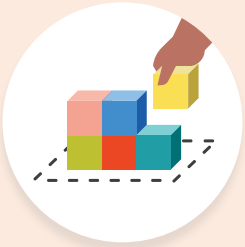
Amplify Desmos Math

Grade 5

Centers Resources

CENTER
Directions



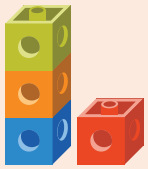
Can You Build It?

Stage 2

Let's build multiple rectangular prisms with a given volume.

Pairs

You'll need . . .


connecting cubes


folders

Number Cards, 0–5


Recording Sheet

Set-up

- Draw two Number Cards and make a two-digit number. If you draw a 0, it must be the second digit. This is the target volume for this round.

How to Play

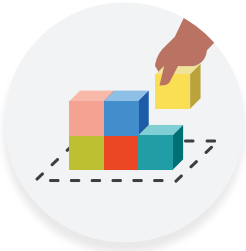
1. Each player secretly builds a rectangular prism with the target volume.
2. Record and compare the dimensions of your prisms.
3. If both prisms have the same dimensions, you earn 1 point. If both prisms have different dimensions, you earn 2 points.
4. Repeat for the same target volume until one or both players cannot build another prism.

How to Win

- Keep playing, trying to earn at least 5 points.

Name _____ Date _____

CENTER
Recording Sheet



Can You Build It?

Stage 2

Target volume	My dimensions	My partner's dimensions	Score

Can You Draw It?

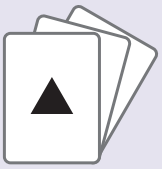
Stage 7

Let's describe and draw triangles and quadrilaterals.

Pairs

You'll need . . .


Quadrilateral Cards, Grade 5


Triangle Cards, Grade 5


Recording Sheet

Set-up

- Place the cards facedown in a pile.

How to Play

1. **Player A:** Choose a card. Do not show it to your partner! Describe the shape so your partner can draw it.
2. **Player B:** Draw the shape you think is on the card.
3. Compare the shapes. If the shapes match, Player A keeps the card. If the shapes do not match, place the card facedown at the bottom of the pile.
4. Take turns.

How to Win

- The player who earns more cards after 8 rounds wins.

Name _____ Date _____

CENTER
Recording Sheet

Can You Draw It?

Stage 7

Round	Drawing	Round	Drawing
1		5	
2		6	
3		7	
4		8	

Capture Squares

Stage 7

Let's multiply numbers (6–9).

Pairs

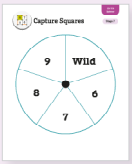
You'll need . . .


2 crayons or colored pencils


number cube


paper clip


Gameboard



Spinner

How to Play

1. Roll the number cube and spin the Spinner. Determine the product.
2. Draw 1 line connecting any 2 dots around the product. If you cannot draw a line, roll the number cube and spin again.
3. If you complete a square, shade the box with your color.
4. Take turns.

How to Win

- The first player to shade 3 boxes wins.

Capture Squares

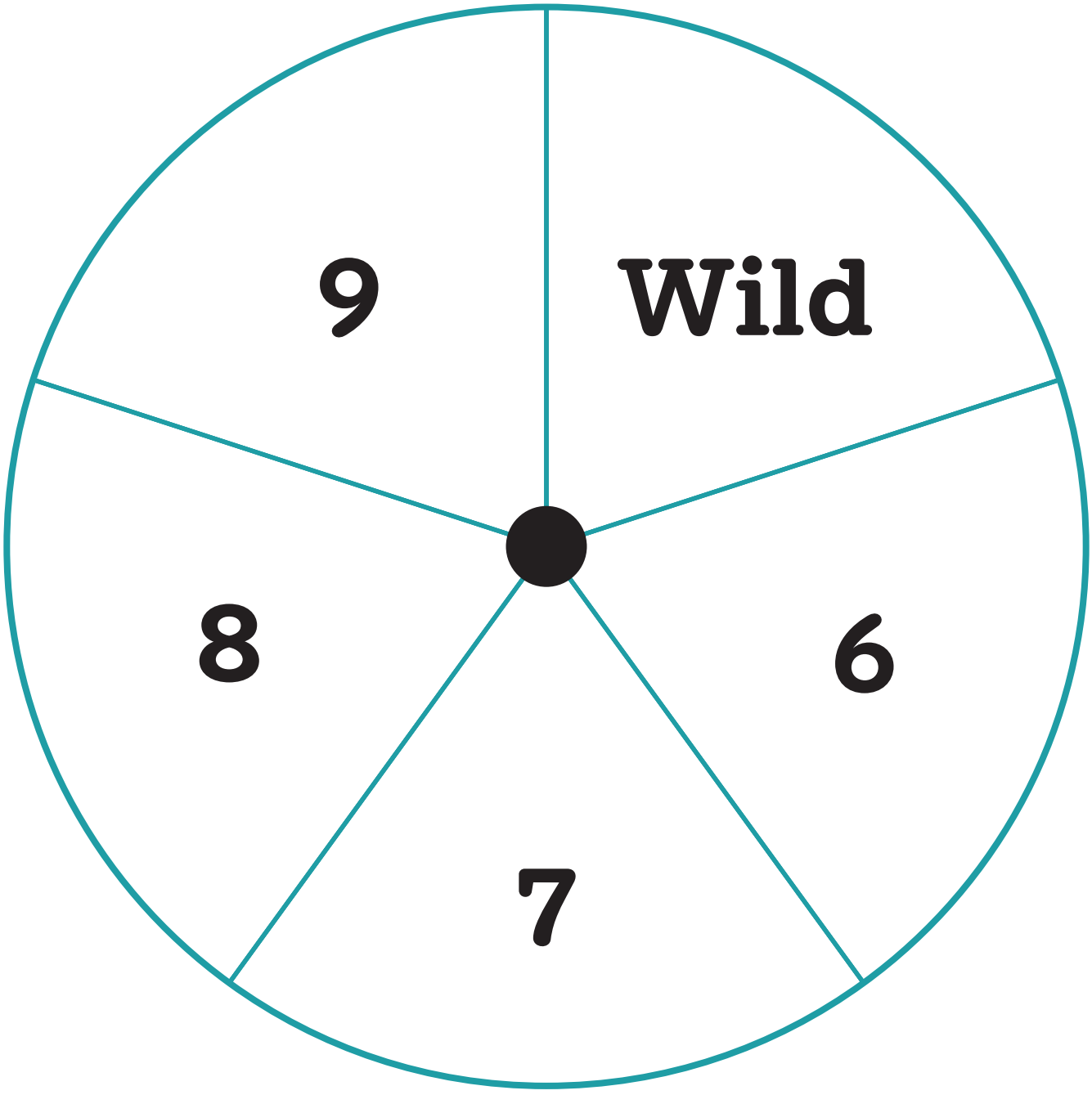
Stage 7

24	32	36	9	14
42	18	35	54	30
7	28	multiple of 9	6	16
24	12	8	27	48
36	45	21	40	18

CENTER
Spinner

Capture Squares

Stage 7



Compare

Stage 9

Let's compare expressions.

Pairs

You'll need . . .

Expression Cards

Set-up

- Divide the cards between both players. Place your cards facedown in a pile.

How to Play

1. Each player flips over a card. Compare the values.
2. The player with the greater value keeps both cards. Place the cards you win faceup in another pile.
3. If the values are equivalent, each player flips over 1 more card. The player with the greater value keeps all 4 cards.
4. Play until you run out of facedown cards.

How to Win

- The player with more cards at the end of the game wins.

Compare

Stage 9

CENTER
Expression Cards
(p. 1 of 4)

Directions: Make one copy per pair of students. Pre-cut the cards and distribute them so that each pair receives one set of cards.

23,400 + 12,002 Compare, Stage 9	43,001 + 102,300 Compare, Stage 9
27,000 + 821,800 Compare, Stage 9	91,004 + 89,001 Compare, Stage 9
902,005 + 81,900 Compare, Stage 9	82,000 + 28,000 Compare, Stage 9
27,300 – 16,100 Compare, Stage 9	86,900 – 42,300 Compare, Stage 9

Compare

Stage 9

30,204 – 8,000 Compare, Stage 9	100,000 – 72,700 Compare, Stage 9
182,000 – 18,600 Compare, Stage 9	109,203 – 73,001 Compare, Stage 9
8,354 × 5 Compare, Stage 9	5,294 × 8 Compare, Stage 9
9,263 × 4 Compare, Stage 9	4,826 × 9 Compare, Stage 9

Compare

Stage 9

$7{,}934 \times 6$ Compare, Stage 9	$6{,}839 \times 7$ Compare, Stage 9
36×24 Compare, Stage 9	28×42 Compare, Stage 9
54×25 Compare, Stage 9	68×29 Compare, Stage 9
74×56 Compare, Stage 9	47×32 Compare, Stage 9

Compare

Stage 9

2,286 ÷ 3 Compare, Stage 9	1,244 ÷ 4 Compare, Stage 9
5,286 ÷ 6 Compare, Stage 9	2,530 ÷ 5 Compare, Stage 9
6,972 ÷ 3 Compare, Stage 9	8,728 ÷ 4 Compare, Stage 9
6,905 ÷ 5 Compare, Stage 9	8,728 ÷ 8 Compare, Stage 9

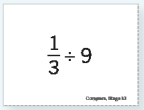
Compare

Stage 10

Let's compare expressions.

Pairs

You'll need . . .



Expression Cards

Set-up

- Divide the cards between both players. Place your cards facedown in a pile.

How to Play

1. Each player flips over a card. Compare the expressions to determine which one has a greater value.
2. The player with the greater value keeps both cards. Place the cards you win faceup in another pile.
3. If the values are equivalent, each player flips over 1 more card. The player with the greater value keeps all 4 cards.
4. Play until you run out of facedown cards.

How to Win

- The player with more cards at the end of the game wins.

Compare

Stage 10

Directions: Make one copy per pair of students. Pre-cut the cards and distribute them so that each pair receives one set of cards.

$\frac{1}{3} \div 9$ Compare, Stage 10	$\frac{1}{4} \div 12$ Compare, Stage 10	$12 \div \frac{1}{3}$ Compare, Stage 10
$\frac{1}{7} \div 4$ Compare, Stage 10	$\frac{1}{6} \div 5$ Compare, Stage 10	$10 \div \frac{1}{4}$ Compare, Stage 10
$\frac{1}{4} \div 6$ Compare, Stage 10	$\frac{1}{2} \div 2$ Compare, Stage 10	$5 \div \frac{1}{6}$ Compare, Stage 10
$\frac{1}{5} \div 5$ Compare, Stage 10	$\frac{1}{8} \div 3$ Compare, Stage 10	$8 \div \frac{1}{3}$ Compare, Stage 10

Compare

Stage 10

$12 \div \frac{1}{5}$	$\frac{5}{8} \times \frac{1}{4}$	$\frac{4}{8} \times \frac{1}{2}$
Compare, Stage 10	Compare, Stage 10	Compare, Stage 10
$5 \div \frac{1}{5}$	$\frac{2}{8} \times \frac{5}{4}$	$\frac{5}{9} \times \frac{1}{5}$
Compare, Stage 10	Compare, Stage 10	Compare, Stage 10
$8 \div \frac{1}{4}$	$\frac{3}{5} \times \frac{4}{6}$	$\frac{4}{5} \times \frac{5}{6}$
Compare, Stage 10	Compare, Stage 10	Compare, Stage 10
$5 \div \frac{1}{6}$	$\frac{1}{6} \times \frac{3}{5}$	$\frac{1}{8} \times \frac{1}{3}$
Compare, Stage 10	Compare, Stage 10	Compare, Stage 10

Compare

Stage 10

3×12 Compare, Stage 10	8×5 Compare, Stage 10	4×5 Compare, Stage 10
5×6 Compare, Stage 10	4×6 Compare, Stage 10	4×3 Compare, Stage 10
3×3 Compare, Stage 10	2×3 Compare, Stage 10	2×8 Compare, Stage 10
12×5 Compare, Stage 10	6×8 Compare, Stage 10	5×8 Compare, Stage 10

Cover Up

Stage 14

Let's multiply two-digit factors.

Pairs

You'll need . . .


2 base-ten units


two-color counters


Gameboard A or B


Recording Sheet

Set-up

- Choose a Gameboard.
- Choose who will use red counters and who will use yellow counters.

How to Play

1. **Player A:**
   - Place a cube on any two numbers in the gray rows. More than one cube can be on the same number. Multiply the numbers.
   - Cover the product of the two numbers with a counter.
   - Record the multiplication expression and product.
2. **Player B:**
   - Move one of the cubes. Multiply the numbers.
   - If the product is not already covered with a counter, cover it.
   - Record the multiplication expression and product.
3. Take turns moving one cube at a time. Record each multiplication expression and product, even if you were unable to cover the product.

How to Win

- The first player to cover 6 squares in a row wins.

Cover Up

Stage 14

252	351	630	360	312	168
360	576	273	315	294	900
420	324	729	144	810	441
156	405	336	450	210	504
195	648	390	169	720	288
225	196	182	567	180	378

12	13	14	15
21	24	27	30

Cover Up

Stage 14

100	160	170	180	200	220
256	260	272	280	288	289
306	320	324	340	352	360
374	396	400	416	440	442
448	468	476	484	504	520
560	572	616	676	728	784

10	16	17	18
20	22	26	28

Name _____ Date _____

CENTER
Recording Sheet

Cover Up

Stage 14

Multiplication expression	Product

CENTER
Directions

Equation Challenge

Stage 9

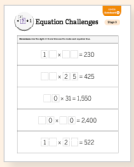
Let's use the digits 0–9 to make the equations true.

Pairs

You'll need . . .


dry-erase markers

sheet protectors

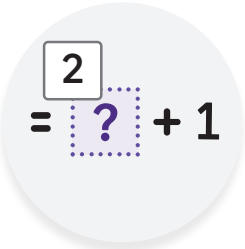

Gameboards A–H

Set-up

- Choose a Gameboard.

How to Play

1. Work together to write the digits 0–9 to make each equation true.
2. Each digit can only be written one time on each Gameboard.
3. Choose a new Gameboard, and start again.

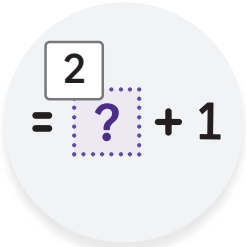


Equation Challenges

Stage 9

Directions: Use the digits 0–9 one time each to make each equation true.

$1\square \times \square\square = 230$
$\square\square \times 25 = 425$
$\square 0 \times 31 = 1{,}550$
$\square 0 \times \square 0 = 2{,}400$
$1\square \times 2\square = 522$



Equation Challenges

Stage 9

Directions: Use the digits 0–9 one time each to make each equation true.

