19.1.20

# LI: To be able to multiply by 100.

I do...

We do...

You do...

1) Complete the sentences.

100 ones are equal to 1 _____

___ tens are equal to 1 thousand

2) $4 \times 100 =$ ___ $\times 4$

3) $4 \times 100 = 10 \times 4 \times$ ___

4) 1,000 cm = _____ m

1) Complete the sentences.

100 ones are equal to 1 hundred

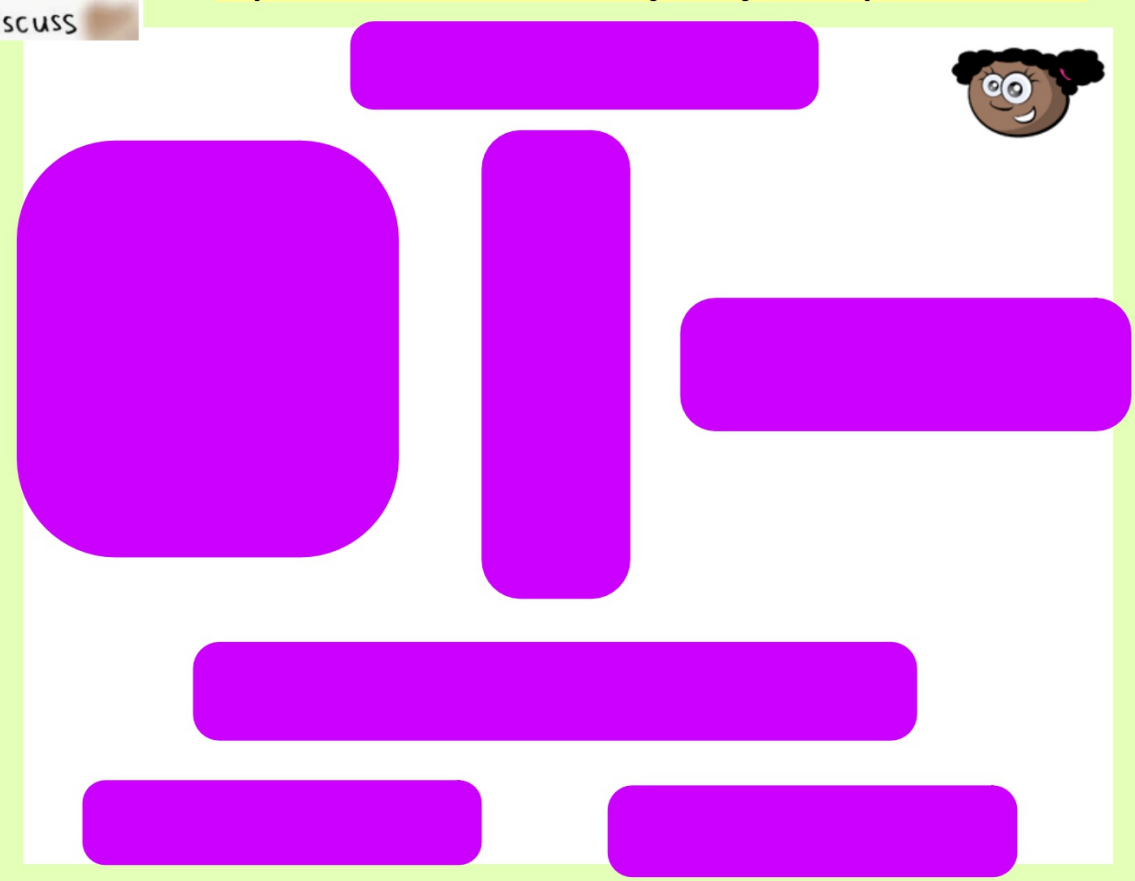
100 tens are equal to 1 thousand

2) $4 \times 100 = 100 \times 4$

3) $4 \times 100 = 10 \times 4 \times 10$

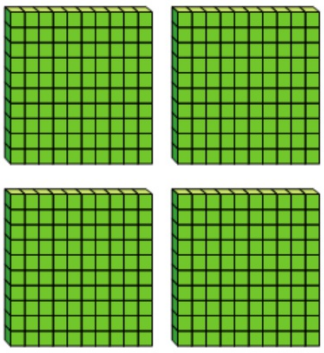
4) 1,000 cm = 10 m

In your jotter, show me 4 groups of 100 represented in as many ways as possible.



