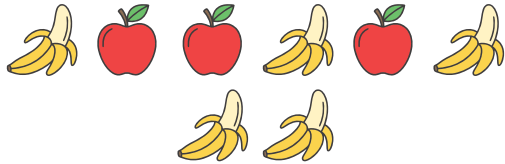


Understanding Ratios

Write each ratio. Keep the order of the words.

1.

Example



apples to bananas

3 : 5

bananas to apples

5 to 3

2.



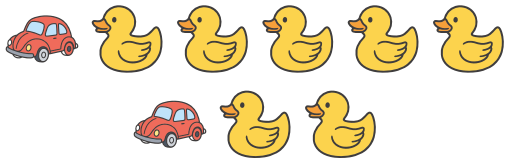
owls to turtles

 to

turtles to owls

 :

3.



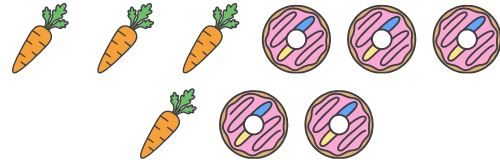
cars to ducks

 :

ducks to cars

 to

4.



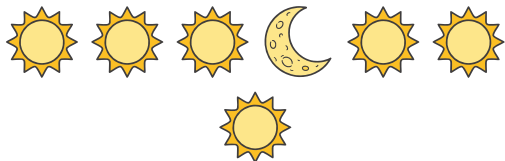
doughnuts to carrots

 to

carrots to doughnuts

 :

5.



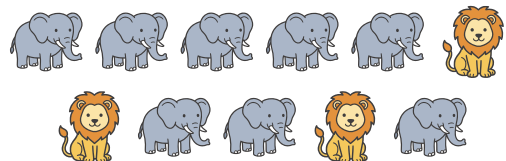
suns to moons

 :

moons to suns

 to

6.



lions to elephants

 to

elephants to lions

 :

Understanding Ratios

Write part-to-part and part-to-whole ratios.

1.



Example

owls to turtles

3 : 4

turtles to all the animals

4

4

:

7

4

to

7

7

2.



ducks to cars

:

cars to all the toys

:

:

to

:

3.



apples to bananas

:

bananas to all the fruit

:

:

:

to

:

:

4.



strawberries to carrots

:

carrots to all the food

:

:

to

:

Part to part or part to whole? Circle one.

Example

5. A bag has 4 red marbles and 7 blue marbles.
What does the ratio 4:11 compare?

part to part part to whole

6. A team has 9 boys and 6 girls. What does the ratio 6:9 compare?

part to part part to whole

7. A box holds 5 pencils and 8 pens. What does the ratio 8:13 compare?

part to part part to whole

8. Of 14 students, 8 walk to school and 6 ride the bus. What does 6:8 compare?

part to part part to whole

Understanding Ratios

Draw shapes to show each ratio. Then shade squares to show a ratio.

1. Draw circles and squares. The ratio of circles to squares is **2:3**.



Example

2. Draw triangles and circles. The ratio of triangles to circles is **4 to 1**.

3. Draw **8** shapes. The ratio of stars to all the shapes is **3:8**. The rest are squares.

4. Draw squares and stars. The ratio of stars to squares is **5 to 2**.

5. Draw **7** shapes. The ratio of circles to all the shapes is **4 to 7**. The rest are triangles.

6. For every **1** triangle there are **3** squares. Draw **2** triangles and the squares.

Shade squares to show each ratio.

Example

7. shaded to not shaded: **3:7**



8. shaded to all the squares: **5:8**



9. not shaded to shaded: **1:5**



10. shaded to all the squares: **3:4**



Understanding Ratios

Circle the ratio that matches.