$11 \times \square\,2 = 3\,\square\,2$

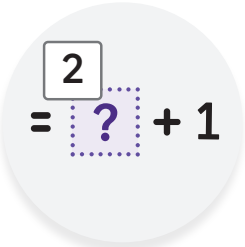
$4\,\square \times 20 = 9\,2\,\square$

$\square\,\square \times 25 = 675$

$10 \times \square\,\square = 890$

$\square\,1 \times 1\,\square = 154$

CENTER
Gameboard C

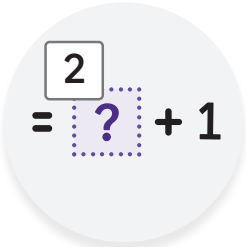


Equation Challenges

Stage 9

Directions: Use the digits 0–9 one time each to make each equation true.

$\square\,1 \times 1\,\square = 1{,}349$
$\square\,\square \times 30 = 1{,}800$
$\square\,5 \times \square\,1 = 775$
$4\,\square \times 3\,\square = 1{,}395$
$3\,\square \times 23 = 8\,7\,\square$

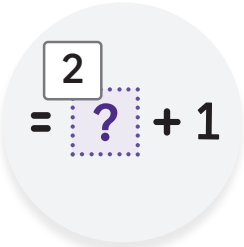


Equation Challenges

Stage 9

Directions: Use the digits 0–9 one time each to make each equation true.

$\square 1 \times 1 \square = 610$
$\square\square \times 41 = 3{,}239$
$\square 7 \times \square 4 = 1{,}428$
$5 \square \times 1 \square = 795$
$1 \square \times 47 = 5 6 \square$

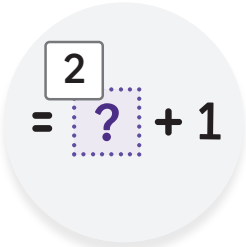


Equation Challenges

Stage 9

Directions: Use the digits 0–9 one time each to make each equation true.

$\square\,0 \times \square\,0 = 4{,}200$
$\square\,\square \times 3\,0 = 540$
$5\,2 \times \square\,\square = 4{,}680$
$\square\,5 \times 6\,\square = 1{,}600$
$\square\,\square \times 3\,5 = 1{,}225$

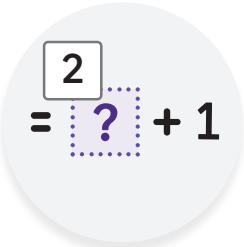


Equation Challenges

Stage 9

Directions: Use the digits 0–9 one time each to make each equation true.

$\square\,0 \times \square\,6 = 3{,}240$
$2\,\square \times 5\,\square = 1{,}300$
$\square\,\square \times 2\,4 = 1{,}800$
$4\,8 \times \square\,\square = 4{,}032$
$\square\,\square \times 6\,2 = 744$

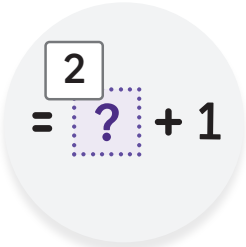


Equation Challenges

Stage 9

Directions: Use the digits 0–9 one time each to make each equation true.

$\square\square \times 18 = 63\square$
$\square 5 \times 3\square = 2{,}080$
$1\square \times 17 = 23\square$
$59 \times 6\square = 3\square 17$
$\square\square \times 26 = 2{,}366$



Equation Challenges

Stage 9

Directions: Use the digits 0–9 one time each to make each equation true.

$\square\,5 \times \square\,5 = 5{,}525$
$\square\,\square \times 1\,3 = 403$
$6\,\square \times 5\,\square = 3{,}410$
$5\,\square \times 7\,\square = 3{,}500$
$8\,2 \times \square\,\square = 4{,}018$

CENTER
Directions

Equation Challenge

Stage 10

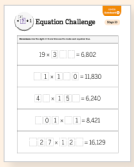
Let's use the digits 0–9 to make the equations true.

Pairs

You'll need . . .


dry-erase markers

sheet protectors

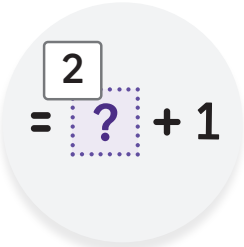

Gameboards A–H

Set-up

- Choose a Gameboard.

How to Play

1. Work together to write the digits 0–9 to make each equation true.
2. Each digit card can only be written one time on each Gameboard.
3. Choose a new Gameboard, and start again.



Equation Challenge

Stage 10

Directions: Use the digits 0–9 one time each to make each equation true.

$19 \times 3\square\square = 6{,}802$

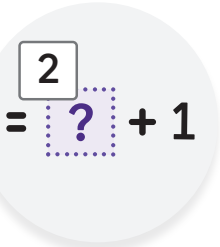
$\square 1 \times 1\square 0 = 11{,}830$

$4\square \times 15\square = 6{,}240$

$\square 01 \times \square 1 = 8{,}421$

$\square 27 \times 12\square = 16{,}129$

CENTER
Gameboard B



Equation Challenge

Stage 10

Directions: Use the digits 0–9 one time each to make each equation true.

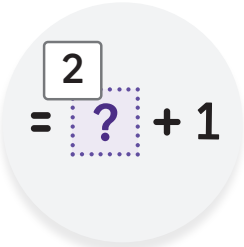
$15 \times 2\square\square = 3{,}510$

$\square 1 \times 1\square 0 = 10{,}650$

$7\square \times 11\square = 8{,}330$

$\square 35 \times \square 1 = 19{,}035$

$\square 52 \times 24\square = 37{,}392$



Equation Challenge

Stage 10

Directions: Use the digits 0–9 one time each to make each equation true.

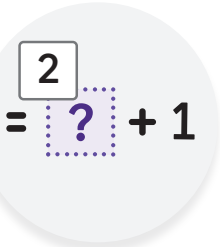
$52 \times 3\square\square = 17{,}212$

$\square 1 \times 1\square 0 = 3{,}990$

$4\square \times 52\square = 23{,}144$

$\square 25 \times \square 1 = 37{,}275$

$\square 11 \times 32\square = 259{,}520$



Equation Challenge

Stage 10

Directions: Use the digits 0–9 one time each to make each equation true.

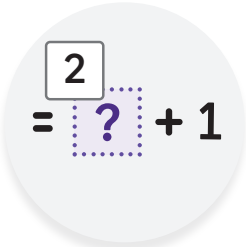
$12 \times 3\square\square = 4{,}548$

$\square 1 \times 1\square 0 = 7{,}380$

$2\square \times 49\square = 12{,}250$

$\square 74 \times \square 5 = 9{,}590$

$\square 51 \times 26\square = 169{,}911$

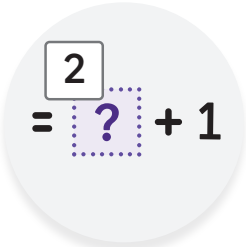


Equation Challenge

Stage 10

Directions: Use the digits 0–9 one time each to make each equation true.

$\square\square \times 6\square\square = 22{,}260$
$\square 1 \times 1\square 0 = 7{,}380$
$1\square \times 17\square = 2{,}040$
$\square 34 \times \square 5 = 40{,}425$
$\square 20 \times 23\square = 28{,}680$

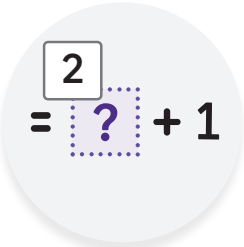


Equation Challenge

Stage 10

Directions: Use the digits 0–9 one time each to make each equation true.

$\square\,4 \times 1\,\square\,0 = 5{,}940$
$\square\,1\,6 \times 3\,\square = 7{,}992$
$\square\,1\,0 \times 2\,\square = 17{,}690$
$6\,7 \times 1\,\square\,\square = 9{,}246$
$4\,\square \times 1\,0\,\square = 4{,}400$



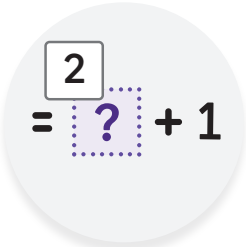
Equation Challenge

Stage 10

Directions: Use the digits 0–9 one time each to make each equation true.

$\square 35 \times 15 \square = 36{,}190$
$\square 01 \times 8 \square = 24{,}381$
$1 \square \times 36 \square = 6{,}205$
$\square 0 \times 1 \square 0 = 14{,}400$
$25 \times 1 \square \square = 2{,}700$

CENTER
Gameboard H



Equation Challenge

Stage 10

Directions: Use the digits 0–9 one time each to make each equation true.

$\square\square \times 341 = 20{,}801$
$91 \times 5\square\square = 47{,}593$
$4\square \times 70\square = 28{,}360$
$14\square \times \square 5 = 10{,}800$
$\square 15 \times 30\square = 158{,}620$

Flipping for Fractions

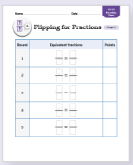
Stage 1

Let's make equivalent fractions.

Pairs

You'll need . . .

Number Cards, 1–9



Recording Sheet

Set-up

- Shuffle two sets of Number Cards and arrange them facedown in an array.

How to Play

1. **Player A:** Flip over 3 Number Cards.
2. Use two or three of the numbers to make the first fraction on your Recording Sheet. For example, if you flipped a 1, 2, and 3, you could make the fraction $\frac{1}{2}$ or the fraction $\frac{3}{12}$. Do not show your partner your fraction.
3. Set the first 3 cards aside. Flip over another 3 Number Cards. Try to make a second fraction that is equivalent to your first fraction. If you need to, you can set aside 1 or more of the Number Cards and flip over replacements one time. If you can make an equivalent fraction, record it, and you earn 1 point. Otherwise, your turn is over.
4. **Player B:** Complete Steps 1–3 to complete the round.

How to Win

- The player who earns more points after 5 rounds wins.

Name _____ Date _____

CENTER
Recording Sheet

Flipping for Fractions

Stage 1

Round	Equivalent fractions	Points
1	$\frac{\square}{\square} = \frac{\square}{\square}$	
2	$\frac{\square}{\square} = \frac{\square}{\square}$	
3	$\frac{\square}{\square} = \frac{\square}{\square}$	
4	$\frac{\square}{\square} = \frac{\square}{\square}$	
5	$\frac{\square}{\square} = \frac{\square}{\square}$	

CENTER
Directions

Flipping for Fractions

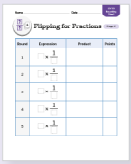
Stage 2

Let's multiply a whole number and a unit fraction.

Pairs

You'll need . . .

Number Cards, 1–9



Recording Sheet

Set-up

- Arrange the Number Cards facedown in an array.

How to Play

1. **Player A:** Flip over 2 Number Cards.
2. Use the numbers to make a multiplication expression on your Recording Sheet. Do not show your partner your expression.
3. Determine the product. Record it. Do not show your partner your product.
4. **Player B:** Replace the cards, shuffle, and rearrange them facedown again. Complete Steps 1–3.
5. Compare the products. The player with the product closer to 1 earns 1 point.

How to Win

- The player who earns more points after 5 rounds wins.

Name _____ Date _____

CENTER
Recording Sheet

Flipping for Fractions

Stage 2

Round	Expression	Product	Points
1	$\square \times \frac{1}{\square}$		
2	$\square \times \frac{1}{\square}$		
3	$\square \times \frac{1}{\square}$		
4	$\square \times \frac{1}{\square}$		
5	$\square \times \frac{1}{\square}$		

Flipping for Fractions

Stage 3

Let's multiply a whole number and a fraction.

Pairs

You'll need . . .

Number Cards, 1–9

Recording Sheet

Set-up

- Arrange the Number Cards facedown in an array.

How to Play

1. **Player A:** Flip over 3 Number Cards.
2. Use the numbers to make a multiplication expression on your Recording Sheet. Do not show your partner your expression.
3. Determine the product. Record it. Do not show your partner your product.
4. **Player B:** Replace the cards, shuffle, and rearrange them facedown again. Complete Steps 1–3.
5. Compare the products. The player with the product closer to 1 earns 1 point.

How to Win

- The player who earns more points after 5 rounds wins.

Name _____ Date _____

CENTER
Recording Sheet

Flipping for Fractions

Stage 3

Round	Expression	Product	Points
1	□ × □/□		
2	□ × □/□		
3	□ × □/□		
4	□ × □/□		
5	□ × □/□		

CENTER
Directions

Flipping for Fractions

Stage 4

Let's divide whole numbers.

Pairs

You'll need . . .

Number Cards, 1–9

Recording Sheet

Set-up

- Arrange the Number Cards facedown in an array.

How to Play

1. **Player A:** Flip over 2 Number Cards.
2. Use the numbers to make a division expression on your Recording Sheet. Do not show your partner your expression.
3. Determine the quotient. Record it. Do not show your partner your quotient. Set the 2 cards aside.
4. **Player B:** Complete Steps 1–3 by flipping over 2 of the remaining cards.
5. Compare your quotients. The player with the quotient closer to 1 earns 1 point. Record the number of points you earned for the round.

How to Win

- The player who earns more points after 5 rounds wins.

Name _____ Date _____

CENTER
Recording Sheet

Flipping for Fractions

Stage 4

Round	Expression	Quotient	Points
1	☐ ÷ ☐		
2	☐ ÷ ☐		
3	☐ ÷ ☐		
4	☐ ÷ ☐		
5	☐ ÷ ☐		

CENTER
Directions

Flipping for Fractions

Stage 5

Let's multiply fractions.

Pairs

You'll need . . .

Number Cards, 1–9

Recording Sheet

Set-up

- Shuffle two sets of Number Cards and arrange them facedown in an array.

How to Play

1. **Player A:** Flip over 4 Number Cards.
2. Use the numbers to make a multiplication expression on your Recording Sheet. Do not show your partner your expression.
3. Determine the product. Record it. Do not show your partner your product. Set the 4 cards aside.
4. **Player B:** Complete Steps 1–3 by flipping over 4 of the remaining cards.
5. Compare the products. The player with the greater product earns 1 point.

How to Win

- The player who earns more points after 5 rounds wins.

Name _____ Date _____

CENTER
Recording Sheet

Flipping for Fractions

Stage 5

Round	Expression	My product	My partner's product	Points
1	$\frac{\square}{\square} \times \frac{\square}{\square}$			
2	$\frac{\square}{\square} \times \frac{\square}{\square}$			
3	$\frac{\square}{\square} \times \frac{\square}{\square}$			
4	$\frac{\square}{\square} \times \frac{\square}{\square}$			
5	$\frac{\square}{\square} \times \frac{\square}{\square}$			

CENTER
Directions

Flipping for Fractions

Stage 6

Let's divide fractions and whole numbers.

Pairs

You'll need . . .

- Number Cards, 1–9
- Recording Sheet

Set-up

- Arrange the Number Cards facedown in an array.

How to Play

1. **Player A:** Flip over 2 Number Cards.
2. Use the numbers to make a division expression with one whole number and one unit fraction on the Recording Sheet. Do not show your partner your expression.
3. Determine the quotient. Record it. Do not show your partner your quotient.
4. **Player B:** Replace the cards, shuffle, and rearrange them facedown again. Complete Steps 1–3.
5. Compare the quotients. The player with the quotient closer to 1 earns 1 point. Record the number of points you earned for the round.

How to Win

- The player who earns more points after 5 rounds wins.

