MONTHLY SYLLABUS

SESSION-2017-18

CLASS-VII

SUBJECT : MATHEMATICS

MONTH	CONTENT
TERM-I (PRATIBHA)	
April 2017	❖ **Chapter 1: Integers** Introduction, Recall, Properties of addition and subtraction of integers, Multiplication of integers, Properties of multiplication of Integers, Division of integers, Properties of division of integers. ❖ **Chapter 3: Data Handling** Introduction, Collecting data, Organization of data, Representative values, Arithmetic mean, Mode, Median, Use of Bar graphs with a different purpose, Chance and Probability. ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
May 2017	❖ **Chapter 14: Symmetry** • Introduction, Lines of symmetry for regular polygons, Rotational Symmetry, Line Symmetry and Rotational Symmetry. • **Mental Maths, Maths Lab Activities, YUVA Session**
July 2017	❖ **Chapter 15 : Visualising solid shapes** Visualising solid objects, Viewing different sections of a solid (one way to view an object is by cutting or slicing, another way is by shadow play, a third way is by looking at it from certain angles to get different views). ❖ **Note –** As per SCERT guidelines, content not to be taught is complete chapter except sub-section 15.4.3 and section 15.5

	❖ **Chapter 2 : Fractions and Decimals**
	Introduction, How well you have learnt about fractions ? (Proper fraction, Improper fraction, Mixed fraction, Equivalent fractions), Multiplication of fractions, Division of fractions, How well you have learnt about decimal numbers? Multiplication of decimal numbers, Division of decimal numbers.
	❖ **Chapter 5 : Lines and Angles**
	Introduction, Related Angles, Pair of lines, checking for parallel lines.
	❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
August 2017	❖ **Chapter-4 : Simple Equations**
	A mind-reading game, Setting up of an equation, Review of what we know, What equation is? Solving an equation, More equations, From solution to equation, Application of simple equations to practical situations.
	❖ **Chapter-6 : The Triangle and its Properties**
	Introduction, Medians of a triangle, Altitudes of a triangle, Exterior angle of a triangle and its property, Angle sum property of a triangle.
	❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
September 2017	❖ **Chapter-6 : The Triangle and its Properties**
	Two special triangles: Equilateral and Isosceles, Sum of the lengths of two sides of a triangle, Right-angled triangles and Pythagoras property.
	❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
TERM-II (PRATIBHA)	
MONTHS	**CONTENT**
October 2017	❖ **Chapter- 8 : Comparing Quantities**

	Introduction, Equivalent ratios, Percentage-Another way of comparing quantities, Use of percentages, Prices related to an item or buying and selling, Charge given on borrowed money or simple interest. ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
November 2017	❖ **Chapter – 7 : Congruence of Triangles** Introduction, Congruence of plane figures, Congruence among line segments, Congruence of angles, Congruence of triangles, Criteria for congruence of triangles, Congruence among right-angled triangles. ❖ **Chapter 10 : Practical Geometry** Introduction, Construction of a line parallel to a given line through a point not on the line, Construction of triangles, Constructing a triangle when the lengths of its three sides are known (SSS Criterion), Constructing a triangles when the lengths of two sides and the measure of the angle between them are known (SAS Criterion), Constructing a triangle when the measures of two of its angles and the length of the side included between them is given (ASA Criterion), Constructing a right-angled triangle when the length of one leg and its hypotenuse are given (RHS Criterion). ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
December 2017	❖ **Chapter 11 : Perimeter and Area** Introduction, Squares and Rectangles, Area of a parallelogram, Area of a triangle, Circles, Conversion of units, Applications. ❖ **Chapter 13 : Exponents and Powers** Introduction, Exponents, Laws of exponents, Miscellaneous examples using the laws of exponents, Decimal number system, Expressing large numbers in the standard form. ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
January 2018	❖ **Chapter-12 : Algebraic Expressions** Introduction, How are expressions formed? Terms of an

