

BCM SCHOOL
A Senior Secondary School Affiliated to CBSE, New Delhi
Class VIII (Mathematics) Syllabus 2020-21

Month	Units	Skills	Inculcation	Activity(Integrated)	Learning outcome	Internal assessment
April- No. of periods - 12	Unit- 1 Rational numbers	Calculation skills will be improved to use four basic operations of rational numbers in day to day life.	Better understanding of concept by showing Educomp content + Questionnaire.	To show that there are infinitely many rational numbers between any two rational numbers.	Students will be able to learn use of rational numbers to make calculation easy.	Weekly Test
No. of periods 18	Unit – 2 Linear equations in one variable	Understanding skill and reasoning skills will be improved to solve real life problems.	Use of real life examples Educomp content + question bank		Solving of problems related to day to day life	Periodic Test -1
May – No. of periods 16	Unit – 3 Understanding quadrilaterals	Critical thinking, reasoning skill, observation skill of students will be improved by identifying various types of quadrilaterals and apply properties of them.	Use of real objects, Educomp content + question bank	i)To verify angle sum prop. Of quadrilateral ii) To understand concept of convex and concave polygon	Students will learn about different types of quadrilateral and their properties	Periodic Test -1
No of periods 14	Unit 6 Square and square roots	Calculation skill will be improved and they will learn to make arrangements in equal no of rows and columns.	Using different patterns , educomp content + question bank.	To represent the pattern , the sum of n consecutive odd natural no. is n^2 .		Periodic Test -1
June	Summer vacation					

July– No. of periods 12	Unit -15 Introduction to graphs	Observation, drawing skills will be improved.	Real life examples + question bank	Plotting of co-ordinates and drawing different mathematical shapes(Rectangle, Square and Triangle)	Students will learn to plot points in Cartesian plane, and draw Graphs.	Class test
No. of periods 6	Unit – 7 Cube and cube roots	Calculation skills will be improved.	Use of Educomp content + question bank		Students will learn to find cube and cube root of a number.	Revision Test
August – No. of periods 7	Unit – 16 Playing with numbers	Using reasoning students will be able to apply trick by solving puzzles etc.	Puzzles , magic squares +question bank		Students will learn about divisibility test and their applications.	Class test
No. of periods 19	Unit 8 Comparing Quantities	Social skills, thinking skills	Real life problems related to profit, loss,Simple interest, Compound interest etc+question bank.	Comparison between simple interest and compound interest for n consecutive years.	Students will learn about the concept of profit %,loss%, sales tax, simple and compound interest.	Revision test
September	Half Yearly Examination Unit 1,2,3,6,7,8,15,16					
October No. of periods 14	Unit 11 Mensuration	Critical thinking, analyzing the shapes, observation skill	Real objects, Educomp content+ question bank.	To deduce the formula of TSA of cylinder.	Students will learn about the perimeter, area of different 2-D shapes , volume of different 3-D shapes	Weekly Test
No. of periods 6	Unit 12 Exponents and powers	Critical thinking, observation skill, calculation skill	Educomp content+ question bank	To Verify law of exponent i.e $x^m \times x^n = x^{m+n}$	Students will learn about the different laws of exponents, standard form and their application	Periodic Test -2
				.		

November No. of periods 13	Unit 4 Practical Geometry	Drawing skill	Use of geometrical instruments +question bank		Students will learn to draw histogram, pie chart and to find probability	Periodic Test -2
No. of periods 14	Unit 9 Algebraic expressions and identities	Calculation skill, critical thinking	Educomp content+Question bank	To verify $(a+b)^2=a^2+2ab+b^2$	Students will learn about algebraic identities and their applications	Periodic Test -2
December No. of periods 14	Unit 14 Factorization	Observation skill, critical thinking	Educomp content+Question bank		Students will learn different method to factorise, algebraic expressions	Revision test
No. of periods 14	Unit 5 Data handling	Thinking skill, drawing skill ,observation skill	Real life examples + Educomp content	To Represent the given data by using pie-chart(Art club)	Students will learn to construct unique quadrilateral with five given parts.	Class test
No. of periods 12	Unit 13 Direct and inverse proportion	Thinking skill, logical skill	Real life example + Question bank	To understand the concept of inverse proportion (Demonstration method)	Students will learn about the concept of direct and inverse proportion to solve real life examples.	Class Test
January	Unit 10 Visualizing solid shapes	Logical skill, observation skill	Real life objects+ Question bank	To verify Euler's formula for hexagonal pyramid	Students will learn different views of 3-d shapes and Euler's formula	Class test
February	Revision					
March	Annual examination Unit 1,2,6,7,11,12,5,9,14,4,13,10					