

Grade 6 - Converting Measurement Units with Ratios - Answer Key

Common Core 6.RP.A.3d · maths-pdf.fr/en/

This **unit conversions answers** for 6th Grade covers converting measurement units with ratios (Common Core 6.RP.A.3d), with a free PDF to print.

Check each conversion here. The solutions state the conversion fact, show whether you multiply or divide, and give the answer with the correct unit in bold. A few solutions include double number lines or tape diagrams.

Grade 6 · Common Core State Standards: **6.RP.A.3d**

Unit conversions answers: exercises 1 to 10

Exercise 1 - Feet to inches

1 foot = 12 inches.

$$3 \times 12 = 36$$

36 inches

Exercise 2 - Yards to feet

1 yard = 3 feet.

$$5 \times 3 = 15$$

15 feet

Exercise 3 - Inches to feet

12 inches = 1 foot, so divide by 12.

$$48 \div 12 = 4$$

4 feet

Exercise 4 - Pounds to ounces

1 pound = 16 ounces.

$$4 \times 16 = 64$$

64 ounces

Exercise 5 - Ounces to pounds

$$96 \div 16 = 6$$

6 pounds

Exercise 6 - Gallons to quarts

1 gallon = 4 quarts.

$$3 \times 4 = 12$$

12 quarts

Exercise 7 - Cups to fluid ounces

$$5 \times 8 = 40$$

40 fluid ounces

Exercise 8 - Pints to quarts

Divide by 2.

$$24 \div 2 = 12$$

12 quarts

Exercise 9 - Hours to minutes

1 hour = 60 minutes.

$$2.5 \times 60 = 150$$

150 minutes

Exercise 10 - Seconds to minutes

$$270 \div 60 = 4.5$$

4.5 minutes

Exercises 11 and up

Exercise 11 - Centimeters to meters

$$100 \text{ cm} = 1 \text{ m.}$$

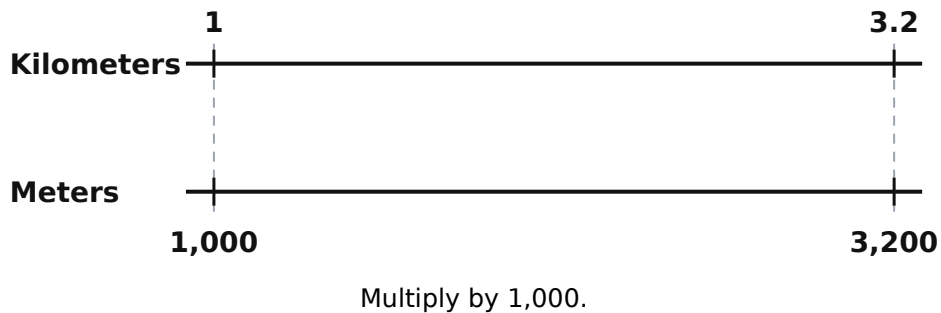
$$450 \div 100 = 4.5$$

4.5 meters

Exercise 12 - Kilometers to meters

$$3.2 \times 1000 = 3200$$

3,200 meters



Exercise 13 - Grams to kilograms

$$1,000 \text{ g} = 1 \text{ kg.}$$

$$2500 \div 1000 = 2.5$$

2.5 kilograms

Exercise 14 - Milliliters to liters

$$750 \div 1000 = 0.75$$

0.75 liter

Exercise 15 - Unit rate conversion

Feet per hour: $60 \times 5280 = 316800$.

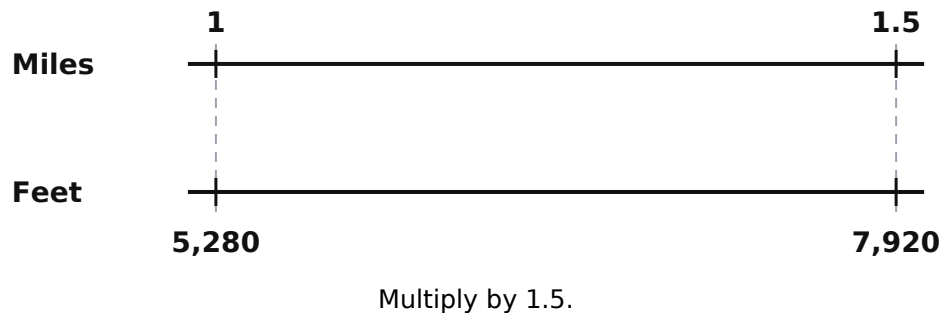
Feet per minute: $316800 \div 60 = 5280$.

5,280 feet per minute

Exercise 16 - Miles to feet

$$1.5 \times 5280 = 7920$$

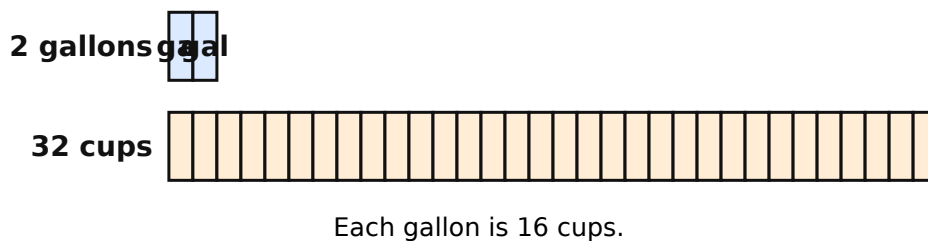
7,920 feet



Exercise 17 - Lemonade servings

$$2 \times 16 = 32 \text{ cups.}$$

32 servings



Exercise 18 - Which is longer?

2.5 yards = $2.5 \times 36 = 90$ inches (1 yard = 36 inches).

$90 > 80$

2.5 yards is longer.

Exercise 19 - Flour loaves

5 pounds = $5 \times 16 = 80$ ounces.

$80 \div 12 = 6$ remainder $80 - 72 = 8$.

6 loaves with 8 ounces left

Exercise 20 - Cutting rope

3.6 m = $3.6 \times 100 = 360$ cm.

$360 \div 45 = 8$

8 pieces

Key facts behind this unit conversions answers

Key facts

- A conversion factor is a ratio between two units, like 12 inches to 1 foot.
- Larger unit to smaller unit: multiply. Smaller to larger: divide.
- Metric conversions use 10, 100, and 1,000.
- Convert to the same unit before comparing amounts.
- Rates can be converted by converting each unit in turn.

How to use this unit conversions answers

Cover each solution, solve the exercise again, then uncover it and compare every line. If your answer differs, find the first step that changed and redo the exercise from there.