06.10.20

LO: I can order a set of decimals to 3 dp.

Arrange these numbers in ascending order.

What does ascending mean?

2·32, 2, 2·232, 2·3.

Write in columns

2·32
2
2·232
2·3

Put in the zeros. Why?

To hold place value of course.

$$2 \cdot 320$$
$$2 \cdot 000$$
$$2 \cdot 232$$
$$2 \cdot 300$$

Now arrange in order

$2, 2{\cdot}232, 2{\cdot}3, 2{\cdot}32$

Now it's your turn;

a) 1·53, 3·15, 1·33, 1·35.

b) 5·61, 6·51, 15·6, 5·16.

c) 2·78, 0·78, 2·07, 0·87.

d) 7·23, 7·33, 7·22, 7·32.

Have a go at these numbers;

a) 3·37, 3·77, 3·337, 3·377, 3·737.

b) 6·446, 6·66, 6·44, 6·664, 6·4.

c) 2·55, 2·225, 2·522, 2·25, 2·525.

d) 9·989, 9·898, 9·888, 9·99, 9·89.

LO: I can subtract numbers mentally.

We are going to look again at mental strategies to help us subtract, increasingly larger, numbers from one another.

I want to solve the subtraction 456 - 76. How might I do this?

Partitioning.

$$456 - 76 = 456 - 70 - 6$$

$$456 - 70 \quad \text{or 7 tens} = 386$$

$$386 - 6 = 380$$

How about,

1576 - 239

1576 - 200 or 2 hundreds = 1376

1376 - 30 or 3 tens = 1346

1346 - 9 or 9 units = 1337.

Think about counting up in your head.

603 - 387

387 —— 400 = 13

400 —— 603 = 203

203 + 13 = 216.

How would I solve a number calculation such as

6134 - 2002

I would use the counting up method. If I count up from 2002 in thousands I reach 6002 (4000) and then count up to 6134. That gives me 132 and if I add this to 4000 then I find the solution 4132.

What if I was looking at the mathematical problem of 7863 - 1995,

Counting up from 1995 I add 5 to reach 2000. I add on 5863 to reach 7863, finally adding the 5 to bridge the gap. This gives me the solution, worked out mentally, of 5868.

PLENARY

True or False?

$$49{,}999 - 19{,}999 = 50{,}000 - 20{,}000$$

Dora

I did not need to use a written method to work this out.

Can you explain why Dora's method work?

Can you think of another example where this method could be used?