

Rounding whole numbers to estimate in context

MODULE 1 · PLACE VALUE, DECIMALS AND THE NUMBER SYSTEM NUMBER

HOW TO ANSWER TODAY

- **Value of a digit.** Find which place the digit sits in, then write what it is worth there as a number (not the place name).
In 3,742 the digit 7 sits in the hundreds place. Its value is 700.
- **Round to nearest....** Look at the digit ONE place to the right of where you're rounding to. 5 or more → round up; less than 5 → keep.
7.34 to nearest tenth → 7.3 (the 4 is less than 5). · 7.36 → 7.4.
- **Expanded form.** Write the number as a sum of its place values. Skip any part that is 0.
 $3,482 = 3,000 + 400 + 80 + 2$ · $70,050 = 70,000 + 50$

★ STRETCH PROBLEMS

- 1 5th class are decorating a World Book Day display board with the total number of words read by all the pupils in the school this term: **6,204,109**. What is the value of the digit **2** in this number?
- 2 5th class baked sponge cakes for the Junior Infants playground fundraiser. Each tray of sponge needs **74.85 grams** of sugar, but the kitchen scales only show one decimal place. What is **74.85** rounded to the nearest tenth of a gram?
- 3 The school library catalogue shows that **377,265** books have been borrowed across all the primary schools in the county this year. Write **377,265** in expanded form.
- 4 The Cumann na mBunscol website reports that **485,708** pupils have taken part in school blitzes across the country since the competition began. Write **485,708** in expanded form.
- 5 At the Saturday farmers' market in Galway, the stallholder weighs a bag of potatoes and the scales show **95.31 kg** of spuds sold by lunchtime. She wants to write the total on her board to the nearest tenth of a kilogram. What does she write?