

Annual & Weekly Syllabus Split-Up - 2026-27
Grade X

Subject: Maths

S.No	Month	No. of Working Days	No. of Days	Topic	Sub Topic	Teaching Aids/Resources	Classroom teaching Video Link	Activities	Art Integrated project	Pedagogy Process/Teaching Strategy	Chapterwise Notes link	Assessment	
1	APRIL	25	Week 1	Real Numbers	Fundamental Theorem of Arithmetic ,	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Factor Tree Activity	Create number-based patterns using prime factors; Design artistic representations of number properties; Integration with patterns in art	Conceptual understanding; Logical reasoning; Step-by-step proof explanation; Think-Pair-Share; Focus on number properties and proof techniques	Resources (Worksheet + Mind Maps)	Formative Quiz + Worksheet	
			Week 2		Proofs of irrationality of $\sqrt{2}, \sqrt{3}, \sqrt{5}$	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA		Create number-based patterns using prime factors; Design artistic representations of number properties; Integration with patterns in art	Conceptual understanding; Logical reasoning; Step-by-step proof explanation; Think-Pair-Share; Focus on number properties and proof techniques	Resources (Worksheet + Mind Maps)	Proof Writing Task + Worksheet	
			Week 3	QUADRATIC EQUATIONS	Polynomials	Zeros of a polynomial	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Graph plotting of polynomials; Finding zeros using graphs; Practice problems on coefficients	Create curve-based designs using polynomial graphs; Artistic patterns using curves; Integration with visual arts	Visual and conceptual learning using graphs; Activity-based approach; Step-by-step explanation; Focus on linking algebra with graphs	Resources (Worksheet + Mind Maps)	Zeros Identification Quiz + Worksheet
			Week 4		Relationship between zeros and coefficients of quadratic polynomials.	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Solve equations using different methods; Verify relationship between zeros and coefficients; Graph plotting of quadratic functions	Create parabola-based artistic designs; Pattern making using quadratic curves; Integration with real-life structures (arches, bridges)	Conceptual and application-based learning; Step-by-step derivation; Use of discriminant; Graph-based visualization; Think-Pair-Share; Focus on problem-solving and real-life application	Resources (Worksheet + Mind Maps)	Vieta's Application Test + Worksheet	
			Week 5		Solution By Factorisation and bi quadratic formula	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Solve equations using different methods; Verify relationship between zeros and coefficients; Graph plotting of quadratic functions	Create parabola-based artistic designs; Pattern making using quadratic curves; Integration with real-life structures (arches, bridges)	Conceptual and application-based learning; Step-by-step derivation; Use of discriminant; Graph-based visualization; Think-Pair-Share; Focus on problem-solving and real-life application	Resources (Worksheet + Mind Maps)	Problem Solving Quiz + Worksheet	
2	JUNE	20	Week 1	PAIR OF LINEAR EQUATIONS IN TWO VARIABLES							Resources (Worksheet + Mind Maps)		
			Week 2		graphical method of their solution, consistency/inconsistency.	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Verify trigonometric identities; Solve problems based on identities; Height & distance problems (real-life application); Word problems involving angles of elevation/depression	Create coordinate-based designs using intersecting lines; Map-based activity showing intersection points; Integration with real-life planning (budget, routes)	Conceptual and problem-solving approach; Graph-based visualization; Step-by-step algebraic methods; Think-Pair-Share; Focus on real-life applications and interpretation of solutions	Resources (Worksheet + Mind Maps)	Formative Quiz + Worksheet	
			Week 3		, by elimination. Simple situational problems.	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Verify trigonometric identities; Solve problems based on identities; Height & distance problems (real-life application); Word problems involving angles of elevation/depression	Create coordinate-based designs using intersecting lines; Map-based activity showing intersection points; Integration with real-life planning (budget, routes)	Conceptual and problem-solving approach; Graph-based visualization; Step-by-step algebraic methods; Think-Pair-Share; Focus on real-life applications and interpretation of solutions	Resources (Worksheet + Mind Maps)	Problem Solving Task + Worksheet	
			Week 4	ARITHMETIC PROGRESSIONS	Derivation of the nth term and sum of the first n terms of AP	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Derivation & Sum Calculation	Sequence Pattern Design	Concept Mapping, Formula Derivation, Sum Calculation & ATL Skills Development	Resources (Worksheet + Mind Maps)	Derivation Test + Worksheet	
