Ridgefield Public Schools

Summer Booklet

Students in Grade 3 in June Going into Grade 4

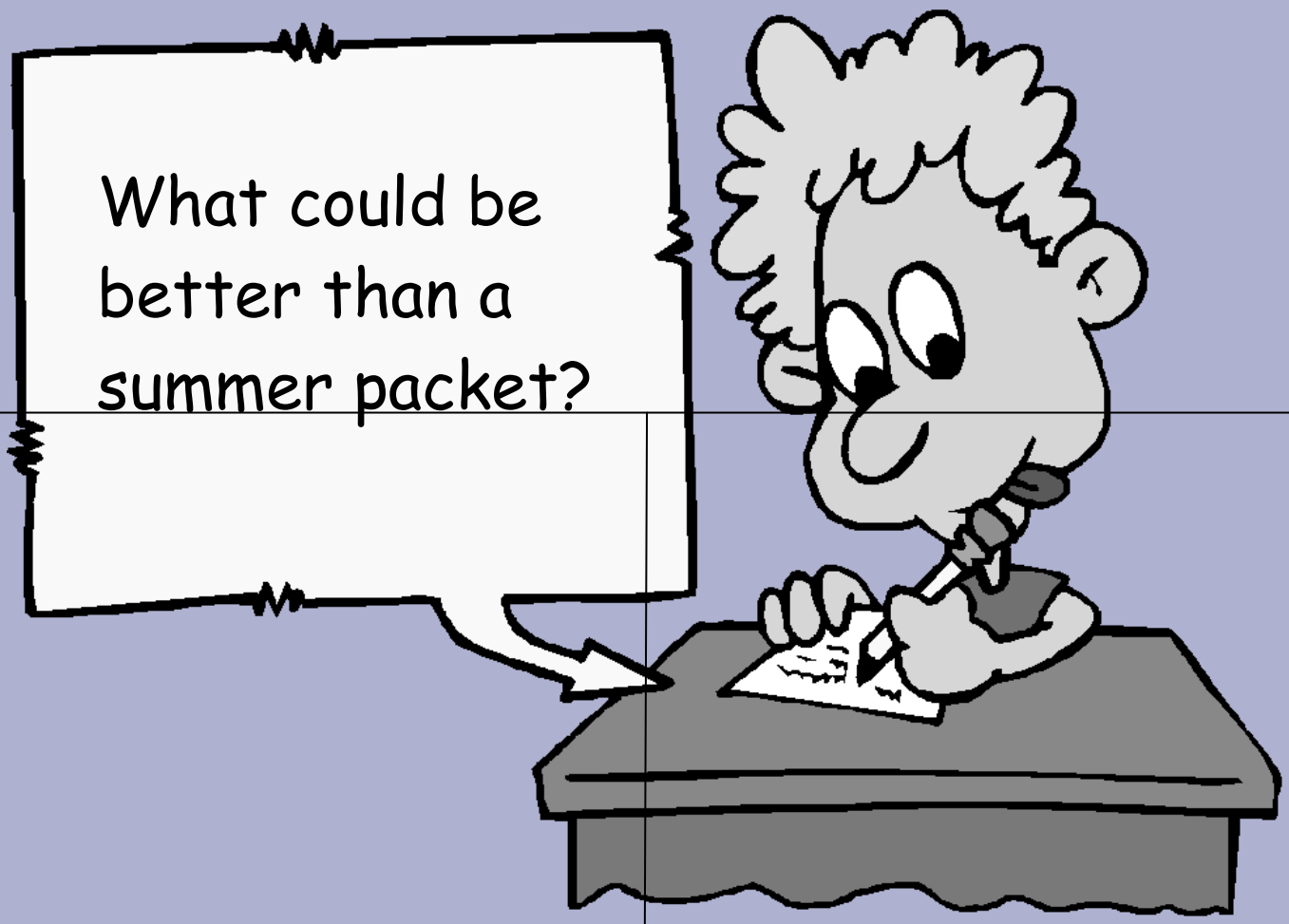
Name: _____

School: _____

Please note: The numbers in parentheses at the beginning of each problem refer to the Grade Three Connecticut Mastery Test Objectives for the Fourth Generation.

1. Place Value	1A. Solve problems involving 1 and 10 more or less using 2-digit numbers. 1B. Identify alternative forms of expressing 3-digit whole numbers using expanded notation. 1C. Identify alternative forms of expressing 2-digit whole numbers using regrouping. 1D. Use place value concepts to identify and compare the magnitude and value of digits in 2- and 3-digit numbers.
2. Pictorial Representations of Numbers	2A. Relate whole numbers to pictorial representations of base ten blocks and vice versa. 2B. Identify fractional parts of regions and sets using pictures and vice versa. 2C. Label and/or shade fractional parts of regions and sets.
4. Order, Magnitude and Rounding of Numbers	4A. Order 2- and 3-digit whole numbers. 4B. Describe magnitude of 2- and 3-digit whole numbers. 4C. Round 2-digit whole numbers in context. 4D. Identify points representing 2- and 3-digit whole numbers on a number line and vice versa.
5. Models for Operations	5A. Relate multiplication and division facts to rectangular arrays and pictures. 5B. Identify or write the appropriate operation or number sentence to solve a story problem. 5C. Write story problems from addition and subtraction number sentences.
6. Basic Facts	6A. Add and subtract facts to 18. 6B. Multiply and divide by 2, 5 and 10.
7. Computation with Whole Numbers and Decimals	7A. Add and subtract 1- and 2-digit numbers without regrouping. 7B. Add 1- and 2-digit numbers with regrouping.
9. Solve Word Problems	9A. Solve simple problems involving addition (with/without regrouping) and subtraction (without regrouping). 9B. Solve simple story problems involving addition (with/without regrouping) and subtraction (without regrouping) with extraneous information.
10. Numerical Estimation Strategies	10A. Identify the best expression to find an estimate.
11. Estimating Solutions to Problems	11A. Identify a reasonable estimate to a problem.
14. Time	14A. Tell time to the nearest hour, half-hour and quarter hour using analog and digital clocks. 14B. Solve problems involving time, elapsed time (15 minute increments) and calendars.
15. Approximating Measures	15A. Estimate lengths and areas by comparing.
16. Customary and Metric Measures	16A. Measure lengths to the nearest inch or centimeter. 16B. Draw lengths to the nearest inch or centimeter. 16C. Identify appropriate customary or metric units of measure for a given situation (inches, feet, centimeters and meters).
17. Geometric Shapes and Properties	17A. Identify and recognize 2-dimensional geometric shapes and figures, including number of angles and sides of polygons. 17B. Draw 2-dimensional geometric shapes and figures.
19. Tables, Graphs, and Charts	19A. Identify correct information from tables, bar graphs, pictographs and charts. 19B. Create bar graphs and pictographs from data in tables and charts.
21. Probability	21A. Identify correct solutions to problems involving elementary notions of probability.
22. Patterns	22A. Extend or complete patterns, or identify rules using numbers and attributes. 22B. Extend or complete patterns and state rules using numbers and attributes.
24. Classification and Logical Reasoning	24A. Identify objects that are the same or different by one attribute. 24B. Sort objects into two groups by a common attribute.
25. Mathematical Applications	25A. Solve extended numerical and statistical problems.