Name _____ Date _____

CENTER
Recording Sheet

Flipping for Fractions

Stage 6

Round	Expression	My quotient	My partner's quotient	Points
1				
2				
3				
4				
5				

CENTER
Directions

Stage 5

Get Your Numbers in Order

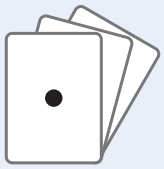
Let's order decimal numbers from least to greatest.

Pairs

You'll need . . .


dry-erase markers

sheet protectors


Decimal Point Cards

Number Cards, 0–9


Gameboard

Set-up

- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. On your turn, draw 3 Number Cards and make a decimal number less than 1.
2. You will order decimals from least to greatest. The player who starts the game records their number in any space on the Gameboard.
3. You cannot move a number once it is on the Gameboard. Take turns ordering and recording numbers until all the spaces are filled.
4. If your number cannot be recorded on the Gameboard, you must say "pass," and you get 1 point.

How to Win

- The player with fewer points at the end of the game wins.

Get Your Numbers in Order

Stage 5

CENTER
Decimal Point Cards

Directions: Make one copy per pair. Pre-cut the cards and distribute them so that each pair of students receives one set of cards. This set of cards will be used throughout the year.

Decimal Point Cards

Decimal Point Cards

Decimal Point Cards

Decimal Point Cards

Decimal Point Cards

Decimal Point Cards

Decimal Point Cards

Decimal Point Cards

Decimal Point Cards

CENTER
Gameboard

Get Your Numbers in Order

Stage 5

Least **Greatest**

Points

Player A	Player B

Greatest of Them All

Stage 6

Let's make and compare decimal numbers.

Pairs

You'll need . . .

Number Cards, 0–9

Recording Sheet, one per pair

Set-up

- Choose who will be Player A and who will be Player B.
- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. Each player draws a Number Card and records it in one of the boxes.
2. Repeat until each player has a number to the hundredths place.
3. Write a comparison using <, >, or =. The player with the greater number earns 1 point.

How to Win

- When the Recording Sheet is full, the player who earns more points wins.

Name _____ Date _____

CENTER
Recording Sheet

Greatest of Them All

Stage 6

Player A	Compare using <, >, or =	Player B	Winner?
☐.☐☐		☐.☐☐	
☐.☐☐		☐.☐☐	
☐.☐☐		☐.☐☐	
☐.☐☐		☐.☐☐	
☐.☐☐		☐.☐☐	
☐.☐☐		☐.☐☐	

Greatest of Them All

Stage 7

Let's make and compare decimal numbers.

Pairs

You'll need . . .

Number Cards, 0–9

Recording Sheet, one per pair

Set-up

- Choose who will be Player A and who will be Player B.
- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. Each player draws a Number Card and records it in one of the boxes.
2. Repeat until each player has a number to the thousandths place.
3. Write a comparison using <, >, or =. The player with the greater number earns 1 point.

How to Win

- When the Recording Sheet is full, the player who earns more points wins.

Name _____ Date _____

CENTER
Recording Sheet

Greatest of Them All

Stage 7

Player A	Compare using <, >, or =	Player B	Winner?
☐.☐☐☐		☐.☐☐☐	
☐.☐☐☐		☐.☐☐☐	
☐.☐☐☐		☐.☐☐☐	
☐.☐☐☐		☐.☐☐☐	
☐.☐☐☐		☐.☐☐☐	
☐.☐☐☐		☐.☐☐☐	

Greatest of Them All

Stage 8

Let's multiply and divide by powers of 10.

Pairs

You'll need . . .

Number Cards, 0–9

Recording Sheet A or B

Set-up

- Choose a Recording Sheet. One is for multiplying, and one is for dividing.
- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. Each player draws a Number Card and records it in one of the boxes.
2. Repeat 6 times so that each player has a five-digit number and a power of 10.
3. Multiply or divide, and record your number in standard form. Then record your partner's number.
4. The player with the greater number earns 1 point.

How to Win

- When the Recording Sheet is full, the player who earns more points wins.

CENTER
Recording Sheet A

Name _____ Date _____

Greatest of Them All

Stage 8

Power of ten	My number in standard form	My partner's number in standard form	Points
□□.□□□ × 10□			
□□.□□□ × 10□			
□□.□□□ × 10□			
□□.□□□ × 10□			
□□.□□□ × 10□			

CENTER
Recording Sheet B

Name _____ Date _____

Greatest of Them All

Stage 8

Power of ten	My number in standard form	My partner's number in standard form	Points
□□.□□□ ÷ 10□			
□□.□□□ ÷ 10□			
□□.□□□ ÷ 10□			
□□.□□□ ÷ 10□			
□□.□□□ ÷ 10□			

Stage 5

How Are They the Same?

Let's draw shapes that have shared attributes.

Groups of 4

You'll need . . .

straightedges


Quadrilateral Cards, Grade 5


Triangle Cards, Grade 5


Recording Sheet

Set-up

- Choose a set of cards and place them facedown in a pile. Draw the top 6 cards and lay them out faceup.

How to Play

1. One player chooses 2 of the faceup cards that have an attribute in common and names the attribute.
2. All players draw these shapes and record the shared attribute.
3. All players draw another shape that has the same attribute.
4. Compare and discuss the shapes drawn in the third column. Each player earns 1 point if everyone agrees their shape shares the correct attribute. Decide which shapes are the same and which are different. Each player earns 1 point if they drew a shape that is different.
5. Play 5 rounds, with 6 new cards each time. Take turns choosing 2 cards.

How to Win

- The player who earns the most points wins.

Name _____ Date _____

CENTER
Recording Sheet

How Are They the Same?

Stage 5

Shape 1	Shape 2	Shared attribute	My shape drawing	Points

CENTER
Directions

How Close?

Stage 8

Let's multiply fractions and whole numbers to 5.

Pairs

You'll need . . .

Number Cards, 0–9


Recording Sheet

Set-up

- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. Each player draws 6 cards.
2. Choose 3 cards to complete your equation. Determine the product.
3. Compare your products. If your product is closer to 5, you earn a point.
4. Draw 6 new cards and play again until the Recording Sheet is full.

How to Win

- The player who earns more points wins.

Name _____ Date _____

CENTER
Recording Sheet

How Close?

Stage 8

Multiplication equation	Points
$\frac{\square}{\square} \times \square =$	
$\frac{\square}{\square} \times \square =$	
$\frac{\square}{\square} \times \square =$	
$\frac{\square}{\square} \times \square =$	
$\frac{\square}{\square} \times \square =$	
$\frac{\square}{\square} \times \square =$	

CENTER
Directions

How Close?

Stage 9

Let's add decimals to 1.

Pairs

You'll need . . .

Number Cards, 0–9

Recording Sheet

Set-up

- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. Each player draws 6 cards.
2. Choose 4 of the cards to complete your equation. Determine the sum.
3. Compare your sums. If your sum is closer to 1, you earn a point.
4. Draw 6 new cards and play again until the Recording Sheet is full.

How to Win

- The player who earns more points wins.

Name _____ Date _____

CENTER
Recording Sheet

How Close?

Stage 9

Addition equation	Points
0.□□ + 0.□□ = □	
0.□□ + 0.□□ = □	
0.□□ + 0.□□ = □	
0.□□ + 0.□□ = □	
0.□□ + 0.□□ = □	
0.□□ + 0.□□ = □	
0.□□ + 0.□□ = □	
0.□□ + 0.□□ = □	

CENTER
Directions

How Close?

Stage 10

Let's subtract decimals from 1.

Pairs

You'll need . . .

Number Cards, 0–9

Recording Sheet

Set-up

- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. Each player draws 4 cards.
2. Choose 2 cards to complete the subtraction expression. Determine the difference to complete the equation.
3. Compare your differences. If your difference is closer to 0, you earn 1 point.
4. Draw 4 new cards and play again until the Recording Sheet is full.

How to Win

- The player who earns more points wins.

Name _____ Date _____

CENTER
Recording Sheet

How Close?

Stage 10

Subtraction equation	Points
$1 - 0.\square\square = \square$	
$1 - 0.\square\square = \square$	
$1 - 0.\square\square = \square$	
$1 - 0.\square\square = \square$	
$1 - 0.\square\square = \square$	
$1 - 0.\square\square = \square$	
$1 - 0.\square\square = \square$	
$1 - 0.\square\square = \square$	

CENTER
Directions

How Close?

Stage 11

Let's add fractions to 5.

Pairs

You'll need . . .

Number Cards, 0–9


Recording Sheet

Set-up

- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. Each player draws 6 cards.
2. Choose 4 cards to complete an expression. Determine the sum to complete the equation.
3. Compare your sums. If your sum is closer to 5, you earn 1 point.
4. Draw 6 new cards and play again until the Recording Sheet is full.

How to Win

- The player who earns more points wins.

Name _____ Date _____

CENTER
Recording Sheet

How Close?

Stage 11

Addition equation	Points
$\frac{\square}{\square} + \frac{\square}{\square} =$	
$\frac{\square}{\square} + \frac{\square}{\square} =$	
$\frac{\square}{\square} + \frac{\square}{\square} =$	
$\frac{\square}{\square} + \frac{\square}{\square} =$	
$\frac{\square}{\square} + \frac{\square}{\square} =$	
$\frac{\square}{\square} + \frac{\square}{\square} =$	

CENTER
Directions

How Close?

Stage 12

Let's subtract fractions from 5.

Pairs

You'll need . . .

Number Cards, 0–9

Recording Sheet

Set-up

- Shuffle the Number Cards and place them in a stack facedown.

How to Play

1. Each player draws 4 cards.
2. Choose 2 cards to complete an expression. Determine the difference to complete the equation.
3. Compare your differences. If your difference is closer to 0, you earn 1 point.
4. Draw 4 new cards and play again until the Recording Sheet is full.

How to Win

- The player who earns more points wins.

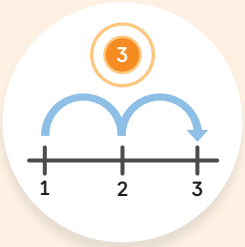
Name _____ Date _____

CENTER
Recording Sheet

How Close?

Stage 12

Subtraction equation	Points
$5 - \frac{\square}{\square} = \_\_\_$	
$5 - \frac{\square}{\square} = \_\_\_$	
$5 - \frac{\square}{\square} = \_\_\_$	
$5 - \frac{\square}{\square} = \_\_\_$	
$5 - \frac{\square}{\square} = \_\_\_$	
$5 - \frac{\square}{\square} = \_\_\_$	



Jump the Line

Stage 2

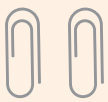
Let's add and subtract fractions on a number line.

Pairs

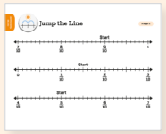
You'll need . . .


6 base-ten units


dry-erase markers


paper clips

sheet protectors


Gameboard, Spinners

Set-up

- With your partner, choose a target number for each number line. Mark the 3 target numbers using your dry-erase marker.
- Place a cube on the start number on each number line.

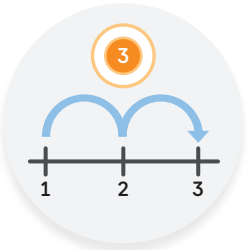
How to Play

1. **Player A:** Spin both Spinners. Add and subtract in one of these two ways as you move the distance you spun:
   - Use your spins from both Spinners to move one cube on one number line.
   - Use each spin to move a different cube. You may not be able to use both spins if your cube would land off of the number line. If you land on *Wild*, you may add or subtract any number less than $\frac{1}{10}$.
2. Mark where you landed on the number line with your cube.
3. Take turns spinning and moving on the number line.

How to Win

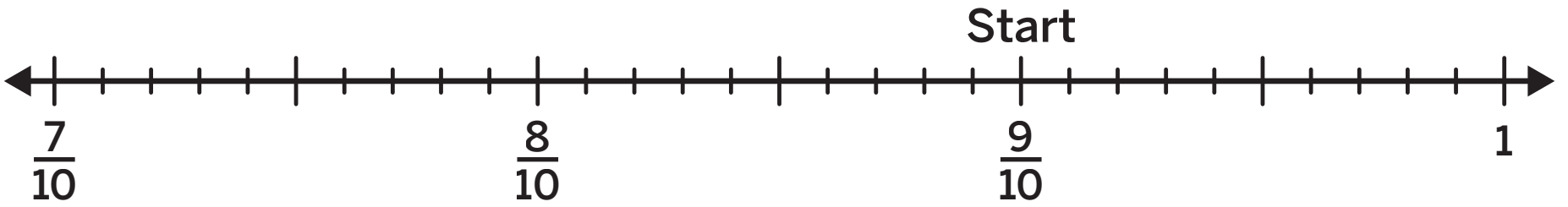
- Landing on a target number earns 1 point with that number line now out of play. The first player to land on two target numbers wins.

