Algebraically Speaking…
McDougal Littell – Geometry
Fall Semester

Homework Assignments:

For all sections assigned, first read through teaching section & examples carefully, then work assigned problems.

Chapter 1 – Essentials of Geometry:

_____ Lesson 1.1 – Identify Points, Lines, and Planes
    Read through the teaching section & examples. As you look at these concepts, you can use a pencil and sheet of paper to represent a line and a plane, accordingly. Play around with them as you read through the examples. This is a helpful technique to use as you begin to look at what different intersections might look like.

             Problems: #1(a-d), 3-6 all, 8-11 all, 13, 14,
                      #16-22 all, 25, 26, 27-37 odd, 40-42 all, 46

_____ Lesson 1.2 – Use Segments and Congruence
             Problems: #1, 7-13 odd, 17-29 odd, 33

_____ Lesson 1.3 – Use Midpoint and Distance Formulas
             Problems: #1, 3-21 odd, 24, 25-33 odd,
                          #34, 35-41 odd
                           #43, 45, 46, 47, 48, 52, 53

_____ Lesson 1.4 – Measure and Classify Angles
             Problems: #3, 5, 6, 7-14 all, 15-21 all, 22, 24,
                          # 25-28 all, 29, 31, 33-38 all, 40, 42,
                          # 44, 47, 51, 53-61 all

         Do 1.4 - Construction, page 33-34

_____ Lesson 1.5 – Describe Angle Pair Relationships
             Problems: # 3, 5, 6, 7-15 odd, 16, 17-27 odd, 30, 31, 33, 39,
                             41, 43, 49-52 all, 54
_____ Lesson 1.6 – Classify Polygons
             Problems: # 3-13all, 15, 16, 18-29all, 33-37odd, 40, 41

_____ Lesson 1.7 – Find Perimeter, Circumference, and Area
             Problems: # 4, 6-9all, 13, 16, 18, 19-25odd, 26, 27-31odd, 35, 40,
                          #43, 46
_____ Chapter 1 Summary and Review
             Problems: ALL

Chapter 2 – Reasoning and Proof:

_____ Lesson 2.1 – Use Inductive Reasoning

Problems: # 3-4 (do in your head, no need to sketch),
5 – 17 all, 20, 21, #23 – 29 odd, 30
32 – 37 all

_____ Lesson 2.2 – Analyze Conditional Statements

Problems: # 3 – 5 all, # 7 – 15 all, 16, 18, #19 – 24 all
26 – 28 all, 33, 35, 36, 39

_____ Lesson 2.3 – Apply Deductive Reasoning

Problems: # 4 – 10 all, 12, 13, #16 – 19 all, 21, 22, 24,
25 – 28 all

_____ Lesson 2.4 – Use Postulates and Diagrams

Problems: # 3 – 8 all, # 10 – 24 all, # 35 – 38 all, 39

_____ Lesson 2.5 – Reason Using Properties from Algebra

Problems: # 1 – 19 Odd,
21 – 25 All, 29, 30, 33

_____ Lesson 2.6 – Prove Statements about Segments and Angles

Problems: # 3 – 12 All, 16, 17, 18, 21,
23, 24, 26, 29

_____ Lesson 2.7 – Prove Angle Pair Relationships

Problems: # 3 – 6 All, #8 – 14 Odd, 16
17 – 33 Odd
37, 39, 42, 46

_____ Chapter 2 Summary and Review

Problems: ALL

Chapter 3 – Parallel and Perpendicular Lines

_____ Lesson 3.1 – Identify Pairs of Lines and Angles

                 Work problems: # 3, 5, 7 - 14, all,
                                          # 18 - 27 all, 29 - 32 all,
                                          # 37, 40 - 42 all

_____ Lesson 3.2 – Use Parallel Lines and Transversals

                 Work problems: # 5 – 19 Odd, 22, 24,
                                          #27 – 33 All, 35, 37, 42

_____ Lesson 3.3 – Prove Lines are Parallel

                 Work Problems: # 3, # 5 – 8 all, # 10 – 15 all, 17,
                                          # 19 – 21, 29, 31, 35, 36, 38, # 40 – 44 Odd

_____ Lesson 3.4 – Find and Use Slopes of Lines

                 Work Problems: # 3 – 6 All, 7, 9, 13, 15, 16, 17, 20,
                                          # 23, 25, 27, 28, 30, 32, 33, 36, 40

_____ Lesson 3.5 – Write and Graph Equations of Lines

                 Work Problems: # 3 – 7 Odd, 11 – 21 Odd, 23 – 28 Odd
                                          # 30 – 44 Odd, 46, 48, 49, 51,
                                          # 53, 55, 57, 60, 62, 63

_____ Lesson 3.6 – Prove Theorems about Perpendicular Lines

                 Work Problems: # 2 – 4 All, 5 – 7 All, 8 – 10 All,
                                          # 16, 19, 23, 25, 26, 29, 31, 33