Ridgefield Public Schools Presents……
Summer Math Practice !!!!!!!!!!!!!!!!!!!!!!!!!



(1A)

1. Sixty-four people bought new cars in June. Ten **fewer** people bought new cars in August. How many people bought new cars in August?

- 54
- 63
- 65
- 74

(1A)

2. Matthew spent $47.00 at the Mall. Aaron spent $1.00 **less** than Matthew. How much money did Aaron spend?

- $36.00
- $37.00
- $46.00
- $48.00

(1B)

3. Which means the same as 400 + 60 + 8?

- 4,608
- 4,068
- 468
- 408

(1B)

4. Which means the same as 297?

- 20 + 90 + 7
- 200 + 900 + 7
- 200 + 90 + 7
- 200 + 90 + 70

(1C)

5. Which means the same as 4 tens and 17 ones?

- 417
- 21
- 4017
- 57

(1C)

6. Which means the same as 84?

- 8 tens and 14 ones
- 7 tens and 14 ones
- 80 tens and 14 ones
- 84 tens

(1D)

7. In which number does the 2 have the greatest value?

- 268
- 682
- 826
- 628

(1D)

8. What is the value of 7 in the number 764?

- 7000
- 70
- 700
- 7

(1D)

9. The value of 347 would change by how much if the 3 were replaced by a 1?

- 100
- 200
- 300
- 400

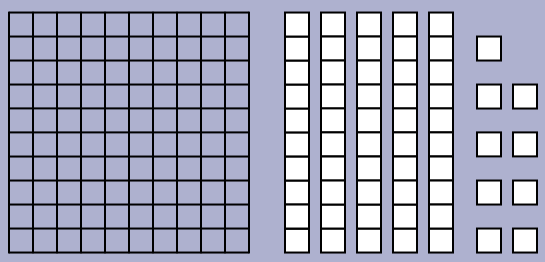
(1D)

10. The value of 528 would change by how much if 6 replaced 2?

- 4000
- 400
- 40
- 4

(2A)

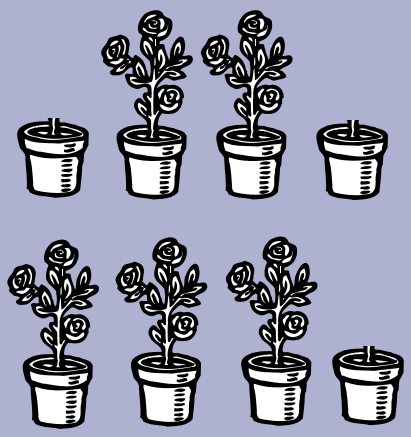
11. What number is shown by the blocks in this picture?



- 159
- 195
- 559
- 915

(2B)

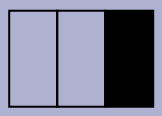
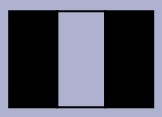
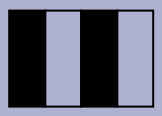
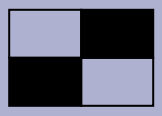
12. What fraction of the pots has flowers?



- $\frac{5}{8}$
- $\frac{3}{8}$
- $\frac{3}{5}$
- $\frac{7}{8}$

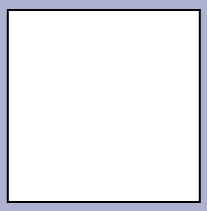
(2B)

13. Which figure shows $\frac{2}{3}$ shaded?

- 
- 
- 
- 

(2C)

14. Shade in $\frac{2}{4}$ of the shape.

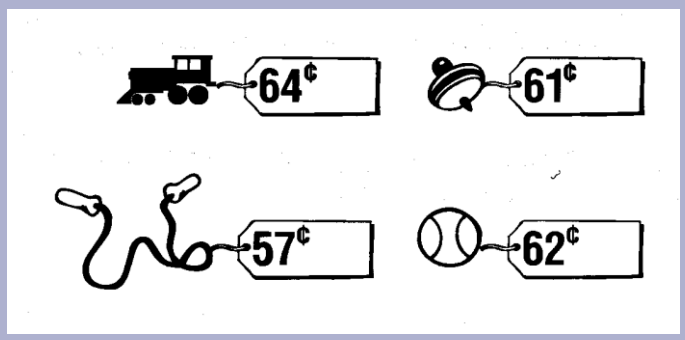


(2C)

15. Shade in $\frac{4}{7}$ of the shapes below.

(4A)

16. *TOYS 4 US* is having a sale. Which list below shows the sale prices from **greatest to least**?



- ○ 57, 64, 61, 62
- ○ 64, 62, 57, 61
- ○ 64, 62, 61, 57
- ○ 57, 64 61, 62

Use the table to answer question 17. (4B)

NAME	AMOUNT EARNED
Tom	$ 6.50
Elaine	$ 8.25
Jerry	$ 9.75
Mari	$ 7.50
Helene	$ 5.75

17. Which 2 students both earned **more than** $7.00 but **less than** $9.00?

- ○ Tom, Mari
- ○ Jerry, Elaine
- ○ Elaine, Mari
- ○ Mari, Jerry

(4C)

18. Sue owns 29 videos. This number is **closest** to

- ○ 15
- ○ 20
- ○ 30
- ○ 40

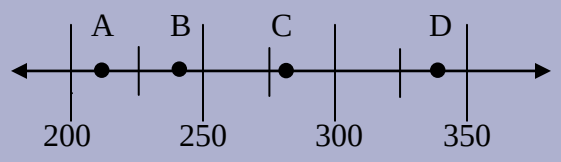
(4C)

19. There were 62 new students in school last month. This amount is a little

- ○ less than 50.
- ○ more than 50.
- ○ less than 60.
- ○ more than 60.