1. Which ratio compares apples to bananas?

Example



5:3

3:8

5:8

3:5

2. Which ratio compares turtles to all the animals?



7:9

2:7

7:2

2:9

3. A shelter has 6 dogs and 4 cats. Which ratio compares cats to dogs?

4 to 10

4 to 6

6 to 4

6 to 10

4. What fraction of the toys are cars?



$\frac{5}{4}$

$\frac{5}{9}$

$\frac{4}{9}$

$\frac{4}{5}$

5. A garden has 7 red tulips and 2 yellow tulips. Which ratio compares yellow tulips to all the tulips?

7 to 2

2:7

7 to 9

2:9

6. Which ratio compares moons to suns?



5:1

1 to 5

1:6

5 to 6

7. A class has 12 girls and 13 boys. What fraction of the students are boys?

$\frac{12}{25}$

$\frac{13}{25}$

$\frac{13}{12}$

$\frac{12}{13}$

8. Which ratio is equivalent to the ratio of lions to elephants?



4:10

3:2

2:3

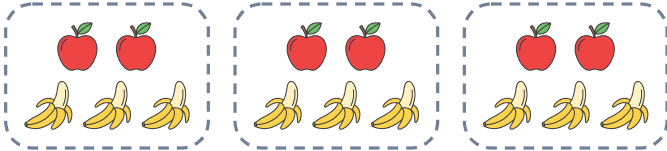
6:4

Understanding Ratios

Find equivalent ratios.

1.

Example



apples to bananas

in all

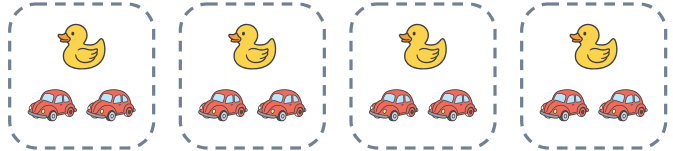
6 : 9

in one group

2 : 3

6:9 and 2:3 are equivalent ratios.

2.



ducks to cars

in all

□ : □

in one group

□ : □

Write the missing number.

Example

3. $3 : 4 = 6 : \square$ 4. $2 : 5 = \square : 15$ 5. $10 : 15 = 2 : \square$

6. $12 : 8 = \square : 2$ 7. $1 : 6 = 4 : \square$ 8. $9 : 12 = 3 : \square$

9. $5 : 2 = \square : 10$ 10. $18 : 6 = \square : 1$ 11. $4 : 7 = 20 : \square$

Are the ratios equivalent? Circle yes or no.

Example

12. $4:6$ and $6:9$ yes no 13. $2:3$ and $3:4$ yes no

14. $5:1$ and $15:3$ yes no 15. $8:12$ and $4:3$ yes no

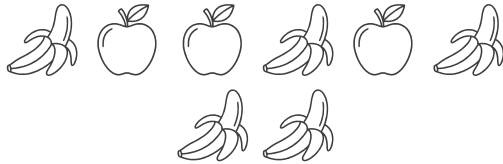
16. $3:7$ and $9:21$ yes no 17. $6:4$ and $10:8$ yes no

Understanding Ratios

Write each ratio. Keep the order of the words.

1.

Example



apples to bananas

3 : 5

bananas to apples

5 to 3

2.



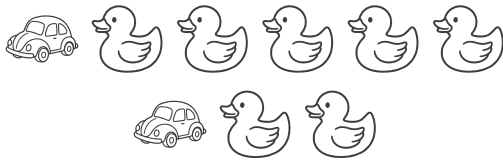
owls to turtles

 to

turtles to owls

 :

3.



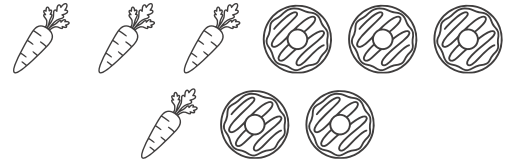
cars to ducks

 :

ducks to cars

 to

4.



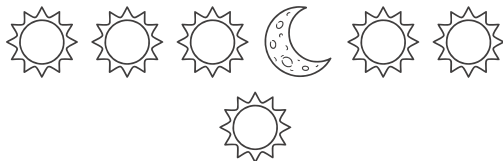
doughnuts to carrots

 to

carrots to doughnuts

 :

5.



