GeometryCoach.com

GEOMETRY CURRICULUM MAP

UNIT 1 – Geometry Basics

1-1 Nets and Drawings for Visualizing Geometry

1-2 Points Lines and Planes

1-3 Measuring Segments

1-4 Measuring Angles

1-5 Exploring Angle Pairs

1-6 Classifying Polygons

1-7 Midpoint and Distance in the Coordinate Plane

1-8 Perimeter Circumference and Area

1-9 Constructions

GeometryCoach.com

UNIT 2 – Reasoning and Proof

2-1 Inductive and Deductive Reasoning

2-2 Logic

2-3 Proving Theorems

2-4 Algebraic Proofs

2-5 Theorems about Angles and Perpendicular Lines

2-6 Planning a Proof

UNIT 3 – Parallel and Perpendicular Lines

3-1 Identify Pairs of Lines and Angles

3-2 Use Parallel Lines and Transversals

3-3 Prove Lines Parallel

3-4 Find and Use Slopes of Lines

3-5 Right and Graph Equations of Lines

3-6 Prove Theorems about Perpendicular Lines

GeometryCoach.com

UNIT 4 – Congruent Triangles

4-1 Congruent Figures

4-2 Triangle Congruence by SSS and SAS

4-3 Triangle Congruence by ASA and AAS

4-4 Using Corresponding Parts of Congruent Triangles

4-5 Isosceles and Equilateral Triangles

4-6 Congruence in Right Triangles

4-7 Congruence in Overlapping Triangles

UNIT 5 – Relationships within Triangles

5-1 Midsegments of Triangles

5-2 Perpendicular and Angle Bisectors

5-3 Bisectors in Triangles

5-4 Medians and Altitudes

5-5 Indirect Proof

5-6 Inequalities in One Triangle

5-7 Inequalities in Two Triangles

GeometryCoach.com

UNIT 6 – The Polygon and Angle Sum Theorems

6-1 The Polygon-Angle Sum Theorems

6-2 Properties of Parallelograms

6-3 Proving That a Quadrilateral is a Parallelogram

6-4 Properties of Rhombuses Rectangles and Squares

6-5 Conditions of Rhombuses Rectangles and Squares

6-6 Trapezoids and Kites

6-7 Polygons in the Coordinate Plane

6-8 Applying Coordinate Geometry

6-9 Proofs Using Coordinate Geometry

UNIT 7 – Similarity

7-1 Ratios and Proportions

7-2 Similar Polygons

7-3 Proving Triangles Similar

7-4 Similarity in Right Triangles

7-5 Proportions in Triangles

GeometryCoach.com

UNIT 8 – Right Triangles and Trigonometry

8-1 The Pythagorean Theorem and Its Converse

8-2 Special Right Triangles

8-3 Trigonometry

8-4 Angles of Elevation and Depression

8-5 Law of Cosines

8-6 Law of Sines

UNIT 9 - Transformations

9-1 Translations

9-2 Reflections

9-3 Rotations

9-4 Congruence Transformations

9-5 Dilations

9-6 Solving Rational Equations

9-7 Similarity Transformations

GeometryCoach.com

UNIT 10 - Area

10-1 Areas of Parallelograms and Triangles

10-2 Areas of Trapezoids, Rhombuses, and Kites

10-3 Areas of Regular Polygons

10-4 Perimeters and Areas of Similar Figures

10-5 Trigonometry and Area

10-6 Circles and Arcs

10-7 Areas of Circles and Sectors

10-8 Geometric Probability

UNIT 11 – Surface Area and Volume

11-1 Space Figures and Cross Sections

11-2 Surface Areas of Prisms and Cylinders

11-3 Surface Areas of Pyramids and Cones

11-4 Volumes of Prisms and Cylinders

11-5 Volumes of Pyramids and Cones

11-6 Surface Area and Volumes of Spheres

11-7 Areas and Volumes of Similar Solids

GeometryCoach.com

UNIT 12 – Circles

12-1 Tangent Lines

12-2 Chords and Arcs

12-3 Inscribed Angles

12-4 Angle Measures and Segment Lengths

12-5 Circles in the Coordinate Plane

12-6 Locus A Set of Points

UNIT 13 - Probability

13-1 Experimental and Theoretical Probability

13-2 Probability Distributions and Frequency Tables

13-3 Permutations and Combinations

13-4 Compound Probability

13-5 Probability Models

13-6 Conditional Probability Formulas

13-7 Modeling Randomness