(4D)

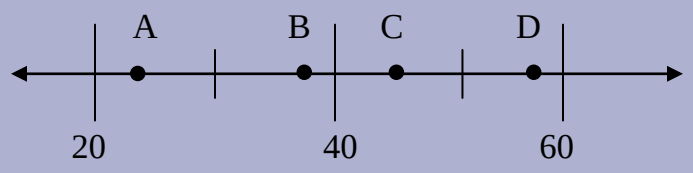
20. The number 277 would be **closest** to which letter on the number line?



- A
- B
- C
- D

(4D)

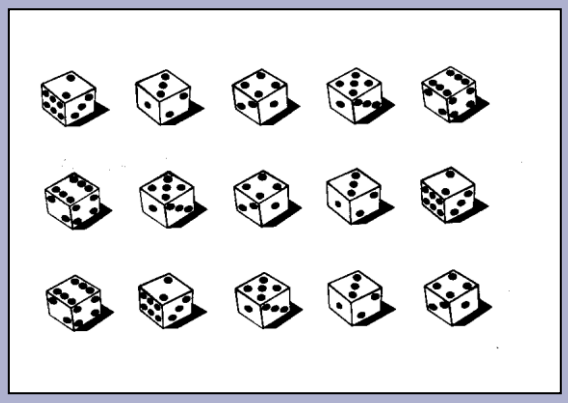
21. Which number does point B stand for on the number line?



- 38
- 58
- 22
- 42

(5A)

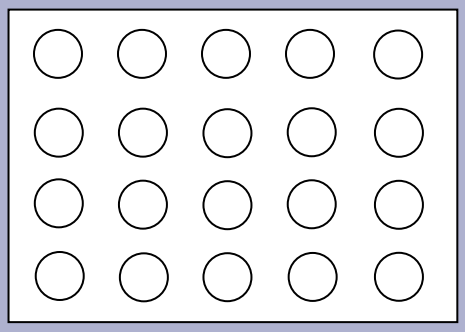
22. Thom shared 15 dice equally among 3 friends. Which fact could be used to find the number of dice each friend should receive?



- 3 + 5
- 15 + 3
- 15 ÷ 3
- 15 × 3

(5A)

23. Which number sentence goes with this picture?



- 20 – 5
- 4 + 5
- 20 + 4
- 4 x 5

(5C)

24. Write a story problem that can be solved using the number sentence $26 + 18 = \square$.

(5C)

25. Write a story problem that can be solved using the number sentence $7 - 3 = \square$.

(5B)

26. There were 17 girls playing jump rope. 14 of the girls stopped playing. To find out how many girls are still playing, you would

- multiply 17 by 14.
- add 14 to 17.
- subtract 14 from 17.
- divide 17 by 14.

(5B)

27. Sue painted 6 trees in her picture. Then she painted 2 more trees. Which number sentence should be used to find the total number of trees Sue painted?

- 6 x 2
- 6 ^ 2
- 6 – 2
- 6 + 2

28. (6A)

15 – 9 =

- 6
- 8
- 4
- 7

29. (6A)

8 + 7 =

- 13
- 14
- 15
- 16

30. (6B)

3 x 10 =

- 33
- 30
- 300
- 310

31. (6B)

18 ^ 2 =

- 6
- 7
- 8
- 9

32. (6B)

$$\begin{array}{r} 2 \\ \underline{\times\ 8} \end{array}$$

- 12
- 14
- 16
- 18

33. (6B)

5/30

- 6
- 7
- 8
- 9

34. (7A)

35 + 23 =

- 12
- 18
- 52
- 58

35. (7A)

$$\begin{array}{r} 47 \\ -\ 25 \\ \hline \end{array}$$

- 22
- 25
- 62
- 72

36. (7B)

$$\begin{array}{r} 62 \\ +29 \\ \hline \end{array}$$

- 81
- 91
- 811
- 911

37. (7B)

6 5 + 8 =

- 63
- 73
- 136
- 145

(9A)

38. Sara made a necklace out of beads. She used 58 yellow beads and 33 red beads. How many beads are in the necklace?

- 91
- 85
- 25
- 21

(9A)

39. The baker sold 21 orange cupcakes and 65 banana cupcakes. How many more banana cupcakes were sold?

- 34
- 44
- 84
- 85

(9B)

40. Lisa cleaned out her desk and found 12 pencils, 5 pens, 2 rulers, and 3 dimes. How many pens and pencils did she find?

- 5
- 7
- 17
- 22

(9B)

41. Fran baked 12 sugar cookies, 24 muffins and 35 chocolate chip cookies. How many more chocolate chip cookies did Fran bake than sugar cookies?

- 11
- 12
- 23
- 24

(10A)

42. Marc needs to subtract 236 from 895. Which of the following would be **best** for Marc to use to **estimate** the difference?

- ○ 800 – 200
- ○ 900 – 300
- ○ 800 – 300
- ○ 900 – 200

(10A)

43. Bill bought a bike for $58.29 and a pair of gloves for $21.98. Which of the following would be **best** for Bill to use to **estimate** the total?

- ○ $50 + $20
- ○ $50 + $30
- ○ $60 + $20
- ○ $60 + $30

(11A)

44. Jackie found 48 shells at the beach. Leslie found 33 shells. **About** how many shells did the girls find?

- ○ 10
- ○ 20
- ○ 70
- ○ 80

(11A)

45. Miffy bought 27 red apples and 49 yellow apples. **About** how many apples did she buy in all?

- ○ a little less than 70
- ○ a little more than 70
- ○ a little less than 80
- ○ a little more than 80

(11A)

46. Darnell read between 4 and 10 pages a day for 3 days in his Harry Potter book. **About** how many pages could he have read in 3 days?

