

Rounding numbers to the nearest 10

A good way of explaining this is to use a **number line**.

If the **unit** of the number is **less than five**, the number needs to be **rounded down**.

If the **unit** of the number is **5 or above**, the number needs to be **rounded up**.

So 32 would be rounded down to 30, 35 would be rounded up to 40 and 38 would also be rounded up to 40:

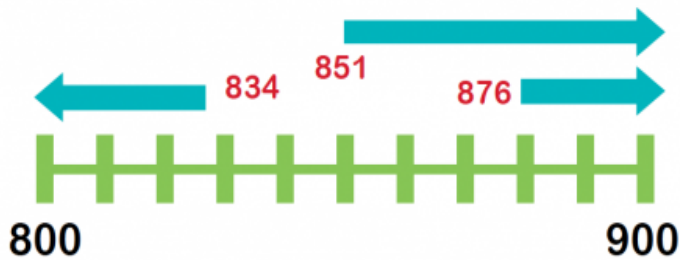


Rounding numbers to the nearest 100

If the **tens digit** is **less than 50** the number is rounded down.

If the **tens digit** is **50 or more**, the number is rounded up. (The units digit can be ignored when rounding a three-digit number to the nearest 100.)

So 834 would be rounded down to 800, 851 would be rounded up to 900 and 876 would be rounded up to 900:



Rounding numbers to the nearest 1000

In **Year 4**, children need to **round four-digit numbers to the nearest ten, hundred or thousand**. Example questions may be as follows:

What is 4231 rounded to the nearest ten? (Answer: 4230)

What is 8163 rounded to the nearest hundred? (Answer: 8200)

What is 2839 rounded to the nearest thousand? (Answer: 3000)

Match the number, how the number is rounded and the number to which it is rounded. One has been done for you.

Top Tip: Start with the larger numbers first.

39	nearest 1000	3400
65	nearest 10	70
74	nearest 100	100
145	nearest 10	700
736	nearest 10	40
1902	nearest 100	1900
3419	nearest 100	10 000
9567	nearest 100	150

Solve the following word problems, rounding the answer as instructed.

1. A supermarket sells 187 cartons of yoghurt a week. How many cartons is this to the nearest 10 and 100?

2. There are 35 245 spectators at a football match. How many is this to the nearest 10, 100 and 1000?

3. I'm thinking of a 3 digit number. When I round it to the nearest 10, I get 560. My number has an 8 in the ones column. What is my number?

Round the Three Dice

Age 7 to 11 ★



There are three dice, each of them with faces labelled from 1 to 6. When the dice are rolled they can be combined in six different ways to make a three-digit number.

For example, if I roll a 2 and a 4 and a 5, I can combine them to make 245, 254, 425, 452, 524 or 542.

Now round each of these numbers to the nearest 100:

245 rounds to 200, 254 rounds to 300, 425 rounds to 400, 452 rounds to 500, 524 rounds to 500 and 542 rounds to 500.

Repeat for other rolls of the dice.

Can each of the six numbers round to the same multiple of 100?

Can each of the six numbers round to a different multiple of 100?

Answers

Match the number, how the number is rounded and the number to which it is rounded. One has been done for you.

Top Tip: Start with the larger numbers first.

39	nearest 1000	3400
65	nearest 10	70
74	nearest 100	100
145	nearest 10	700
736	nearest 10	40
1902	nearest 100	1900
3419	nearest 100	10 000
9567	nearest 100	150

Solve the following word problems, rounding the answer as instructed.

1. A supermarket sells 187 cartons of yoghurt a week. How many cartons is this to the nearest 10 and 100?
190 and 200
2. There are 35 245 spectators at a football match. How many is this to the nearest 10, 100 and 1000?
35 250, 35 200 and 35 000
3. **558**

Round the Three Dice

This is an open ended investigation so there are many possible answers. The questions below might help to get the investigation started.

Key questions

Which numbers can we make?

What will they round to? Will they round up or down? Why?

Do they round to the same multiple of 100? Why? When will this happen?

Does it make a difference if the digits rolled are unique?