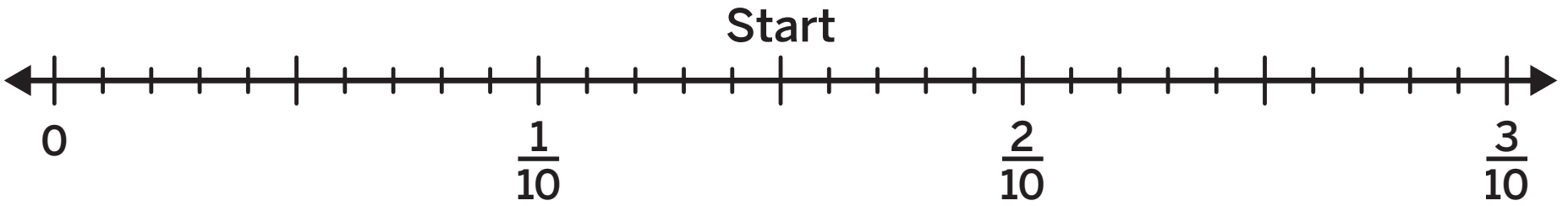
CENTER
Gameboard

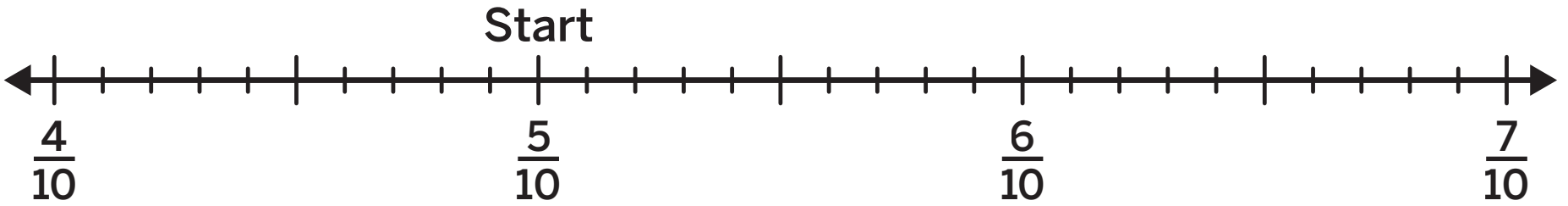


Jump the Line

Stage 2

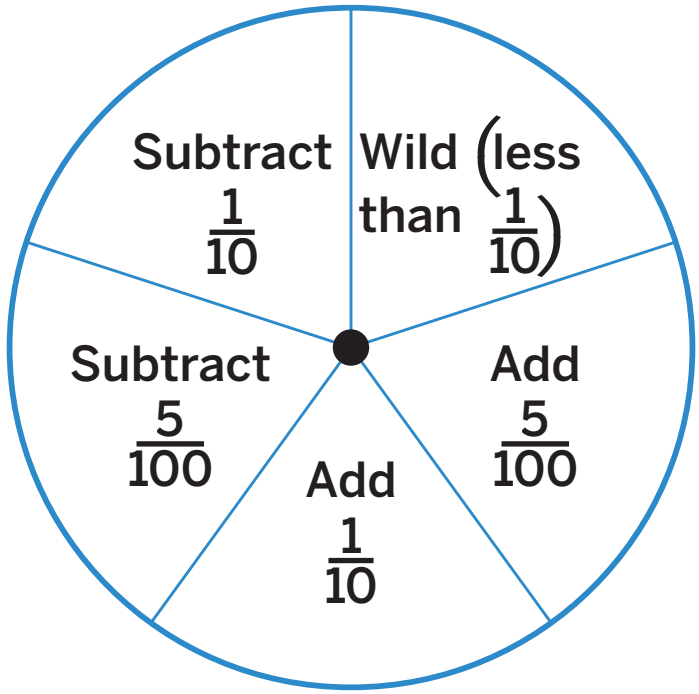


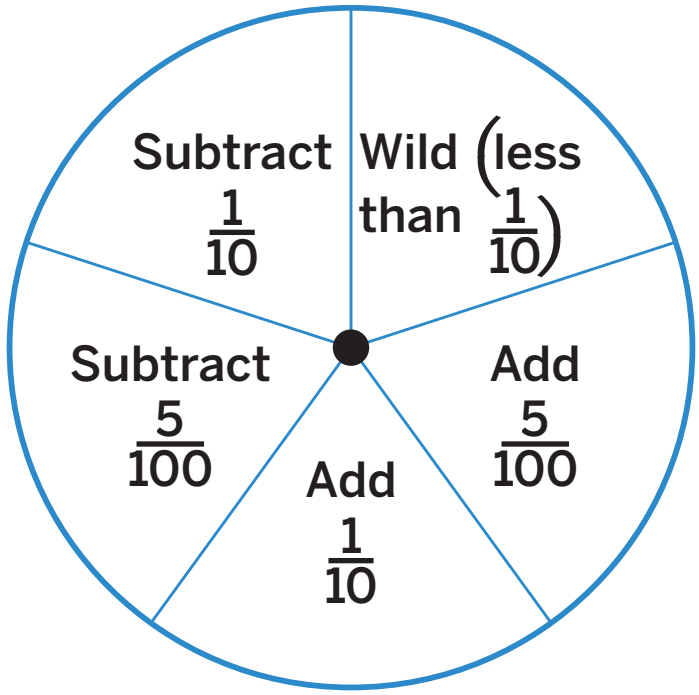




Jump the Line

Stage 2





CENTER
Directions

Jump the Line

Stage 3

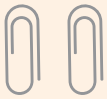
Let's add and subtract decimals on a number line.

Pairs

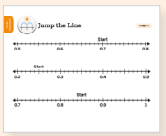
You'll need . . .


6 base-ten units


dry-erase markers


paper clips

sheet protectors


Gameboard, Spinners

Set-up

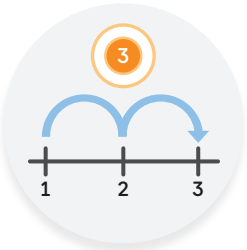
- With your partner, decide on a target number for each line. Mark the three target numbers using your dry-erase marker.
- Place a cube on the start number on each number line.

How to Play

1. **Player A:** Spin both Spinners. Add and subtract in one of these two ways as you move the distance you spun:
   - Use your spins from both spinners to move one cube on one number line.
   - Use one spin to move one cube, and the other spin to move a different cube.
2. Mark where you landed on the number line with your cube.
3. Take turns spinning and moving on the number line.

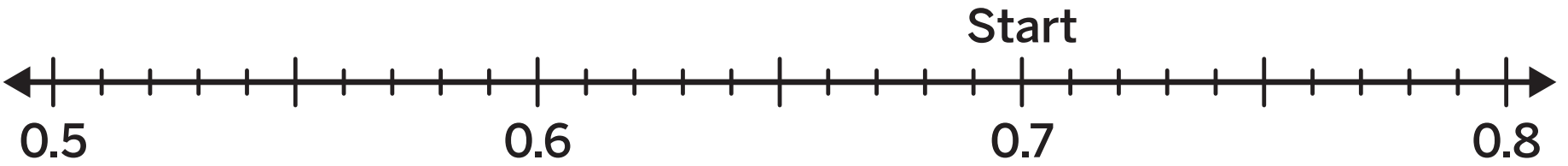
How to Win

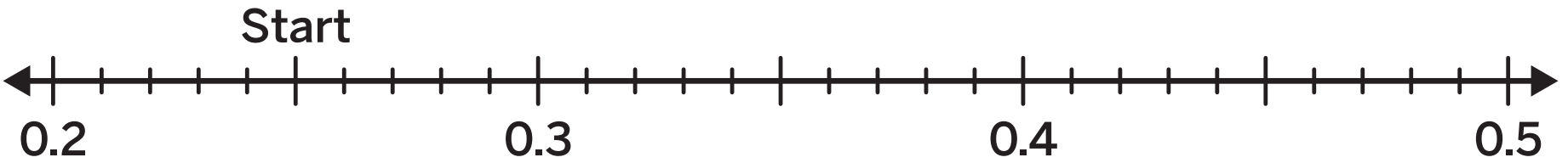
- The first player to land on two of the target numbers wins.

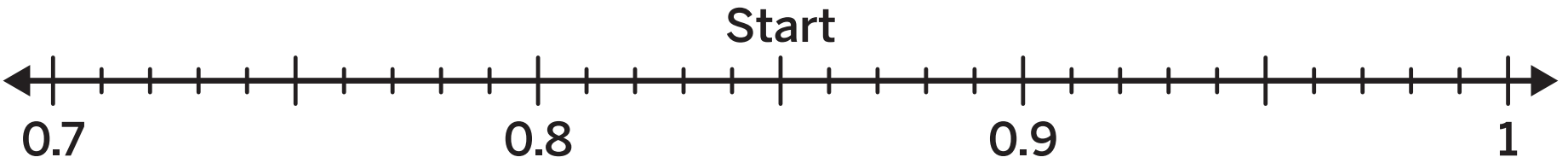


Jump the Line

Stage 3

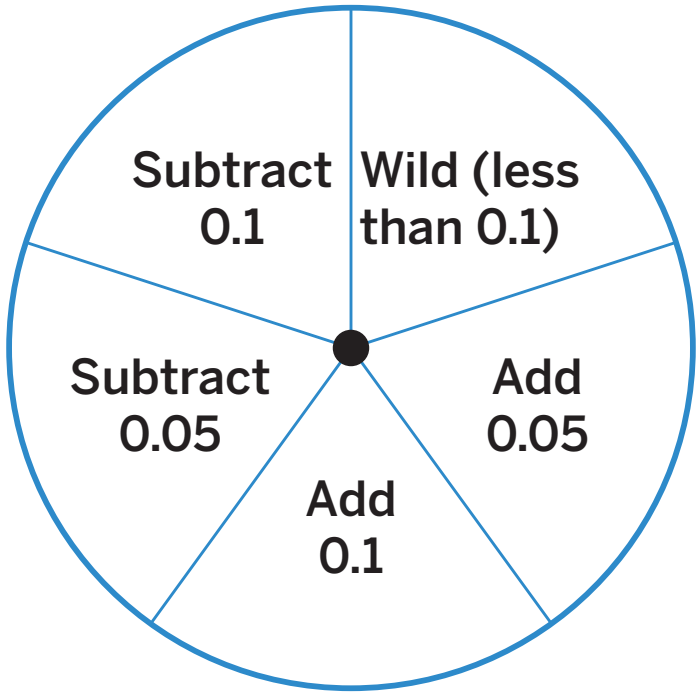


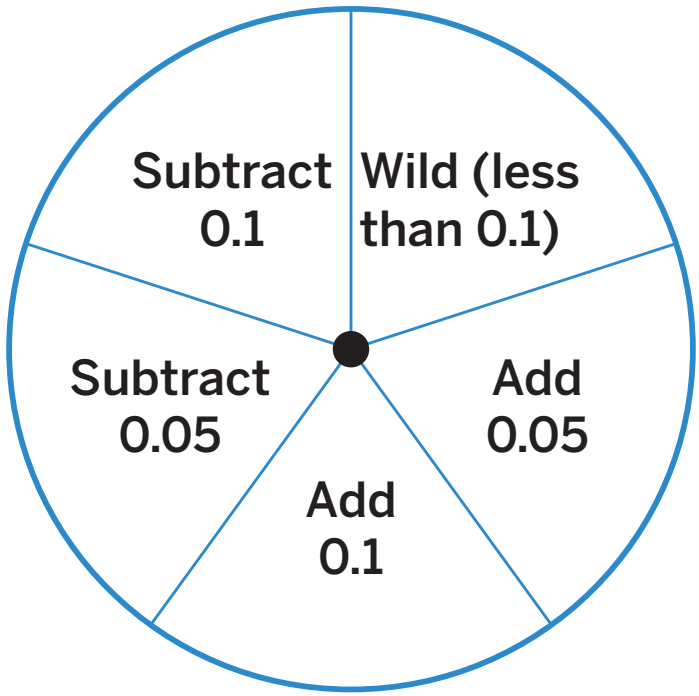




Jump the Line

Stage 3





CENTER
Directions

Mystery Number

Stage 5

Let's use place value to guess the mystery number.

Pairs

You'll need . . .


counters


sticky notes


Gameboard A or B


Recording Sheet

Set-up

- Choose a Gameboard.

How to Play

1. **Player A:** Choose a number on the Gameboard and record it on a sticky note. Do not show your partner your number.
2. **Player B:** Ask as many *yes* or *no* place-value questions as you need to help you identify the mystery number. Consider using words such as *ones, tens, thousands, ten thousands, hundred thousands, greater than, less than, between, 10 times as much, multiple,* and *factor* when you ask your questions. Record each question and your partner's response.
3. **Player B:** Cover up numbers as you determine they are *not* the mystery number. When you are ready, you have one guess to identify the mystery number. Record the number you guess. If you are correct, you earn 1 point.
4. Switch roles and repeat to complete Round 1.

How to Win

- Play 3 rounds. The player who earns more points wins.

CENTER
Gameboard A

Mystery Number

Stage 5

505,505	23,849	329,192	878,830
7,404	63,053	149,834	2,139
38,513	262,987	6,535	784,936
409,281	919,675	603,146	56,350
31,452	8,493	591,230	334,621

CENTER
Gameboard B

Mystery Number

Stage 5

2,958	457,592	137,004	98,670
89,067	72,540	3,587	154,239
753,402	662,193	1,376	982,415
123,456	1,938	158,678	21,109
873,751	43,820	999,999	6,537

CENTER
Recording Sheet

Name _____ Date _____

Mystery Number

Stage 5

	Round 1		Round 2		Round 3	
Questions						
Number	My guess:	Correct number:	My guess:	Correct number:	My guess:	Correct number:

CENTER
Directions

Mystery Number

Stage 6

Let's use place value to guess the decimal number.

Pairs

You'll need . . .


counters


sticky notes


Gameboard A or B


Recording Sheet

Set-up

- Choose a Gameboard.

How to Play

1. **Player A:** Choose a number on the Gameboard and record it on a sticky note. Do not show your partner your number.
2. **Player B:** Ask as many *yes* or *no* place-value questions as you need to help you identify the mystery decimal. Consider using words such as *thousandths, hundredths, tenths, ones, hundreds, thousands, ten thousands, hundred thousands, greater than, less than, between, 10 times as much,* and *one-tenth as much* when you ask your questions. Record each question and your partner's response.
3. **Player B:** Cover up numbers as you determine they are *not* the mystery number. When you are ready, you have one guess to identify the mystery number. Record the number you guess. If you are correct, you earn 1 point.
4. Switch roles and repeat to complete Round 1.

How to Win

- Play 3 rounds. The player who earns more points wins.

CENTER
Gameboard A

Mystery Number

Stage 6

55.05	384.01	329.2	788.30
74.3	359.1	4.58	139.25
513.92	987.5	35.03	36.6
1.74	5.3	606.09	50.68
32.34	945.03	5.9	2.72

Mystery Number

Stage 6

892.08	92.98	7.04	670.8
97.1	4.1	351.27	39.06
7.02	293.4	62.8	5.6
6.4	19.8	678.99	19.22
751.72	820.6	9.98	37.28

CENTER
Recording Sheet

Name _____ Date _____

Mystery Number

Stage 6

	Round 1		Round 2		Round 3	
Questions						
Number	My guess:	Correct number:	My guess:	Correct number:	My guess:	Correct number:

CENTER
Directions

Mystery Number

Stage 7

Let's use rounding to guess the decimal number.

Pairs

You'll need . . .


counters


sticky notes


Gameboard A or B


Recording Sheet

Set-up

- Choose a Gameboard.

How to Play

1. **Player A:** Choose a number on the Gameboard and record it on a sticky note. Do not show your partner your number.
2. **Player B:** Ask as many rounding questions as you need to help you identify the mystery decimal. Consider using a question such as *What digit is in the tenths place when rounded to the nearest whole number, tenth, or hundredth?* Record each question and your partner's response.
3. **Player B:** Cover up numbers as you determine they are *not* the mystery number. When you are ready, you have one guess to identify the mystery number. Record the number you guess. If you are correct, you earn 1 point.
4. Switch roles and repeat to complete Round 1.

How to Win

- Play 3 rounds. The player who earns more points wins.

Mystery Number

Stage 7

3.053	9.183	5.044	2.429	2.636	6.286
5.637	8.364	0.764	4.755	3.117	7.845
6.947	9.238	5.608	7.361	8.658	3.508
5.044	4.833	2.377	7.777	4.193	6.883
1.346	3.542	2.561	0.837	4.246	1.284
7.416	5.029	8.652	8.437	1.654	6.275

Mystery Number

Stage 7

11.317	13.819	11.816	15.477	10.384	13.478
15.007	10.948	14.999	14.268	12.548	16.097
13.545	15.675	12.499	9.764	16.147	13.779
10.296	16.018	13.581	12.717	14.551	15.067
14.349	13.283	15.725	15.109	12.241	11.295
12.175	14.608	10.916	15.542	13.612	10.785

CENTER
Recording Sheet

Name _____ Date _____

Mystery Number

Stage 7

	Round 1		Round 2		Round 3	
Questions						
Number	My guess:	Correct number:	My guess:	Correct number:	My guess:	Correct number:

Mystery Shape

Stage 7

Let's determine the mystery shape.