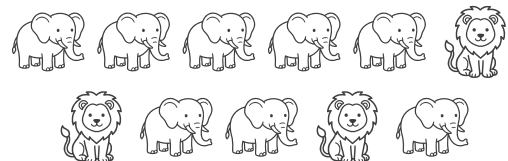
suns to moons

 :

moons to suns

 to

6.



lions to elephants

 to

elephants to lions

 :

Understanding Ratios

Write part-to-part and part-to-whole ratios.

1.



Example

owls to turtles

3 : 4

turtles to all the animals

4

4

:

7

4

to

7

7

2.



ducks to cars

:

cars to all the toys

:

:

to

:

3.



apples to bananas

:

bananas to all the fruit

:

:

to

:

4.



strawberries to carrots

:

carrots to all the food

:

:

to

:

Part to part or part to whole? Circle one.

Example

5. A bag has 4 red marbles and 7 blue marbles.
What does the ratio 4:11 compare?

part to part part to whole

6. A team has 9 boys and 6 girls. What does the ratio 6:9 compare?

part to part part to whole

7. A box holds 5 pencils and 8 pens. What does the ratio 8:13 compare?

part to part part to whole

8. Of 14 students, 8 walk to school and 6 ride the bus. What does 6:8 compare?

part to part part to whole

Understanding Ratios

Draw shapes to show each ratio. Then shade squares to show a ratio.

1. Draw circles and squares. The ratio of circles to squares is **2:3**.



Example

2. Draw triangles and circles. The ratio of triangles to circles is **4 to 1**.

3. Draw **8** shapes. The ratio of stars to all the shapes is **3:8**. The rest are squares.

4. Draw squares and stars. The ratio of stars to squares is **5 to 2**.

5. Draw **7** shapes. The ratio of circles to all the shapes is **4 to 7**. The rest are triangles.

6. For every **1** triangle there are **3** squares. Draw **2** triangles and the squares.

Shade squares to show each ratio.

Example

7. shaded to not shaded: **3:7**



8. shaded to all the squares: **5:8**



9. not shaded to shaded: **1:5**



10. shaded to all the squares: **3:4**



Understanding Ratios

Circle the ratio that matches.

1. Which ratio compares apples to bananas?

Example



5:3

3:8

5:8

3:5

2. Which ratio compares turtles to all the animals?



7:9

2:7

7:2

2:9

3. A shelter has 6 dogs and 4 cats. Which ratio compares cats to dogs?

4 to 10

4 to 6

6 to 4

6 to 10

4. What fraction of the toys are cars?



$\frac{5}{4}$

$\frac{5}{9}$

$\frac{4}{9}$

$\frac{4}{5}$

5. A garden has 7 red tulips and 2 yellow tulips. Which ratio compares yellow tulips to all the tulips?

7 to 2

2:7

7 to 9

2:9

6. Which ratio compares moons to suns?



5:1

1 to 5

1:6

5 to 6

7. A class has 12 girls and 13 boys. What fraction of the students are boys?

$\frac{12}{25}$

$\frac{13}{25}$

$\frac{13}{12}$

$\frac{12}{13}$

8. Which ratio is equivalent to the ratio of lions to elephants?



4:10

3:2

2:3

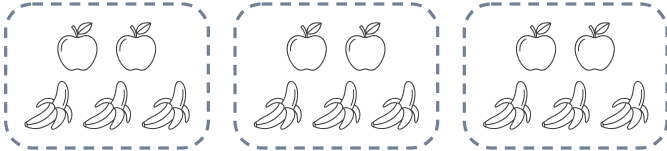
6:4

Understanding Ratios

Find equivalent ratios.

1.

