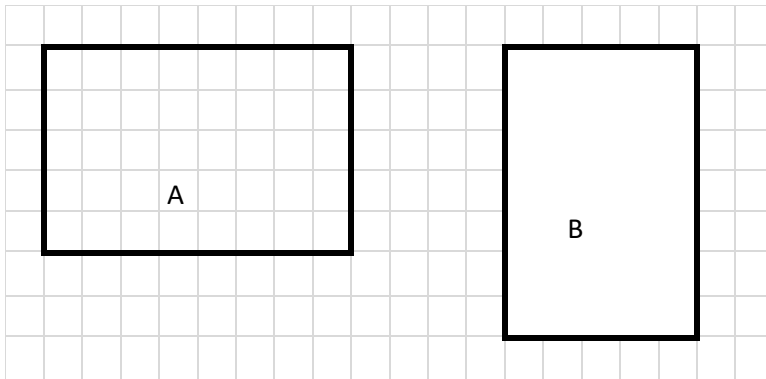




Name _____

Date _____

1. Determine the perimeter and area of rectangles A and B. Include labels.



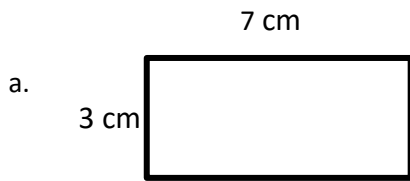
A = _____

A = _____

P = _____

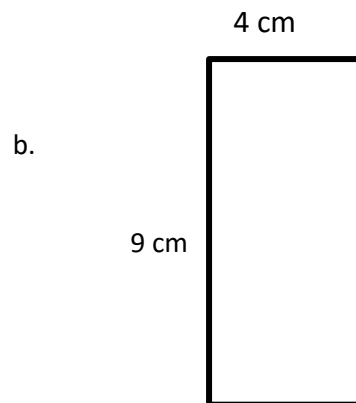
P = _____

2. Determine the perimeter and area of each rectangle. Include labels.



P = _____

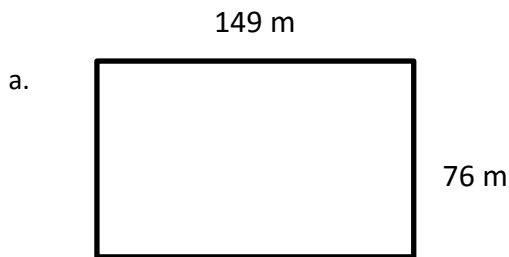
A = _____



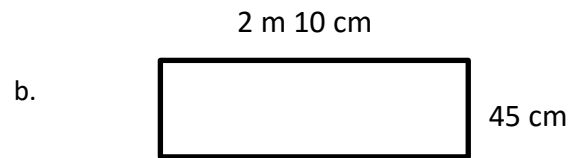
P = _____

A = _____

3. Determine the perimeter of each rectangle. Include labels.

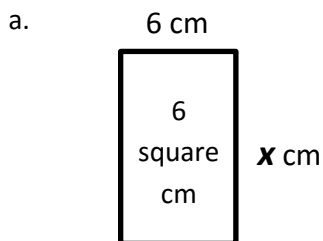


P = _____

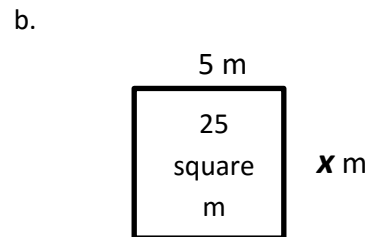


P = _____

4. Given the rectangle's area, find the unknown side length. Include labels.

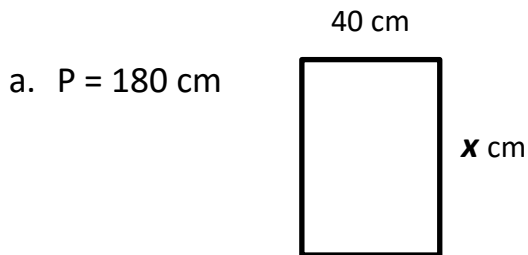


x = _____

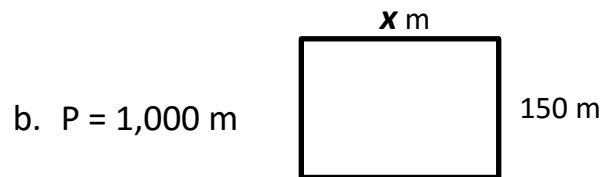


x = _____

5. Given the rectangle's perimeter, find the unknown side length. Include labels.



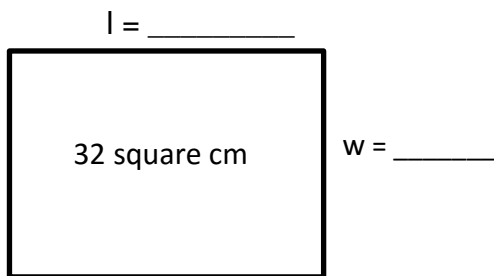
$x =$ _____



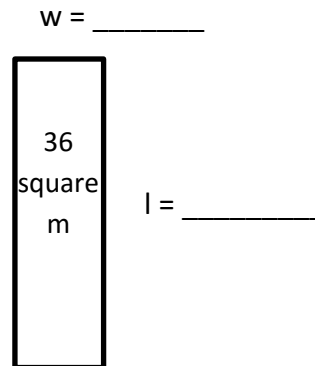
$x =$ _____

6. Each of the following rectangles has whole number side lengths. Given the area **and** perimeter, find the length and width. Include labels.

a. $A = 32$ square cm
 $P = 24$ cm



b. $A = 36$ square m
 $P = 30$ m

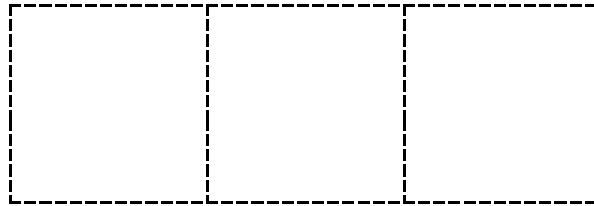




Name _____

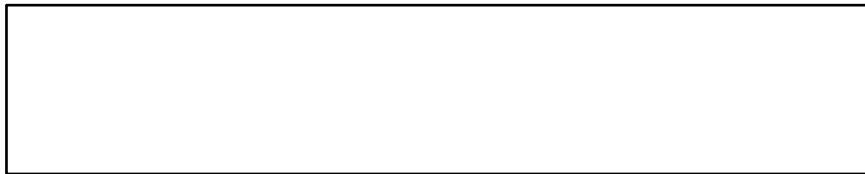
Date _____

1. A rectangular pool is 7 feet wide. It is 3 times as long as it is wide.
 - a. Label the diagram with the dimensions of the pool.