- ○ 20
- ○ 40
- ○ 55
- ○ 70

(11A)

47. Mrs. Andrews gave 285 chocolate scented pencils and 391 strawberry scented pencils as prizes to the students. **About** how many pencils did she give?

- ○ Less than 500
- ○ Between 500 and 600
- ○ Between 600 and 700
- ○ More than 700

(11A)

48. The school store sold 29 notebooks on Monday. It sold 42 notebooks on Tuesday. **About** how many notebooks were sold on those two days?

- ○ Less than 50
- ○ About 60
- ○ About 70
- ○ More than 80

(14A)

49. Gary's clock at home showed the time below. What time was it?

VVCS D:

- Quarter of 2
- quarter of 3
- Half-past 2
- Quarter after 3

(14A)

50. Rose's clock showed quarter past seven. At which clock was she looking?

- 8ev
- 7yv
- 7ev
- 8ov

(14B)

51. Michael and Arturo went underwater scuba diving from 7:30 to 9:00 A.M. How long did they stay underwater?

- 1 hour, 15 minutes
- 1 hour, 30 minutes
- 2 hours, 15 minutes
- 2 hours, 30 minutes

Use the calendar below to answer questions 52 and 53.

August

Sun	Mon	Tues	Wed	Thurs	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		

(14B)

52. Jeannie is planning to go to the beach on August eighth. What day is that?

- Thursday
- Tuesday
- Saturday
- Sunday

(14B)

53. On the calendar above, which date is the third Thursday of the month?

- August 3
- August 15
- August 17
- August 31

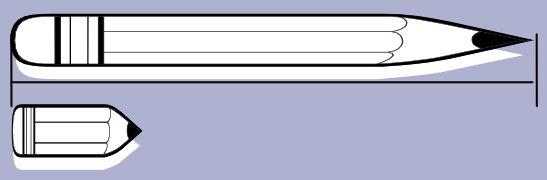
(14B)

54. Josie practiced the piano for one hour. If she started at quarter past three, at what time did she finish?

- 3:30
- 3:45
- 4:15
- 4:30

(15A)

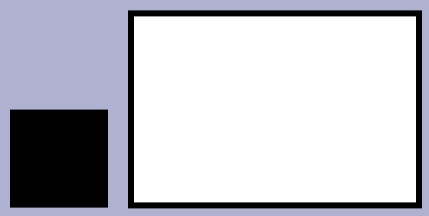
55. Lucy measured two pencils. She found that the longer pencil had a length of 12 centimeters. **About** how long is the shorter pencil?



- 1 centimeter
- 2 centimeters
- 3 centimeters
- 4 centimeters

(15A)

56. **About** how many shaded shapes does it take to cover the entire area?

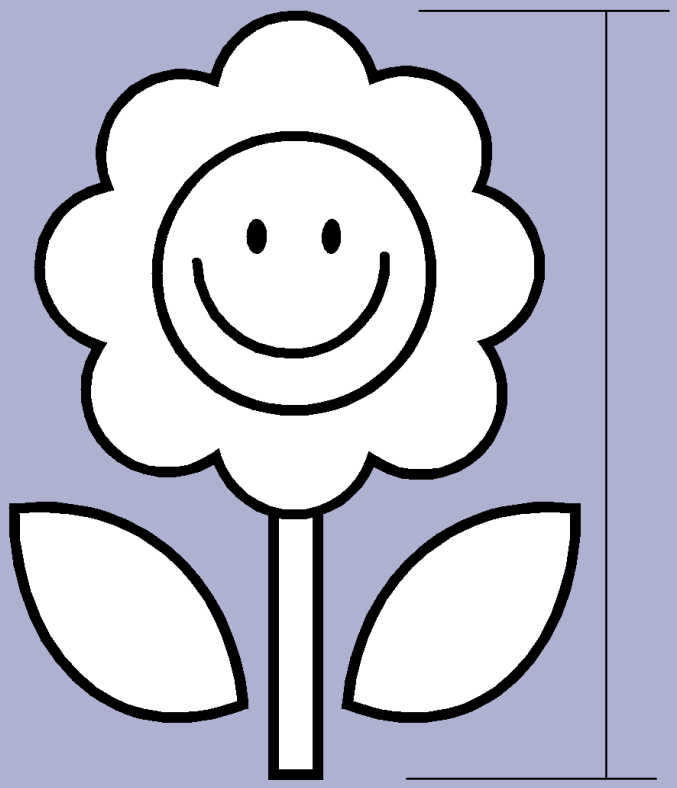


- 2
- 4
- 6
- 8

Use the ruler at the bottom of Page 14 to answer question 57.

(16A)

57. Measure the height of the flower (from the top to the bottom) to the nearest inch.



- 2 inches
- 3 inches
- 4 inches
- 5 inches

Use the ruler at the bottom of this page to answer question 58 – 60.

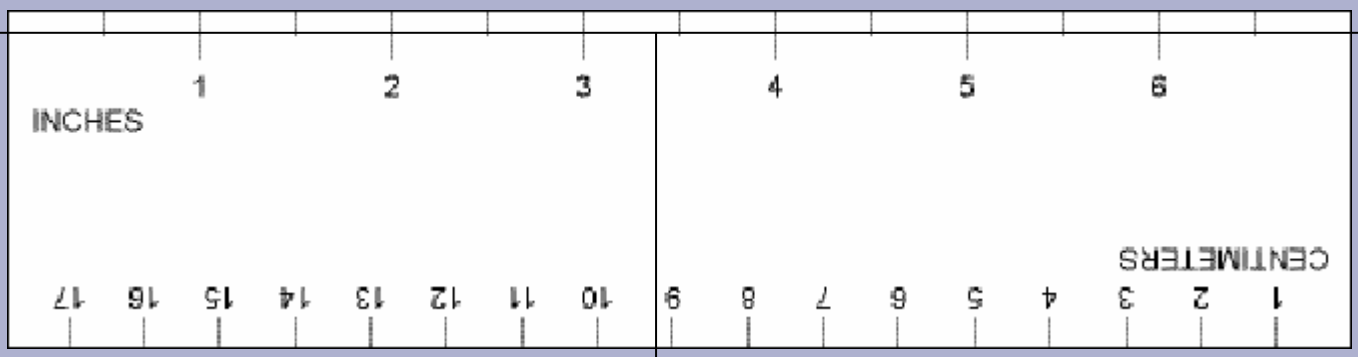
(16A)

58. Use the ruler at the bottom of page 14 to measure the line segment below to the nearest centimeter. Do not measure the end points.