_____ Chapter 3 Summary and Review

                         Problems: ALL

Chapter 4 – Congruent Triangles

_____ Lesson 4.1 – Apply Triangle Sum Properties
> Problems: # 1 – 6 all,, 11, # 14 – 19 all, # 21 – 28 all, 31,
> # 32 – 37 all, 41, 52

_____ Lesson 4.2 – Apply Congruence and Triangles
> Problems: # 4 – 13 all, , 16, # 19 – 21 all, , 23, 25, 26, 28

_____ Lesson 4.3 – Prove Triangles Congruent by SSS
> Problems: # 1 – 7 all, 9, 11, # 16 – 18 all, 21, 24, 26

_____ Lesson 4.4 – Prove Triangles Congruent by SAS and HL
> Problems: # 3 – 8 all, # 10, 11, 12, 14, 15, 17, 18, 19, 21, 22
> # 25, 28, 29, 31, 33, 34, 36, 38, 39

_____ Lesson 4.5 – Prove Triangles Congruent by ASA and AAS
> Problems: # 3 – 5, 7, 8, #11 – 13, 15, 17, 19, 20, 24, 27, 31, 32

_____ Lesson 4.6 – Use Congruent Triangles
> Problems: # 4, 7, 8, 11, 13, 14, 16, 18, 19, 20, 21, 23, 28, 31,
> # 33 – 35, 39

_____ Lesson 4.7 – Use Isosceles and Equilateral Triangles
> Problems: # 3-9 all, #11-13, #15-22, 25, 27, 29, 32, 34, 39, 40
> # 42, 43, 47, 48
> # 33 – 35, 39

_____ Lesson 4.8 - Perform Congruence Transformations
> Problems: # 3-8, 9, 10, 13, 15, 18, 21, 23, 26, 28, 29, 31,
> # 33-36, 38, 39, 42, 43

_____ Chapter 4 Summary and Review
> Problems: ALL

Chapter 5 – Relationships within Triangles:

_____ Lesson 5.1 – Midsegment Theorem and Coordinate Proof
Problems: # 3, 5, # 6 – 11 All,
#12, 16, 13, 15, 19, 21, 23, 24, 28
29, 30, 31, 32, 35, 38, 40,

_____ Lesson 5.2 – Use Perpendicular Bisectors
Problems: # 3 – 9 All,
#11 – 17 All,
20 – 22 All,
26, 33

_____ Lesson 5.3 – Use Angle Bisectors of Triangles
Problems: # 3 – 13 All,
`   # 15 – 20 All,
23, 25, 26, 29, 32,

_____ Lesson 5.4 – Use Medians and Altitudes
Problems: # 3-6 all, 7, 8, 9, 11, #13-15 all, 17, 19, 20, 21, 23,
24, 25, 31, 33, 35, 36, 41, 42
Practice your "MAPA-CICO" ☺

_____ Lesson 5.5 – Use Inequalities in a Triangle
Problems: # 6-11 all, # 16-19 all, # 21, 23, 25

_____ Lesson 5.6 – Inequalities in Two Triangles and Indirect Proof
Problems: # 3-8 all
Practice your "MAPA-CICO" ☺

_____ Chapter 5 Summary and Review
Problems: ALL

Chapter 6 – Similarity:

_____ Lesson 6.1 – Ratios, Proportions, and the Geometric Mean
                     Problems: # 3 – 9 Odd, 11, 15, 17, 18, 22, 23, 27, 28,
                                   # 30, 31, 35, 40, 43, 45, 46, 49, 51, 52,
                                   # 53, 55, 57, 59, 65, 68

_____ Lesson 6.2 – Use Proportions to Solve Geometry Problems
                Problems: # 6, 7, 9, 11, 13, 16, 18, 22, 26, 28, 30

_____ Lesson 6.3 – Use Similar Polygons
                     Problems: # 5, 6, 7, 9 – 11, 12, 14 – 17, 19, 23 – 26, 32, 34

_____ Lesson 6.4 – Prove Triangles Similar by AA
                     Problems: # 3 – 14 All, 20, 21, 23, 25, 27, 29, 31, 34

_____ Lesson 6.5 – Prove Triangles Similar by SSS and SAS
                     Problems: # 3, 5, 7, 9, 10, 11, 14, 15, 18-23, 29, 31, 33

_____ Lesson 6.6 – Use Proportionality Theorems
                     Problems: # 3, 5, 8, 9, 13, 15, 17, 21, 24

_____ Lesson 6.7 – Perform Similarity Transformantions
                     Problems: # 3, 5, 7, 9, 12, 13, 16, 18, 19, 21, 23, 26, 29

_____ Chapter 6 Summary and Review
                              Problems: ALL