b. Find the perimeter of the pool. $P =$ _____

2. A rectangular bumper sticker is 3 inches long. It is 4 times as wide as it is long.
 - a. Draw a diagram of the bumper sticker and label its dimensions.



b. Find the perimeter and area of the bumper sticker. $P =$ _____ $A =$ _____

3. The area of a rectangle is 36 square centimeters and its length is 9 centimeters. Draw and label this rectangle.

a. What is the width of the rectangle? $W =$ _____

b. Elsa wants to draw a second rectangle that is the same length but is 3 times as wide. Draw and label Elsa's second rectangle.

c. What is the perimeter of Elsa's second rectangle? $P =$ _____

4. The area of Nathan's bedroom rug is 15 square feet. The longer side measures 5 feet. His living room rug is twice as long and twice as wide as the bedroom rug.
- a. Draw and label a diagram of Nathan's bedroom rug. What is its perimeter? $P =$ _____
- b. Draw and label a diagram of Nathan's living room rug. What is its perimeter? $P =$ _____

- c. What is the relationship between the two perimeters?
-

- d. Find the area of the living room rug using the formula $A = l \times w$.

$$A = \underline{\hspace{2cm}}$$

- e. The living room rug has an area that is how many times that of the bedroom rug?

The area of the living room rug is _____ times the area of the bedroom rug.



Name _____

Date _____

Example:

$10 \times 5 = 50$

$10 \times 5 \text{ ones} = 5 \text{ tens}$

thousands	hundreds	tens	ones

1. Draw number disks and arrows as shown to represent each product.

thousands	hundreds	tens	ones

a. $100 \times 7 =$ _____

$(10 \times 7) \times 10 =$ _____

$100 \times 7 \text{ ones} =$ _____

thousands	hundreds	tens	ones

b. $1,000 \times 7 =$ _____

$(10 \times 7) \times 10 \times 10 =$ _____

$1,000 \times 7 \text{ ones} =$ _____

thousands	hundreds	tens	ones

2. Complete the following equations. Use the place value chart if needed.

a. $8 \times 10 = \underline{\hspace{2cm}}$ b. $\underline{\hspace{2cm}} \times 8 = 800$ c. $8,000 = \underline{\hspace{2cm}} \times 1,000$

d. $10 \times 3 = \underline{\hspace{2cm}}$ e. $3 \times \underline{\hspace{2cm}} = 3,000$ f. $\underline{\hspace{2cm}} \times 3 = 300$

g. $1,000 \times 4 = \underline{\hspace{2cm}}$ h. $\underline{\hspace{2cm}} = 10 \times 4$ i. $400 = \underline{\hspace{2cm}} \times 100$

3. Draw number disks and arrows as shown to represent each product.

a. $10 \times 15 = \underline{\hspace{2cm}}$ $10 \times (1 \text{ ten } 5 \text{ ones}) = \underline{\hspace{2cm}}$

thousands	hundreds	tens	ones

b. $100 \times 17 = \underline{\hspace{2cm}}$ $(10 \times 17) \times 10 = \underline{\hspace{2cm}}$

thousands	hundreds	tens	ones

c. $1,000 \times 36 = \underline{\hspace{2cm}}$

$(10 \times 36) \times 10 \times 10 = \underline{\hspace{2cm}}$

thousands	hundreds	tens	ones

4. Decompose each multiple of 100, or 1,000 before multiplying.

a. $2 \times 800 = 2 \times 8 \times \underline{\hspace{1cm}} \times \underline{\hspace{1cm}}$
 $= 16 \times \underline{\hspace{1cm}}$
 $= \underline{\hspace{1cm}}$

b. $5 \times 5,000 = \underline{\hspace{1cm}} \times \underline{\hspace{1cm}} \times 10 \times 10 \times 10$
 $= \underline{\hspace{1cm}} \times \underline{\hspace{1cm}}$
 $= \underline{\hspace{1cm}}$



Name _____

Date _____

Draw number disks to represent the value of the following expressions.

1. $5 \times 2 =$ _____

5 times _____ ones is _____ ones.

ones

2. $5 \times 20 =$ _____

5 times _____ tens is _____.

tens	ones

3. $5 \times 200 =$ _____

5 times _____ hundreds is _____.

hundreds	tens	ones

4. $5 \times 2,000 =$ _____

_____ times _____ thousands is _____.

thousands	hundreds	tens	ones

5. Find the products.

a. $20 \times 9 =$	b. $6 \times 70 =$	c. $7 \times 700 =$	d. $3 \times 900 =$
e. $9 \times 90 =$	f. $40 \times 7 =$	g. $600 \times 6 =$	h. $8 \times 6,000 =$
i. $5 \times 70 =$	j. $5 \times 80 =$	k. $5 \times 200 =$	l. $6,000 \times 5 =$

6. At the school cafeteria, each student who ordered lunch gets 6 chicken nuggets. The cafeteria staff prepares enough for 300 kids. How many chicken nuggets does the cafeteria staff prepare altogether?

7. Jane has thirty times as many stickers as her brother. Her brother has 8 stickers. How many stickers does Jane have?

8. The flower shop has 40 times as many flowers in one cooler as Julia has in her bouquet. The cooler has 120 flowers. How many flowers are in Julia's bouquet?

$$40 \times \underline{\quad} = 120$$



Name _____

Date _____

Represent the following problem by drawing disks in the place value chart.

1. To solve 30×60 , think:

$$(3 \text{ tens}) \times (6 \text{ tens}) =$$

$$3 \times 6 \times 10 \times 10 =$$

$$30 \times 60 = \underline{\hspace{2cm}}$$

Hundreds	Tens	Ones

2. Use the word form of the numbers to find the products.

a. $3 \text{ tens} \times 6 \text{ tens} = \underline{\hspace{1cm}}$ hundreds

$$30 \times 60 = \underline{\hspace{2cm}}$$

b. $2 \text{ tens} \times 2 \text{ tens} = \underline{\hspace{1cm}} \underline{\hspace{1cm}}$

$$20 \times 20 = \underline{\hspace{2cm}}$$

c. $3 \text{ tens} \times 5 \text{ tens} = \underline{\hspace{1cm}} \underline{\hspace{1cm}}$

$$30 \times 50 = \underline{\hspace{2cm}}$$

d. $7 \text{ tens} \times 6 \text{ tens} = \underline{\hspace{1cm}} \underline{\hspace{1cm}}$

$$70 \times 60 = \underline{\hspace{2cm}}$$

e. $6 \text{ tens} \times 4 \text{ tens} = \underline{\hspace{1cm}} \underline{\hspace{1cm}}$

$$60 \times 40 = \underline{\hspace{2cm}}$$

3. Rewrite each equation in unit form and solve.

a. $40 \times 70 =$ _____

4 tens \times 7 tens = _____ hundreds

b. $60 \times 60 =$ _____

6 tens \times 6 _____ = _____ hundreds

c. $80 \times 20 =$ _____

8 _____ \times 2 _____ = _____ hundreds

d. $70 \times 70 =$ _____

_____ _____ \times _____ _____ = _____ hundreds

e. $40 \times 90 =$ _____

_____ _____ \times _____ _____ = _____ _____

f. $30 \times 70 =$ _____

_____ _____ \times _____ _____ = _____ _____



Name _____

Date _____

- Show partial products with disks on the place value chart, and record the partial products vertically.