Pairs

You'll need . . .


sticky notes


Quadrilateral Cards, Grade 5


Recording Sheet

Set-up

- Organize the Quadrilateral Cards faceup in rows.

How to Play

1. **Player A:** Choose a mystery shape and draw it on a sticky note. Do not show your partner.
2. **Player B:** Ask *yes* or *no* questions and flip cards facedown as you determine they are not the mystery shape. Record each question and your partner's response.
3. **Player B:** When you are ready, you have one guess to identify the mystery shape. Draw the shape you guess on your Recording Sheet. If you are correct, you earn 1 point.
4. Switch roles and repeat. Play 3 rounds.

How to Win

- The player who earns more points wins.

CENTER
Recording Sheet

Name _____ Date _____

Mystery Shape

Stage 7

	Round 1		Round 2		Round 3	
Questions						
Shapes	My guess:	Correct shape:	My guess:	Correct shape:	My guess:	Correct shape:

CENTER
Directions

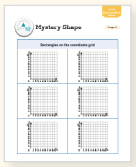
Mystery Shape

Stage 8

Let's find the mystery shape on a coordinate grid.

Pairs

You'll need . . .


Blank Coordinate Planes


Coordinate Plane Shape Cards


Recording Sheet

Set-up

- Organize the Coordinate Plane Shape Cards faceup in rows.

How to Play

1. **Player A:** Choose a mystery rectangle from one of the cards and draw it on your Recording Sheet. Do not show your partner.
2. **Player B:** Ask *yes* or *no* questions and flip cards facedown as you determine they are not the mystery rectangle. Record each question and your partner's response.
3. **Player B:** When you are ready, you have one guess to identify the mystery rectangle. Draw your guess. If you guess correctly, you earn 1 point.
4. Switch roles and repeat. Play 3 rounds.

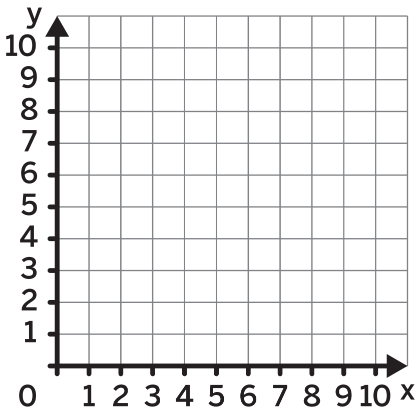
How to Win

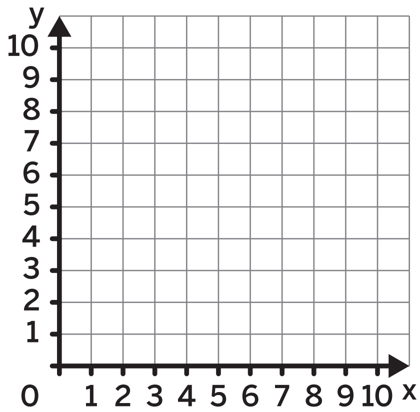
- The player who earns more points wins.

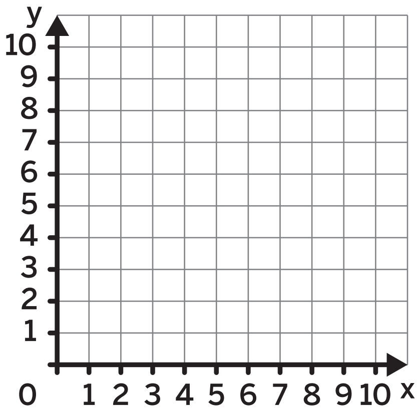
Mystery Shape

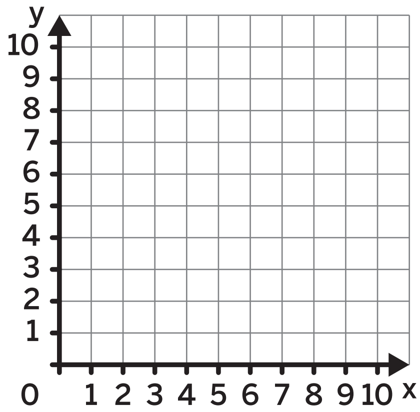
Stage 8

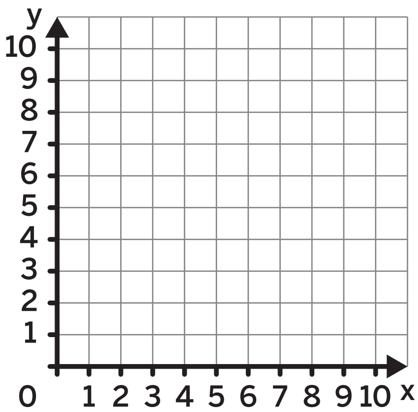
Rectangles on the coordinate grid

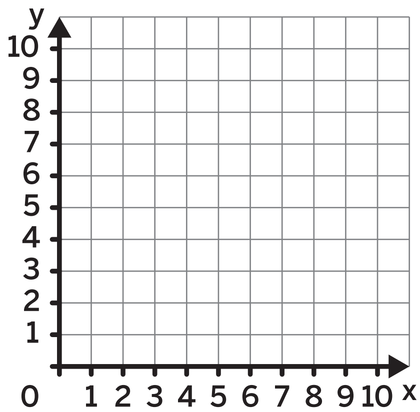












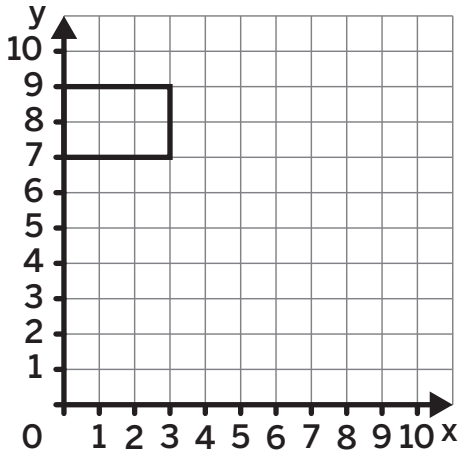
Mystery Shape

Stage 8

CENTER
Coordinate Plane Shape Cards
(p. 1 of 2)

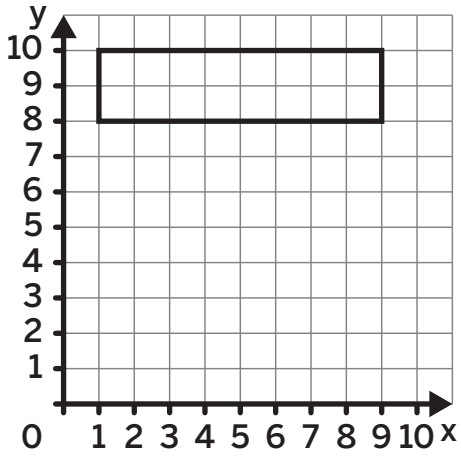
Directions: Make 1 copy per pair. Pre-cut the cards and distribute them so that each pair receives one set of cards.

A



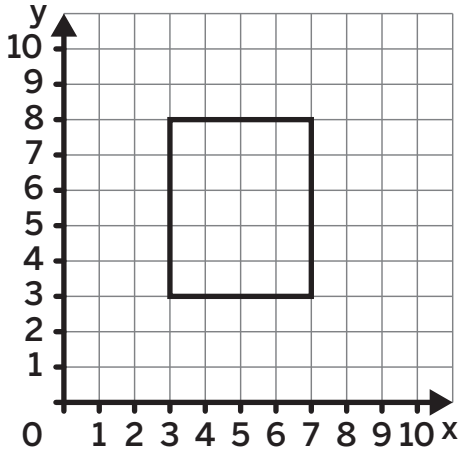
Mystery Shape Stage 8

B



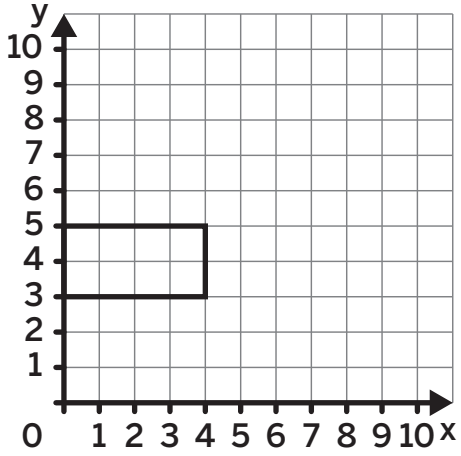
Mystery Shape Stage 8

C



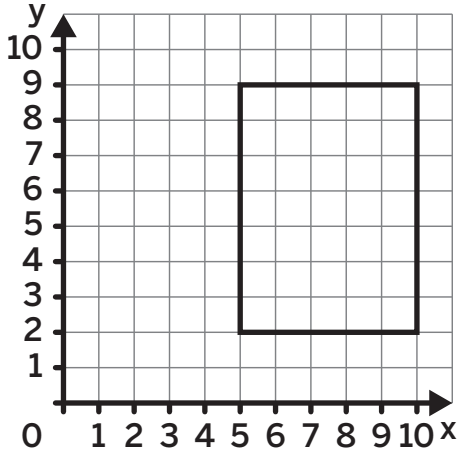
Mystery Shape Stage 8

D



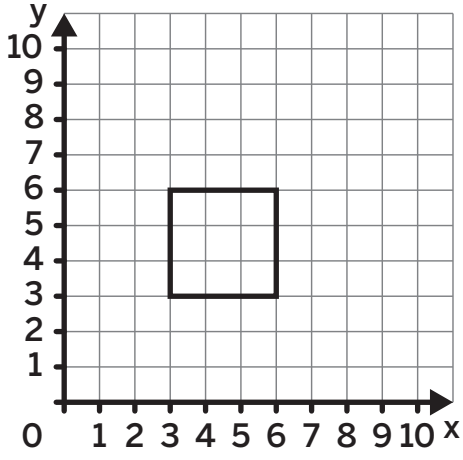
Mystery Shape Stage 8

E



Mystery Shape Stage 8

F

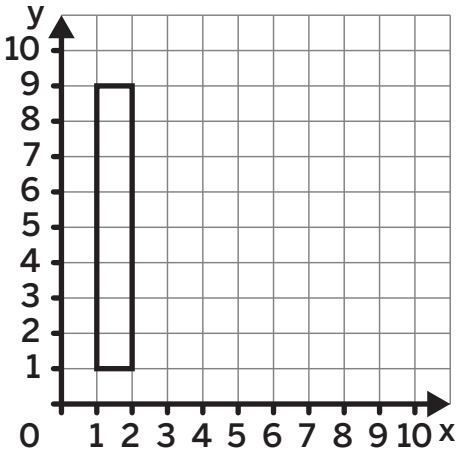


Mystery Shape Stage 8

Mystery Shape

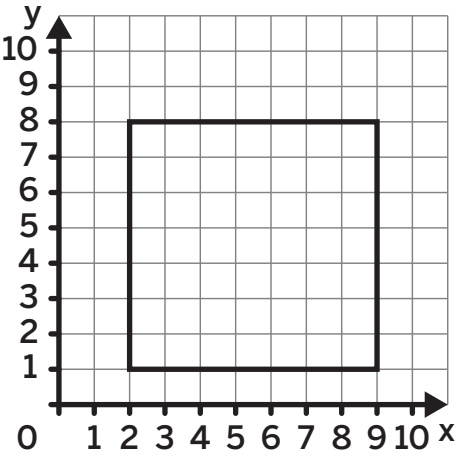
Stage 8

G



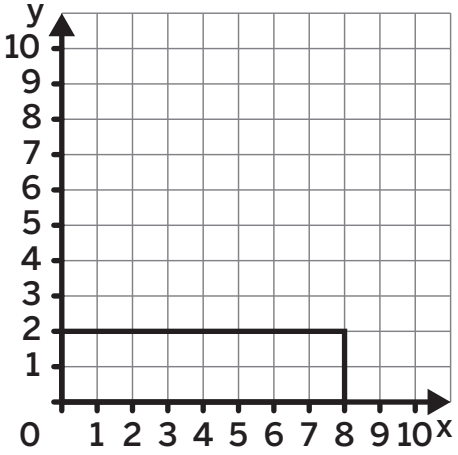
Mystery Shape Stage 8

H



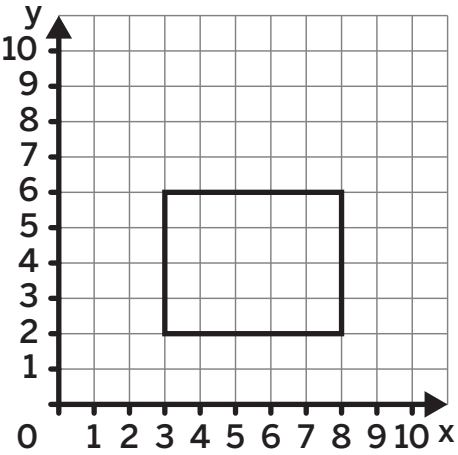
Mystery Shape Stage 8

I



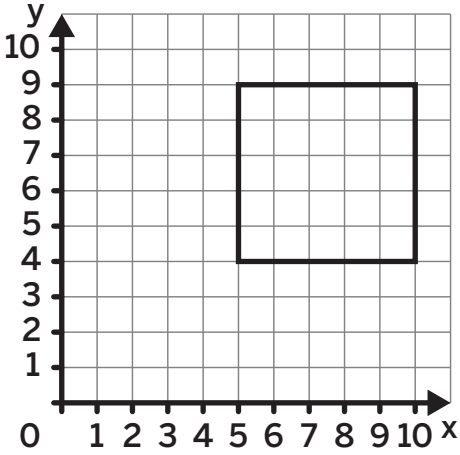
Mystery Shape Stage 8

J



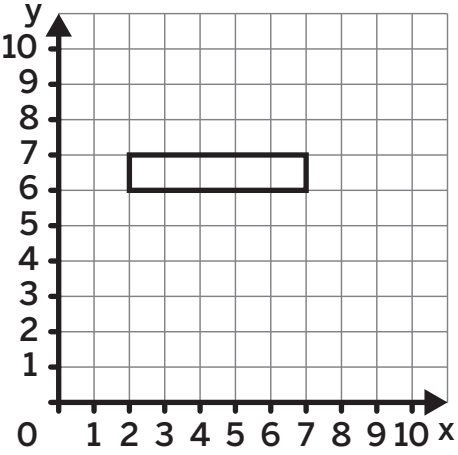
Mystery Shape Stage 8

K



Mystery Shape Stage 8

L



Mystery Shape Stage 8

Name _____ Date _____

Mystery Shape

Stage 8

	Round 1		Round 2		Round 3	
Questions						
Shapes	My guess:	Correct shape:	My guess:	Correct shape:	My guess:	Correct shape:

CENTER
Directions

Rectangle Rumble

Stage 5

Let's represent the product of two numbers on a rectangular grid.

Pairs

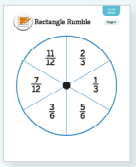
You'll need . . .


coloring tools


1 paper clip


Gameboard

Number Cards, 1–4


Spinner

Set-up

- Choose a color for your rectangles that is different from your partner's.

