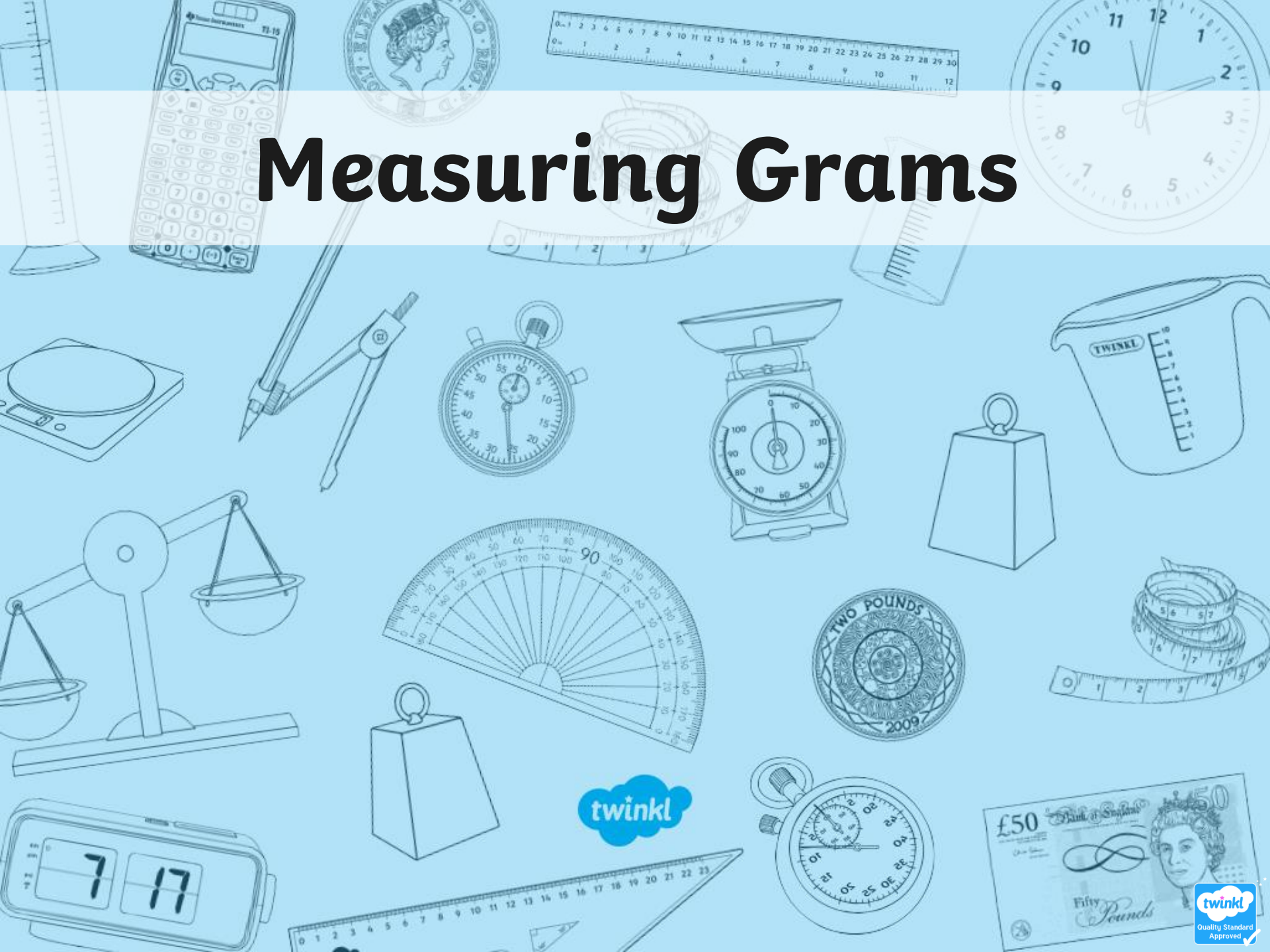


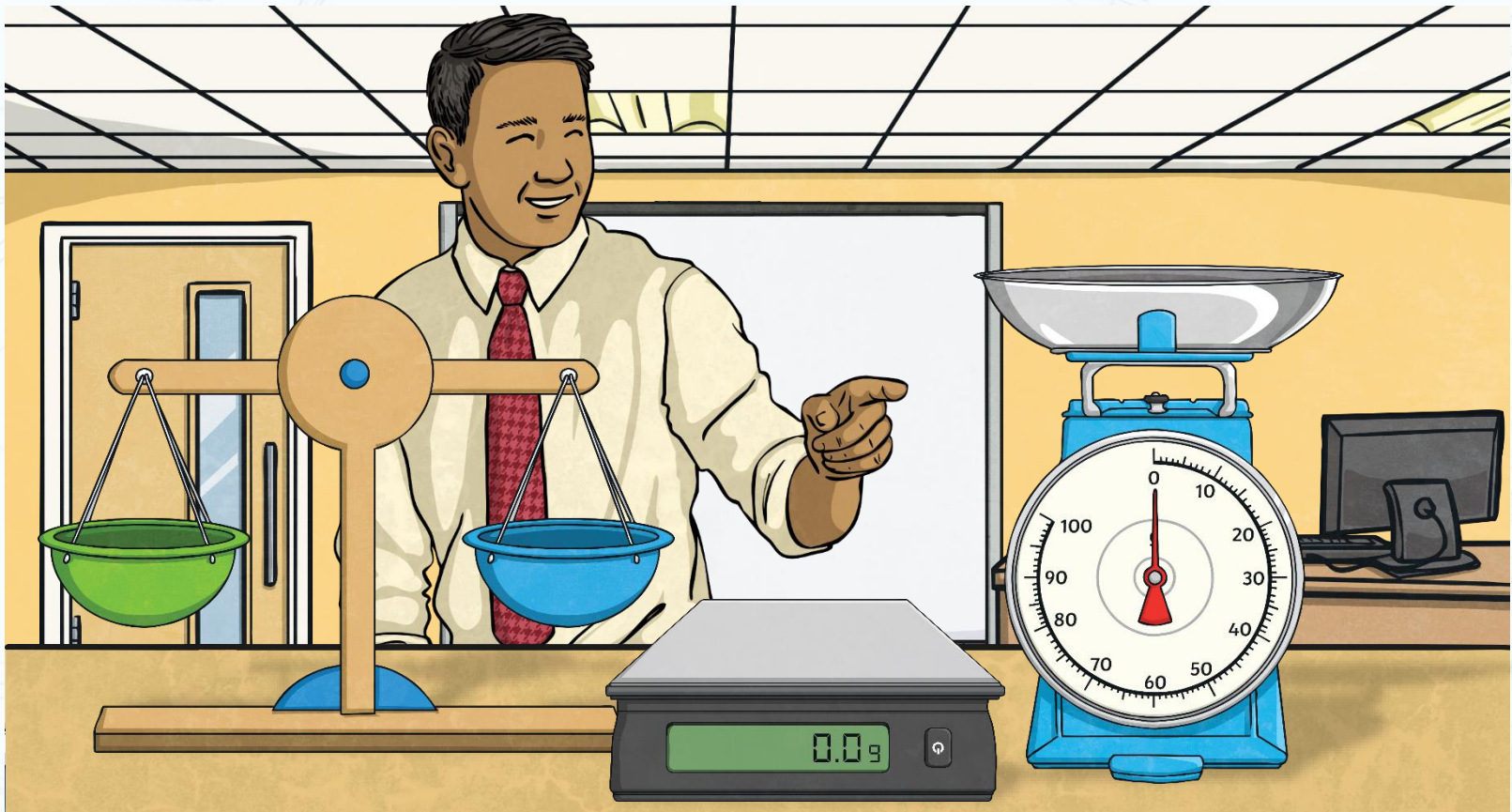
Measuring Grams



Weighing in Grams



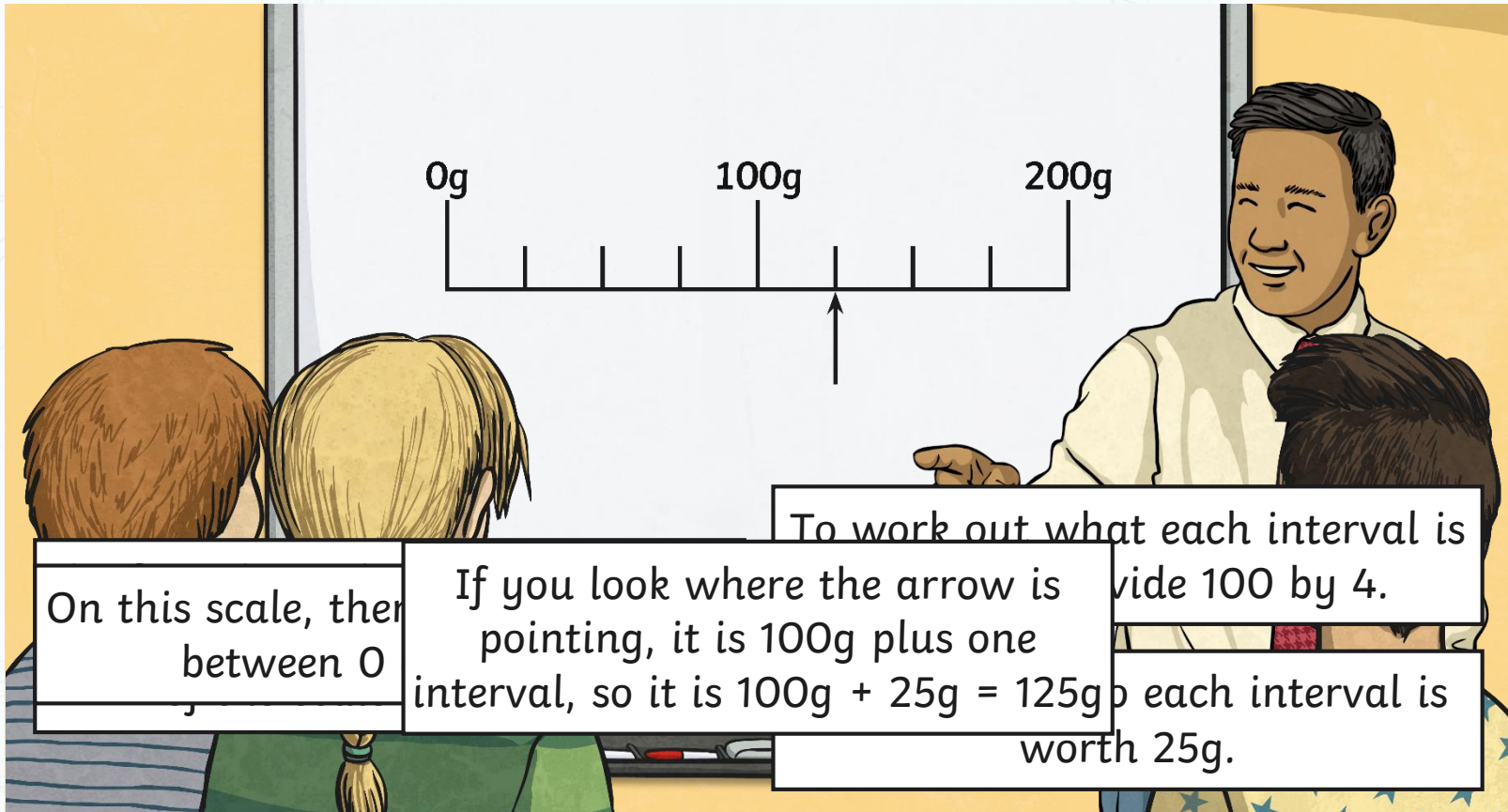
It is more accurate to use weighing scales to measure in grams.
There are many different sorts of weighing scales:



Reading Scales



We are going to learn how to use **analogue scales**.



On this scale, there are 4 intervals between 0 and 100g.

If you look where the arrow is pointing, it is 100g plus one interval, so it is $100\text{g} + 25\text{g} = 125\text{g}$.

