

Key vocabulary

million, hundred thousand, ten thousand, thousand, hundred, ten, one, integer, negative number, positive number, round / rounding, Roman numeral

Ordering and comparing numbers

> more than, greater than, bigger than
< less than, smaller than
= equal to, the same as

Reading and writing numbers

10,000 = ten thousand
100,000 = one hundred thousand
1,000,000 = one million

Place value

Thousands				Ones		
O	H	T	O	H	T	O

Commas separate every 3 digits from the right,
e.g. 4287489 = 4,287,489

Rounding

When rounding to a specific power of 10, look at the digit to the right. If this digit is 0 → 4, round to the previous multiple of that power of 10; if this digit is 5 → 9, round to the next multiple of that power of 10. E.g. 45,294 rounded to the nearest 100 = 45,300.

When rounding to the nearest...

10 → number will end in at least 1 zero

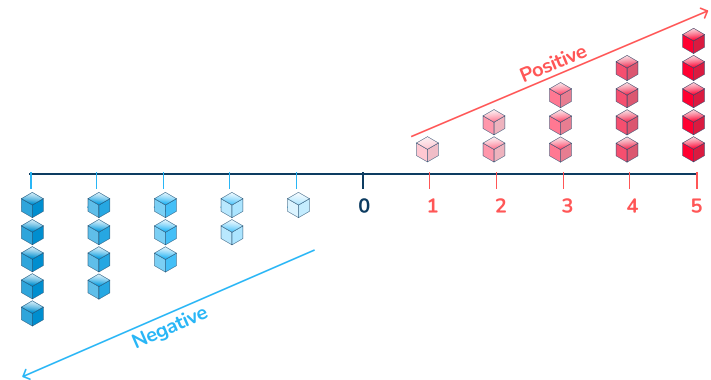
10,000 → number will end in at least 4 zeros

100 → number will end in at least 2 zeros

100,000 → number will end in at least 5 zeros

1,000 → number will end in at least 3 zeros

Negative numbers



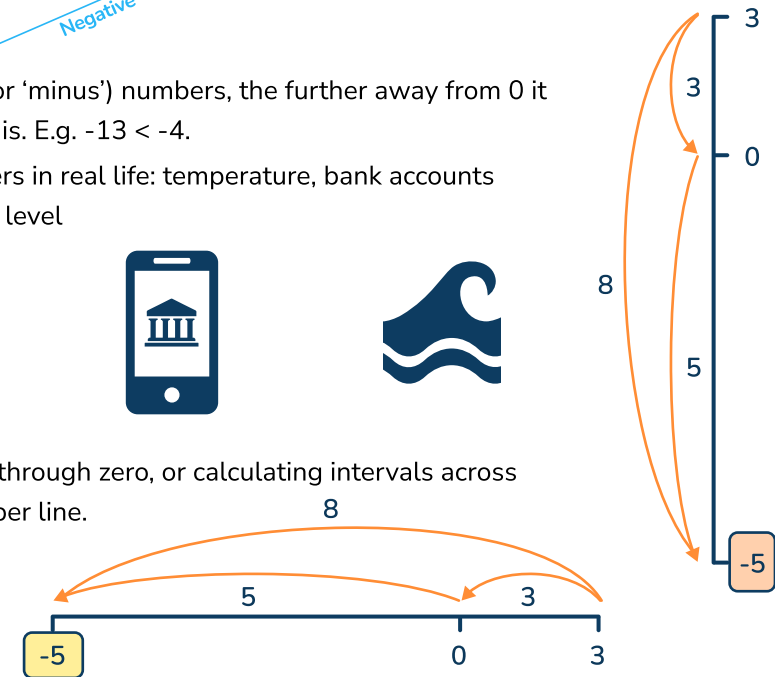
With negative (or 'minus') numbers, the further away from 0 it is, the smaller it is. E.g. $-13 < -4$.

Negative numbers in real life: temperature, bank accounts (overdrafts), sea level



When counting through zero, or calculating intervals across zero, use a number line.

e.g. $3 - 8 = -5$



Roman numerals

I = 1	V = 5	X = 10	C = 100	M = 1,000
II = 2	VI = 6	L = 50	D = 500	
III = 3	VII = 7			
IV = 4	VIII = 8			
	IX = 9			

Reading Roman numerals: add from left to right if the left numeral is greater than the right numeral. If it is smaller than the right numeral, subtract the value of the left from the right numeral.

E.g. **CCXCIX** = 100 + 100 + (100 - 10) + (10 - 1) = 299

Writing Roman numerals: Follow the same rules as above, but remember that a numeral can only be repeated up to 3 times.

E.g. **1984** = MCMLXXXIV