Answers and talk notes

Division Expressions with Fractions and Mixed Numbers

What your student is learning

Tonight we divide with mixed numbers like 2 1/2. The trick: turn the mixed number into one simple fraction first, then divide the same way as always.

Answers

Ask your student to explain before you look.

1. **D.** 4. 1/2 = 4/8, so 1/2 ÷ 1/8 = 4. Four eighths fit in one half.
2. **A.** 7/5. 2/3 ÷ 5/7 = 2/3 × 7/5. Flip the divisor, 5/7, to 7/5.
3. **C.** 4. 4 sixths ÷ 1 sixth = 4, so 2/3 ÷ 1/6 = 4.
4. **B.** 2. 5/6 ÷ 5/12 = 5/6 × 12/5 = 60/30 = 2.
5. **D.** 4. 3 1/3 = 10/3, so 10/3 ÷ 5/6 = 10/3 × 6/5 = 60/15 = 4.
6. **A.** 3. 2 1/4 = 9/4, so 9/4 ÷ 3/4 = 9/4 × 4/3 = 36/12 = 3 pieces.

Talk about it

Which number are we dividing BY: the rice or the scoop?

Home mission

Use any 1/2-cup scoop and a bowl. Pretend the bowl holds 2 1/2 cups of rice. Ask your student: how many scoops? Listen for "two and a half cups is five halves."

When they are stuck, ask

- What do we do first when we see a mixed number like 2 1/2?
- Which fraction gets flipped — the first one or the second one?
- After we multiply, can we make the answer smaller? Let's simplify.

Try not to say

- Flip the mixed number without making it one fraction first.
- Flip the first fraction instead of the second.
- Just divide the tops and the bottoms straight across.