Example



apples to bananas

in all

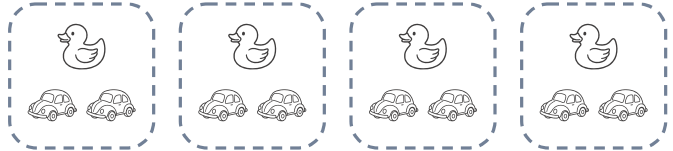
6 : 9

in one group

2 : 3

6:9 and 2:3 are equivalent ratios.

2.



ducks to cars

in all

 :

in one group

 :

Write the missing number.

Example

3. $3 : 4 = 6 : \boxed{8}$ 4. $2 : 5 = \boxed{} : 15$ 5. $10 : 15 = 2 : \boxed{}$

6. $12 : 8 = \boxed{} : 2$ 7. $1 : 6 = 4 : \boxed{}$ 8. $9 : 12 = 3 : \boxed{}$

9. $5 : 2 = \boxed{} : 10$ 10. $18 : 6 = \boxed{} : 1$ 11. $4 : 7 = 20 : \boxed{}$

Are the ratios equivalent? Circle yes or no.

Example

12. $4:6$ and $6:9$ yes no 13. $2:3$ and $3:4$ yes no

14. $5:1$ and $15:3$ yes no 15. $8:12$ and $4:3$ yes no

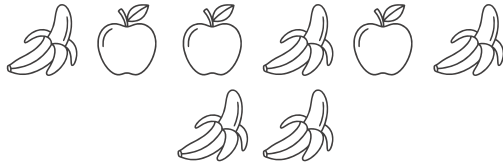
16. $3:7$ and $9:21$ yes no 17. $6:4$ and $10:8$ yes no

Understanding Ratios

Write each ratio. Keep the order of the words.

1.

Example



apples to bananas

3 : 5

bananas to apples

5 to 3

2.



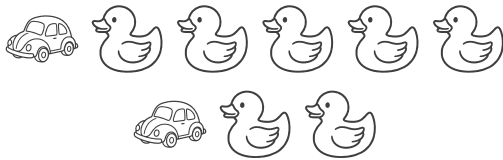
owls to turtles

4 to 2

turtles to owls

2 : 4

3.



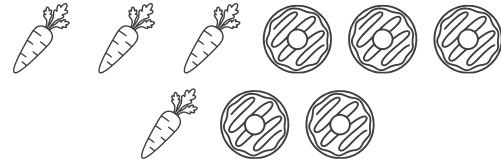
cars to ducks

2 : 7

ducks to cars

7 to 2

4.



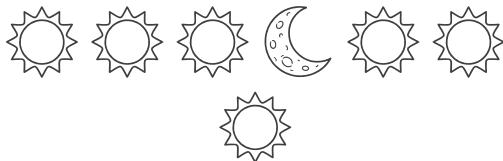
doughnuts to carrots

5 to 4

carrots to doughnuts

4 : 5

5.



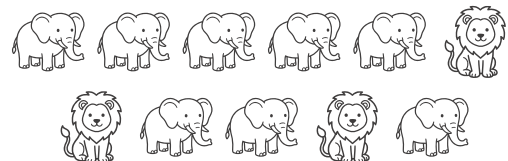
suns to moons

6 : 1

moons to suns

1 to 6

6.



lions to elephants

3 to 8

elephants to lions

8 : 3

Understanding Ratios

Write part-to-part and part-to-whole ratios.

1.



Example

owls to turtles

3 : 4

turtles to all the animals

4

4

:

7

4

to

7

7

2.



ducks to cars

2 : 5

cars to all the toys

5

5

:

7

5

to

7

7

3.



apples to bananas

6 : 3

bananas to all the fruit

3

3

:

9

3

to

9

9

4.



strawberries to carrots

5 : 4

carrots to all the food

4

4

:

9

4

to

9

9

Part to part or part to whole? Circle one.

