DELHI POLICE PUBLIC SCHOOL

SCHOLASTIC SYLLABUS

SESSION 2024-25

CLASS V- MATHS – TERM 1

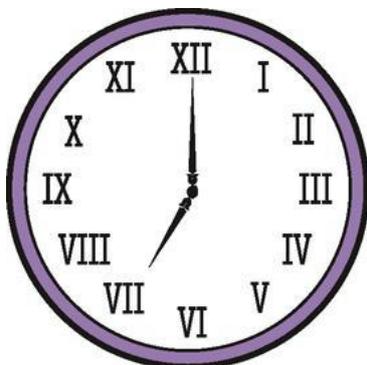| APRIL 2024	TOPIC AND SUBTOPICS
LEARNING OBJECTIVES • Develop proper understanding of the number system. • Help students observe large numbers and express them in words and numerical form. • Recognize the numbers by their place value and face value. • Convert numbers between Indian and International systems. • Make comparisons and build numbers. **VALUE / LEARNING OUTCOMES** • Apply the understanding of numbers to situations in real life.	**Unit - 1: LARGE NUMBERS** • Indian Place Value System • 7 and 8- digit numbers • Indian and International Place Value Chart • Face value, Place value • Predecessor and successor • Expand, Compare, Order and Build numbers
	ACTIVITY • Use of Abacus to form large numbers • Use number meter and cards • Compare and arrange population of a few states in the given order

MAY 2024	**TOPIC AND SUBTOPICS**
LEARNING OBJECTIVES • Help students get familiarized with the ancient number systems and understand the usage of Roman numerals. • Comprehend rules and learn to convert from one system to another. • Can carry out simple addition and subtraction operations on Roman Numbers. **VALUES / LEARNING OUTCOMES** • Explore how the number system developed in various parts of the world and appreciate their diversity. • Use the number system to express dates, classes, time etc.	**Unit - 1: LARGE NUMBERS (ROMAN NUMERALS)** • Symbols for Roman Numbers • Writing Roman numbers till 500 • Properties of Roman Number System. • Conversions between Roman and Hindu-Arabic numerals • Simple addition and Subtraction

ACTIVITY

• Investigate the areas where the Roman numbers are still being used.
• Prepare a 3 x 3 magic square of Roman numbers from 1 – 9.

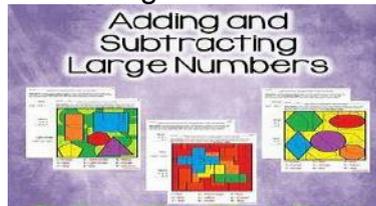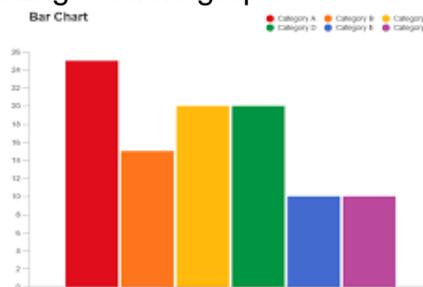| **JULY 2024**	**TOPIC AND SUBTOPICS**
LEARNING OBJECTIVES • Develop understanding of arithmetic operations and techniques. • Explore the relationship between operations. **VALUES / LEARNING OUTCOMES** • Develop confidence in solving problems involving the two operations separately as well as together.	**Unit 2 -: ADDITION AND SUBTRACTION OF NUMBERS** • Properties of Addition and Subtraction • Adding & Subtracting 7 and 8- digit numbers • Combination of addition and subtractiondifference • Word Problems • Estimating sum and difference **ACTIVITY** • Fill the missing digits using rules of addition and subtraction.
LEARNING OBJECTIVES • Express the data in the form of pictures and bars. • Read and draw inferences from a circle graph. **VALUES / LEARNING OUTCOMES** • Help locate points on a grid, based on available information. • Able to apply the concept to collect, record and interpret data in real life.	**Unit 6: DATA HANDLING** • Data collection and organization • Tally marks and Tabular form of data • Reading and Drawing a Pictograph and a Bar Graph • Reading a Circle graph **ACTIVITY** • Conduct a survey for a given topic and represent the data graphically.