- ○ 2 centimeters
- ○ 4 centimeters
- ○ 6 centimeters
- ○ 8 centimeters

59. Draw a line segment that is 3 inches long in the box below. (16B)

60. Draw a line segment that is 10 centimeters long in the box below. (16B)



(16C)

61. Which is a **reasonable** height for a flagpole?

- 6 meters
- 6 centimeters
- 6 kilometers
- 6 liters

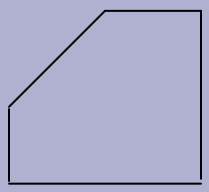
(16C)

62. Which object would be **about** 6 feet tall?

- a kitten
- a school
- a bookcase
- a chair

(17A)

63. How many angles does this shape have?

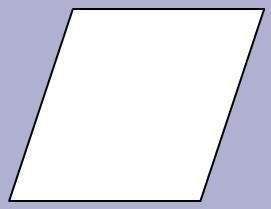


- 1
- 3
- 5
- 7

(17A)

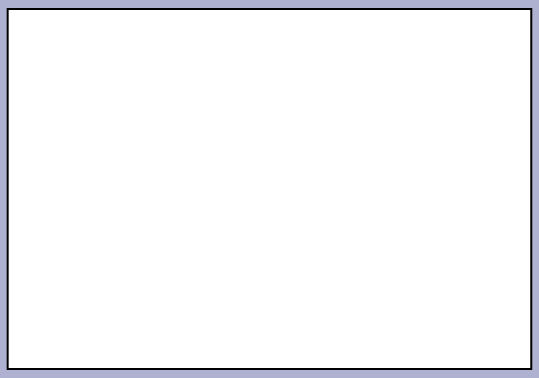
64. What is the name of this shape?

- square
- triangle
- rectangle
- parallelogram

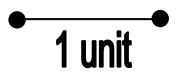


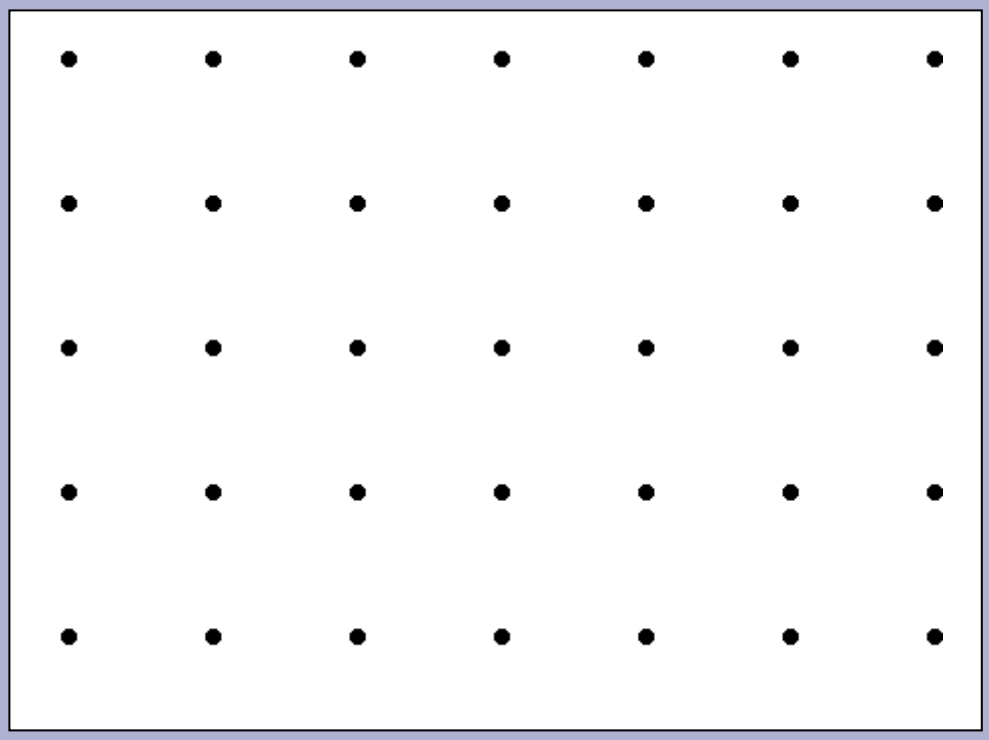
(17B)

65. Draw a three-sided polygon inside the box below.

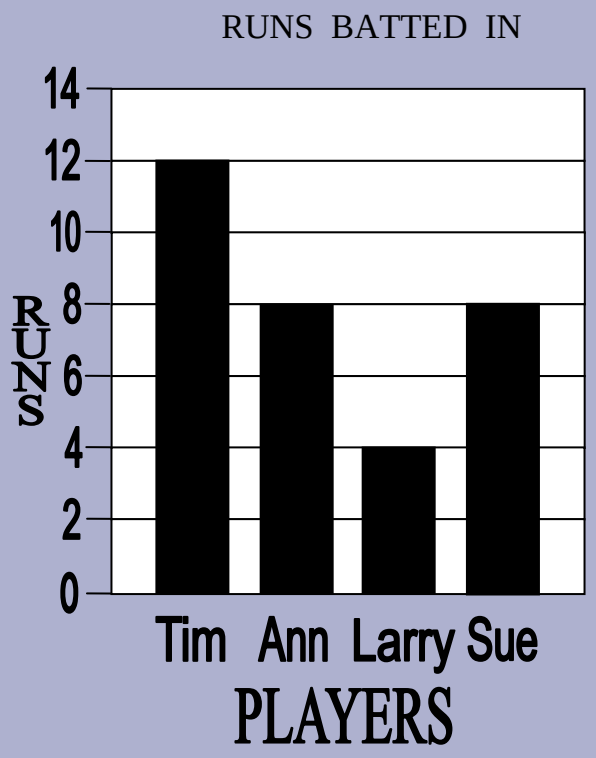


67. Draw a polygon on the grid that is 3 units long on all sides. (17B)





The graph below shows how many runs five baseball players on the Jets' team batted in. Use the graph to answer questions 68 and 69.



