SHIKSHA NATION

📄 Fraction Worksheet for Class 6 – PDF Structure

(NCERT Chapter 7: Fractions)

NCERT Chapter 7 – Practice Worksheets with Answers

Student Name: _____

Class & Section: _____
Date: _____

Instructions

For Students

- Read each question slowly and carefully before solving
- Write answers neatly and show steps where required
- Do not guess the answer; think before writing
- Use rough work space if needed
- Take your time and do not rush through questions

Remember, understanding the method is more important than finishing fast.

For Parents

- Encourage your child to explain the steps aloud
- Focus on how the answer is written, not only the final answer
- Correct mistakes calmly and ask the child to try again
- Praise effort and improvement, not just correct answers

Your support and patience help children gain confidence in fractions.

Tip: Short daily practice with explanation works better than long study hours.

Section 1: Equal Sharing & Fraction Basics

(NCERT Class 6 Maths – Chapter 7, Ex 7.1 aligned)

Instructions for Students

Look at each question carefully.
Check whether the parts are equal before writing the fraction.

Question Type 1: Identify the Fraction

1. A circle is divided into 4 equal parts. One part is shaded.
   Write the fraction for the shaded part. _____

2. A rectangle is divided into 6 equal parts.
   If 2 parts are shaded, write the fraction. _____

Question Type 2: Shade the Given Fraction

3. Shade 1/3 of the given shape.
   (Teacher/Parent will provide the figure)

4. Shade 3/5 of a rectangle divided into equal parts.

5. Shade 1/2 of a circle divided into equal sections.

Question Type 3: Write Fraction for Equal Parts

6. A chocolate bar is broken into 8 equal pieces.
   What fraction shows one piece? _____

7. A pizza is cut into 10 equal slices.
   Write the fraction for one slice. _____

8. A sheet of paper is divided into 4 equal parts.
   Write the fraction for the whole sheet. _____

Thinking Question (Concept Check)

9. A shape is divided into unequal parts.
   Can it represent a fraction?
   Write Yes / No and give a short reason. _____

Difficulty Level

🟢 Easy – Focus on understanding equal parts.

Section 2: Fractions as Parts of a Whole

(NCERT Class 6 Maths – Chapter 7, Ex 7.2 aligned)

Instructions for Students

First identify the whole.
Then count the total equal parts and the parts taken.

Question Type 1: Picture-Based Questions

1. A circle is divided into 8 equal parts.
   If 3 parts are shaded, write the fraction shown. _____

2. Look at the given picture.
   Identify the whole object. _____

3. A rectangle is divided into 6 equal parts.
   Write the fraction for one part. _____

Question Type 2: Fill in the Numerator / Denominator

4. In the fraction 5/9, the numerator is _____ and the denominator is _____.

5. If a whole is divided into 10 equal parts, the denominator will be _____.

6. Fill in the blank:
   ___ / 7 means three equal parts taken from seven.

Question Type 3: Identify Whole and Parts

7. A pizza is divided into 12 equal slices.
   What fraction shows the whole pizza? _____

8. A shape has 4 shaded parts out of 9 equal parts.
   Write the fraction. _____

Concept Check Question

9. If the parts of a shape are not equal,
   can we write a fraction?
   Write Yes / No and give one reason. _____

Difficulty Level

🟡 Easy–Moderate – Focus on whole vs parts.

Section 3: Measuring Using Fractional Units

(NCERT Class 6 Maths – Chapter 7, Ex 7.3 aligned)

Instructions for Students

Read each question carefully.
Think about one unit and how it is divided into equal parts.

Question Type 1: Measure Lengths Using Fractions

1. A ribbon is 1 metre long.
   It is cut into 4 equal parts.
   Write the fraction for one part. _____

2. A pencil is 3/4 of a ruler.
   Write its length in fraction form. _____

3. A strip is divided into 6 equal parts.
   Write the fraction for 2 parts of the strip. _____

Question Type 2: Compare Fractional Measurements

4. Which length is longer:
   1/2 metre or 1/3 metre? _____

5. Compare using >, < or =
   3/4 metre ___ 2/4 metre

6. A rope is 5/6 metre long.
   Another rope is 4/6 metre long.
   Which rope is longer? _____

Application Question

7. Two sticks measure 1/4 metre each.
   What is their total length in fraction form? _____

Difficulty Level

🟡 Moderate – Focus on understanding units and comparison.