In your jotter, show me 4 groups of 100 represented in as many ways as possible.

## 4 groups of 100



| | | | |
|---|---|---|---|
| 100 | 100 | 100 | 100 |

$4 \times 1$ hundred $=$ 4 hundreds

$4 \times 100 = 400$ $\qquad$ $100 \times 4 = 400$

$10 \times 1$ ten $=$ 10 tens

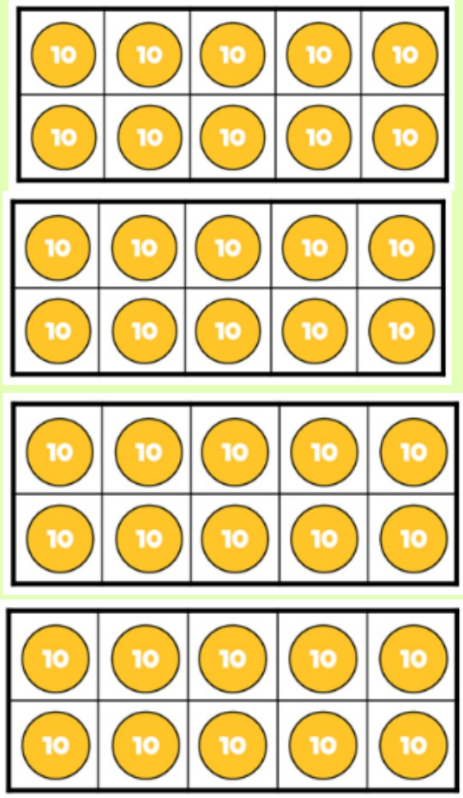
10 tens $=$ 1 hundred

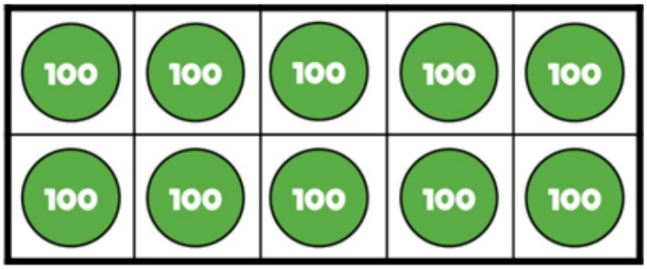
$10 \times 10 = 100$

$40 \times 1$ ten $=$ 40 tens

40 tens $=$ 4 hundreds

$40 \times 10 = 400$

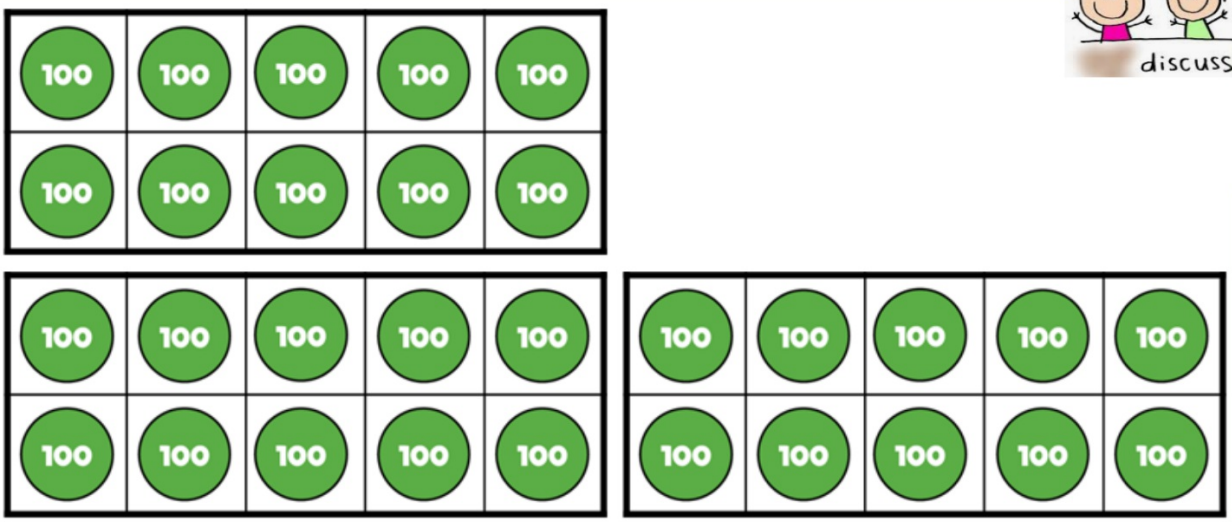





$$10 \times 1 \text{ hundred} = 10 \text{ hundreds}$$

