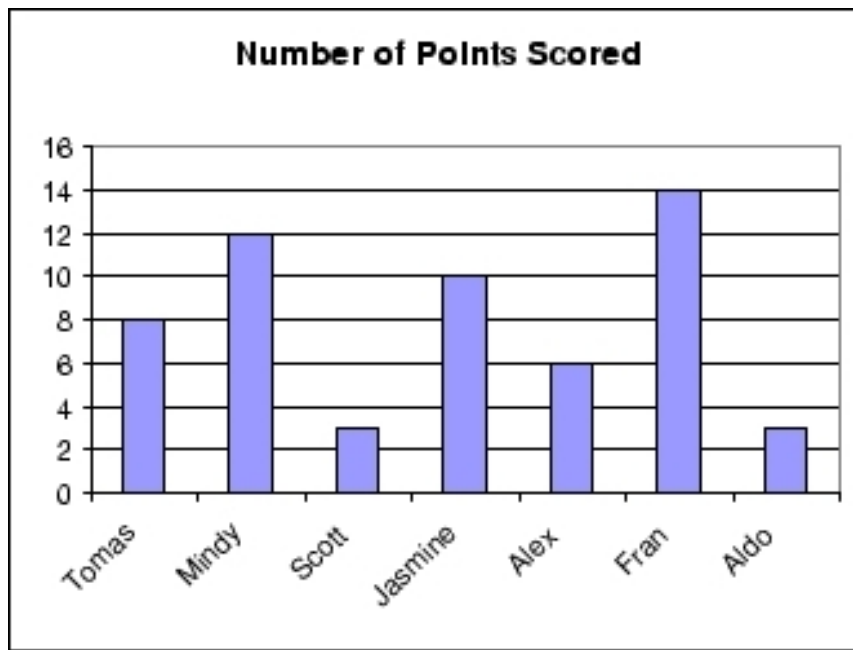
- A. Tuesday
- B. Wednesday
- C. Thursday
- D. Friday

120. 133 fourth grade students were asked what they drink with breakfast in the morning. Here is a bar graph of their responses. What is the range of this data?



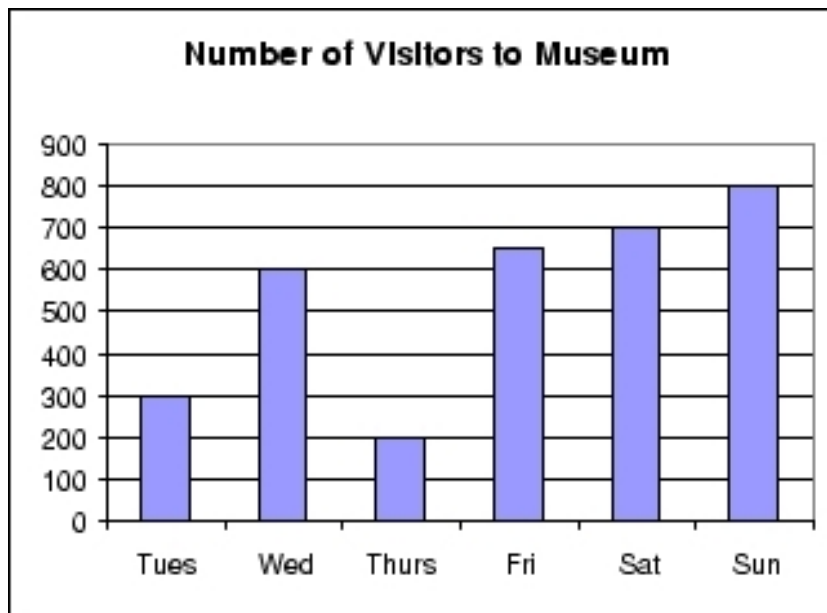
The range is:

- A. 28
 - B. 50
 - C. 55
 - D. 60
121. This chart shows how many points were scored by members of a basketball team. What is the minimum and maximum of the data shown in this bar graph?



