Math Grade 5

1. Whole Numbers, Operations, and Roman Numerals

- 1.1 Digits and Place Values of Whole Numbers
- 1.2 Place value and Expanded Form
- 1.3 Order Relation
- 1.4 Rounding Whole Numbers
- 1.5 Addition of Whole Numbers
- 1.6 Subtraction of Whole Numbers
- 1.7 Multiplication of Whole Numbers
- 1.8 Division of Whole Numbers
- 1.9 Multiplying or Dividing whole numbers by powers of 10
- 1.10 Order of Operation
- 1.11 Word Problems
- 1.12 Roman Numerals

2. Factors, Multiples, Prime Factorization, GCF and LCM

- 2.1 Factors
- 2.2 Multiples
- 2.3 Common Factors and Common Multiples
- 2.4 Rules of Divisibility (By 2, 3, 4, 5, 6, 8, 9, 10, 11)
- 2.5 Prime and Composite Numbers
- 2.6 Prime Factorization, GCD(or HCF) and LCM

3. Fractions

- 3.1 Exploring Fractions
- 3.2 Types of Fractions and Conversion
- 3.3 Reducing Fractions
- 3.4 Multiplication of Fractions
- 3.5 Division of Fractions
- 3.6 Building Equivalent Fractions
- 3.7 Comparing and Arranging Fraction
- 3.8 Addition of Fractions
- 3.9 Subtraction of Fractions
- 3.10 Simplifying Expressions Involving Fractions

4. Decimals and Square Roots

- 4.1 Digit and Place Value of Decimals
- 4.2 Conversion (Fraction-decimal), Short Form and Expanded Notation
- 4.3 Conversion (Unlike to Like), Comparing and Arranging Decimals
- 4.4 Rounding Decimals
- 4.5 Addition of Decimals
- 4.6 Subtraction of Decimals
- 4.7 Multiplication of Decimals
- 4.8 Division of Decimals
- 4.9 Simplifying Square Roots

5. Percents

- 5.1 Introduction to Percentage
- 5.2 Converting Percentage to Fractions and Decimals
- 5.3 Converting Fractions and Decimals to Percentage
- 5.4 Equivalent Fractions, Decimals and Percents

6. Sets and Operations on Sets

- 6.1 Sets and Set Notations
- 6.2 Types of Sets
- 6.3 Subsets
- 6.4 Operations on Sets
- 6.5 Venn Diagrams

7. Algebra

- 7.1 Understanding Variables
- 7.2 Evaluating Algebraic Expressions
- 7.3 Translate Phrases or Statements into Expressions or Equations
- 7.4 Simplifying Linear Equations

8. Geometry: Basics, Polygons and Circle

- 8.1 Plane, Point, Line segment, Line, Ray
- 8.2 Parallel, Perpendicular and Intersecting Lines
- 8.3 Concepts of Angles
- 8.4 Measuring and Classifying Angles
- 8.5 Pairs and Related Angles

- 8.6 Parallel lines and Special Angle Pairs
- 8.7 Curves and Polygons
- 8.8 Quadrilaterals
- 8.9 Quadrilaterals: Parallelogram
- 8.10 Introduction: Triangles
- 8.11 Properties of Triangles
- 8.12 Circles

9. Exploring Shapes

- 9.1 Understanding Symmetry
- 9.2 Lines of Symmetry
- 9.3 Turning Shapes
- 9.4 Patterns

10. Measurements: Basic Operations, Conversions, Time and Temperature

- 10.1 Addition and Subtraction of Measures
- 10.2 Multiplying and Dividing Measurements
- 10.3 Measurement of Length
- 10.4 Measurement of Mass
- 10.5 Measurement of Capacity
- 10.6 Time: 24 Hour Clock
- 10.7 Calendar
- 10.8 Addition and Subtraction of Time
- 10.9 Finding the Starting time or Finishing time
- 10.10 Finding the Starting Date or Finishing Date
- 10.11 Temperature

11. Perimeter and Area of Polygons

- 11.1 Perimeter and Area of Rectangles and Squares
- 11.2 Area of Triangles, Parallelogram and Trapezoids

12. Solid Shapes: Shapes and Volume of Cuboid and Cube

- 12.1 Shapes
- 12.2 Volume of Solid Shapes
- 12.3 Volume of Cuboids and Cubes
- 12.4 Volume of other shapes

13. Statistics and Probability

- 13.1 Reading and Interpreting Data
- 13.2 Pictographs
- 13.3 Bar Graphs
- 13.4 Tally Marks
- 13.5 Line Graph
- 13.6 Pie Chart
- 13.7 Mean, median, Mode and Range
- 13.8 Probability