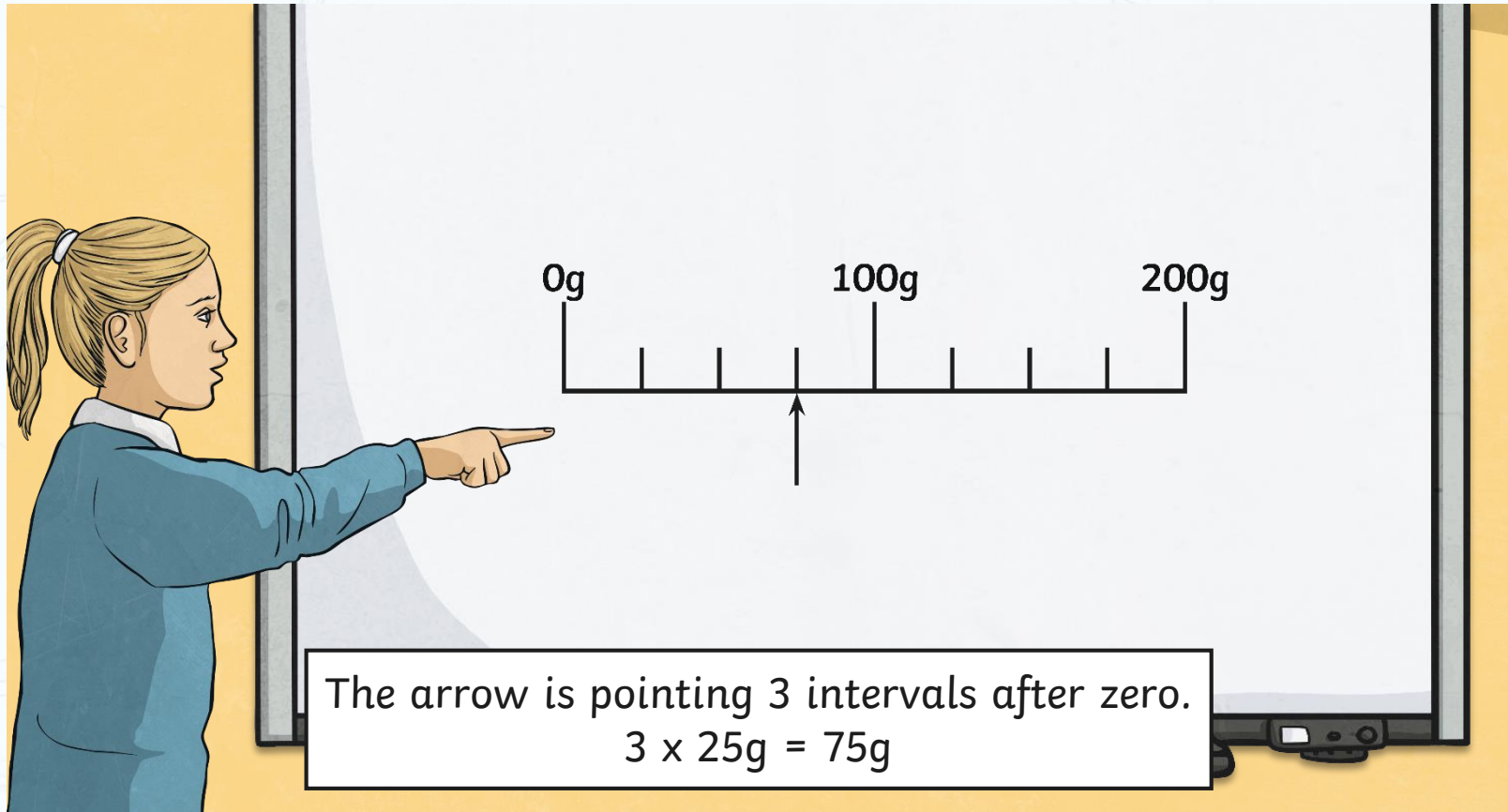
To work out what each interval is worth, divide 100 by 4.

Each interval is worth 25g.