a. 3×24

hundreds	tens	ones

$$\begin{array}{r} 24 \\ \times 3 \\ \hline \end{array}$$

b. 3×42

hundreds	tens	ones

$$\begin{array}{r} 42 \\ \times 3 \\ \hline \end{array}$$

c. 4×34

hundreds	tens	ones

$$\begin{array}{r} 34 \\ \times 4 \\ \hline \end{array}$$

d. 4×27

hundreds	tens	ones

$$\begin{array}{r} 27 \\ \times 4 \\ \hline \end{array}$$

e. 5×42

hundreds	tens	ones

$$\begin{array}{r} 42 \\ \times 5 \\ \hline \end{array}$$

2. When Cindy multiplied 3×24 , she said, “ 3×4 is 12 ones. Then there’s just 2 tens left in 24, so add it to the 12 ones and you get 32 for the answer.” Do you think Cindy’s shortcut works? Explain your thinking in words and justify your response using a model or partial products.



Name _____

Date _____

1. Represent the following expressions with disks that match the partial products.

a. 1×424

hundreds	tens	ones
		● ● ● ●
	● ●	
● ● ● ●		

$$\begin{array}{r}
 424 \\
 \times \quad 1 \\
 \hline
 \end{array}$$

(1 × ___)
 (1 × ___)
 (1 × ___)

b. 3×424

thousands	hundreds	tens	ones

$$\begin{array}{r}
 424 \\
 \times \quad 3 \\
 \hline
 \end{array}$$

c. $4 \times 1,424$

thousands	hundreds	tens	ones

$$\begin{array}{r}
 1424 \\
 \times \quad 4 \\
 \hline
 \end{array}$$

d. 2×617

$$\begin{array}{r} 617 \\ \times 2 \\ \hline \end{array}$$

thousands	hundreds	tens	ones

e. 5×642

$$\begin{array}{r} 642 \\ \times 5 \\ \hline \end{array}$$

thousands	hundreds	tens	ones

f. $3 \times 3,034$

$$\begin{array}{r} 3034 \\ \times 3 \\ \hline \end{array}$$

thousands	hundreds	tens	ones



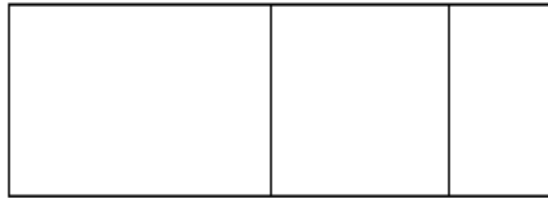
Name _____

Date _____

1. Solve the following expressions using the partial products method, and the area model.

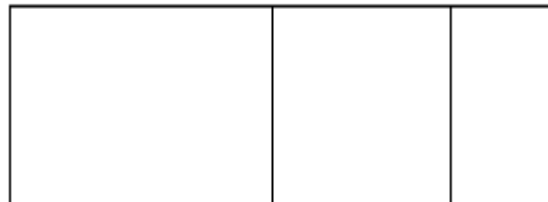
a. 8×312

$$\begin{array}{r} 312 \\ \times 8 \\ \hline \end{array}$$



b. 216×5

$$\begin{array}{r} 216 \\ \times 5 \\ \hline \end{array}$$



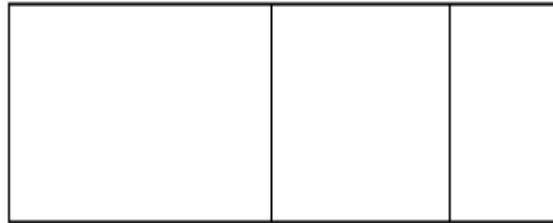
c. 593×9

$$\begin{array}{r} 593 \\ \times 9 \\ \hline \end{array}$$



2. Solve using the partial products and area model methods.

On Monday 475 people visited the museum. On Saturday there were 4 times as many visitors as there were on Monday. How many people visited the museum on Saturday?



3. Model with a tape diagram and solve any way.

6 times as much as 384

Solve any way.

4. 653×3

5. 7 times as many as 3,073.

6. A cafeteria makes 616 pounds of white rice and 508 pounds of brown rice every month. After 6 months, how many pounds of rice does the cafeteria make? Write your answer as a statement.



Name _____

1. The table shows the number of stickers of various types in Chrissy’s new sticker book. Chrissy’s four friends also own the same sticker book.

Type of Sticker	Number of Stickers
flowers	32
smiley faces	21
hearts	39

a. How many stickers does Chrissy have? _____

Chrissy

(work space)

X		

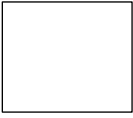
b. How many stickers do Chrissy’s friends have? _____

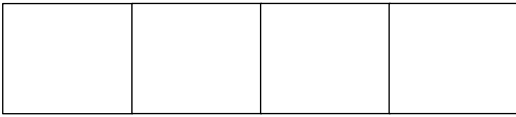
Friends

--	--	--	--

c. How many stickers do Chrissy and her four friends have altogether? _____

2. The small copier makes 437 copies each day. The large copier makes 4 times as many copies each day. How many copies does the large copier make each day?

Small Copier 

Large Copier 

X			
<hr/>			
<hr/>			

3. Jared sold 194 Boy Scout chocolate bars. Matthew sold three times as many as Jared. How many bars did Matthew sell?

a. Draw a tape diagram:

Jared

Matthew

b. Solve using partial products:

X			
<hr/>			
<hr/>			



Name _____

Date _____

Solve the following problems using arrays.

1. Linda makes booklets using 2 sheets of paper. She has 17 sheets of paper. How many of these booklets can she make? Will she have any extra paper? How many sheets?

2. Linda uses thread to sew the booklets together. She cuts 6 inches of thread for each booklet. How many booklets can she stitch with 50 inches of thread? Will she have any unused thread after stitching up the booklets? If so, how much?

3. Ms. Rochelle wants to put her 29 students into groups of 6. How many groups of 6 can she make? If she puts any remaining students in a smaller group, how many students will be in that group?



