Yr 6 Number and Place Value Knowledge Organiser

National Curriculum Aims

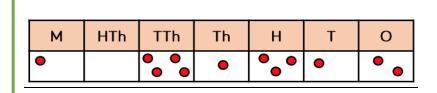
- read, write, order and compare numbers up to 10 000 000 and determine the value of each digit
- round any whole number to a required degree of accuracy
- > use negative numbers in context, and calculate intervals across zero
- > solve number and practical problems that involve all of the above.

Key Vocabulary	
Greater than ≥	If one quantity is more than a second quantity, then it is greater than that second quantity.
Less than ≤	If one quantity is less than a second quantity, then it is less than that second quantity.
Equal	If one amount equals the other, then they have the same value.
Ascending order	Going up in order from smallest to largest.
Descending order	Going down in order from smallest to largest.
Positive	A number greater than zero.
Negative	A number less than zero.
Compare	Look for differences and similarities between them.
Consecutive	Means one after the other in order.
Digit	A digit in any of the 10 numerals: 0-10
Partition	Involves separating a set into subsets. When a
	number is partitioned it is split into separate parts.
Round	To give an approximate number and to make it easier
	to work with.



Home Learning

- Talk about the value of digits in numbers when buying items in the supermarket.
- When cooking it would be useful to discuss weights in both g and kg and discuss the place value of the digits.



This is the same as writing it as: 1,041,312

It is also the same as: 1,041,312 = 1,000,000 + 40,000 + 1000 + 300+10+2

Rounding numbers to the nearest 10,100, 1000

Rounding numbers to the nearest 10:

If the ones digit is less than five, the number needs to be rounded down. If the ones digit of the number is 5 or above the number needs to be rounded up.

So 32 would be rounded down to 30, 35 would be rounded up to 40 and 38 would also be rounded up to 40.

Core Knowledge and Representations



Rounding numbers to the nearest 100:

So 834 would be rounded down to 800, 851 would be rounded up to 900 and 876 would also be rounded up to 900.



Negative Numbers:

The temperature on Monday morning is -5° C. The temperature on Friday morning is 1° C. How much warmer is it on Friday morning than on Monday morning?

Using the number line tells us the difference and the answer is 6°C.