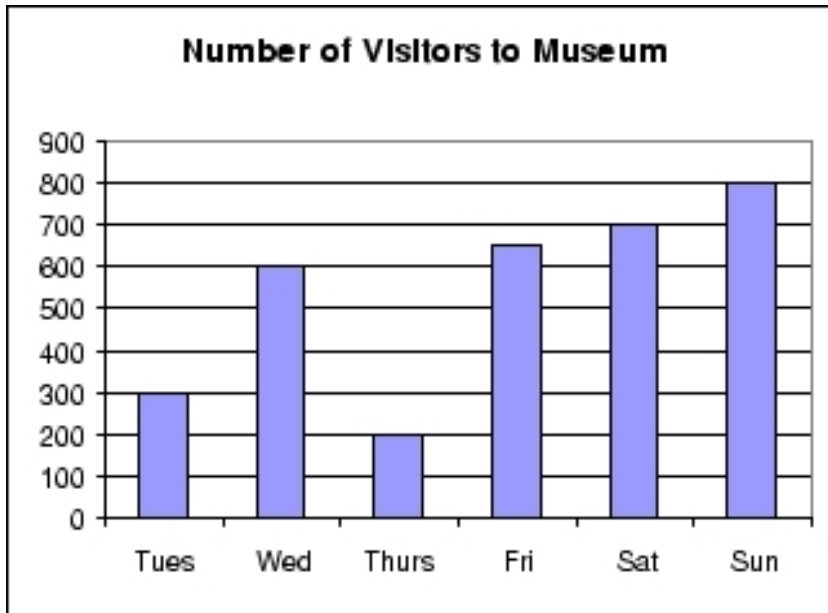
- A. minimum is 1, maximum is 7
- B. minimum is 3, maximum is 14
- C. minimum is 0, maximum is 16
- D. minimum is 3, maximum is 16

122. What is the range of attendance this week at the museum?



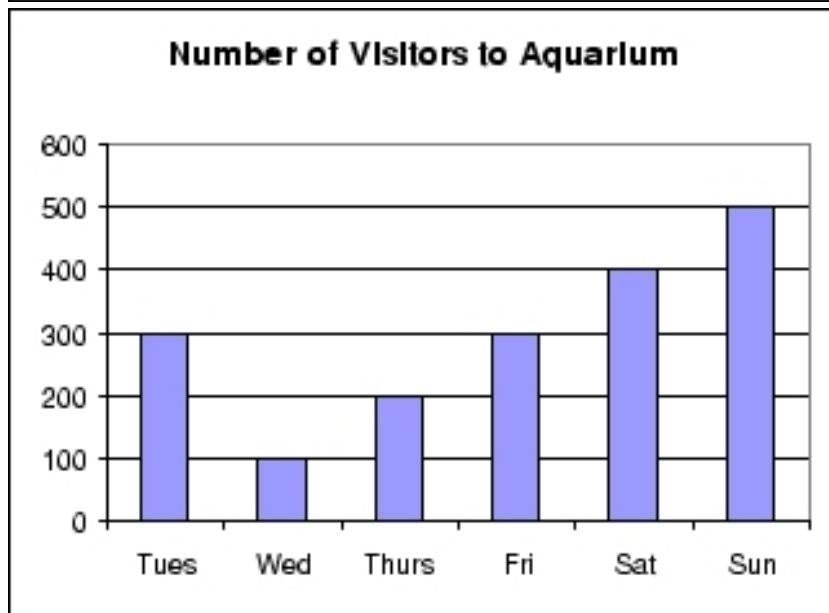
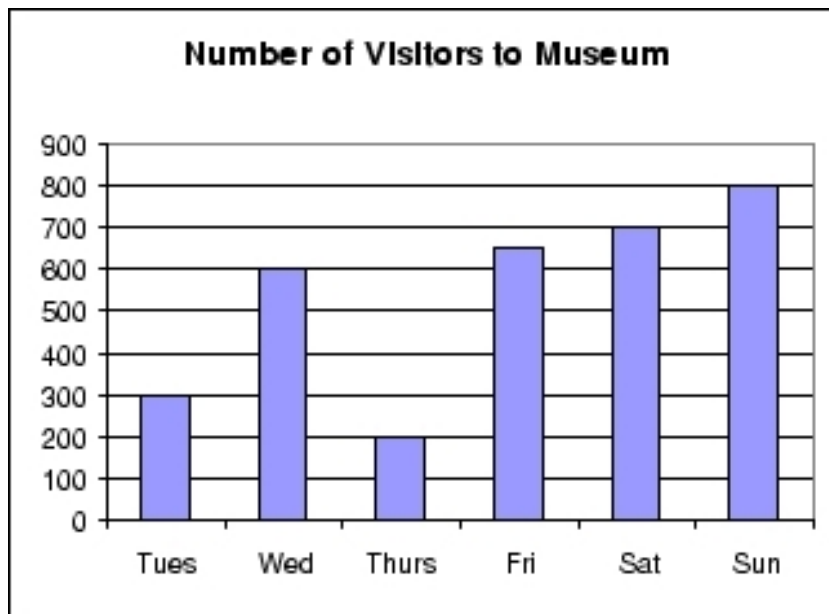
- A. 200
- B. 400
- C. 600
- D. 800