Name _____

Date _____

Show the division using disks. Check your quotient and remainder by using multiplication and addition.

1. $7 \div 3$

Ones

quotient = _____

remainder = _____

Check Your Work

2. $67 \div 3$

Tens	Ones

quotient = _____

remainder = _____

Check Your Work

3. $5 \div 2$

Ones

quotient = _____

remainder = _____

Check Your Work

4. $85 \div 2$

Tens	Ones

quotient = _____

remainder = _____

Check Your Work

5. $5 \div 4$

Ones

quotient = _____

remainder = _____

Check Your Work

6. $85 \div 4$

Tens	Ones

quotient = _____

remainder = _____

Check Your Work



Name _____

Date _____

Show the division using disks. Check your quotient and remainder by using multiplication and addition.

1. $7 \div 2$

Ones

quotient = _____

remainder = _____

Check Your Work

2. $73 \div 2$

Tens	Ones

quotient = _____

remainder = _____

Check Your Work

3. $6 \div 4$

Ones

quotient = _____

remainder = _____

Check Your Work

4. $51 \div 4$

Tens	Ones

quotient = _____

remainder = _____

Check Your Work

5. $8 \div 3$

Ones

quotient = _____

remainder = _____

Check Your Work

6. $84 \div 3$

Tens	Ones

quotient = _____

remainder = _____

Check Your Work



Name _____

Date _____

Solve using the Forgiving Method.

1. $84 \div 2$



2. $84 \div 4$



3. $48 \div 3$



4. $80 \div 5$



5. $79 \div 5$



6. $91 \div 4$



7. $91 \div 6$



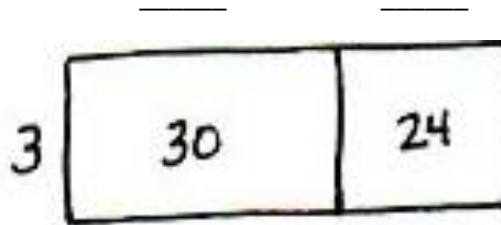
8. $91 \div 7$





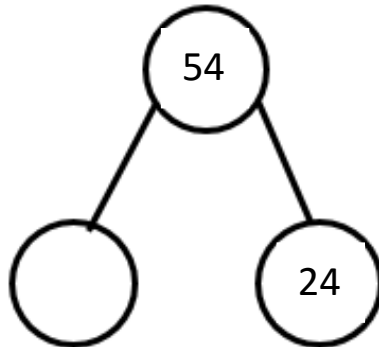
Name _____

1. Maria solved a multiplication problem by drawing an area model, but she left off the length measurements along the top. Can you figure out the missing measurements?



$$3 \times \underline{\quad} = 54$$

Show a number bond to represent Maria's area model.



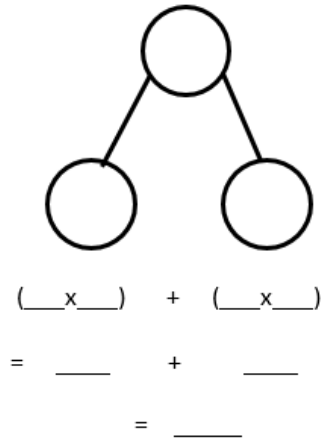
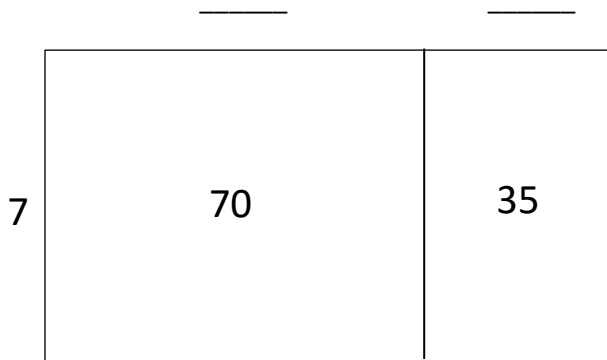
$$(\underline{\quad} \times \underline{\quad}) + (\underline{\quad} \times \underline{\quad})$$

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

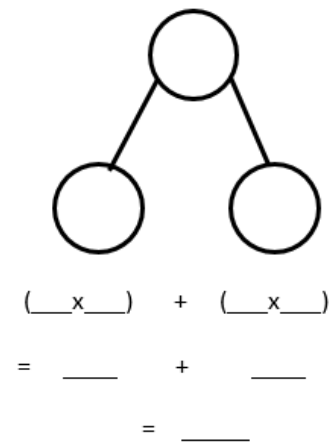
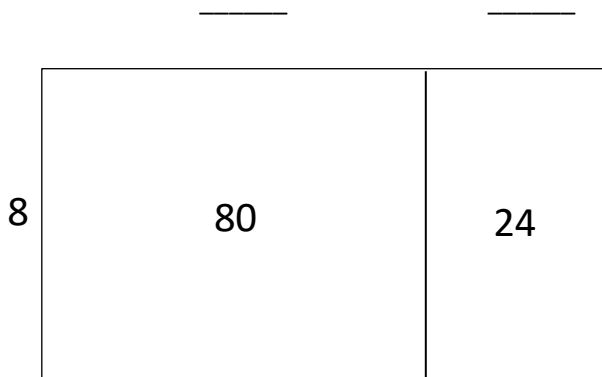
$$= \underline{\quad}$$

2. Fill in the missing lengths on the area models and complete the number bond.

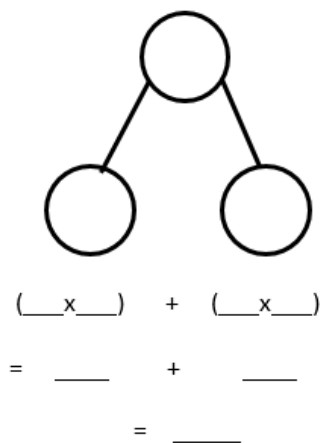
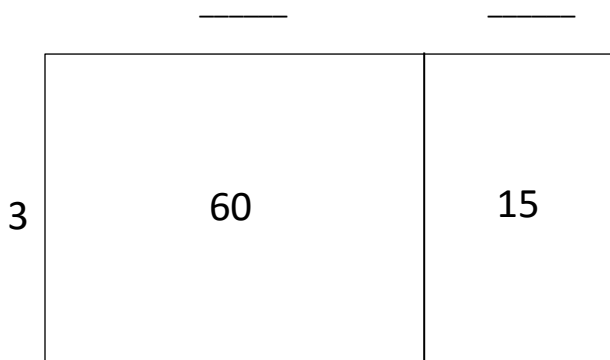
a.