How to Play

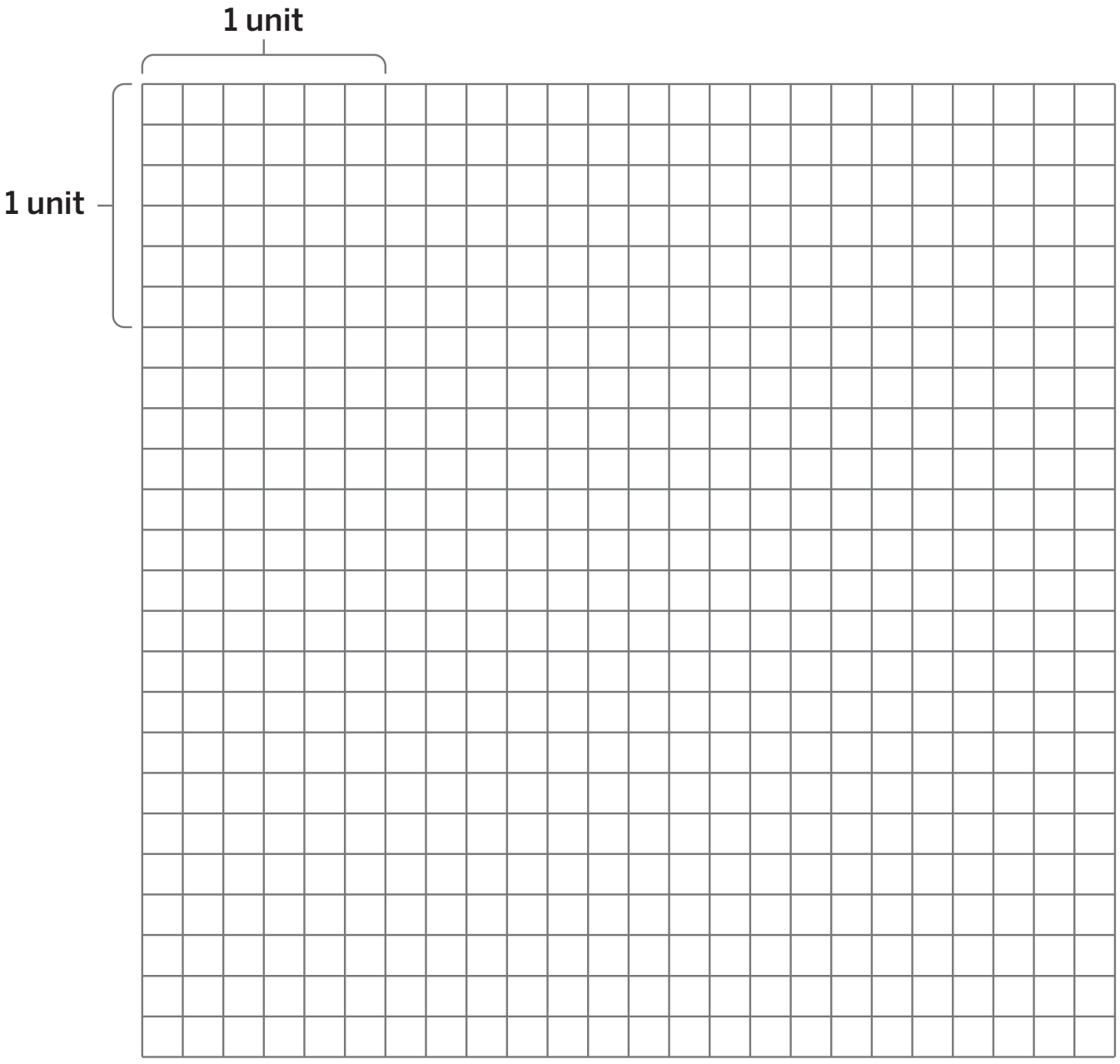
1. Spin the Spinner and draw a Number Card.
2. Shade a rectangular area to represent the product of the two numbers.
3. Take turns until the grid cannot fit any more rectangles.

How to Win

- Each player adds up their total area. The player with the greater total square units wins.

Rectangle Rumble

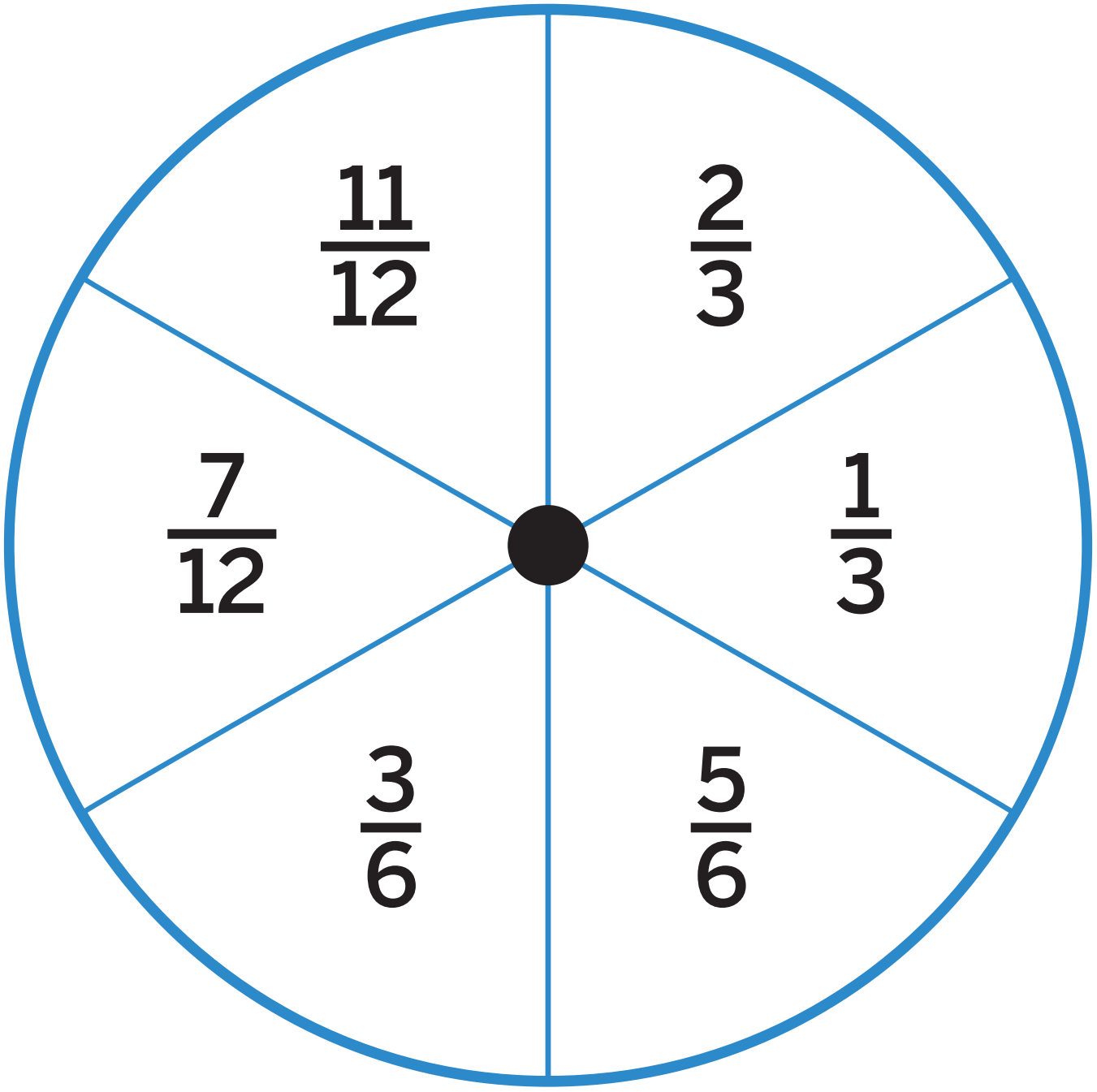
Stage 5



CENTER
Spinner

Rectangle Rumble

Stage 5



CENTER
Directions

Rectangle Rumble

Stage 6

Let's represent the product of two fractions on a rectangular grid.

Pairs

You'll need . . .


coloring tools


2 paper clips


Gameboard


Spinners

Set-up

- Choose a color for your rectangles that is different from your partner.

How to Play

1. Spin each Spinner. If you land on *Wild*, choose any fraction from the Spinner.
2. Shade a rectangular area to represent the product of the two numbers.
3. Take turns until the grid cannot fit any more rectangles.

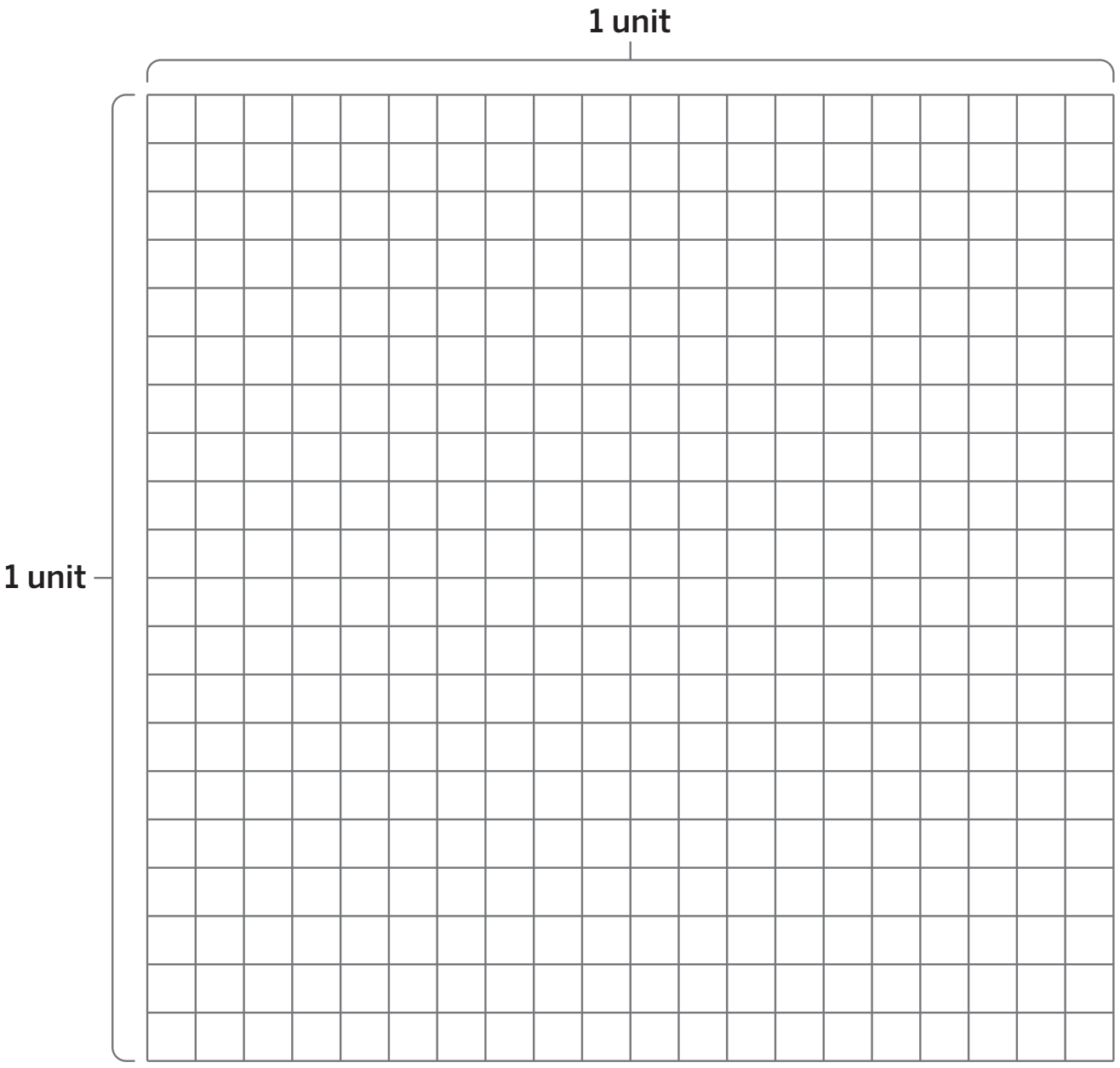
How to Win

- Each player adds up their total area. The player with the greater total square units wins.

CENTER
Gameboard

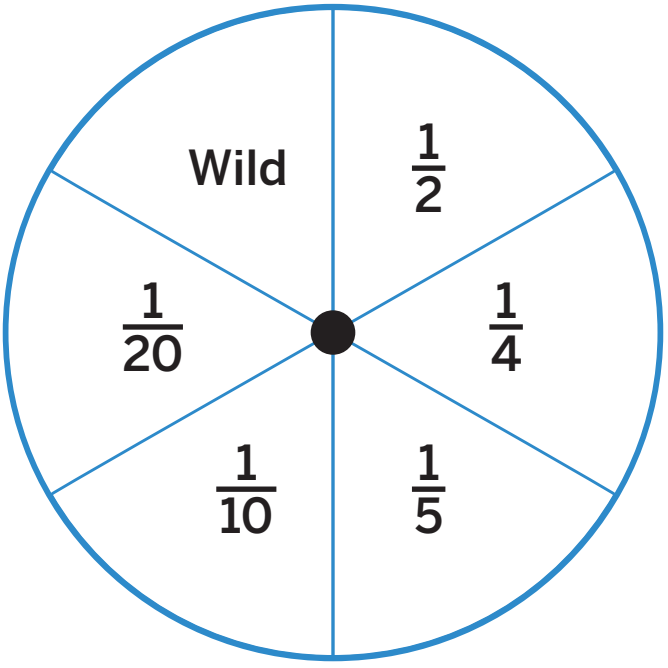
Rectangle Rumble

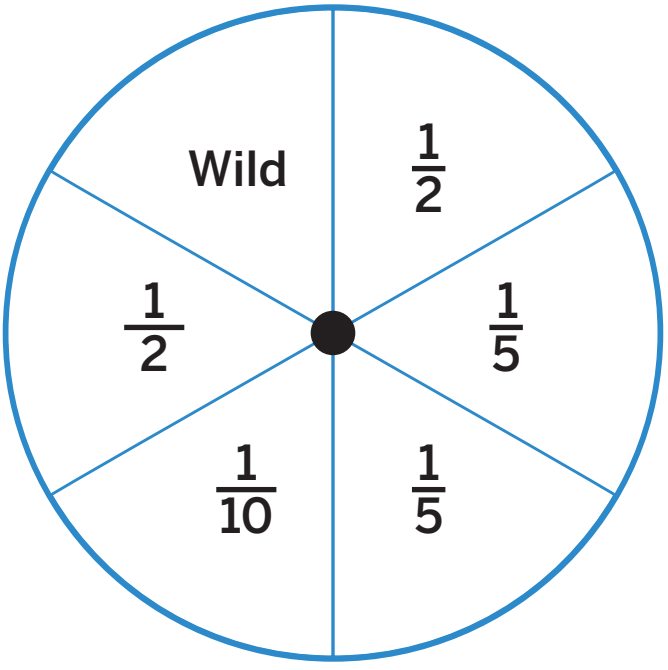
Stage 6



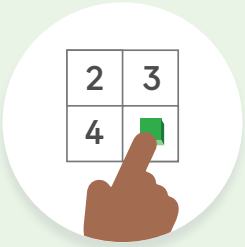
Rectangle Rumble

Stage 6





CENTER
Directions



Related Numbers

Stage 2

Let's find factors and multiples for a given number.