123. On which day did the maximum number of people visit the museum?



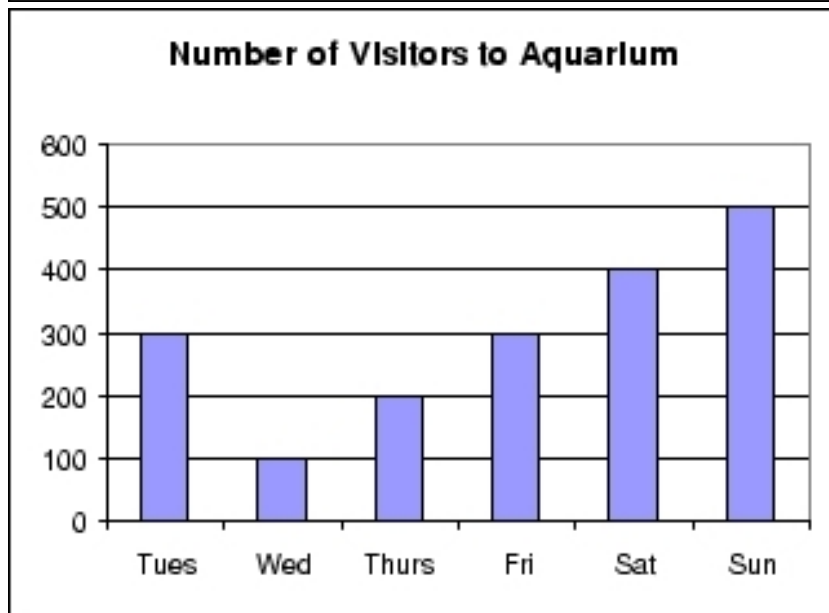
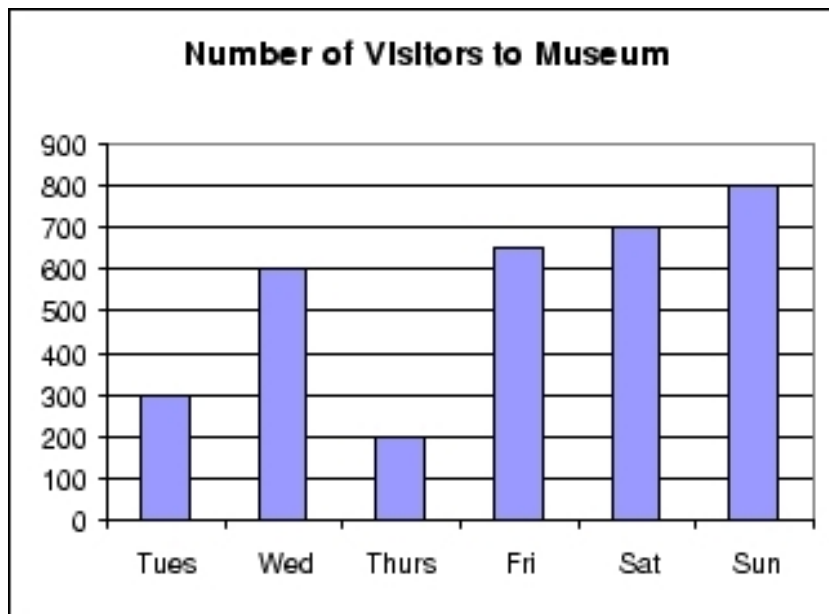
- A. Wednesday
- B. Thursday
- C. Friday
- D. Sunday

