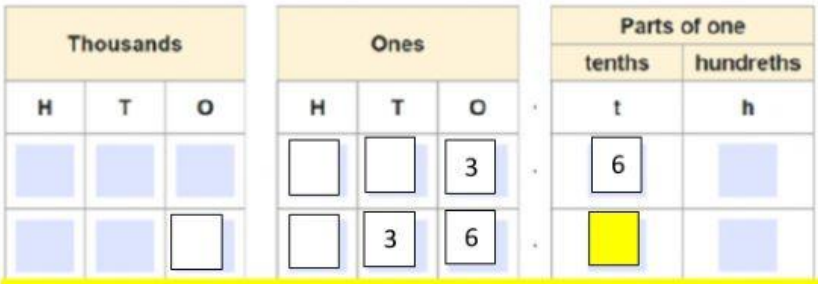
Multiplying and Dividing by 10 and 100

NAME:

When we multiply by 10 the digits in a number move 1 place to the left

3.6 x 10 =



No need to put in decimal place holders for you answers unless it is money

3.6 x 10 = 36

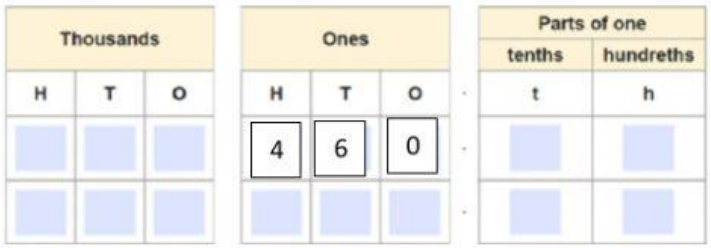
(Short cut for decimal numbers – move the decimal one place to the right)

36 x 10 = 360

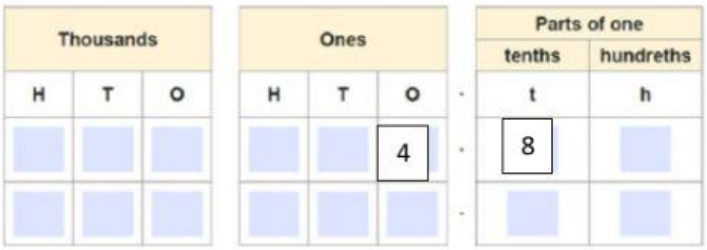
(Short cut for whole numbers – add a zero)

Move the digits 1 place to the left when x10

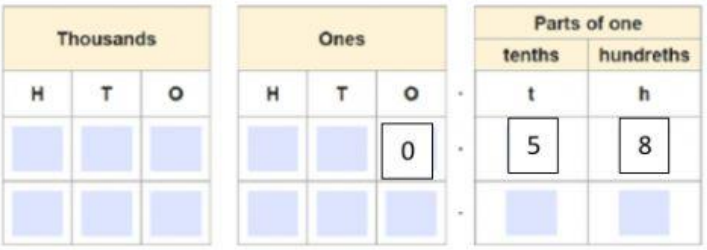
460 x 10 =



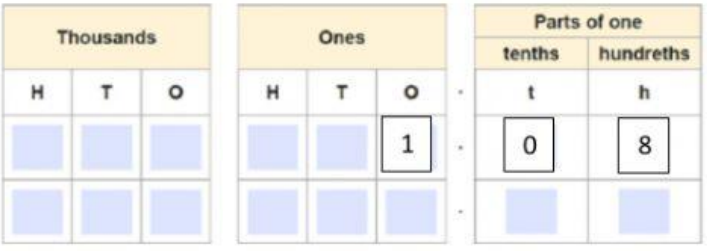
4.8 x 10 =



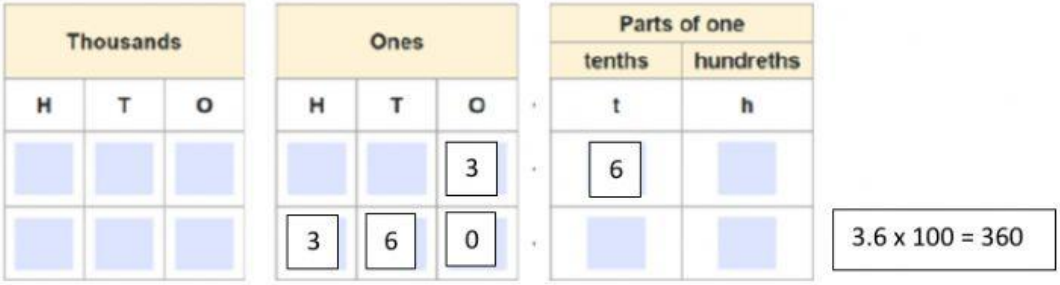
0.58 x 10 =



1.08 x 10 =



When we multiply by 100, the digits move 2 places to the left.