Pairs

You'll need . . .


100 base-ten units


Gameboard


Recording Sheet

Set-up

- Each player chooses 50 cubes.

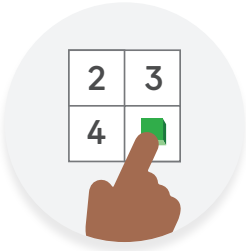
How to Play

1. **Player A:** Cover up an even number that is less than 50.
2. **Player B:** Cover up a factor or multiple of the number your partner covered.
3. Take turns covering numbers that are factors or multiples of the number your partner last covered. The round ends when there are no more factors or multiples of the number remaining.
4. The last player to cover a number in each round earns 1 point. Record your scores.

How to Win

- The player with more points after 10 rounds wins.

CENTER
Gameboard



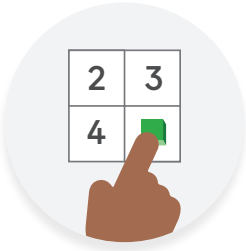
Related Numbers

Stage 2

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

Name _____ Date _____

CENTER
Recording Sheet



Related Numbers

Stage 2

Round	Player A's score	Player B's score
1		
2		
3		
4		
5		
6		
7		
8		
9		
10		
Total		

CENTER
Directions

Target Numbers

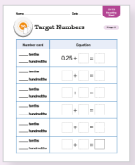
Stage 8

Let's add tenths and hundredths to get to the target number.

Pairs

You'll need . . .

Number Cards, 1–9



Recording Sheet

Set-up

- Place the number cards facedown in a pile.

How to Play

1. Draw the top number card. Choose whether you want to add that number of *tenths* or *hundredths* to the starting number.
2. Record your chosen number to create an addition expression. Complete the equation by determining the sum.
3. Record the sum from the previous equation as the starting number in your next equation.
4. Take turns until each player's Recording Sheet is full.

How to Win

- The player with a final sum closer to 1 wins.

Name _____ Date _____

CENTER
Recording Sheet

Target Numbers

Stage 8

Number card	Equation
_____ tenths _____ hundredths	0.25 + ☐ = ☐
_____ tenths _____ hundredths	☐ + ☐ = ☐
_____ tenths _____ hundredths	☐ + ☐ = ☐
_____ tenths _____ hundredths	☐ + ☐ = ☐
_____ tenths _____ hundredths	☐ + ☐ = ☐
_____ tenths _____ hundredths	☐ + ☐ = ☐

CENTER
Directions

Target Numbers

Stage 9

Let's subtract tenths and hundredths to get to the target number.

Pairs

You'll need . . .

Number Cards, 1–9

Recording Sheet

Set-up

- Place the number cards facedown in a pile.

How to Play

1. Draw the top number card. Choose whether you want to subtract that number of *tenths* or *hundredths* from the starting number.
2. Record your chosen number to create a subtraction expression. Complete the equation by determining the difference.
3. Record the difference from the previous equation as the starting number in your next equation.
4. Take turns until each player's Recording Sheet is full.

How to Win

- The player with a final difference closer to 1 wins.

Name _____ Date _____

CENTER
Recording Sheet

Target Numbers

Stage 9

Number card	Equation
_____ tenths _____ hundredths	$2 - \square = \square$
_____ tenths _____ hundredths	$\square - \square = \square$
_____ tenths _____ hundredths	$\square - \square = \square$
_____ tenths _____ hundredths	$\square - \square = \square$
_____ tenths _____ hundredths	$\square - \square = \square$
_____ tenths _____ hundredths	$\square - \square = \square$

CENTER
Directions

Stage 1

Watch Your Remainder

Let's create division expressions with the smallest remainder.

Pairs

You'll need . . .


paper clip

Number Cards, 0–9


Recording Sheet


Spinner

Set-up

- Place the Number Cards facedown in a pile.
- Spin the Spinner to determine a one-digit divisor that both players will use for Round 1.

How to Play

1. Each player draws 6 Number Cards. Use 3 or 4 of the cards to make your dividend.
2. Write a division expression using your dividend and the divisor.
3. Write a multiplication expression to represent the quotient and remainder. For example, for 109 ÷ 9, you would write (9 × 12) + 1. Check your partner's work to make sure you agree.
4. Record your remainder as your score.
5. Shuffle all the Number Cards. Spin for a new divisor and play the next round.

How to Win

- Play until the Recording Sheet is full. The player who earns fewer points wins.

Name _____ Date _____

CENTER
Recording Sheet

Watch Your Remainder

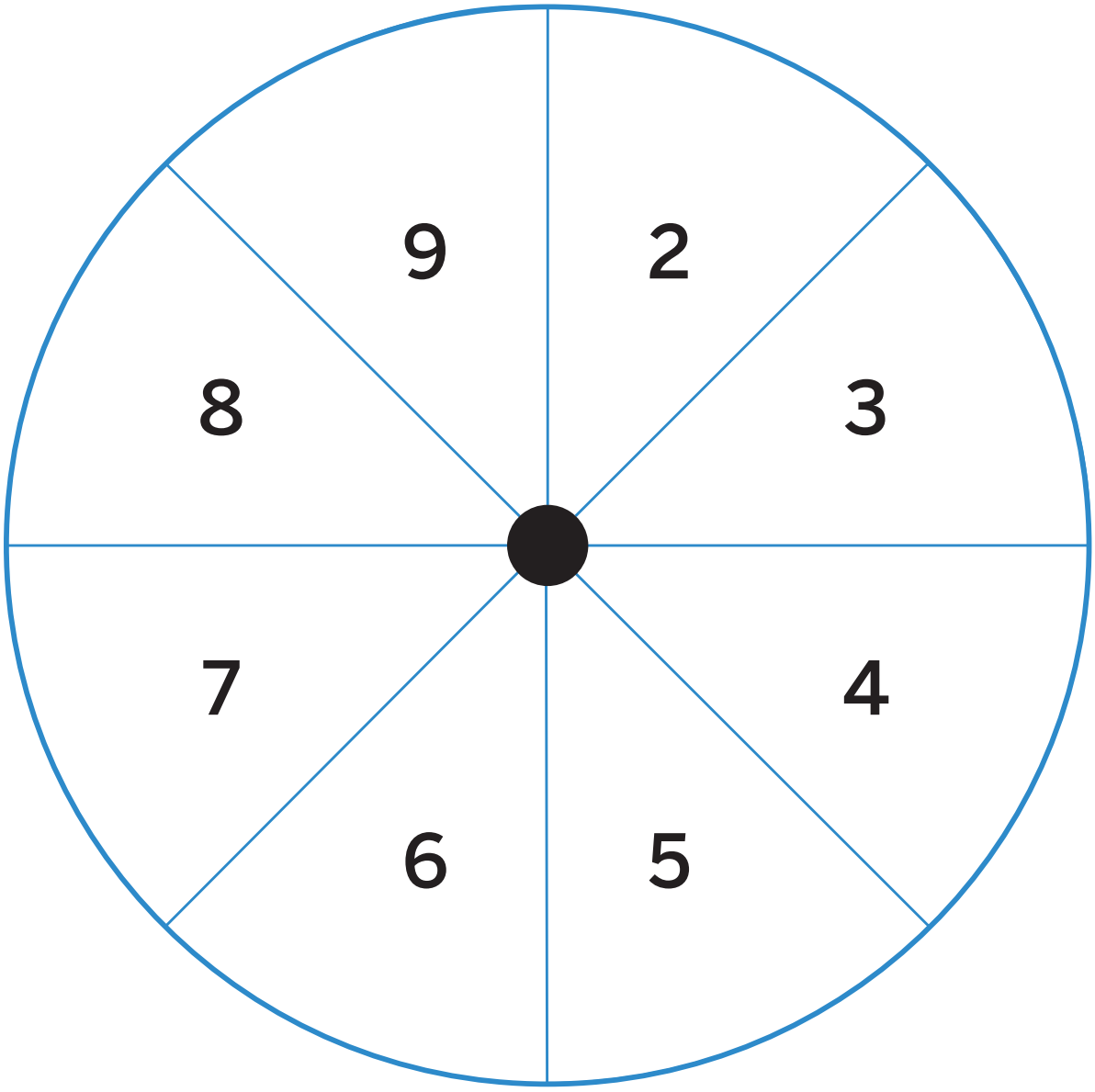
Stage 1

Round	Division expression	Multiplication expression	Points
1			
2			
3			
4			
5			
6			

CENTER
Spinner

Watch Your Remainder

Stage 1



CENTER
Directions

Stage 2

Watch Your Remainder

Let's create division expressions with the smallest remainder.

Pairs

You'll need . . .

Number Cards, 0–9

Recording Sheet

Set-up

- Place the Number Cards facedown in a pile.
- Draw 2 Number Cards to make a two-digit divisor that both players will use for Round 1.

How to Play

1. Each player draws 7 Number Cards. Use 3 or 4 of the cards to make your dividend.
2. Write a division expression using your dividend and the divisor.
3. Write a multiplication expression to represent the quotient and remainder. For example, for 1,119 ÷ 25, you would write (25 × 44) + 19. Check your partner's work to make sure you agree.
4. Record your remainder as your score.
5. Shuffle all the Number Cards. Draw 2 Number Cards for a new divisor and play the next round.

How to Win

- Play until the Recording Sheet is full. The player who earns fewer points wins.

Name _____ Date _____

CENTER
Recording Sheet

Watch Your Remainder

Stage 2

Round	Division expression	Multiplication expression	Points
1			
2			
3			
4			
5			
6			

Would You Rather?

Stage 1

Let's compare smaller measurements.

Pairs

You'll need . . .


number cube


paper clip


Recording Sheet


Spinner

How to Play

1. **Player A:** Spin the Spinner to determine the units. Roll the number cube to determine how many of that unit.
2. **Player A:** Choose a *smaller* unit of measurement and a number of those units. Ask your partner a question comparing the measurements.
   Sample question: Would you rather have 2 feet or 20 inches?
3. **Player B:** Record the units and number of units for each part of the question.
4. **Player B:** Answer your partner's question, paying attention to whether you want *more* (Rounds 1–3) or *less* (Rounds 4–6). Explain your choice. If both players agree that your answer is correct, you earn 1 point.
5. Take turns until each player's Recording Sheet is full.

How to Win

- The player who earns more points wins.

Name _____ Date _____

CENTER
Recording Sheet

Would You Rather?

Stage 1

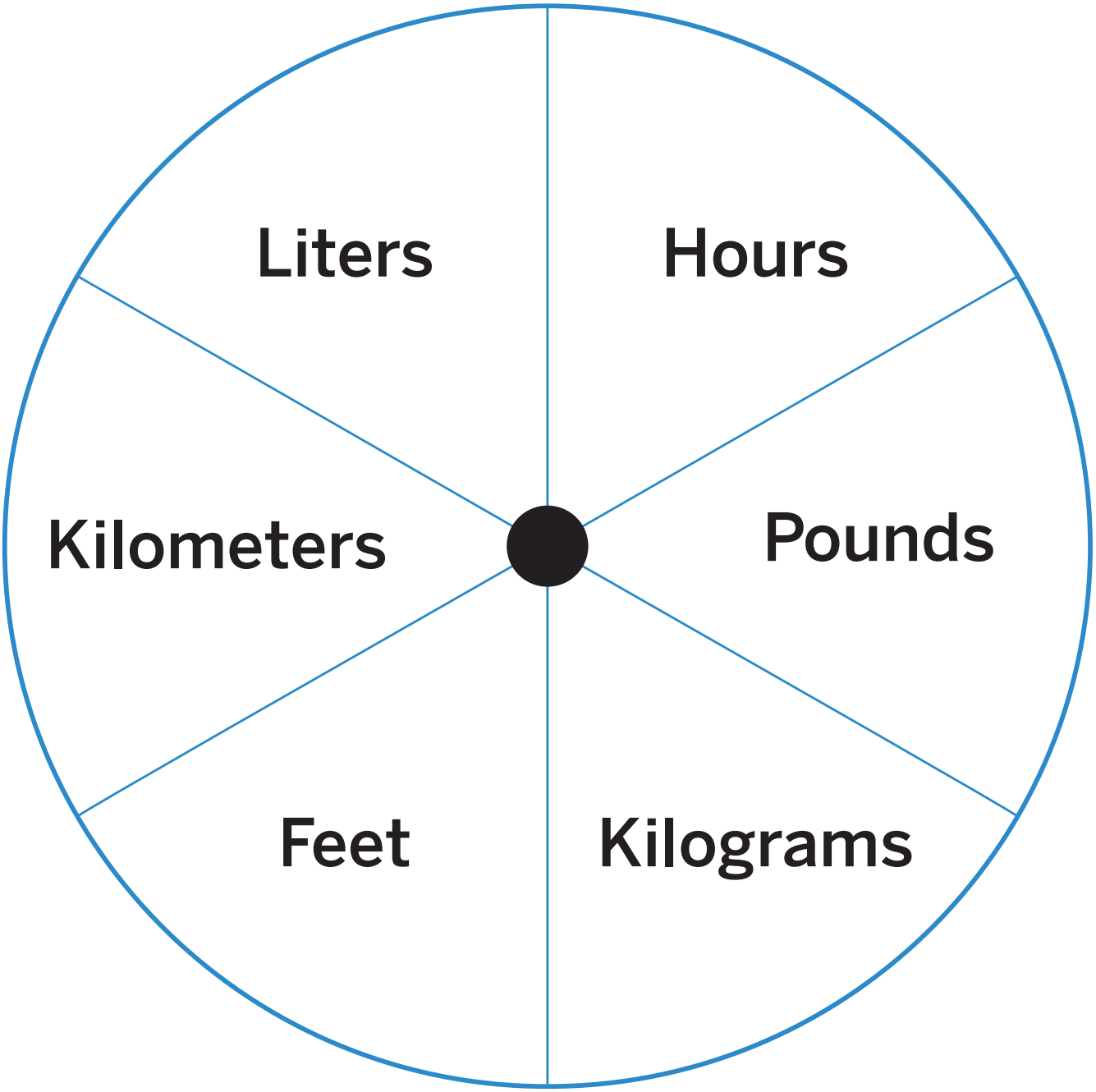
You want *more*		
Would you rather have ___	**or ___?**	**Points**

You want *less*		
Would you rather have ___	**or ___?**	**Points**

Would You Rather?

Stage 1

hours – minutes – seconds kilometers – meters – centimeters feet – inches	liters – milliliters pounds – ounces kilograms – grams



Would You Rather?

Stage 2

Let's compare units in a given system.