Section 4: Fractions on the Number Line

(NCERT Class 6 Maths – Chapter 7, Ex 7.4 aligned)

Instructions for Students

Look at the number line carefully.
Make sure the line is divided into equal parts before marking fractions.

Question Type 1: Mark Fractions on the Number Line

1. Draw a number line from 0 to 1 and mark 1/2 on it.

2. Mark 3/4 on a number line between 0 and 1.

3. Show 2/3 on a number line using equal divisions.

Question Type 2: Find the Missing Fraction

4. On a number line divided into 4 equal parts, the first mark after 0 is 1/4.
   What fraction is the second mark? _____

5. Between 0 and 1, which fraction lies between 1/4 and 3/4? _____

Question Type 3: Ordering Fractions on the Number Line

6. Arrange the following fractions on a number line in ascending order:
   1/3, 2/3, 1/6

7. Arrange the following fractions in descending order:
   1/2, 3/4, 1/4

Difficulty Level

🟡 Moderate – Focus on equal spacing and correct position.

Section 5: Mixed & Improper Fractions

(NCERT Class 6 Maths – Chapter 7, Ex 7.5 aligned)

Instructions for Students

Read the fraction carefully.
Write each step neatly while converting.

Question Type 1: Convert Mixed Fractions into Improper Fractions

1. Convert 2½ into an improper fraction. _____
2. Write 3⅓ as an improper fraction. _____
3. Convert 4¼ into an improper fraction. _____
4. Change 1⅔ into an improper fraction. _____
5. Convert 5⅖ into an improper fraction. _____

Question Type 2: Convert Improper Fractions into Mixed Fractions

6. Convert 7/3 into a mixed fraction. _____
7. Write 11/4 as a mixed fraction. _____
8. Convert 9/2 into a mixed fraction. _____
9. Change 13/5 into a mixed fraction. _____
10. Convert 8/3 into a mixed fraction. _____

Difficulty Level

🟡 Moderate – Focus on correct steps and neat working

Section 6: Equivalent Fractions

(NCERT Class 6 Maths – Chapter 7, Ex 7.6 aligned)

Instructions for Students

Remember, equivalent fractions have the same value.
Multiply or divide the numerator and denominator by the same number.

Question Type 1: Find Equivalent Fractions

1. Write one equivalent fraction for 1/2. _____
2. Find an equivalent fraction of 2/5 by multiplying by 2. _____
3. Write two equivalent fractions for 3/4. _____ , _____
4. Find an equivalent fraction for 4/6. _____

Question Type 2: Fill in the Blanks

5. Complete the fraction:
   3/5 = ___ / 10

6. Fill in the missing number:
   2/7 = 4 / ___

7. Complete:
   5/8 = ___ / 16

Question Type 3: True or False

8. 6/9 = 2/3 (True / False)

9. 3/6 and 1/2 are equivalent fractions (True / False)

10. 2/4 is greater than 1/2 (True / False)

Difficulty Level

🟡 Moderate – Focus on method, not guessing.

Section 7: Comparing Fractions

(NCERT Class 6 Maths – Chapter 7, Ex 7.7 aligned)

Instructions for Students

Read the fractions carefully.
Check the denominator first before comparing.

Question Type 1: Greater Than / Less Than

1. Compare using >, < or =
   3/7 ___ 5/7

2. Which is greater:
   2/5 or 4/5? _____

3. Compare:
   1/4 ___ 1/6

Question Type 2: Ordering Fractions

4. Arrange the following fractions in ascending order:
   3/8, 1/8, 5/8

5. Arrange the following fractions in descending order:
   1/2, 1/3, 1/4

Question Type 3: Reason-Based Comparison

6. Which is smaller, 2/3 or 3/4?
   Write one reason. _____

7. Which fraction is closer to 1, 5/6 or 4/6?
   Explain your answer. _____

Difficulty Level

🟡 Moderate – Focus on reasoning, not shortcuts

Section 8: Addition & Subtraction of Fractions

(NCERT Class 6 Maths – Chapter 7, Ex 7.8 aligned)

Instructions for Students

Check whether the fractions have the same denominator before solving.
Write each step neatly and do not skip steps.