(19A)

68. Who batted in the **fewest** runs?

- Tim
- Ann
- Larry
- Sue

(19A)

69. How many runs did Tim and Ann bat in **altogether**?

- 36
- 20
- 12
- 8

The fourth graders at Baine School held bake sales all year to raise money for new computers. The pictograph shows how much money each class raised.

Money from Bake Sales	
Mrs. Dea	~ ~ ~ ~ ~ ~
Mr. West	~ ~
Mr. Jones	~ ~ ~ ~
Miss Bliss	~ ~ ~ ~ ~ ~ ~ ~

Each ~ represents 10 dollars.

(19A)

70. Which class raised **more than** $35 but **less than** $50?

- Miss Bliss's class
- Mr. West's class
- Mrs. Dea's class
- Mr. Jones's class

The table shows the number of snacks sold at the school basketball game.

	Before Game	During Game
Hot Dogs	33	47
Burgers	28	55
Soda	54	57
Chips	52	41

(19A)

71. Which snack was the **most** popular?

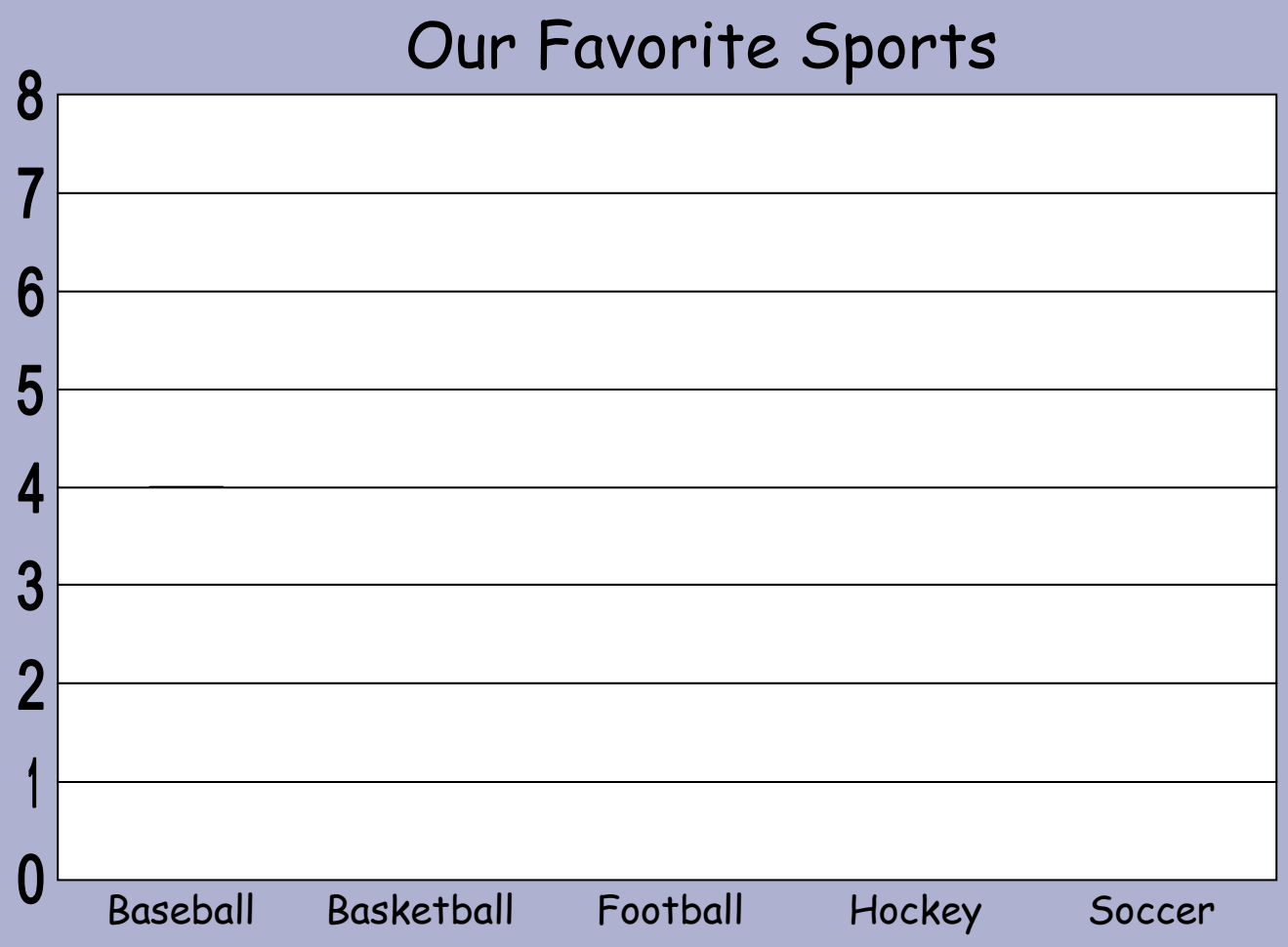
- Hot Dogs
- Burgers
- Soda
- Chips

(19B)

72. Mrs. Jackson asked her students about their favorite sports. Complete the **bar graph** using the information in the chart. **Do not shade the bars**. (Just outline them.) .

OUR FAVORITE SPORTS

Name of Sport	Number of Students
Baseball	5
Basketball	8
Football	3
Hockey	1
Soccer	6



(19B)

73. Create a **pictograph** using the following data.

What is your favorite ice cream flavor?	
FLAVOR	VOTES
Vanilla	5
Chocolate	4
Strawberry	1
Rocky Road	3

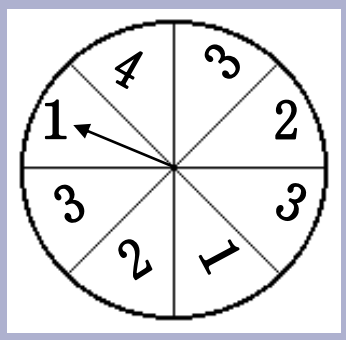
FAVORITE ICE CREAM FLAVORS

Vanilla	
Chocolate	
Strawberry	
Rocky Road	

Let 1 ▯ represent 1 vote.

(21A)

74. Katie spun the spinner once. The arrow landed on 1. If Katie spins the spinner one more time, on which number is the arrow **least** likely to land?