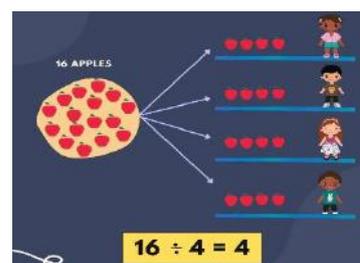| **AUGUST 2024**	**TOPIC AND SUBTOPICS**
LEARNING OBJECTIVES • Develop understanding of arithmetic operations and techniques • Understand the rules and properties of arithmetic operations and apply them to solve problems in real life situations **VALUES / LEARNING OUTCOMES** • Improve analytical and numerical skills	**Unit - 3: MULTIPLICATION AND DIVISION OF LARGE NUMBERS** • Properties of Multiplication and Division • Operations by 10's, 100's, 1000's • Two and three digit multiplication and division • Unitary method **ACTIVITY** • Lattice Multiplication • Division by Grouping and Repeated Subtraction
LEARNING OBJECTIVES • Identify basic geometrical figures and to be able to draw them • List the elements of a figure **VALUES / LEARNING OUTCOMES** • Make inferences and select the right measuring tools and apply the learnt skills in day-to-day life situations • Apply spatial reasoning while constructing angles	**Unit - 5: GEOMETRY** • Point, ray, line, segment, angle, circle • Types of lines • Measuring and drawing angles • Classification of angles and polygons **ACTIVITY** • Rearrange angles of a triangle to show that their sum is 180° • Use paper folding to make geometrical and symmetrical figures

SEPTEMBER 2024	TOPIC AND SUBTOPICS
LEARNING OBJECTIVES • Hone mathematical skills to solve simple numerical questions. • Develop visual, spatial and problem-solving skills. **VALUES / LEARNING OUTCOMES** • Familiarize with basic terms used in Geometry. • Use instruments to measure and draw segments and circles. • Apply spatial reasoning to name figures according to specifications	**Unit - 5: GEOMETRY (to be completed)** • Classification of triangles • Parts of a circle and construction • Symmetry **REVISION OF TOPICS LEARNT** **MID TERM EXAMS**

CLASS V- MATHS – TERM 2

OCTOBER 2024	TOPIC AND SUBTOPICS
LEARNING OBJECTIVES • Identify numbers as prime and composite. • Understand terms like co-prime, composite, HCF, LCM and the relationship between factors and multiples. • Learn rules of divisibility to determine if the test based on rule works. **VALUES / LEARNING OUTCOMES** • Recognise and determine factors and multiples of a number • Apply rules of divisibility • Develop problem solving skills involving factors and multiples	**Unit - 4: PLAYING WITH NUMBERS** • Properties of multiples and factors • Prime and composite numbers • Prime factorization • Common multiples and factors • LCM and HCF • Relationship between LCM, HCF and product. • Divisibility rules **ACTIVITY** • Establish relationship between HCF, LCM and product of numbers • Venn Diagram to find LCM and HCF • Crossword puzzle