Reading Scales



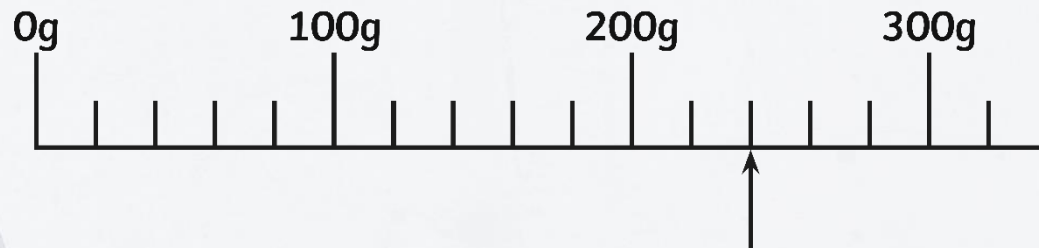
This is the same scale. What is the arrow pointing to now?



Reading Scales



On this scale, there are 5 intervals between 0 and 100g.



To work out what each interval is worth we divide 100 by 5.

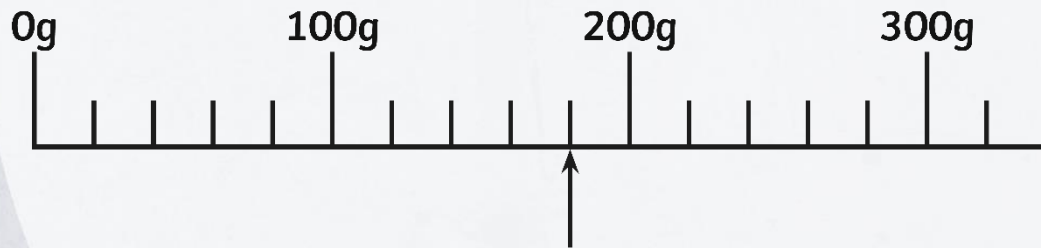
$100 \div 5 = 20$, so each interval is worth 20g.

If you look where the arrow is pointing, it is 200g plus two intervals, so it is $200\text{g} + 40\text{g} = 240\text{g}$

Reading Scales



This is the same scale. What is the arrow pointing to now?



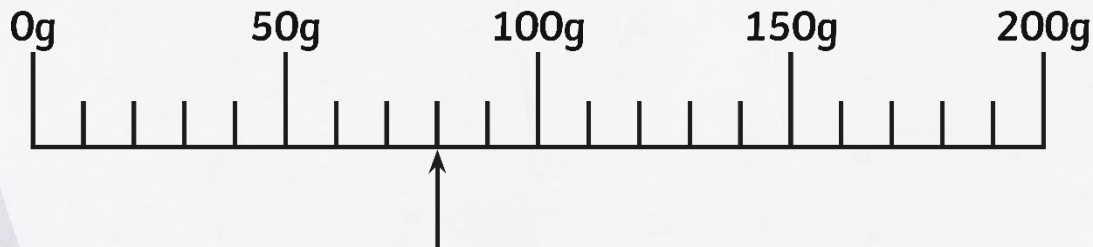
The arrow is pointing 1 interval
before 200g.
 $200\text{g} - 20\text{g} = 180\text{g}$

We could also say:
The arrow is pointing 4 intervals
after 100g.
 $100\text{g} + 80\text{g} = 180\text{g}$

Reading Scales



On this scale, there are 5 intervals between 0 and 50g.



To work out what each interval is worth we divide 50 by 5.