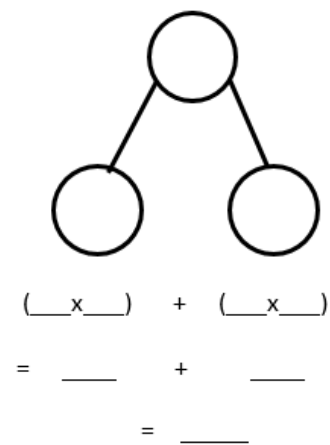
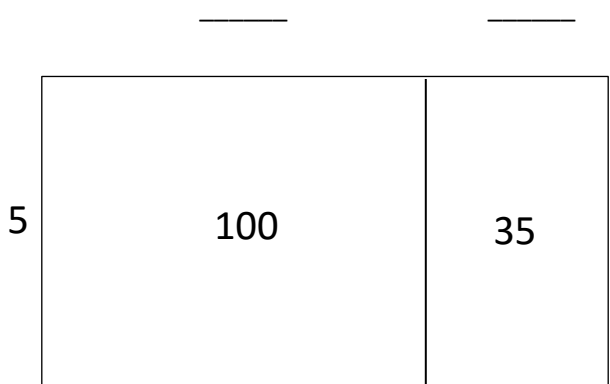
b.



c.



d.

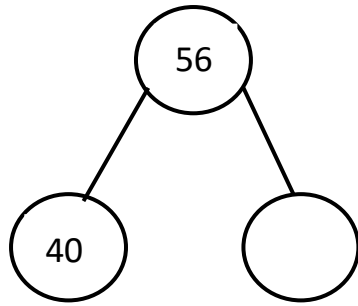




Name _____

1. Use number bonds to divide greater numbers.

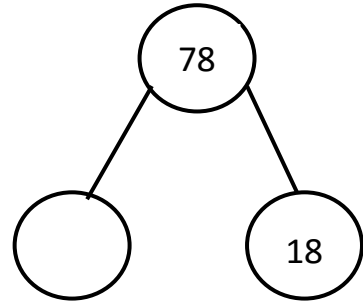
a.



$$\begin{aligned} & (_\div 4) + (_\div 4) \\ = & __ + __ \\ & = __ \end{aligned}$$

$$56 \div 4 = ______$$

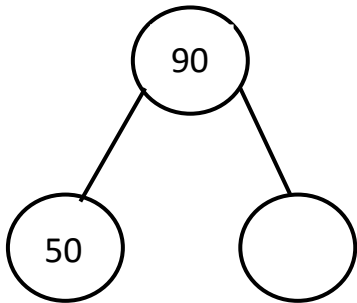
b.



$$\begin{aligned} & (_\div 6) + (_\div 6) \\ = & __ + __ \\ & = __ \end{aligned}$$

$$78 \div 6 = ______$$

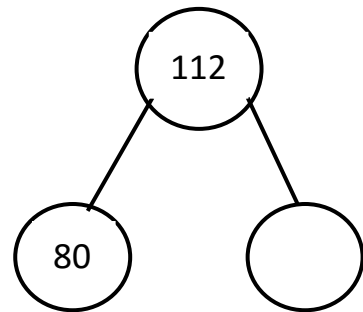
c.



$$\begin{aligned} & (_\div 5) + (_\div 5) \\ = & __ + __ \\ & = __ \end{aligned}$$

$$90 \div 5 = ______$$

d.

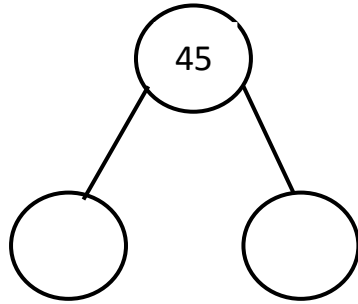


$$\begin{aligned} & (_\div 8) + (_\div 8) \\ = & __ + __ \\ & = __ \end{aligned}$$

$$112 \div 8 = ______$$

2. Decompose the whole into multiples of the divisor to complete the number bonds.

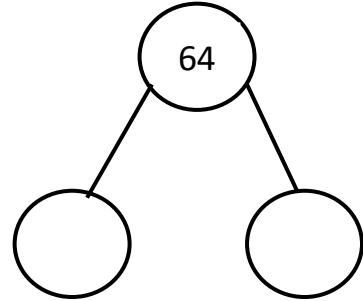
a.



$$\begin{aligned} & (_\div 3) + (_\div 3) \\ = & __ + __ \\ & = __ \end{aligned}$$

$$45 \div 3 = ______$$

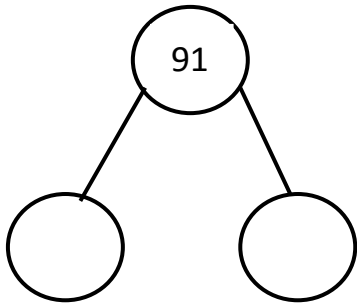
b.



$$\begin{aligned} & (_\div 4) + (_\div 4) \\ = & __ + __ \\ & = __ \end{aligned}$$

$$64 \div 4 = ______$$

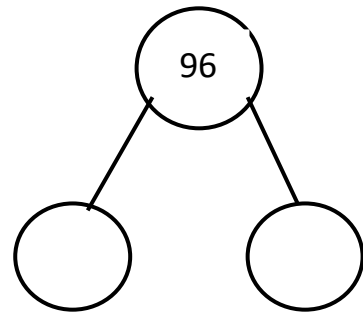
c.



$$\begin{aligned} & (_\div 7) + (_\div 7) \\ = & __ + __ \\ & = __ \end{aligned}$$

$$91 \div 7 = ______$$

d.



$$\begin{aligned} & (_\div 6) + (_\div 6) \\ = & __ + __ \\ & = __ \end{aligned}$$

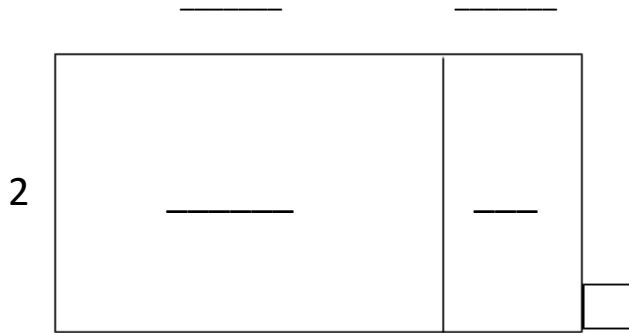
$$96 \div 6 = ______$$



Name _____

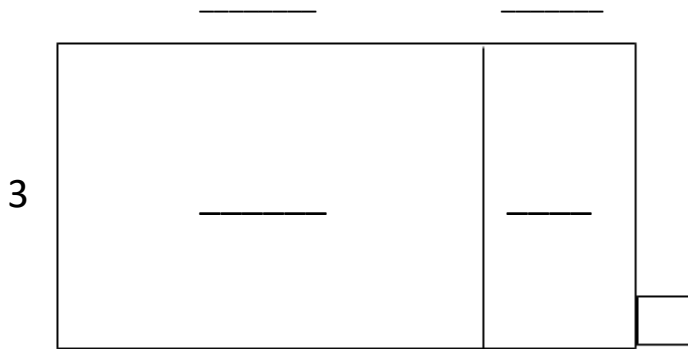
Date _____

1. Solve $35 \div 2$ using an area model.



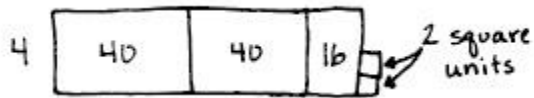
$35 \div 2 = \underline{\quad} r \underline{\quad}$