NOVEMBER 2024	TOPIC AND SUBTOPICS
LEARNING OBJECTIVES - Read, write and identify fractions - Convert between types of fractions - Compare unlike fractions and form equivalent ones - Add, Subtract, Multiply and Divide fractions **VALUES / LEARNING OUTCOMES** - Use properties of fractions and all four operations to simplify real life situations - Enhance analytical thinking skills to solve paarts of a whole or collection	**Unit - 7: FRACTIONS** - Types of fractions - Making Equivalent fractions - Conversion between mixed and improper fractions - Writing a fraction in lowest terms - Comparison and ordering - Addition and subtraction - Multiplication and Division
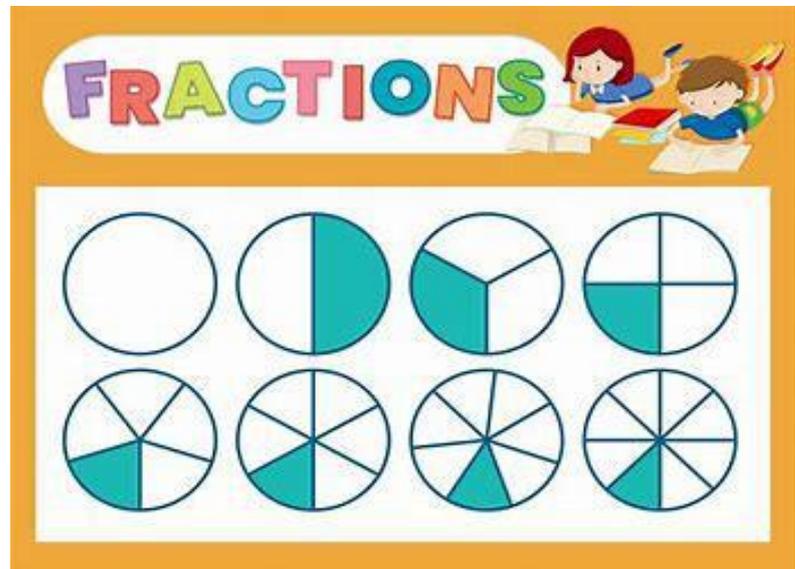
ACTIVITY

- Children will write their routine by dividing 24 hours of the day into categories like sleeping, playing, school hours etc. and write fractions for all. These can be added to find out if they form a complete day or not.
- Depicting addition of mixed fractions using paper folding and shading

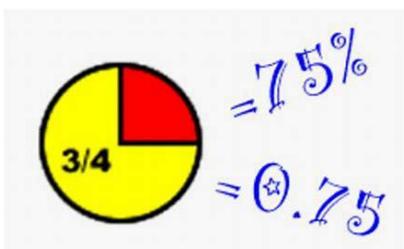| DECEMBER 2024	TOPIC AND SUBTOPICS
LEARNING OBJECTIVES • Understand the meaning and use of decimals • Identify similarities and differences between numbers and decimals **VALUES / LEARNING OUTCOMES** • Appreciate the purpose of using decimals • Understand how the concept of percentage is used in daily life	**Unit - 8: DECIMALS** • Place values and reading a decimal • Ordering decimals • Conversion between fractions and decimals • Addition and Subtraction of decimals • Decimals and mixed fractions • Multiplication and Division of decimals • Percentage **ACTIVITY** • Representation of a decimal on a grid
LEARNING OBJECTIVES • Learn about the different uses of money (earning, spending and saving) • Find the cost of as many units required • Interpret and prepare a bill **VALUES / LEARNING OUTCOMES** • Realise the role of money in our day-to-day life. • Students will be able to handle cash and carry out age-appropriate transaction	**Unit - 11: MONEY** • Conversion between Rupee and Paise • Operations on Money • Word problems • Currency of other countries **ACTIVITY** • Studying an electricity bill • Mock shop

JANUARY 2025	TOPIC AND SUBTOPICS

JANUARY 2025

TOPIC AND SUBTOPICS

LEARNING OBJECTIVES

- Calculate the area and perimeter of geometrical figures using formulae
- Find costs of tiling or bordering

VALUES / LEARNING OUTCOMES

- Understand the relationship between perimeter, area and volume and apply in real-life applications

Unit - 14: PERIMETER AND AREA

- Perimeter and area of regular figures
- Perimeter and area of a square and rectangle
- Applications to real life