February 2018	expression, Like and Unlike terms, Monomials, Binomials, Trinomials and Polynomials, Addition and subtraction of algebraic expressions, Finding the value of an expression, Using algebraic expressions- formulas and rules. ❖ **Mental Maths, Maths lab Activities, YUVA sessions**
February 2018	**The Following Content of Term-I to be repeated and Evaluated in Term-II** ❖ **Chapter-2 : Fractions and Decimals** Introduction, How well you have learnt about fractions? (Proper fraction, Improper fraction, Mixed fraction, Equivalent fractions), Multiplication of fractions, Division of fractions, How well you have learnt about decimal numbers? Multiplication of decimal numbers, Division of Decimal numbers.

CLASS-VII (NISTHA)

SUBJECT : MATHEMATICS

TERM-I (NISHTHA)	
MONTH	**CONTENT**
April 2017	❖ **Chapter 1: Integers** Introduction, Recall, Properties of addition and subtraction of integers, Multiplication of integers, Properties of multiplication of Integers, Division of integers, Properties of division of integers. ❖ **Chapter 3: Data Handling** Introduction, Collecting data, Organization of data, Representative values Arithmetic mean ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
May 2017	❖ **Chapter 3: Data Handling**

	Mode, Median, Use of Bar graphs with a different purpose, Chance and Probability.
	❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
July 2017	❖ **Chapter 15 : Visualising solid shapes**
	Visualising solid objects, Viewing different sections of a solid (one way to view an object is by cutting or slicing, another way is by shadow play, a third way is by looking at it from certain angles to get different views).
	❖ **Note – As per SCERT guidelines, content not to be taught is complete chapter except sub-section 15.4.3 and section 15.5**
	❖ **Chapter 2 : Fractions and Decimals**
	Introduction, How well you have learnt about fractions ? (Proper fraction, Improper fraction, Mixed fraction, Equivalent fractions), Multiplication of fractions, Division of fractions, How well you have learnt about decimal numbers? Multiplication of decimal numbers, Division of decimal numbers.
	❖ **Chapter 5 : Lines and Angles**
	Introduction, Related Angles
	❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
August 2017	❖ **Chapter-5 : Lines and Angles**
	Pair of lines, Checking for parallel lines.
	❖ **Chapter-6 : The Triangle and its Properties**
	Introduction, Medians of a triangle, Altitudes of a triangle, Exterior angle of a triangle and its property, Angle sum property of a triangle. Two special triangles: Equilateral and Isosceles, Sum of the lengths of two sides of a triangle.
	❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
September 2017	❖ **Chapter-6 : The Triangle and its Properties**

Right-angled triangles and Pythagoras property.

❖   **Mental Maths, Maths Lab Activities, YUVA sessions**

TERM-II (NISHTHA)	
MONTHS	**CONTENT**
October 2017	❖ **Chapter- 8 : Comparing Quantities** Introduction, Equivalent ratios, Percentage-Another way of comparing quantities, Use of percentages, Prices related to an item or buying and selling, Charge given on borrowed money or simple interest. ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
November 2017	❖ **Chapter 10 : Practical Geometry** Introduction, Construction of a line parallel to a given line through a point not on the line, Construction of triangles, Constructing a triangle when the lengths of its three sides are known (SSS Criterion), Constructing a triangles when the lengths of two sides and the measure of the angle between them are known (SAS Criterion), Constructing a triangle when the measures of two of its angles and the length of the side included between them is given (ASA Criterion), Constructing a right-angled triangle when the length of one leg and its hypotenuse are given (RHS Criterion). ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
December 2017	❖ **Chapter 13 : Exponents and Powers** Introduction, Exponents, Laws of exponents, Miscellaneous examples using the laws of exponents, Decimal number system, Expressing large numbers in the standard form. ❖ **Chapter-12 : Algebraic Expressions** Introduction, How are expressions formed? Terms of an expression, Like and Unlike terms, Monomials, Binomials, Trinomials and Polynomials.