2. Solve $79 \div 3$ using an area model.




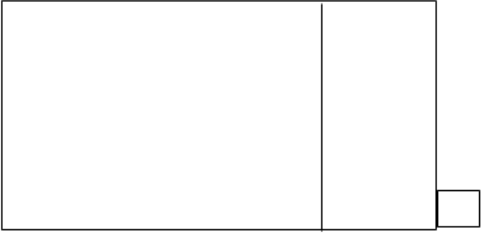

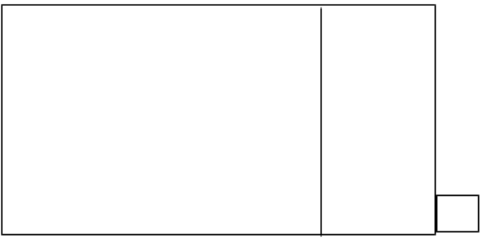
$79 \div 3 = \underline{\quad} r \underline{\quad}$

3. Paula solved the following division problem by drawing an area model.



What division problem did she solve? $\underline{\quad} \div \underline{\quad} = \underline{\quad} r \underline{\quad}$

Solve the following problems using the area model.

<p>4. $42 \div 3 = \underline{\hspace{2cm}}$</p> <div style="text-align: center; margin-top: 20px;">  </div>	<p>5. $43 \div 3 = \underline{\hspace{2cm}} r \underline{\hspace{1cm}}$</p> <div style="text-align: center; margin-top: 20px;">  </div>
<p>6. $52 \div 4 = \underline{\hspace{2cm}}$</p> <div style="text-align: center; margin-top: 20px;">  </div>	<p>7. $53 \div 4 = \underline{\hspace{2cm}} r \underline{\hspace{1cm}}$</p> <div style="text-align: center; margin-top: 20px;">  </div>

8. Ninety-seven lunch trays were placed equally in 4 stacks. How many lunch trays were in each stack? How many lunch trays will be leftover?



Name _____

Date _____

1. Record the factors of the given numbers as multiplication sentences and as a list in order from least to greatest. Classify each as prime (P) or composite (C). The first problem is done for you.

	Multiplication Sentences	Factors	P or C
a.	8 $1 \times 4 = 8$ $2 \times 4 = 8$	The factors of 8 are: 1, 2, 4, and 8	C
b.	10	The factors of 10 are:	
c.	11	The factors of 11 are:	
d.	14	The factors of 14 are:	
e.	17	The factors of 17 are:	
f.	20	The factors of 20 are:	
g.	22	The factors of 22 are:	
h.	23	The factors of 23 are:	

i.	25	The factors of 25 are:	
j.	26	The factors of 26 are:	
k.	27	The factors of 27 are:	
l.	28	The factors of 28 are:	

2. Bryan says that only even numbers are composite.
- List all of the odd numbers less than 20 in numerical order.
 - Use your list to show that Bryan's claim is false.



Name _____

Date _____

3. Explain your thinking, or use division or multiplication to answer the following.

a. Is 2 a factor of 72?	b. Is 2 a factor of 73?
c. Is 3 a factor of 72?	d. Is 2 a factor of 60?
e. Is 6 a factor of 72?	f. Is 4 a factor of 60?
g. Is 5 a factor of 72?	h. Is 8 a factor of 60?

2. Use the associative property to find more factors of 12 and 30.

a. $12 = 4 \times 3$

$= (\underline{\quad} \times 2) \times 3$

$= \underline{\quad} \times (2 \times 3)$

$= \underline{\quad} \times 6$

$= \underline{\quad}$

b. $30 = \underline{\quad} \times 5$

$= (\underline{\quad} \times 3) \times 5$

$= \underline{\quad} \times (3 \times 5)$

$= \underline{\quad} \times 15$

$= \underline{\quad}$

2. Use the forgiving method of division to show that 5 is a factor of 70, 80, and 90.

$70 \div 5$

$80 \div 5$

$90 \div 5$





Name _____

Date _____

1. List the numbers that have 30 as a multiple.

2. Use mental math, division, or the associate property to solve.

a. Is 12 a multiple of 3? _____ Is 3 a factor of 12? _____

b. Is 48 a multiple of 8? _____ Is 48 a factor of 8? _____

c. Is 56 a multiple of 6? _____ Is 6 a factor of 56? _____

3. List three prime numbers. _____

4. Can a prime number be a multiple of any other number except itself?
Explain your reasons why or why not.

5. Follow the directions below.

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	32	33	34	35	36	37	38	39	40
41	42	43	44	45	46	47	48	49	50
51	52	53	54	55	56	57	58	59	60
61	62	63	64	65	66	67	68	69	70
71	72	73	74	75	76	77	78	79	80
81	82	83	84	85	86	87	88	89	90
91	92	93	94	95	96	97	98	99	100

- a. Underline the multiples of 6. When a number is a multiple of 6, what are the possible values for the ones digit? _____
- b. Draw a square around the multiples of 4. Look at the multiples of 4 that have an odd number in the tens place. What values do they have in the ones place?

- c. Circle the multiples of 9. Choose one. What do you notice about the sum of the digits? Choose another one. What do you notice about the sum of the digits?



