Unit 3 Midterm Review

Congruent Triangles

**REMEMBER: Congruent is different from similar!!!

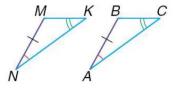
SSS

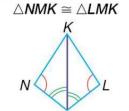
If the three sides of one triangle are congruent to the three sides of a second triangle, then the two triangles are congruent.

Side-Side-Side (SSS)	
$\triangle XYZ \cong \triangle ABC$	$\triangle ABC \cong \triangle ADC$
X A B #C	$A \nearrow C$

Angle-Angle-Side (AAS)

 \triangle *NMK* $\cong \triangle$ *ABC*

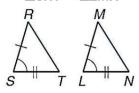


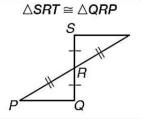


If two angles and a nonincluded side of one triangle are congruent to two angles and the corresponding nonincluded angle of a second triangle, then the two triangles are congruent.

Side-Angle-Side (SAS)

 $\triangle SRT \cong \triangle LMN$



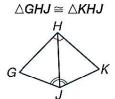


If two sides and the <u>included</u> angle of one triangle are congruent to two sides and the <u>included</u> angle of a second triangle, then the two triangles are congruent.

Angle-Side-Angle (ASA)

 $\triangle GHJ \cong \triangle FEG$



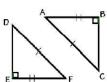


If two angles and the included side of one triangle are congruent to two angles and the included side of a second triangle, then the two triangles are congruent.

HL

Hypotenuse-Leg (HL)

If the hypotenuse and a leg of one right triangle is congruent to the hypotenuse and a leg of another right triangle, then the triangles are congruent



ΔDEF ≅ ΔCBA

 Δ NMJ $\cong \Delta$ KMJ

