

# Grade 7 - Adding and Subtracting Rational Numbers - Worksheet

Common Core 7.NS.A.1 · [maths-pdf.fr/en/](https://maths-pdf.fr/en/)

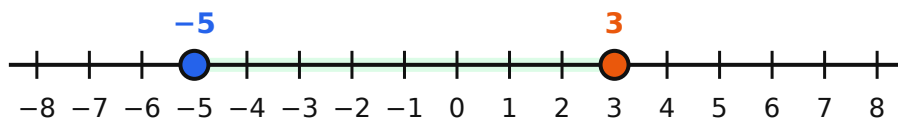
Name: \_\_\_\_\_ Class: \_\_\_\_\_ Date: \_\_\_\_/\_\_\_\_/\_\_\_\_

These 20 problems practice adding and subtracting integers, fractions, and decimals, including number line models, opposites, and absolute value as distance (Common Core 7.NS.A.1). They start with the basic skill, move to different kinds of numbers and multistep work, and end with six word problems set in everyday situations such as shopping, sports, and travel.

Show every step of your work, and use the answer key only after you have tried each problem.

**Grade 7** · Common Core State Standards: **7.NS.A.1**

## Exercise 1 - Add with opposite signs



Start at -5 and move right 8.

Find  $-5+8$ .

## Exercise 2 - Positive plus negative

Find  $7+(-12)$ .

## Exercise 3 - Two negatives

Find  $-6+(-9)$ .

## Exercise 4 - Subtract to a negative

Find  $4-9$ .

### Exercise 5 - Negative minus positive

Find  $-3-8$ .

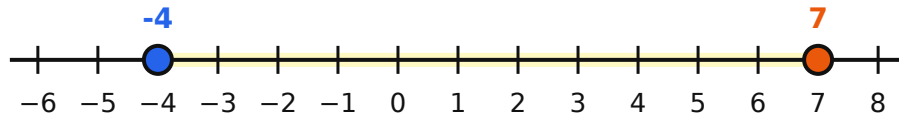
### Exercise 6 - Subtract a negative

Find  $-7-(-4)$ .

### Exercise 7 - Opposites

Find  $-\frac{3}{4}+\frac{3}{4}$  and explain why the answer is the same for any number and its opposite.

### Exercise 8 - Distance on a number line



Two points.

Find the distance between  $-4$  and  $7$ .

### Exercise 9 - Add decimals

Find  $-3.6+8.2$ .

### Exercise 10 - Subtract decimals

Find  $-1.75-2.5$ .

### Exercise 11 - Unlike fractions

Find  $-\frac{1}{2}+\frac{1}{3}$ . Write the answer in simplest form.

### Exercise 12 - Subtract a negative fraction

Find  $\frac{2}{3}-(-\frac{1}{4})$ . Write the answer in simplest form.

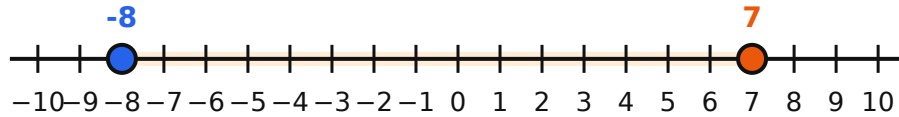
### Exercise 13 - Mixed numbers

Find  $-2\frac{1}{2}+4\frac{3}{4}$ . Write the answer in simplest form.

### Exercise 14 - Negative fractions

Find  $-\frac{5}{6}-\frac{1}{2}$ . Write the answer in simplest form.

### Exercise 15 - Temperature rise



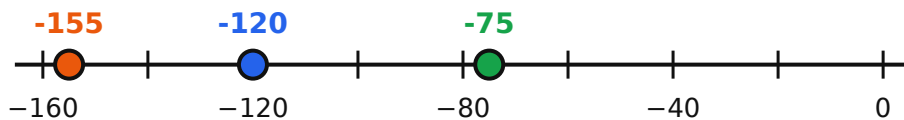
A rise in temperature.

At 6 a.m. in Minneapolis the temperature was  $-8^{\circ}\text{F}$ . By 2 p.m. it rose 15 degrees. Find the afternoon temperature.

### Exercise 16 - Overdrawn account

Jamal has \$42.50 in his checking account and writes a check for \$65.75. Find his new balance.

### Exercise 17 - Submarine



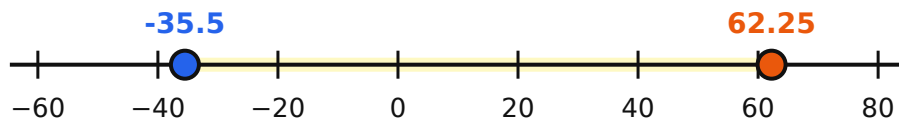
The submarine's three positions.

A submarine is at an elevation of  $-120$  feet. It rises 45 feet and then dives 80 feet. Find its final elevation.

### Exercise 18 - Football yardage

In four plays, a team gains 12 yards, loses 7, loses 15, and gains 9. Find the net result in yards.

### Exercise 19 - Diver and bird



Diver and gull.

A diver is at  $-35.5$  feet (35.5 feet below sea level). A gull flies at  $62.25$  feet above sea level. Find the vertical distance between them.

### Exercise 20 - Account balance

Sofia's account balance is  $-\$18.40$ . She deposits  $\$50$ , then spends  $\$22.35$ , and then spends  $\$9.80$ . Find her final balance.