Name _____

Date _____

1. Draw number disks to represent the following problems. Rewrite each in unit form and solve.

a. $6 \div 3 =$ _____ (1) (1) (1) (1) (1) (1)

6 ones $\div 3 =$ _____ ones

b. $60 \div 3 =$ _____

6 tens $\div 3 =$ _____

c. $600 \div 3 =$ _____

_____ $\div 3 =$ _____

d. $6,000 \div 3 =$ _____

_____ $\div 3 =$ _____

e. $8 \div 4 =$ _____

8 ones $\div 4 =$ _____ ones

f. $80 \div 4 =$ _____

_____ $\div 4 =$ _____

g. $800 \div 4 =$ _____

_____ $\div 4 =$ _____

2. Rewrite each in unit form. Solve for the quotient.

a. $800 \div 4 = 200$ 8 hundreds $\div 4 =$ 2 hundreds	b. $900 \div 3$	c. $400 \div 2$
d. $200 \div 4$ 20 tens $\div 4 =$ _____ tens	e. $160 \div 2$	f. $400 \div 5$
g. $1,200 \div 3$ 12 hundreds $\div 3 =$ _____ hundreds	h. $1,600 \div 4$	i. $2,400 \div 4$

Draw tape diagrams to solve.

4. A fleet of five fire engines carries a total of 20,000 liters of water. If each truck holds the same amount of water, how many liters of water does each truck carry?
5. Jamie drank 4 times as much juice as Brodie. Jamie drank 280 mL of juice. How much juice did Brodie drink?



Name _____

Date _____

1. Divide using the forgiving method.

a. $378 \div 2$



b. $795 \div 3$



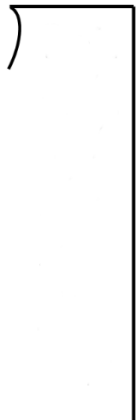
c. $512 \div 4$



d. $492 \div 4$



e. $539 \div 3$



f. $862 \div 5$



g. $498 \div 3$



h. $783 \div 5$



i. $621 \div 4$



j. $531 \div 4$



2. Selena's dog completed an obstacle course that was 932 meters long. There were 4 parts to the course, all equal in length. How long was 1 part of the course?



Name _____

Date _____

1. Divide using the Forgiving Method.

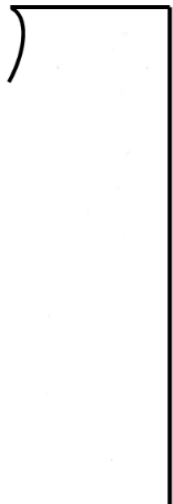
a. $2,464 \div 4$



b. $1,828 \div 3$



c. $9,426 \div 3$



d. $6,587 \div 2$



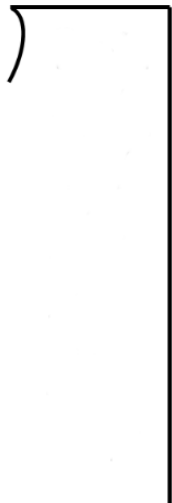
e. $5,425 \div 3$



f. $5,425 \div 2$



g. $8,427 \div 3$



h. $8,426 \div 3$





Name _____

Draw tape diagrams to solve. Identify if the group size or the number of groups is unknown.

1. 500 mL of juice was shared equally by 4 children. How much juice did each child get?

___ group size unknown

___ number of groups unknown

2. Kelly separated 618 cookies into baggies. Each baggie contained 3 cookies. How many baggies of cookies did Kelly make?

___ group size unknown

___ number of groups unknown

3. Jeff biked the same distance each day for 5 days. If he travelled 350 miles altogether, how many miles did he travel each day?

___ group size unknown

___ number of groups unknown

4. A piece of ribbon 876 inches long was cut by a machine into 4-inch long strips to be made into bows. How many strips were cut?

___ group size unknown

___ number of groups unknown



Name _____

Date _____

Use the forgiving method of division to solve.

1. Mary bought a package of 435 party favors to give to the guests at her birthday party. She planned to give 9 party favors to each guest. How many guests is she expecting?

2. 4,000 pencils were donated to an elementary school. If 8 classrooms shared the pencils equally, how many pencils did each class receive?

3. 2,008 kilograms of potatoes were packed into sacks weighing 8 kilograms each. How many sacks were packed?



4. A baker made 7 batches of muffins. There were a total of 252 muffins. If there were the same number of muffins in each batch, how many muffins were in a batch?





Name _____

Date _____

Use an area model to represent the following expressions in word form.
Record the partial products and solve.

1. 30×17

<p>30</p> <p>____ tens x ____ tens =</p> <p>____ hundreds =</p> <p>_____</p>	<p>____ tens x ____ =</p> <p>____ tens =</p> <p>_____</p>
--	---

$$\begin{array}{r} 30 \\ \times 17 \\ \hline \end{array}$$

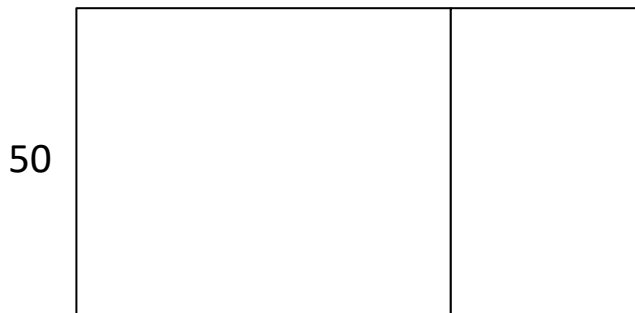
2. 40×58

<p>40</p> <p>____ tens x ____ tens =</p> <p>____ hundreds =</p> <p>_____</p>	<p>____ tens x ____ =</p> <p>____ tens =</p> <p>_____</p>
--	---

$$\begin{array}{r} 40 \\ \times 58 \\ \hline \end{array}$$

Draw an area model to represent the following expressions in standard form.
Record the partial products vertically and solve.

3. 50×38



$$\begin{array}{r} 50 \\ \times 38 \\ \hline \end{array}$$

4. 60×19



$$\begin{array}{r} \\ \times \\ \hline \end{array}$$

Solve using partial products.

5. 20×88

$$\begin{array}{r} \\ \times \\ \hline \end{array}$$

6. 30×8

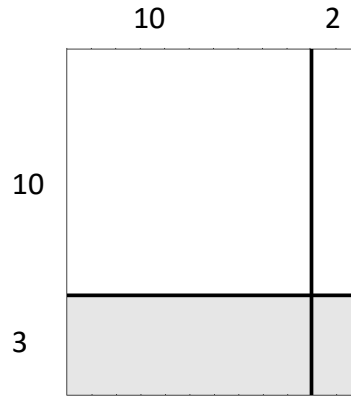
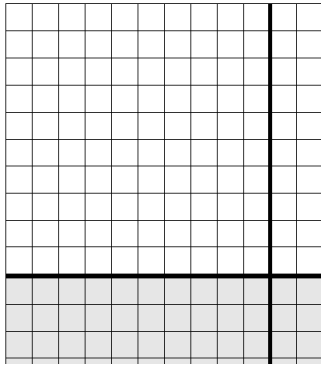
$$\begin{array}{r} \\ \times \\ \hline \end{array}$$



Name _____

Date _____

1. Write the expression shown by these area models. _____ x _____



Use the distributive property to find the product.

