MATHEMATICS YEAR-IV

Number Sense and Place Value

- Understanding and representing numbers up to 100,000
- Counting forward and backward in multiples of 10, 100, 1000, and 10,000
- Recognising and extending number patterns and sequences
- Comparing and ordering numbers up to 100,000
- Understanding place value up to 100,000 (ten thousands, thousands, hundreds, tens, and ones)
- Writing numbers in standard, expanded, and word form

Addition, Subtraction, Multiplication and Division

- Adding and subtracting multi-digit numbers with regrouping
- Multiplying multi-digit numbers by one-digit and two-digit numbers
- Dividing numbers up to 10,000 by one-digit divisors with and without remainders
- Applying mental math strategies to addition, subtraction, multiplication, and division
- Solving multi-step word problems involving all four operations
- Estimating sums, differences, products, and quotients

Fractions and Decimals

- Adding, subtracting, multiplying, and dividing fractions with unlike denominators
- Finding equivalent fractions and simplifying fractions
- Converting between improper fractions and mixed numbers
- Representing and comparing decimals to thousandths
- Adding, subtracting, multiplying, and dividing decimals
- Solving word problems involving fractions and decimals

Measurement and Data

- Converting between different units of length, weight, capacity, and time
- Calculating perimeter, area, and volume of geometric figures
- Reading and interpreting data from line graphs, bar graphs, and circle graphs
- Making predictions and drawing conclusions based on data
- Applying measurement and data concepts to real-world scenarios

Geometry

- Identifying, classifying, and describing 2D shapes (quadrilaterals, parallelograms, rhombuses) based on their properties
- Identifying and measuring angles using protractors
- Understanding and applying angle relationships (complementary, supplementary)
- Recognising lines of symmetry and rotational symmetry in 2D shapes
- Describing and comparing the attributes of 3D shapes (prisms, pyramids, cones)
- Identify right, obtuse, and acute angles and label vertex and sides
- Identify intersecting, parallel and perpendicular lines
- Identify congruent figures, angles and line segments

Patterns, Algebra, and Problem Solving

- Recognizing, describing, and extending number patterns and sequences
- Identifying and using variables in expressions and equations
- Writing and solving equations to represent real-world problems
- Applying properties of operations to generate equivalent expressions
- Analysing patterns and relationships to solve problems
- Using critical thinking and problem-solving skills to tackle challenging mathematical problems