			Week 5	ARITHMETIC PROGRESSIONS	and their application in solving daily life problems.	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Word Problems Application	Daily Life AP Timeline	Concept Mapping, Real-Life Applications, Problem Solving & Reflection	Resources (Worksheet + Mind Maps)	Application Quiz + Worksheet	
3	JULY	27	Week 1	Coordinate Geometry	Distance formula.	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Plotting points on Cartesian plane; Distance formula verification using graph paper; Section formula activity (midpoint of line segment); Real-life mapping (locating classroom objects using coordinates)	Design a city map/grid using coordinate plane showing roads, buildings, parks; Create rangoli/mandala using plotted points; Integration with Geography (map reading)	Experiential Learning, Inquiry-based Learning, Visual Learning, Activity-based Approach; Think-Pair-Share; Concept building from concrete (graph plotting) to abstract (formula derivation); Use of ICT tools (GeoGebra) for visualization; Focus on competency-based problem solving and real-life application	Resources (Worksheet + Mind Maps)	Graph-based worksheet; Case-study questions (real-life location problems); Competency-based MCQs; Short answer test on distance & section formula; Peer assessment through map activity	
			Week 2		Section formula (internal division).	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Activity on finding midpoint of a line segment using graph paper; Dividing a line segment in given ratio (m:n) by plotting; Verification of section formula using coordinate grid; Real-life activity: locating a point between two locations	Section Formula Practice	Experiential Learning, Activity-based Learning, Inquiry Method; Concept building from midpoint → internal division → section formula; Visual learning using graph paper and GeoGebra; Think-Pair-Share; Emphasis on conceptual clarity and competency-based application	Resources (Worksheet + Mind Maps)	Graph-based questions; Case-study (finding location between two cities); Competency-based MCQs; Short answer test on midpoint & section formula; Peer assessment through activity	
			Week 3	TRIANGLES	Basic Proportionality Theorem	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Draw triangle and a line parallel to one side; measure segments and verify proportionality (AD/DB = AE/EC); Paper folding activity to observe parallel lines; Use ruler to check ratios	Create Warli art or geometric patterns using triangles and parallel lines; Design a bridge/roof structure showing proportional division; Integration with Art & Architecture	Activity-based Learning, Experiential Learning, Proof-based reasoning; Start from observation → measurement → pattern → theorem statement; Think-Pair-Share; Visual demonstration using diagrams and GeoGebra; Focus on logical reasoning and concept clarity	Resources (Worksheet + Mind Maps)	Proof-based questions; Case-study (real-life proportional division); Competency-based MCQs; Diagram-based questions; Short test on theorem application	
			Week 4		Similarity criteria (Without proof)	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Compare two triangles using cut-outs (AAA); Measure sides to verify SAS & SSS similarity; Group activity to identify similar shapes in classroom objects; Scale factor activity using grid paper	Create Warli art or geometric patterns using triangles and parallel lines; Design a bridge/roof structure showing proportional division; Integration with Art & Architecture	Experiential Learning, Activity-based Learning, Visual comparison method; Concept building through observation → comparison → criteria formation; Think-Pair-Share; Use of GeoGebra for dynamic similarity; Focus on real-life application and competency-based understanding	Resources (Worksheet + Mind Maps)	Diagram-based questions; Case-study (scale models); Competency-based MCQs; Short answer questions identifying similarity criteria; Peer assessment through activity	
			Week 5	CIRCLES	Terminologies and theorem related to circles	NCERT Textbook; NCERT Exemplar; CBSE Competency-Based Questions; Reference Book; ICT Tools (GeoGebra); Worksheets; Mind Maps	NA	Identify parts of circle (radius, diameter, chord, arc, sector) using diagrams; Draw tangents and verify properties; Activity to check "radius ⊥ tangent at point of contact"; Group task on identifying circle properties in real-life objects (clock, wheel)	Mandala art using circles and concentric designs; Create rangoli using chords and arcs; Integration with Art & Architecture (domes, wheels, designs)	Experiential Learning, Visual Learning, Activity-based approach; Concept building from basic terminology → observation → theorem understanding; Use of diagrams and GeoGebra; Think-Pair-Share; Emphasis on theorem application and reasoning skills	Resources (Worksheet + Mind Maps)	Diagram-based questions; Assertion-Reason questions; Competency-based MCQs; Short answer test on terminology & theorems; Peer assessment through drawing activity	

11	MARCH	17	Week 1	5	Annual Exam								
			Week 2	6									
			Week 3	6									
			Week 4	5									
			Week 5	3									