Perimeter   Area   Volume

ACTIVITY
- Find perimeter of objects around you
- Compare areas if the perimeters are equal
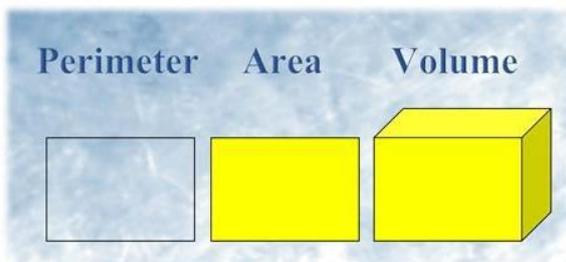
LEARNING OBJECTIVES

- Able to convert units, add and subtract time
- Assess the starting, duration and finishing time for an event

VALUES / LEARNING OUTCOMES

- Form a timeline of events according to the year
- Think critically, analyze and apply the concept to real life situations

Unit - 11: TIME

- Conversions between units of time
- 12 and 24-hour clock
- Addition and subtraction of time
- Duration of time
- Calendar

ACTIVITY

- Make a list of some important events in History and form a timeline
- Making a sun dial

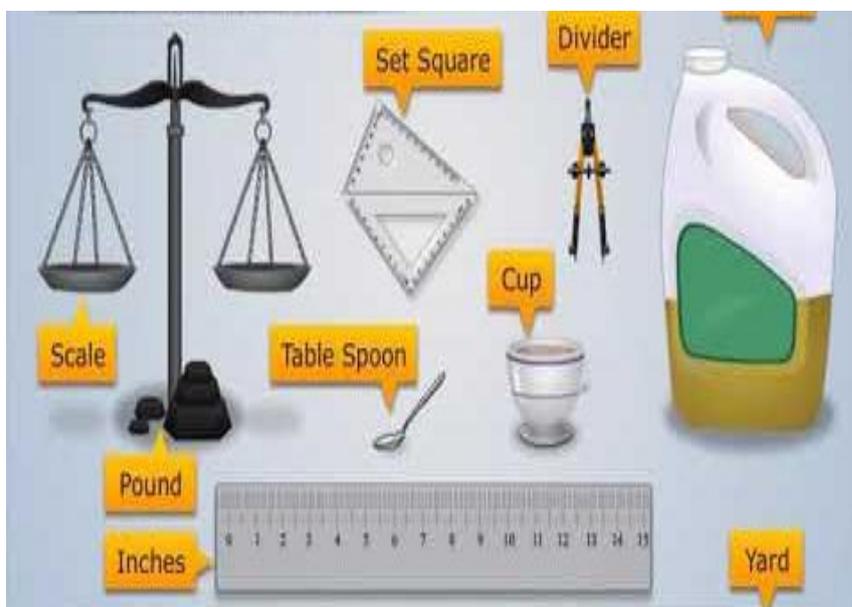| FEBRUARY 2025	TOPIC AND SUBTOPICS

LEARNING OBJECTIVES

- Select the right measuring tools and apply the learnt skills in day-to-day life situations
- Draw inferences from the given information to nurture critical thinking and problem solving

VALUES / LEARNING OUTCOMES

- Estimate the unit of measurement to find the measure of different objects
- Learn to use measuring instruments

Unit - 9: MEASUREMENT

- Units of measurement of length, mass and capacity and temperature
- Conversion of measures using decimals
- Addition, subtraction, multiplication and division of measures

ACTIVITY

- Learning to read the clinical thermometer
- Investigate about the normal body temperature of a few animals

MARCH 2025	TOPIC AND SUBTOPICS
LEARNING OBJECTIVES • Students will be able to refine and hone their learning skills and shall be able to perform better in the Annual assessment **VALUES / LEARNING** **OUTCOMES** • Appreciate the process of logical analysis of Mathematics. • Inculcate stepwise method of solving real life situations	**REVISION** Revision worksheets will be given.
	ANNUAL EXAMS