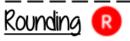


#### **Y10 FOUNDATION HT1 APPROXIMATIONS**





2.46 192 (to 2dp) - Is this closer to 246 or 247



247

2.46 192

This shows the number is closer t

#### Significant Figures

370 to I significant figure is 400 37 to I significant figure is 40 3.7 to I significant figure is 4 0.37 to I significant figure is 0.4 0.00000037 to I significant figure is 0.0000004

nonzero number

SF: Round to the first

Round to the first non

zero number

## Integer Place Value

| Billions |   |   | Millions |   |   | Thousands |   |   | Ones |   |   |
|----------|---|---|----------|---|---|-----------|---|---|------|---|---|
| Н        | Т | 0 | Н        | Т | 0 | Н         | Т | 0 | Н    | Т | 0 |
|          |   | 3 | 1        | 4 | 8 | 0         | 3 | 3 | 0    | 2 | 9 |
|          |   |   |          |   |   |           |   |   |      |   |   |

Placeholder -

Three billion, one hundred and forty eight million, thirty three thousand and twenty nine

I billion 1, 000, 000, 000  $\,$ 

**I million** 1 000,000

### Estimation 🔞

Round to I significant figure to estimate

 $21.4 \times 3.1 \approx 20 \times 3 \approx 60$ 



The equal sign changes to show it is an estimation

This is an **underestimate** because both values were rounded down

It is good to check all calculations with an estimate in all aspects of maths — it helps you identify calculation errors.

### Round to I significant figure

370 to 1 significant figure is 400

37 to 1 significant figure is 40

3.7 to I significant figure is 4

0.37 to I significant figure is 0.4

0.00000037 to 1 significant figure is 0.0000004

# Rounding to the nearest power of ten

If the number is halfway between we "round up"

5495 to the nearest 1000

5475 to the nearest 100

5475 to the nearest 10



1

6000

5400



5470



5480