124. How many more people attended the museum than the aquarium on Sunday?



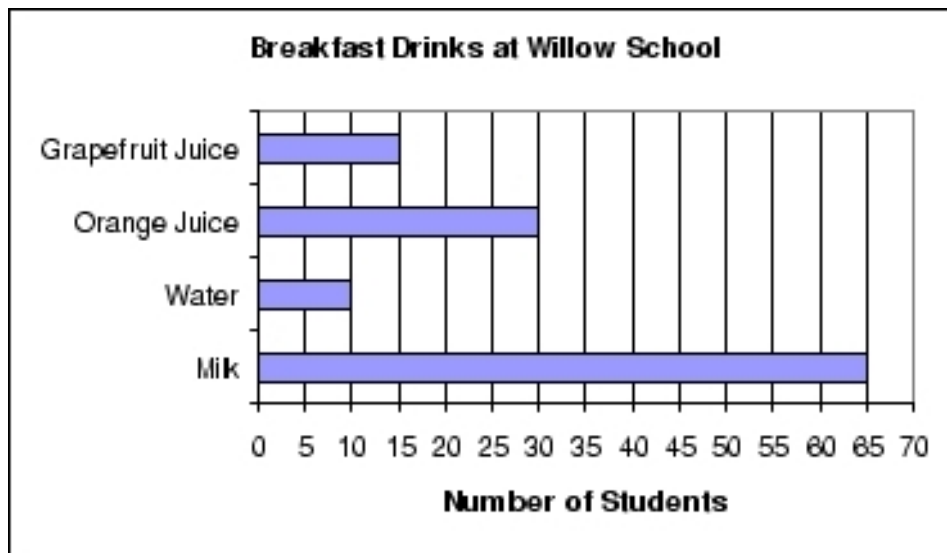
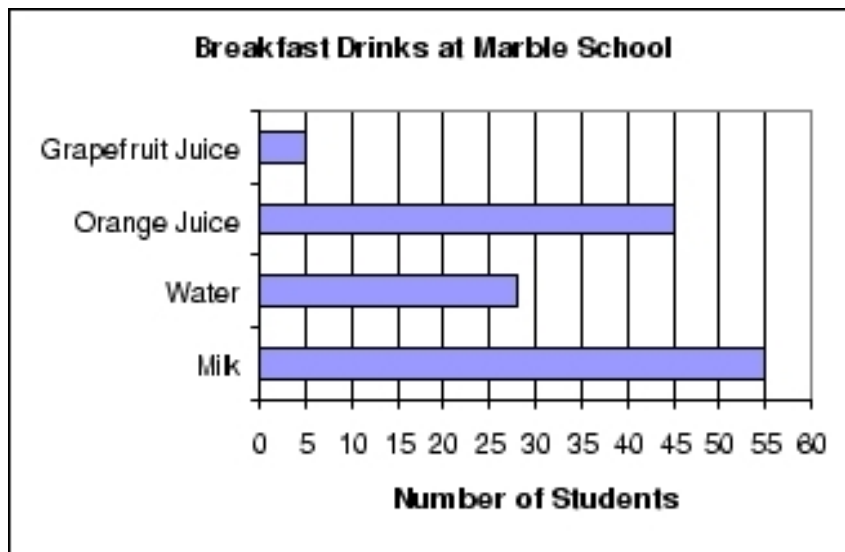
- A. 100
- B. 300
- C. 500
- D. 800