$$10 \text{ hundreds} = 1 \text{ thousand}$$

$$10 \times 100 = 1{,}000 \qquad 100 \times 10 = 1{,}000$$



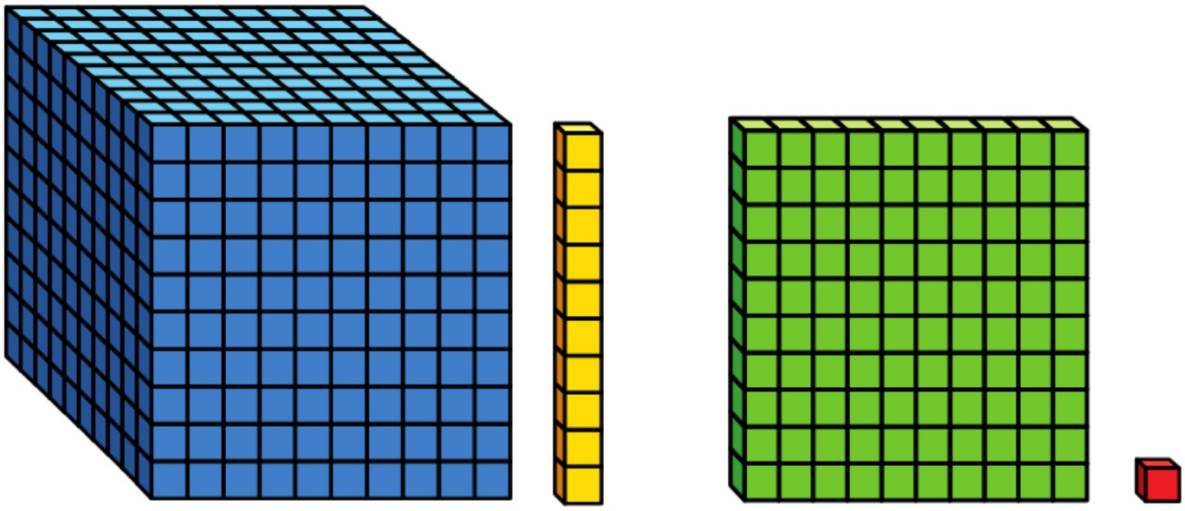

$30 \times 1$ hundred $=$ ___ hundreds

30 hundreds $=$ ___ thousands

$30 \times 100 =$ _____

___ $\times 30 = 3{,}000$

Remember:



1 hundred is 100 times the size of 1 one

1 thousand is 100 times the size of 1 ten

| Th | H | T | O |
|---|---|---|---|
| | | | |

100 times the size

100 times the size

Making a number 100 x bigger, means moving it to the left 2 spaces.

Use a place value grid to solve:

