

Name: _____
 Geometry

Date: _____
 Band: _____

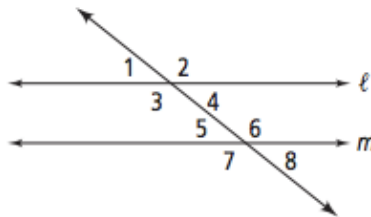
Unit 3: Parallel and Perpendicular Lines

LT#1: Identify relationships between figures in space.

1. Draw a cube and use it to show an example of skew line segments.

LT#2: Identify angles formed by two lines and a transversal.

2. Use the diagram for A-B. Line $l \parallel m$. Identify each angle pair.



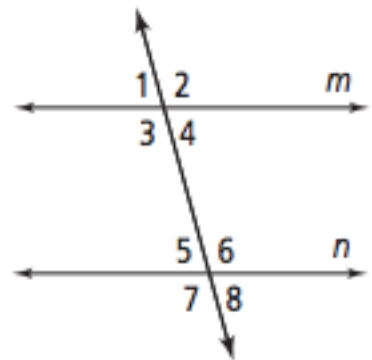
A. $\angle 1$ and $\angle 5$

B. $\angle 6$ and $\angle 7$

LT#3: Prove theorems about parallel lines.

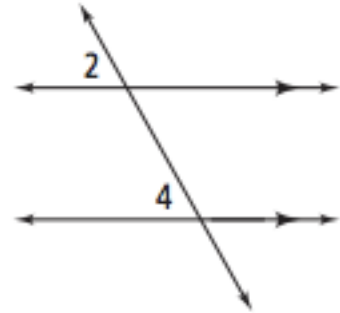
3. **Given:** $m \parallel n$

Prove: $m\angle 1 + m\angle 7 = 180$



LT#4: Use properties of parallel lines to find angle measures.

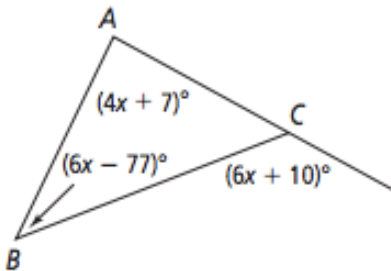
4. Given $m\angle 2 = 50$, which postulate or theorem proves $m\angle 4 = 50$?



LT#8: Find measures of angles of triangles.

5. Given right $\triangle ABC$ with $m\angle B = (3x + 10)$ and $m\angle A = x$, if $\angle C$ is the right angle, what is the value of x ?

6. Find $m\angle B$.



LT#9: Graph and write linear equations.

7. Write an equation of the line that connects the points $A(1,3)$ and $B(4,-9)$.
8. What is the slope of a line that passes through $(-3,5)$ and $(4,3)$?

LT#10: Relate slope to parallel and perpendicular lines.

9. What is the slope of a line parallel to $-8x + y = 2$?
10. What is the slope of a line that is perpendicular to the line that passes through $(-2,2)$ and $(1,3)$?
11. What is the slope of a line that is perpendicular to $3x + 5y = 2$?