125. Did the museum or the aquarium have more visitors for the week?



- A. aquarium
- B. museum
- C. They are the same.
- D. There is not enough information to decide.

126. These bar graphs show what students at Marble School and Willow School drink with breakfast. How many more students drink grapefruit juice at Willow School than at Marble School?



- A. 5
- B. 10
- C. 15
- D. 20

Open-Ended Questions

Provide your answer in the space provided.

1.

Solve each of these problems without using a calculator:

Answer: _____

4. Jill wants to buy enough seed to grow grass in the patch of lawn that is 10 feet long and 9 feet wide. How many square feet is her patch of lawn? Show your work.

Answer: _____

5. Jack wants to put a border around a bulletin board that is 54 inches long and 43 inches high. How much boarder material will he need for this job? Make a drawing to explain how you solved this.

Answer: _____

6. Bill made brownies for himself and five friends. The pan he used to make the brownies is 12 inches by 12 inches. If Bill cuts the brownies into six equal pieces, how big will each brownie be? Make a drawing and show your work.

Answer: _____

**MMLA Mathematics Assessment Items
Answer Key**

Multiple Choice

Item No.	Correct Answer	GLCE	MEAP Code
1	D	N.ME.03.01	core
2	D	N.ME.03.01	core
3	A	N.ME.03.01	core
4	C	N.ME.03.01	core
5	A	N.ME.03.01	core
6	B	N.ME.03.01	core
7	C	N.ME.03.01	core
8	B	N.ME.03.02	core
9	A	N.ME.03.02	core
10	D	N.ME.03.02	core
11	C	N.ME.03.02	core
12	A	N.ME.03.02	core
13	B	N.ME.03.02	core
14	B	N.ME.03.05	ext
15	B	N.ME.03.05	ext
16	A	N.ME.03.05	ext
17	A	N.ME.03.05	ext
18	B	N.ME.03.05	ext
19	A	N.FL.03.06	core
20	B	N.FL.03.06	core
21	D	N.FL.03.06	core
22	C	N.FL.03.06	core
23	A	N.FL.03.06	core
24	C	N.FL.03.06	core
25	A	N.FL.03.06	core
26	A	N.FL.03.06	core
27	A	N.FL.03.07	core

28	A	N.FL.03.07	core
29	B	N.FL.03.07	core
30	A	N.FL.03.07	core
31	B	N.FL.03.07	core
32	C	N.FL.03.07	core
33	B	N.MR.03.09	core
34	A	N.MR.03.09	core
35	D	N.MR.03.09	core
36	D	N.MR.03.09	core
37	C	N.MR.03.09	core
38	D	N.MR.03.09	core
39	C	N.MR.03.10	core
40	C	N.MR.03.10	core
41	A	N.MR.03.10	core
42	B	N.MR.03.10	core
43	A	N.FL.03.11	core
44	C	N.FL.03.11	core
45	C	N.FL.03.11	core
46	A	N.FL.03.11	core
47	C	N.FL.03.11	core
48	B	N.FL.03.11	core
49	C	N.FL.03.11	core
50	C	N.FL.03.11	core
51	C	N.FL.03.11	core
52	B	N.FL.03.11	core
53	A	N.FL.03.11	core
54	C	N.FL.03.11	core
55	D	N.FL.03.11	core
56	D	N.FL.03.11	core
57	A	N.MR.03.15	core
58	B	N.MR.03.15	core
59	C	N.MR.03.15	core