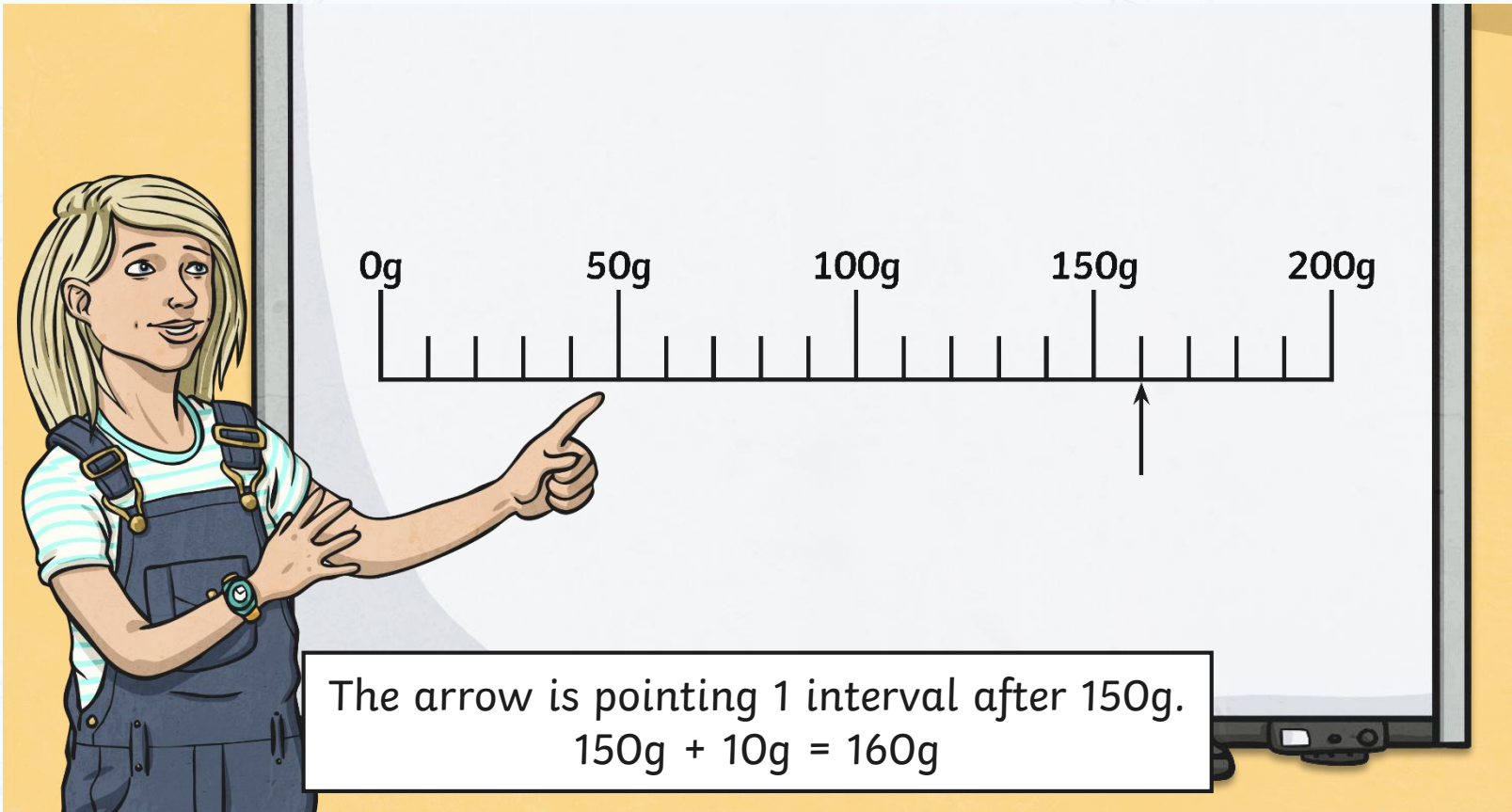
$50 \div 5 = 10$, so each interval is worth 10g.

If you look where the arrow is pointing, it is 50g plus three intervals, so it is $50g + 30g = 80g$

Reading Scales



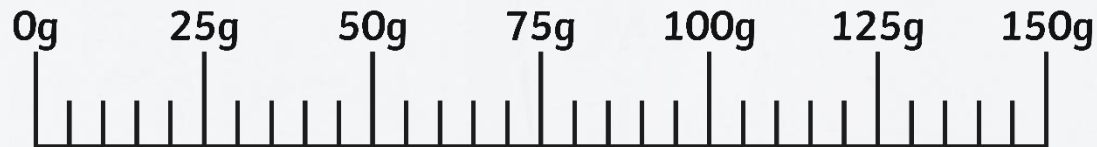
This is the same scale. What is the arrow pointing to now?