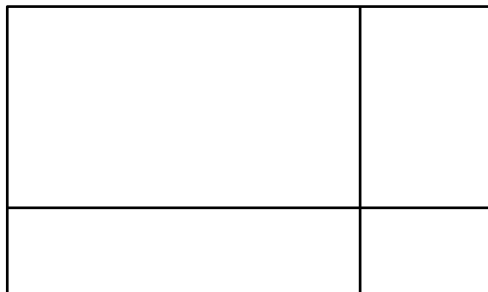
$$13 \times 12 = (10 \times \underline{\quad}) + (10 \times \underline{\quad}) + (3 \times \underline{\quad}) + (3 \times \underline{\quad})$$

$$13 \times 12 = \underline{\quad} + \underline{\quad} + \underline{\quad} + \underline{\quad}$$

$$13 \times 12 = \underline{\quad}$$

Use an area model to represent the following expressions. Record the partial products and solve.

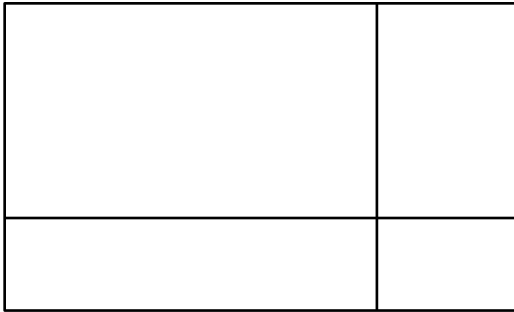
2. 34×17



$$\begin{array}{r} 34 \\ \times 17 \\ \hline \\ \hline \\ \hline \\ \hline \\ + \\ \hline \end{array}$$

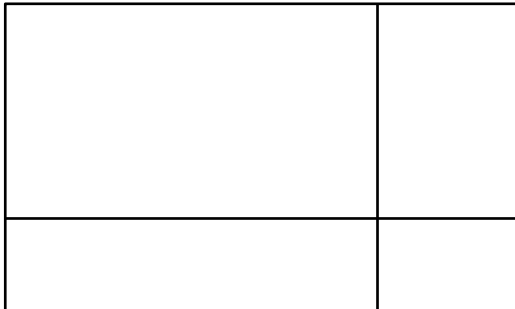
Draw an area model to represent the following expressions. Record the partial products vertically and solve.

3. 45×18



$$\begin{array}{r} \times \\ \hline \\ \hline \\ \hline \\ \hline \\ + \\ \hline \end{array}$$

4. 45×19



$$\begin{array}{r} \times \\ \hline \\ \hline \\ \hline \\ \hline \\ + \\ \hline \end{array}$$

Solve using four partial products.

5. 12×47

$$\begin{array}{r} \times \\ \hline \\ \hline \\ \hline \\ \hline \\ + \\ \hline \end{array}$$

6. 23×93

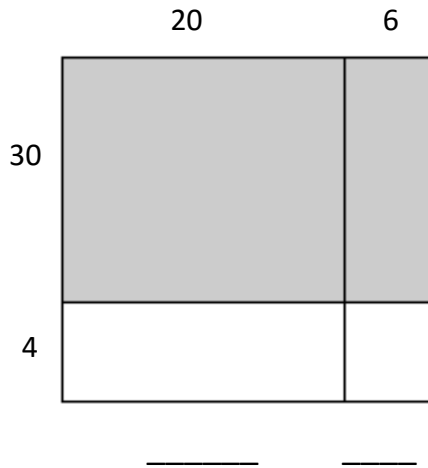
$$\begin{array}{r} \times \\ \hline \\ \hline \\ \hline \\ \hline \\ + \\ \hline \end{array}$$



Name _____

Date _____

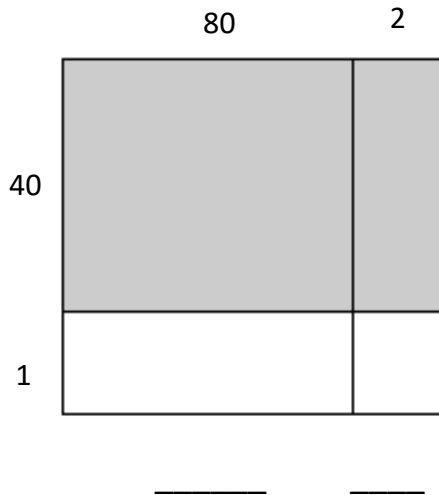
1. Solve using the area model. Add the columns to record two partial products.



$$\begin{array}{r}
 34 \\
 \times 26 \\
 \hline
 \end{array}$$

6 ones × 34 ones

2 tens × 34 ones



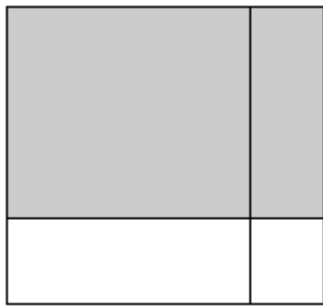
$$\begin{array}{r}
 41 \\
 \times 82 \\
 \hline
 \end{array}$$

2 ones × 41 ones

8 tens × 41 ones

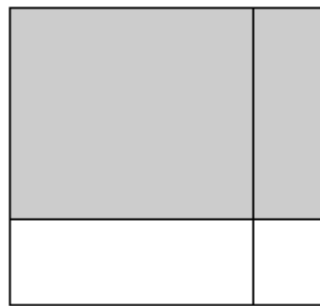
2. Solve using the area model. Add the columns to record two partial products.

a. 68×23



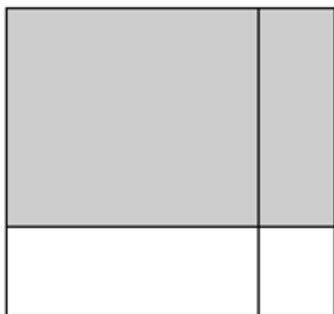
$$\begin{array}{r} 68 \\ \times 23 \\ \hline \end{array}$$

b. 49×33



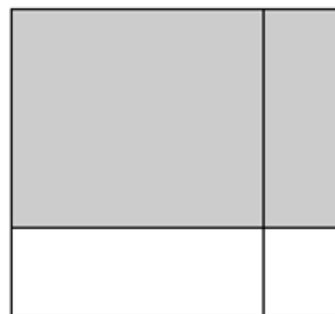
$$\begin{array}{r} 49 \\ \times 33 \\ \hline \end{array}$$

c. 16×25



$$\begin{array}{r} 16 \\ \times 25 \\ \hline \end{array}$$

d. 54×71



$$\begin{array}{r} 54 \\ \times 71 \\ \hline \end{array}$$