60	B	N.MR.03.15	core
61	C	N.MR.03.15	core
62	C	N.ME.03.16	core
63	A	N.ME.03.17	ext
64	B	N.ME.03.17	ext
65	C	N.ME.03.17	ext
66	B	N.ME.03.19	ext
67	C	N.MR.03.20	ext
68	A	N.MR.03.20	ext
69	A	N.ME.03.21	core
70	A	N.ME.03.21	core
71	C	N.ME.03.21	core
72	B	N.ME.03.21	core
73	D	N.ME.03.21	core
74	B	M.UN.03.01	core
75	D	M.UN.03.01	core
76	B	M.UN.03.01	core
77	D	M.UN.03.02	core
78	C	M.UN.03.02	core
79	B	M.UN.03.02	core
80	C	M.UN.03.02	core
81	C	M.UN.03.02	core
82	C	M.UN.03.03	core
83	B	M.UN.03.03	core
84	A	M.UN.03.03	core
85	B	M.UN.03.04	core
86	C	M.UN.03.04	core
87	A	M.UN.03.04	core
88	A	M.UN.03.04	core
89	C	M.UN.03.04	core
90	C	M.UN.03.05	core
91	D	M.UN.03.05	core

92	B	M.UN.03.06	ext
93	D	M.UN.03.07	ext
94	B	M.UN.03.08	ext
95	D	M.PS.03.11	core
96	B	M.PS.03.11	core
97	C	M.PS.03.11	core
98	B	M.PS.03.11	core
99	C	M.PS.03.11	core
100	A	M.PS.03.11	core
101	C	M.PS.03.11	core
102	B	M.PS.03.11	core
103	D	M.PS.03.11	core
104	C	M.PS.03.11	core
105	C	M.PS.03.12	ext
106	B	M.PS.03.12	ext
107	B	M.PS.03.12	ext
108	B	M.PS.03.12	ext
109	B	M.PS.03.12	ext
110	C	M.PS.03.13	ext
111	A	G.GS.03.04	ext
112	A	G.SR.03.05	core
113	D	G.SR.03.05	core
114	B	G.GS.03.06	core
115	B	G.GS.03.06	core
116	D	G.GS.03.06	core
117	D	G.GS.03.06	core
118	C	D.RE.03.01	ext
119	C	D.RE.03.01	ext
120	B	D.RE.03.02	core
121	B	D.RE.03.02	core
122	C	D.RE.03.02	core
123	D	D.RE.03.02	core

124	B	D.RE.03.03	core
125	B	D.RE.03.03	core
126	B	D.RE.03.03	core

Open Ended

Item No.	Correct Answer	GLCE	MEAP Code
1	24; 18; 40; 8; 8; 9	N.FL.03.11	core
2	Students' measurements should be correct to the nearest 1/2 inch and expressed in feet and inches.	M.UN.03.02	core
3	90 feet of fence. $30 + 30 + 15 + 15$	M.PS.03.13	ext
4	90 square feet.	M.PS.03.13	ext
5	194 inches.	M.PS.03.13	ext
6	The brownies could be cut in several different ways to make six of equal size. One side could be cut in half and the other side cut in thirds, resulting in 6" x 4" brownies. Or one side could be cut in sixths, resulting in 12" x 2" brownies. He could also cut out four 8" x 3" brownies and two 4" x 6" brownies. Each brownie has to be 24 square inches, since the total area of the pan is 144 square inches.	M.PS.03.13	ext
7	Students could draw a parallelogram, rhombus or trapezoid, but not a square or rectangle. They could also draw a figure with four curved sides.	G.GS.03.04	ext
8	Student drawings should show two right triangles on the ends of the parallelogram, and the square in the middle, like this:	G.SR.03.05	core