- 1
- 2
- 3
- 4

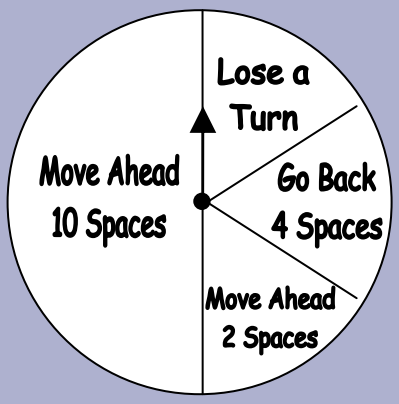
(21A)

75. Mickey has a collection of marbles. He keeps 25 blue, 75 green, 15 yellow, and 50 red marbles in a bag. If Mickey reaches into the bag without looking and takes out one marble, what color is he **most** likely to get?

- blue
- green
- yellow
- red

(21A)

76. Tom was playing a game with the spinner below. If he spins one more time, on which part of the spinner is he **most** likely to land?



- Lose a Turn
- Go Back 4 Spaces
- Move Ahead 2 Spaces
- Move Ahead 10 Spaces

(22A)

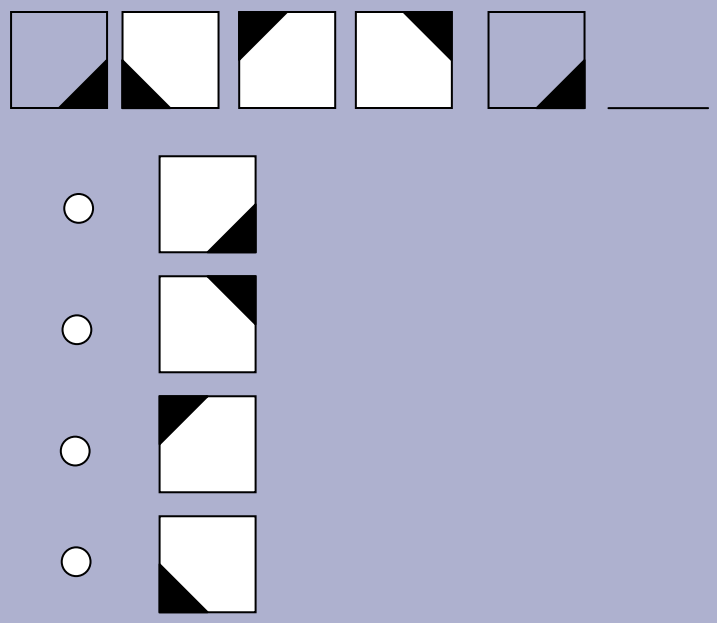
77. What two numbers are missing in the following pattern?

5, 13, 21, ___, ___, 45, 53

- 24, 27
- 29, 37
- 31, 41
- 26, 31

(22A)

78. What shape is next in the pattern below?



(22A)

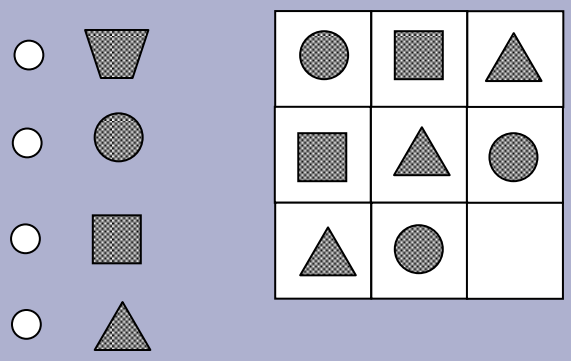
79. Which number belongs in the blank space?

1	3	5	7
3	5	7	9
5	7	9	11
7	9	11	

- 12
- 13
- 14
- 15

(22A)

80. Which shape belongs in the blank space?



(22A)

81. What number is missing in the table?

IN	OUT
10	5
8	3
15	10
12	

- 7
- 9
- 11
- 13

(22A)

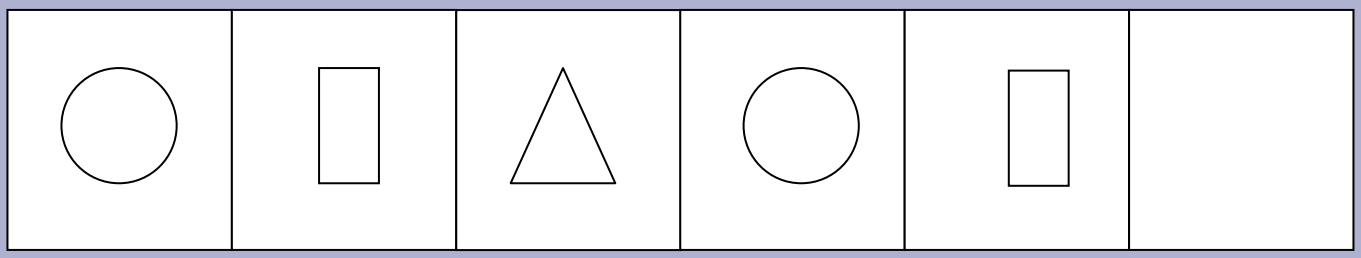
82. What rule was followed in the table below?

START	END
2	6
5	9
8	12
11	15

- Add 2
- Add 4
- Multiply by 2
- Multiply by 4

(22B)

83. What is the next shape in the following pattern? **Draw** the shape. Then **write** a sentence that explains why you drew the shape. (*HINT: Do not just say that you followed the pattern.)*



Explanation: _____

_____

_____

_____

_____

_____

(22B)

84. What number is missing in the pattern below? Write the number on the blank space. Then write a sentence explaining why you chose that number.

41, 36, 31, 26, 21, _____

Explanation: _____

_____

_____

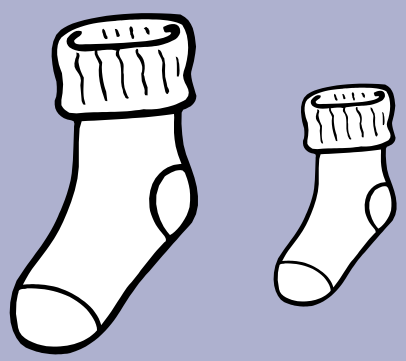
_____

_____

_____

(24A)

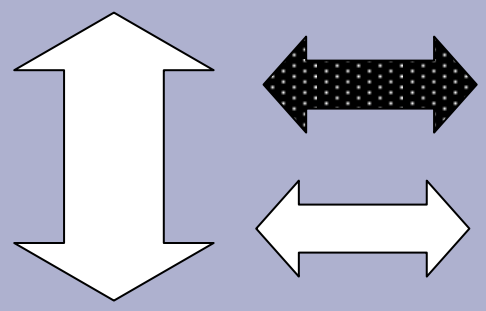
85. Mr. Jones found these two socks in the dryer. How are the socks **different**?



