#### **River View Primary School**

**Mathematics** 

Year 5

Autumn

# What will I know by the end of the unit?

# **Place Value**

Count forwards or backwards in steps of powers of 10 for any given number up to 1,000,000. Read and write numbers to at least 1,000,000 and determine the value of each digit. Read Roman numerals to 1,000 and recognise years written in Roman numerals. Order and compare numbers to at least 1,000,000. Round any number up to 1,000,000 to the nearest 10, 100, 1,000, 10,000 and 100,000. Solve number and practical problems that involve all of the above.

# **Addition and Subtraction**

Add and subtract whole numbers with more than 4digits, including formal written methods. Add and subtract numbers mentally with increasingly large numbers. Use rounding to check answers to calculations and determine, in the context of a problem, levels of accuracy. Solve addition and subtraction multi-step problems in context, deciding which operations and methods to use and why.

### **Multiplication and Division**

Identify multiples and factors, including finding all factor pairs of a number and common factors of two numbers. Know and use the vocabulary of prime numbers, prime factors and composite numbers. Establish whether a number up to 100 is prime and recall primes up to 19. Recognise and use square numbers and cube numbers and the notation for squared and cubed. Multiply and divide whole numbers by 10, 100 and 1000. Solve problems involving multiplication and division including using the knowledge of factors and multiples, squares and cubes.

#### Fractions

Identify, name and write equivalent fractions of a given fraction, represented visually, including tenths and hundredths. Recognise mixed numbers and improper fractions and convert from one form to the other and write mathematical statements >1 as a mixed number. Compare and order fractions whose denominators are multiples of the same number. Add and subtract fractions with the same denominator and denominators that are multiples of the same number.

Technical Vocabulary	
integer	a negative or positive whole number
rounding	an approximation used to express a number in a more convenient way
sum	the result when two or more numbers are added together
addend	a number which is added to another
difference	the result of subtracting one number from another
minuend	a quantity or number from which another is to be subtracted
subtrahend	a quantity or number to be subtracted from another
factor	a number which will divide exactly into another number
multiple	the product of a given number multiplied by another number
product	the result when two or more numbers are multiplied
square number	the product of a number multiplied by itself
cube number	the product of a number multiplied by itself twice
composite number	a number with more than two factors
prime number	a number with only two factors, 1 and itself
equation	a statement of equality between two expressions
numerator	the number above the line in a fraction
denominator	the number below the line in a fraction
improper fraction	a fraction whose numerator is equal to or larger than its denominator
mixed number	formed by combining a whole number and a fraction