3.6 x 100 = 360

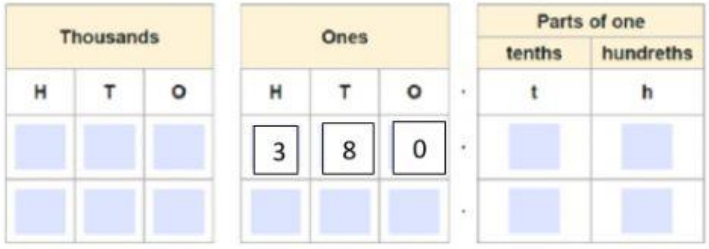
(Short cut for decimal numbers – move the decimal two place to the right)

36 x 10 (Short cut for whole numbers – add two zeros)

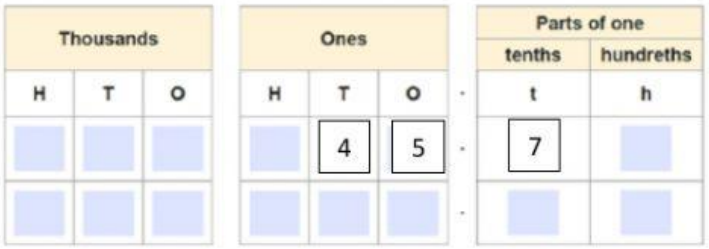
When we multiply by 100, the digits move 2 place to the left.

Move the digits 2 places to the left when x100

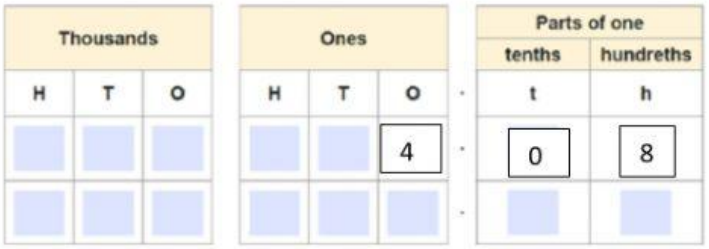
380 x 100 =



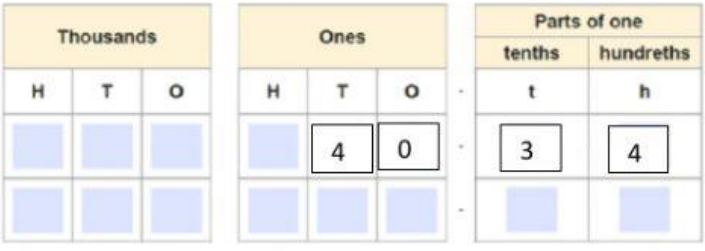
45.7 x 100 =



4.08 x 100 =



40.34 x 100



When we divide by 10 the digits in a number move 1 place to the right.

3.6 ÷ 10 = 0.36 (Short cut for decimal numbers – move the decimal one place to the left)

36 ÷ 10 = 3.6 (Short cut for whole numbers – add 1 decimal place)

When we divide by 100 the digits in a number move 2 places to the right.

Move the digits 1 places to the right when ÷10

380 ÷ 10 =

Thousands			Ones			Parts of one	
						tenths	hundreths
H	T	O	H	T	O	t	h
			3	8	0		

385 ÷ 10 =

Thousands			Ones			Parts of one	
						tenths	hundreths
H	T	O	H	T	O	t	h
			3	8	5		

38.5 ÷ 10

Thousands			Ones			Parts of one	
						tenths	hundreths
H	T	O	H	T	O	t	h
				3	8	5	

Move the digits 2 places to the right when ÷100

380 ÷ 100

Thousands			Ones			Parts of one	
						tenths	hundreths
H	T	O	H	T	O	t	h
			3	8	0		

385 ÷ 100

Thousands			Ones			Parts of one	
						tenths	hundreths
H	T	O	H	T	O	t	h
			3	8	5		

X10

Move the decimal 1 place to the right or add a 0

240 x 10 =

48 x 10 =

7.2 x 10 =

24.7 x 10 =

0.45 x 10 =

10.45 x 10 =

4.06 x 10 =

23.24 x 10 =

X100

Move the decimal 2 places to the right or add two 0's

45 x 100 =

345 x 100 =

320 x 100 =

45.9 x 100 =

23.05 x 100 =

45.4 x 100 =

45.06 x 100 =

45.26 x 100 =

Shortcut ÷10

For decimal numbers, move the decimal 1 place to the left

For whole numbers, remove a zero or add 1 decimal place

240 ÷ 10 =

24 ÷ 10 =

242 ÷ 10 =

2.4 ÷ 10 =

24.2 ÷ 10 =

Shortcut ÷100

For decimal numbers, move the decimal 2 places to the left

For whole numbers, remove a two zeros or add 2 decimal place

2400 ÷ 100 =

4562 ÷ 100 =

240 ÷ 100 =

242 ÷ 100 =

674.8 ÷ 100 =