Example

5. A bag has 4 red marbles and 7 blue marbles.
What does the ratio 4:11 compare?

part to part part to whole

6. A team has 9 boys and 6 girls. What does the ratio 6:9 compare?

part to part part to whole

7. A box holds 5 pencils and 8 pens. What does the ratio 8:13 compare?

part to part part to whole

8. Of 14 students, 8 walk to school and 6 ride the bus. What does 6:8 compare?

part to part part to whole

Understanding Ratios

Draw shapes to show each ratio. Then shade squares to show a ratio.

1. Draw circles and squares. The ratio of circles to squares is 2:3.



Example

2. Draw triangles and circles. The ratio of triangles to circles is 4 to 1.



3. Draw 8 shapes. The ratio of stars to all the shapes is 3:8. The rest are squares.



4. Draw squares and stars. The ratio of stars to squares is 5 to 2.



5. Draw 7 shapes. The ratio of circles to all the shapes is 4 to 7. The rest are triangles.



6. For every 1 triangle there are 3 squares. Draw 2 triangles and the squares.



Shade squares to show each ratio.

Example

7. shaded to not shaded: 3:7



8. shaded to all the squares: 5:8



9. not shaded to shaded: 1:5



10. shaded to all the squares: 3:4



Understanding Ratios

Circle the ratio that matches.

1. Which ratio compares apples to bananas?

Example



5:3

3:8

5:8

3:5

2. Which ratio compares turtles to all the animals?



7:9

2:7

7:2

2:9

3. A shelter has 6 dogs and 4 cats. Which ratio compares cats to dogs?

4 to 10

4 to 6

6 to 4

6 to 10

4. What fraction of the toys are cars?



$\frac{5}{4}$

$\frac{5}{9}$

$\frac{4}{9}$

$\frac{4}{5}$

5. A garden has 7 red tulips and 2 yellow tulips. Which ratio compares yellow tulips to all the tulips?

7 to 2

2:7

7 to 9

2:9

6. Which ratio compares moons to suns?



5:1

1 to 5

1:6

5 to 6

7. A class has 12 girls and 13 boys. What fraction of the students are boys?

$\frac{12}{25}$

$\frac{13}{25}$

$\frac{13}{12}$

$\frac{12}{13}$

8. Which ratio is equivalent to the ratio of lions to elephants?



4:10

3:2

2:3

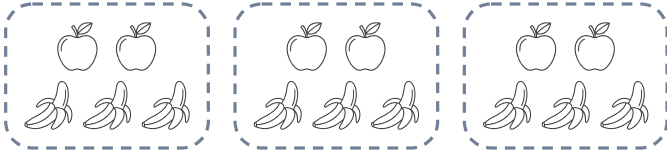
6:4

Understanding Ratios

Find equivalent ratios.

1.

Example



apples to bananas

in all

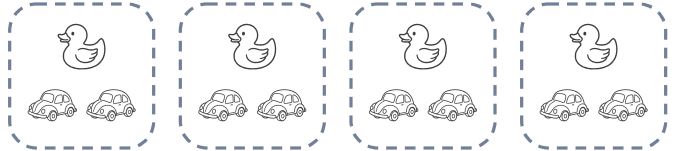
6 : 9

in one group

2 : 3

6:9 and 2:3 are equivalent ratios.

2.



ducks to cars

in all

4 : 8

in one group

1 : 2

Write the missing number.

Example

3. $3 : 4 = 6 : 8$ 4. $2 : 5 = 6 : 15$ 5. $10 : 15 = 2 : 3$

6. $12 : 8 = 3 : 2$ 7. $1 : 6 = 4 : 24$ 8. $9 : 12 = 3 : 4$

9. $5 : 2 = 25 : 10$ 10. $18 : 6 = 3 : 1$ 11. $4 : 7 = 20 : 35$

Are the ratios equivalent? Circle yes or no.

Example

12. $4:6$ and $6:9$ yes no 13. $2:3$ and $3:4$ yes no

14. $5:1$ and $15:3$ yes no 15. $8:12$ and $4:3$ yes no

16. $3:7$ and $9:21$ yes no 17. $6:4$ and $10:8$ yes no