MONTH	CONTENT
	❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
January 2018	❖ **Chapter-12 : Algebraic Expressions** Addition and subtraction of algebraic expressions, Finding the value of an expression Using algebraic expressions- formulas and rules. ❖ **Mental Maths, Maths lab Activities, YUVA sessions**
February 2018	**The Following Content of Term-I to be repeated and Evaluated in Term-II** ❖ **Chapter-2 : Fractions and Decimals** Introduction, How well you have learnt about fractions? (Proper fraction, Improper fraction, Mixed fraction, Equivalent fractions), Multiplication of fractions, Division of fractions, How well you have learnt about decimal numbers? Multiplication of decimal numbers, Division of Decimal numbers.

CLASS-VII (NISHTHA – NEO READER)

SUBJECT : MATHEMATICS

TERM-I

MONTH	CONTENT
April 2017	❖ **Chapter 1: Integers** Introduction, Recall, Properties of addition and subtraction of integers, Multiplication of integer, Properties of multiplication of Integers, ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
May 2017	❖ **Chapter 1: Integers** Division of integers, Properties of division of integers. ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**

July 2017	❖ **Chapter 15 : Visualising solid shapes** Visualising solid objects, Viewing different sections of a solid (one way to view an object is by cutting or slicing, another way is by shadow play, a third way is by looking at it from certain angles to get different views). ❖ **Note – As per SCERT guidelines, content not to be taught is complete chapter except sub-section 15.4.3 and section 15.5** ❖ **Chapter 2 : Fractions and Decimals** Introduction, How well you have learnt about fractions? (Proper fraction, Improper fraction, Mixed fraction, Equivalent fractions), Multiplication of fractions, Division of fractions. ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
August 2017	❖ **Chapter 2 : Fractions and Decimals** How well you have learnt about decimal numbers? Multiplication of decimal numbers, Division of decimal numbers. ❖ **Chapter-5 : Lines and Angles** Introduction, Related Angles ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
September 2017	❖ **Chapter-5 : Lines and Angles** Pair of lines, Checking for parallel lines. ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
TERM-II (NISHTHA – NEO READER)
MONTHS	**CONTENT**
October 2017	❖ **Chapter 10 : Practical Geometry** Introduction, Construction of a line parallel to a given line through a point not on the line, Construction of triangles,

	Constructing a triangle when the lengths of its three sides are known (SSS Criterion), Constructing a triangles when the lengths of two sides and the measure of the angle between them are known (SAS Criterion), Constructing a triangle when the measures of two of its angles and the length of the side included between them is given (ASA Criterion), Constructing a right-angled triangle when the length of one leg and its hypotenuse are given (RHS Criterion). ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
November 2017	❖ **Chapter-12 : Algebraic Expressions** Introduction, How are expressions formed? Terms of an expression, Like and Unlike terms, Monomials, Binomials, Trinomials and Polynomials. Addition and subtraction of algebraic expressions. ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
December 2017	❖ **Chapter-12 : Algebraic Expressions** Finding the value of an expression, Using algebraic expressions- formulas and rules. ❖ **Chapter 13 : Exponents and Powers** Introduction, Exponents ❖ **Mental Maths, Maths Lab Activities, YUVA sessions**
January 2018	❖ **Chapter 13 : Exponents and Powers** Laws of exponents, Miscellaneous examples using the laws of exponents, Decimal number system, Expressing large numbers in the standard form. ❖ **Mental Maths, Maths lab Activities, YUVA sessions**
February 2018	**The Following Content of Term-I to be repeated and Evaluated in Term-II** ❖ **Chapter-2 : Fractionss and Decimals** Introduction, How well you have learnt about fractions? (Proper

	fraction, Improper fraction, Mixed fraction, Equivalent fractions), Multiplication of fractions, Division of fractions, How well you have learnt about decimal numbers? Multiplication of decimal numbers, Division of Decimal numbers.