- ○ Color
- ○ Size
- ○ Shape
- ○ Color and Size

(24A)

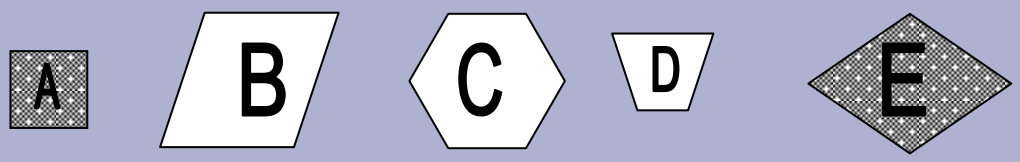
86. Mr. Gaudet drew three arrows. How are the three arrows the **same**?



- ○ Size
- ○ Color
- ○ Shape
- ○ Shape and Color

(24B)

87. Sort all 5 of these shapes into 2 groups so that the shapes in each group have something in common. Show how you grouped the shapes by writing the letter from each shape into the boxes marked Group 1 and Group 2. Then write a sentence that explains how you decided to group the shapes.



GROUP 1	GROUP 2

_____

_____

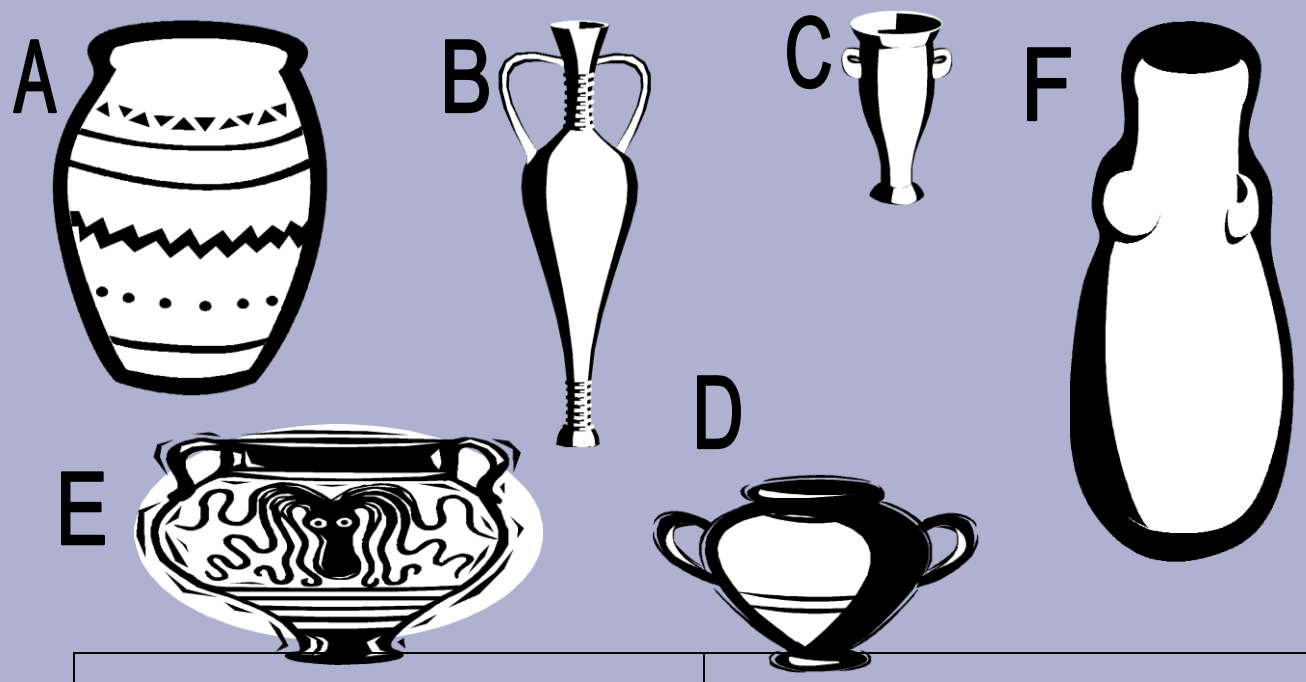
_____

_____

_____

(24B)

88. Sort all 6 of these figures into 2 groups so that the figures in each group have something in common. Show how you grouped the figures by writing the letter from each figure into the boxes marked Group 1 and Group 2. Then write a sentence that explains how you decided to group the figures.



GROUP 1	GROUP 2

_____

_____

_____

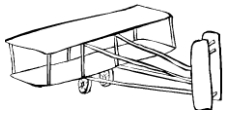
_____

_____

_____

(25A)

89. Mrs. Van Buren is going to buy paperback books. These are the 3 types of books she will buy:

My Favorite Pets	Tornadoes I Have Known	Model Airplanes
		
Animal Books $2.00	Science Books $3.00	Hobby Books $4.00

- Mrs. Van Buren wants to give at least 6 books to the school library.
- She will include at least one of each type of book.
- She will spend no more than $30.00.

Use the space below to show

- one set of books Mrs. Van Buren could give to the library,
- how many of each type of book,
- the total cost, and
- how you got your answer.

(25A)

90. Rob has a set of red, blue, and green toy cars. He has
- 12 red cars,
- 8 blue cars, and
- 6 green cars.

He places all his toy cars on 4 shelves. Each shelf has
- **more** than 4 cars,
- at least 2 colors, and
- an **even** number of cars.

Fill in the chart to show one way Rob could organize his cars.

SHELVES	RED CARS	BLUE CARS	GREEN CARS	TOTAL NUMBER OF CARS
SHELF 1				
SHELF 2				
SHELF 3				
SHELF 4				
TOTALS	12 red cars	8 blue cars	6 green cars	26 cars