Reading Scales



On this scale, there are 5 intervals between 0 and 25g.



To work out what each interval is worth we divide 25 by 5.

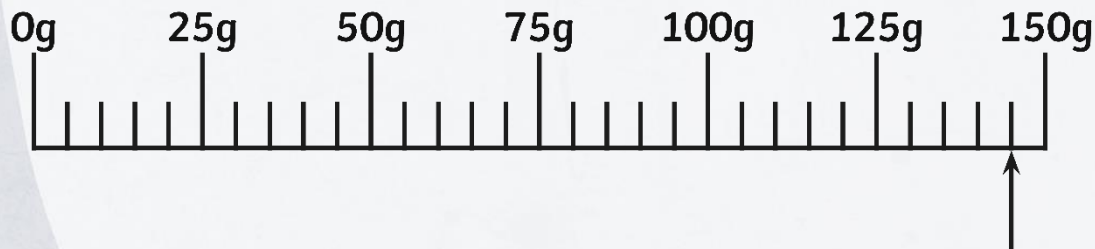
$25 \div 5 = 5$, so each interval is worth 5g.

If you look where the arrow is pointing, it is 50g plus four intervals, so it is $50\text{g} + 20\text{g} = 70\text{g}$

Reading Scales



This is the same scale. What is the arrow pointing to now?



The arrow is pointing 1 interval
before 150g.
 $150\text{g} - 5\text{g} = 145\text{g}$

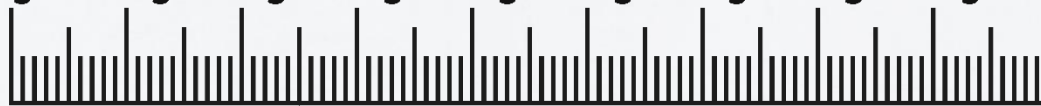
We could also say:
The arrow is pointing 4 intervals
after 125g.
 $125\text{g} + 20\text{g} = 145\text{g}$

Reading Scales



On this scale, there are 10 intervals between 0 and 100g.

0g 100g 200g 300g 400g 500g 600g 700g 800g 900g



To work out what each interval is worth we divide 100 by 10.