Pairs

You'll need . . .


number cube


paper clip


Recording Sheet


Spinner

How to Play

1. **Player A:** Spin the Spinner to determine the units. Roll the number cube to determine how many of that unit.
2. **Player A:** Choose a *smaller* unit of measurement and a number of those units. The smaller unit does *not* have to be on the Spinner. Ask your partner a question comparing the measurements.
   Sample question: Would you rather have 2 yards or 20 feet?
3. **Player B:** Record the units and number of units for each part of the question.
4. **Player B:** Answer your partner's question, paying attention to whether you want *more* (Rounds 1–3) or *less* (Rounds 4–6). Explain your choice. If both players agree that your answer is correct, you earn 1 point.
5. Take turns until each player's Recording Sheet is full.

How to Win

- The player who earns more points wins.

Name _____ Date _____

CENTER
Recording Sheet

Would You Rather?

Stage 2

You want *more*		
Would you rather have ___	**or ___?**	**Points**

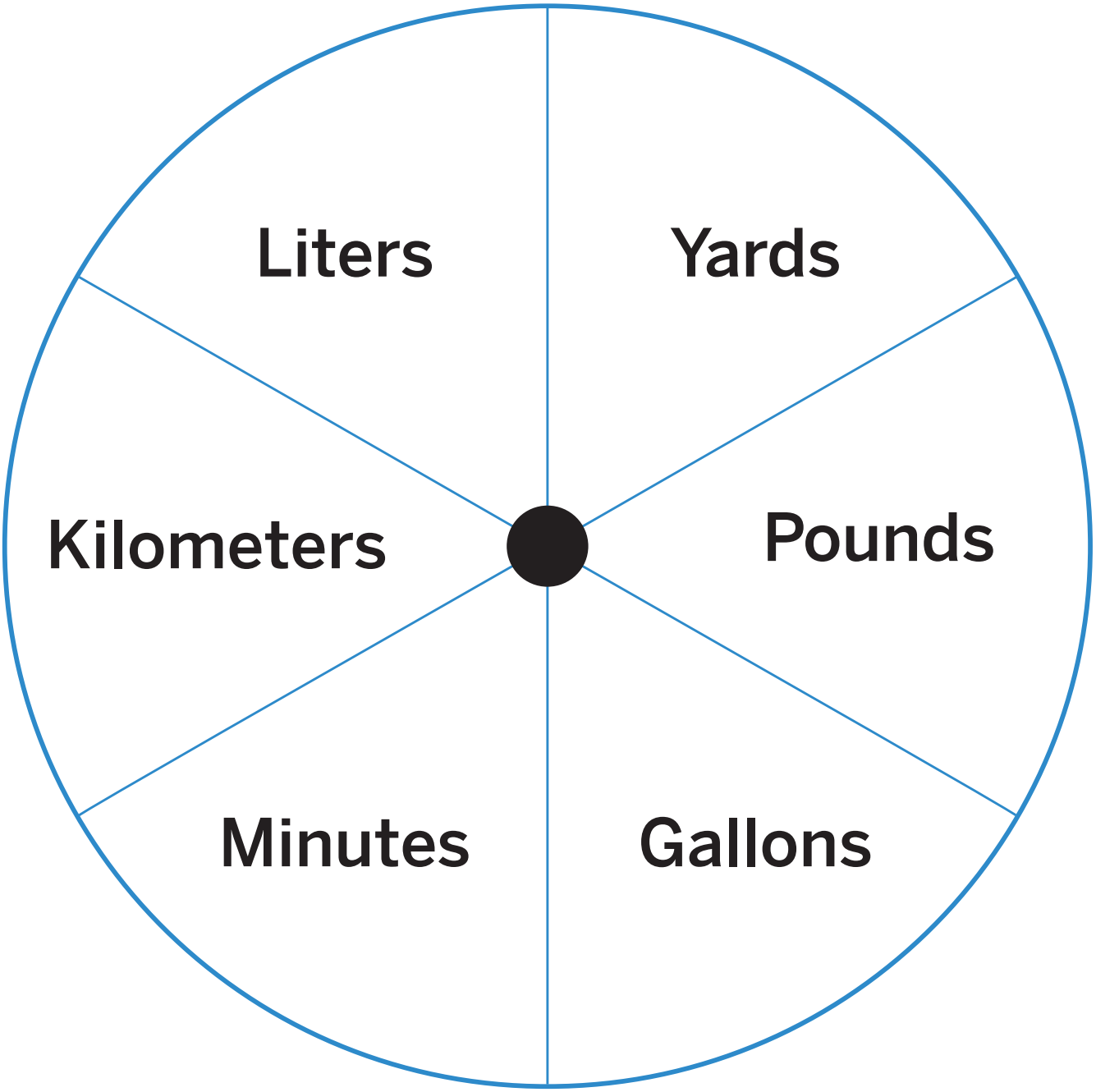
You want *less*		
Would you rather have ___	**or ___?**	**Points**

CENTER
Spinner

Would You Rather?

Stage 2

kilometers – meters – centimeters liters – milliliters gallons – quarts – pints – cups	pounds – ounces yards – feet – inches days – hours – minutes – seconds



Work Mats, Cards, and Grids

Number Cards, 0–10

Directions: Make as many copies as are needed; four copies of this page creates one set of cards. Cut out the cards to create a set of cards that will be used throughout the year.

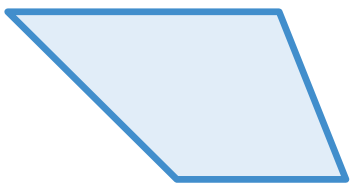
1 Number Cards, 0–10	2 Number Cards, 0–10	3 Number Cards, 0–10
4 Number Cards, 0–10	5 Number Cards, 0–10	6 Number Cards, 0–10
7 Number Cards, 0–10	8 Number Cards, 0–10	9 Number Cards, 0–10
10 Number Cards, 0–10	0 Number Cards, 0–10	

Quadrilateral Cards, Grade 5

CENTER
Cards
(p. 1 of 2)

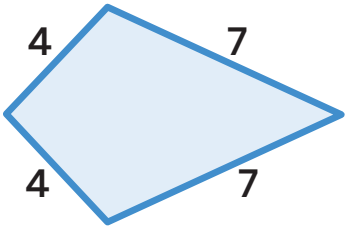
Directions: Make one copy per pair. Pre-cut the cards and distribute them so that each pair of students receives one set of cards.

A



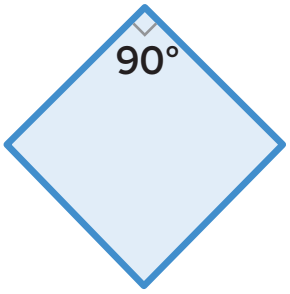
Quadrilateral Cards, Grade 5

B



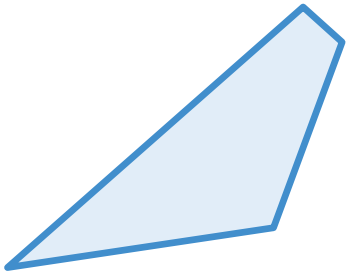
Quadrilateral Cards, Grade 5

C



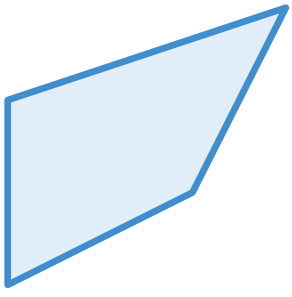
Quadrilateral Cards, Grade 5

D



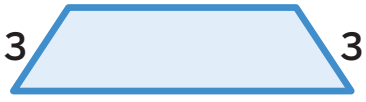
Quadrilateral Cards, Grade 5

E



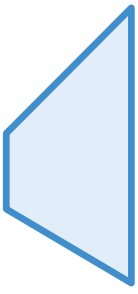
Quadrilateral Cards, Grade 5

F



Quadrilateral Cards, Grade 5

G



Quadrilateral Cards, Grade 5

H

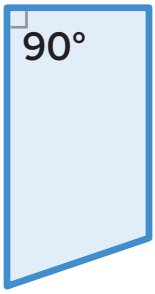
Quadrilateral Cards, Grade 5

I

Quadrilateral Cards, Grade 5

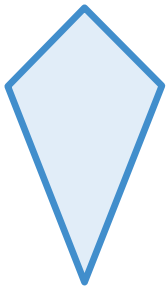
Quadrilateral Cards, Grade 5

J



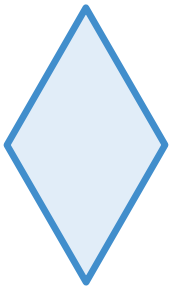
Quadrilateral Cards, Grade 5

K



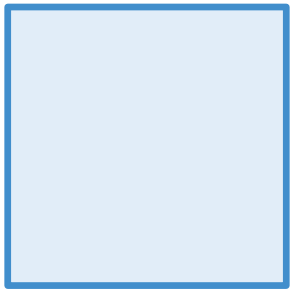
Quadrilateral Cards, Grade 5

L



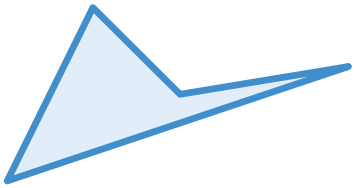
Quadrilateral Cards, Grade 5

M



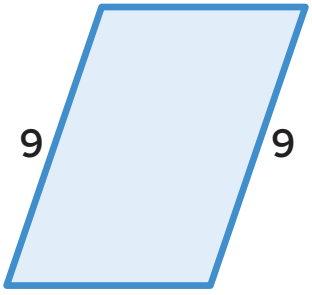
Quadrilateral Cards, Grade 5

N



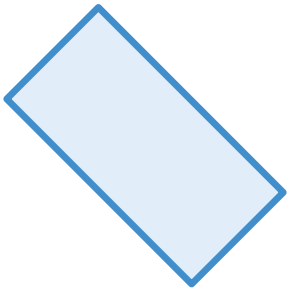
Quadrilateral Cards, Grade 5

O



Quadrilateral Cards, Grade 5

P

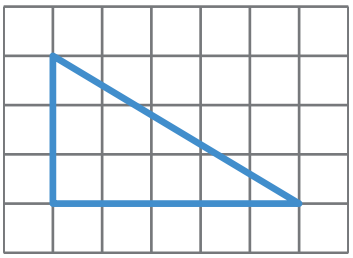


Quadrilateral Cards, Grade 5

Triangle Cards, Grade 5

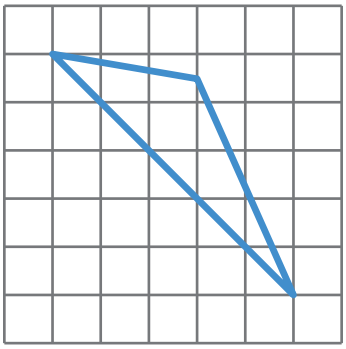
Directions: Make one copy per pair. Pre-cut the cards and distribute them so that each pair of students receives one set of cards.

A



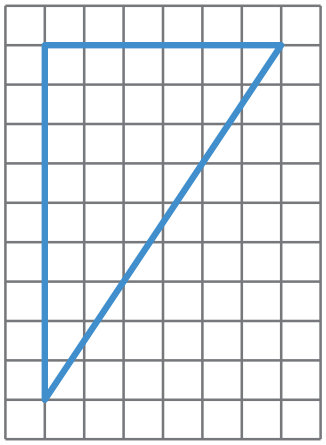
Triangle Cards, Grade 5

B



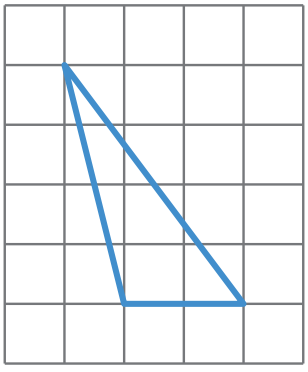
Triangle Cards, Grade 5

C



Triangle Cards, Grade 5

D

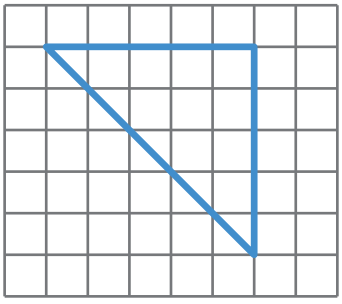


Triangle Cards, Grade 5

E

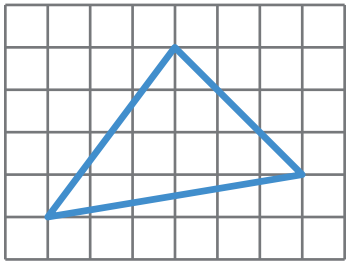
Triangle Cards, Grade 5

F



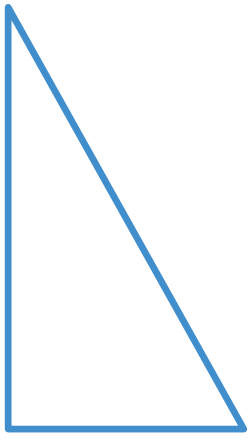
Triangle Cards, Grade 5

G



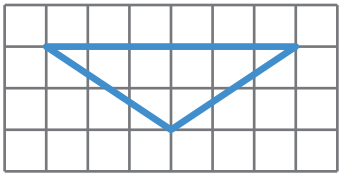
Triangle Cards, Grade 5

H



Triangle Cards, Grade 5

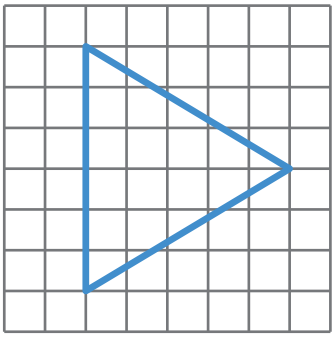
I



Triangle Cards, Grade 5

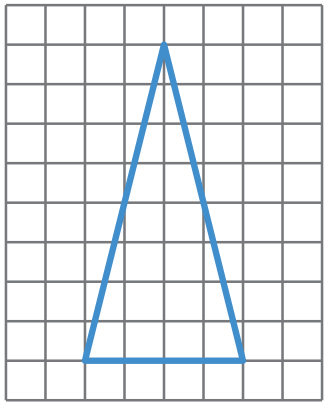
Triangle Cards, Grade 5

J



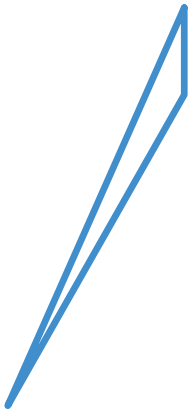
Triangle Cards, Grade 5

K



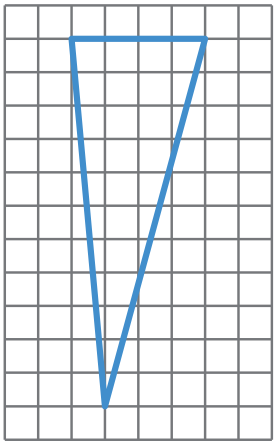
Triangle Cards, Grade 5

L



Triangle Cards, Grade 5

M



Triangle Cards, Grade 5