Sub-Section A: Like Denominators

1. Add:
   2/7 + 3/7 = _____

2. Find the sum:
   1/5 + 2/5 = _____

3. Subtract:
   5/8 − 3/8 = _____

4. Find the difference:
   7/10 − 2/10 = _____

5. Add:
   4/9 + 3/9 = _____

Sub-Section B: Simple Word Problems

6. Riya ate 2/6 of a chocolate in the morning and 1/6 in the evening.
   What fraction of the chocolate did she eat in total? _____

7. A rope is 6/8 metre long.
   If 2/8 metre is cut, how much rope is left? _____

8. Aman read 3/7 of a book on Monday and 2/7 on Tuesday.
   How much of the book did he read altogether? _____

9. A cake is divided into 10 equal pieces.
   If 4 pieces are eaten, what fraction remains? _____

Difficulty Level

🟡 Moderate – Focus on correct steps and neat working

Section 9: Fraction Word Problems

(Application Based)

Instructions for Students

Read the question carefully.
Underline important numbers before solving.

Question Type 1: Daily-Life Situations

1. Riya drank 3/5 of a bottle of juice in the morning.
   How much juice is left in the bottle? _____

2. A rope is 7/8 metre long.
   If 3/8 metre is cut, how much rope remains? _____

3. Meena read 2/6 of a book in the morning and 1/6 in the evening.
   What fraction of the book did she read in total? _____

Question Type 2: Multi-Step Problems

4. A cake is divided into 12 equal pieces.
   Aman ate 5 pieces and Riya ate 3 pieces.
   What fraction of the cake was eaten in total? _____

5. A water tank is filled up to 4/6 part.
   Later, 1/6 part of water is used.
   How much water is left in the tank? _____

6. Sita walks 1/4 km in the morning and 2/4 km in the evening.
   What is the total distance she walks in a day? _____

Thinking Question

7. A chocolate bar is divided into 10 equal parts.
   If 2/10 is eaten in the morning and 3/10 in the evening,
   how much chocolate is left? _____

Difficulty Level

🟡 Moderate – Focus on understanding the situation and steps

Full Chapter Practice Test – Fractions

(Class 6 Maths | NCERT Chapter 7)

Instructions for Students

- Attempt all questions
- Show steps where required
- Do not rush; read each question carefully

Time Suggested: 40 minutes

Section A: Basic Concepts

1. A circle is divided into 8 equal parts.
   Write the fraction for 3 shaded parts. _____

2. Write the numerator and denominator of 5/9.
   Numerator: _____ Denominator: _____

Section B: Fractions on Number Line

3. Mark 1/2 on a number line from 0 to 1.

4. Arrange the following fractions in ascending order:
   1/4, 3/4, 2/4

Section C: Mixed & Equivalent Fractions

5. Convert 3½ into an improper fraction. _____

6. Write one equivalent fraction of 2/3. _____

7. Check whether 6/8 and 3/4 are equivalent.
   Write Yes / No with reason. _____

Section D: Comparing Fractions

8. Compare using >, < or =
   2/5 ___ 4/5

9. Which fraction is greater, 3/4 or 2/3?
   Give one reason. _____

Section E: Addition & Subtraction

10. Add:
    3/7 + 2/7 = _____

11. Subtract:
    5/6 − 1/6 = _____

Section F: Word Problems

12. Riya ate 2/6 of a chocolate in the morning and 3/6 in the evening.
    What fraction of the chocolate did she eat in total? _____

13. A rope is 7/8 metre long.
    If 3/8 metre is cut, how much rope is left? _____

14. A pizza is cut into 10 equal slices.
    If 4 slices are eaten, what fraction remains? _____

Section G: Application & Thinking

15. Simplify the fraction 6/12. _____

16. Draw a number line and show 3/4 on it.

17. Convert 9/3 into a whole number. _____

18. Write one mistake students often make while adding fractions. _____

Difficulty Level

🟡 Balanced – Easy to Moderate (Exam-Oriented)

📌 Parent Tip:
Let the child attempt this test without help first.
Check steps calmly and revise weak areas after the test.