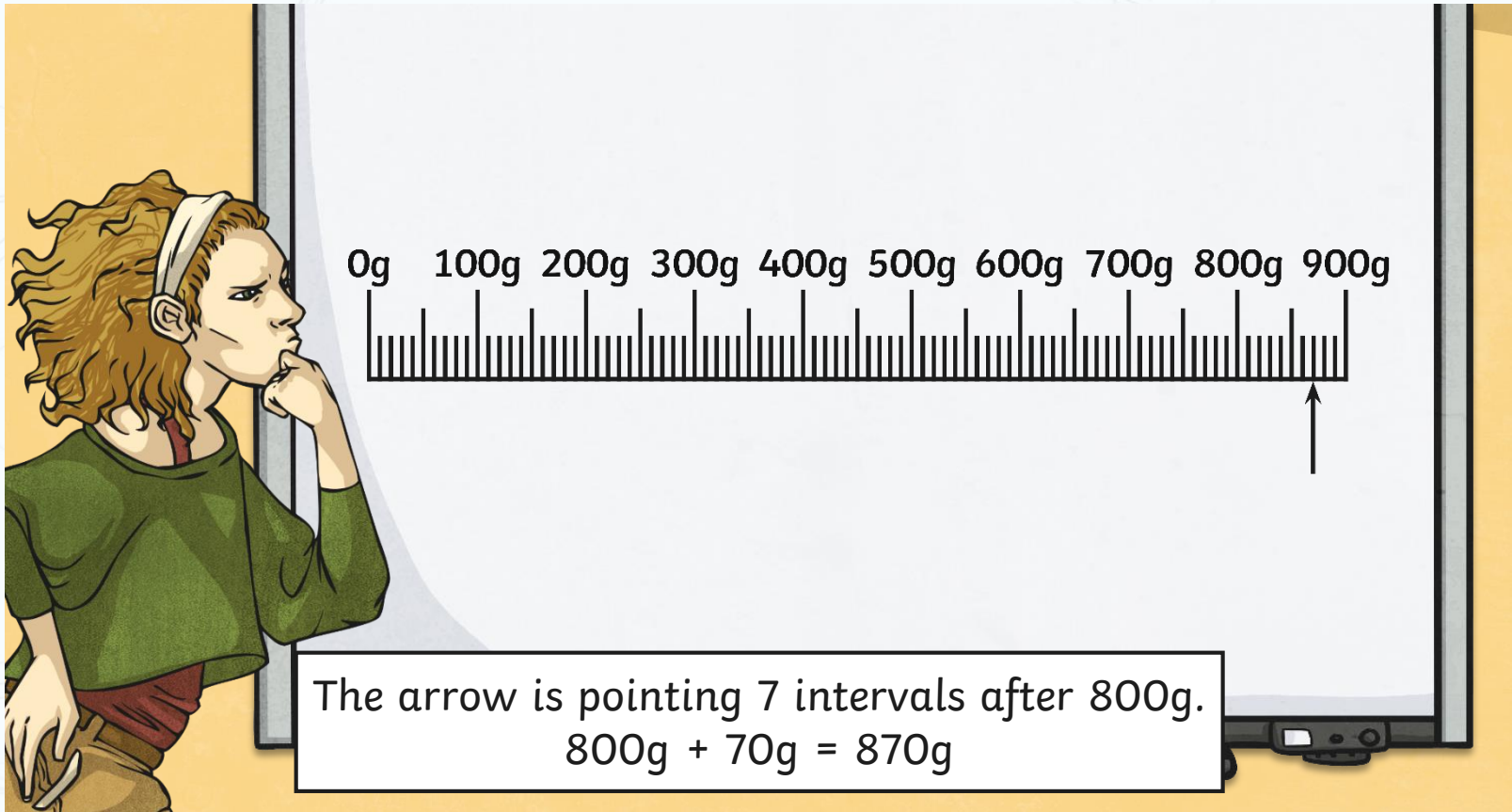
$100 \div 10 = 10$, so each interval is worth 10g.

If you look where the arrow is pointing, it is 200g plus five intervals, so it is $200g + 50g = 250g$

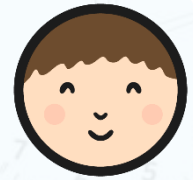
Reading Scales



This is the same scale. What is the arrow pointing to now?



Measure in Grams



Use your mass measuring mastery to complete these activity sheets.

★ ★ ★

Scale 3:

Write a sentence to explain how you worked out what each interval is worth.

Calculating the intervals:

Arrows are pointing to:

A g
B g
C g
D g

Scale 4:

Use a ruler to draw your own scale from 0g to 300g. On the scale mark the following intervals.

Arrows are pointing to:

A g
B g
C g
D g

★ ★ ★ Reading Scales

Scale 1:

For each scale, write a calculation to show how you worked out what each interval is worth and then say how many grams the arrow is pointing to.

Scale 1:

0g 100g

Calculating the intervals:

There are **2** intervals between 0 and 100.

$100 \div 2 = 50$

Each interval is worth **50** g.

The arrow is pointing to **25** g.

Scale 2:

Arrows are pointing to:

A g
B g
C g
D g

★ ★ ★ Reading Scales

Scale 1:

For each scale, write a calculation to show how you worked out what each interval is worth and then say how many grams the arrow is pointing to.

Scale 1:

0g 100g

Calculating the intervals:

There are **2** intervals between 0 and 100.

$100 \div 2 = 50$

Each interval is worth **50** g.

The arrow is pointing to **25** g.

Scale 2:

Arrows are pointing to:

A g
B g
C g
D g

★ Reading Scales to Measure in Grams

I can read scales to measure in grams.

For each scale, write a calculation to show how you worked out what each interval is worth and then say how many grams the arrows are pointing to. The first one has done for you.

Scale 1:

Calculating the intervals:

There are **2** intervals between 0 and 100.

$100 \div 2 = 50$

Each interval is worth **50** g.

The arrow is pointing to **250** g.

Scale 2:

Arrows are pointing to:

A g
B g
C g
D g