54 x 100 =

36 x 100 =

71 x 100 =

# True or False?

Multiply by 100

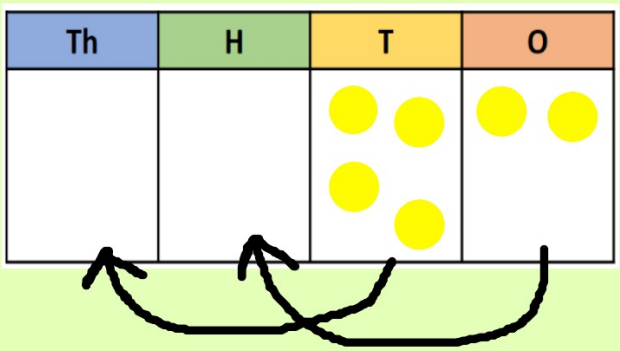
$$42 \times 100 > 420 \times 10$$

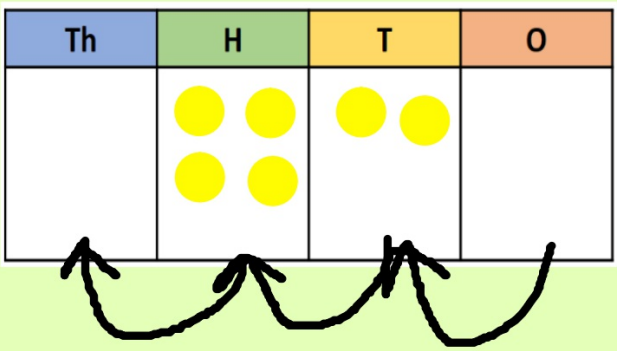
False

$$42 \times 100 = 420 \times 10$$

42 x 100 = 4200

420 x 10 = 4200



# Choose which worksheets you work on, depending on how confident you are feeling!

**1** Complete the calculation shown in base 10

3 × 1 hundred = ☐ hundreds  3 × 100 = ☐

**2** Work out the calculations.

a) 2 × 100  c) 100 × 8  e) 100 × 10
b) 4 × 100  d) 5 × 100  f) 20 × 100

**3** There are 7 boxes of 100 crayons.

Which calculations work out the total number of crayons?

100 + 7  100 × 7  7 + 100  7 × 100

**4** Match the images to the calculations. Work out the calculations.

9 × 100 = ☐  6 × 100 = ☐  12 × 100 = ☐

**5** Complete the calculations.

a) 32 × 100 = ☐  c) 100 × 72 = ☐  e) ☐ × 100 = 6,500
b) 29 × 100 = ☐  d) 5 × 7 × 100 = ☐  f) 100 × ☐ = 3,000

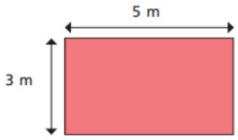
**4** Match the images to the calculations. Work out the calculations.

9 × 100 = ☐  6 × 100 = ☐  12 × 100 = ☐

**5** Complete the calculations.

a) 32 × 100 = ☐  c) 100 × 72 = ☐  e) ☐ × 100 = 6,500
b) 29 × 100 = ☐  d) 5 × 7 × 100 = ☐  f) 100 × ☐ = 3,000

**6** Calculate the perimeter of the rectangle.




Give your answer in centimetres.

**7** Write <, > or = to compare the statements.

a) 45 × 100 ◯ 45 × 10
b) 36 × 100 ◯ 100 × 36
c) 100 × 27 ◯ 26 × 100
d) 31 × 100 ◯ 31 × 10 × 10
e) 30 × 10 ◯ 3 × 100

**5** Complete the calculations.

a) 32 × 100 = ☐  c) 100 × 72 = ☐  e) ☐ × 100 = 6,500
b) 29 × 100 = ☐  d) 5 × 7 × 100 = ☐  f) 100 × ☐ = 3,000

**7** Write <, > or = to compare the statements.

a) 45 × 100 ◯ 45 × 10
b) 36 × 100 ◯ 100 × 36
c) 100 × 27 ◯ 26 × 100
d) 31 × 100 ◯ 31 × 10 × 10
e) 30 × 10 ◯ 3 × 100

**8** Amir thinks of a 2-digit even number.

He multiplies it by 100

His answer is greater than 3,450 but less than 3,750

Write the number that Amir is thinking of.

**9** Four children are making numbers using base 10

The table shows how many of each piece they use.

| | Number of 100s | Number of 10s |
|---|---|---|
| Eva | 17 | 0 |
| Ron | 15 | 8 |
| Dexter | 16 | 15 |
| Whitney | | |

a) What number has Eva made?

b) Who has made the biggest number?

c) Whitney has made the same number as Eva.

She used 100s and 10s.

What pieces could Whitney have used?

Write your answer in the table.

Are there any other answers? Talk about it with a partner.