Answer Key – Fractions

(Class 6 Maths | NCERT Chapter 7)

Section 1: Equal Sharing & Fraction Basics

1. 1/4
2. 2/6
3. 1/3
4. 3/5
5. 1/2
6. 1/8
7. 1/10
8. 4/4 = 1
9. No (parts must be equal)

Section 2: Fractions as Parts of a Whole

1. 3/8
2. The whole shape
3. 1/6
4. Numerator = 5, Denominator = 9
5. 10
6. 3/7
7. 12/12
8. 4/9
9. No (unequal parts)

Section 3: Measuring Using Fractional Units

1. 1/4

2. 3/4
3. 2/6
4. 1/2 metre
5. 3/4 > 2/4
6. 5/6 metre
7. 2/4 = 1/2 metre

Section 4: Fractions on the Number Line

1. 1/2 marked at middle
2. 3/4 marked between 1/2 and 1
3. 2/3 between 0 and 1
4. 2/4
5. 1/2
6. 1/6, 1/3, 2/3
7. 3/4, 1/2, 1/4

Section 5: Mixed & Improper Fractions

1. 2½ = 5/2
2. 3⅓ = 10/3
3. 4¼ = 17/4
4. 1⅔ = 5/3
5. 5⅖ = 27/5
6. 7/3 = 2⅓
7. 11/4 = 2¾
8. 9/2 = 4½

9. 13/5 = 2⅗
10. 8/3 = 2⅔

Section 6: Equivalent Fractions

1. 2/4
2. 4/10
3. 6/8, 9/12
4. 2/3
5. 6/10
6. 14
7. 10/16
8. True
9. True
10. False

Section 7: Comparing Fractions

1. 3/7 < 5/7
2. 4/5
3. 1/4 > 1/6
4. 1/8, 3/8, 5/8
5. 1/2, 1/3, 1/4
6. 2/3 (closer to 1)
7. 5/6 (larger numerator)

Section 8: Addition & Subtraction

1. 2/7 + 3/7 = 5/7

2. 1/5 + 2/5 = 3/5
3. 5/8 – 3/8 = 2/8
4. 7/10 – 2/10 = 5/10
5. 4/9 + 3/9 = 7/9
6. 3/6 = 1/2
7. 4/8
8. 5/7
9. 6/10

Section 9: Fraction Word Problems

1. 2/5
2. 4/8
3. 3/6
4. 8/12
5. 3/6
6. 3/4
7. 5/10

Full Chapter Practice Test – Answers

1. 3/8
2. 5 and 9
3. Middle of 0 and 1
4. 1/4, 2/4, 3/4
5. 7/2
6. 4/6

7. Yes
8. 2/5 < 4/5
9. 3/4
10. 5/7
11. 4/6
12. 5/6
13. 4/8
14. 6/10
15. 1/2
16. Correct placement
17. 3
18. Adding denominators

📌 Parent Note (Optional Page Footer)
Focus on steps. Small mistakes are part of learning.

Common Mistakes in Fractions

(Read Before or After Practice)

Understanding common mistakes helps students improve faster and avoid repeating errors in exams.

❌ Mistake 1: Adding or Subtracting Denominators

Wrong method:
1/4 + 1/4 = 2/8 ❌

Correct idea:
When denominators are same, add or subtract only the numerators.
1/4 + 1/4 = 2/4 ✔️

❌ Mistake 2: Wrong Conversion of Mixed Fractions

Wrong method:
2½ = 2 + 1/2 ❌

Correct idea:
Multiply the whole number with the denominator, then add the numerator.
2½ = (2 × 2 + 1) / 2 = 5/2 ✔️

❌ Mistake 3: Unequal Parts on Number Line

Wrong approach:
Marking fractions without equal spacing ❌

Correct idea:
Always divide the number line into equal parts first, then mark the fraction.
Equal spacing is more important than speed ✔️

❌ Mistake 4: Not Simplifying Fractions

Example:
6/12 left as it is ❌

Correct idea:
Simplify whenever possible.
6/12 = 1/2 ✔️

❌ Mistake 5: Guessing Instead of Explaining

Writing an answer without knowing why often leads to errors.
Explanation shows real understanding.

👨‍👩‍👧 Parent Tip Box

- Ask your child to explain each step aloud
- Focus on how the answer is written, not just correctness
- Do not scold for mistakes — use them as learning points
- Encourage slow and neat work

📌 A child who understands mistakes learns faster than one who memorises answers.

Keep Going, You're Learning 👍

A Note for Students

Maths becomes easier when you practice regularly and stay patient.
Do not worry about mistakes — they are part of learning.

Take one question at a time.
Understand the steps.
Explain your thinking in your own words.

Every small effort you make today helps you become more confident tomorrow.

> "Practice slowly. Understand clearly. You will improve."

Remember

- Speed will come with practice
- Understanding is more important than marks
- Asking questions is a good habit

Believe in yourself and keep practising.

Shiksha Nation