

### 3.1 Pairs of Lines & Angles CYU DAY ONE

Use when you get it right all by yourself

**S** Use when you did it all by yourself, but made a silly mistake

**H** Use when you could do it alone with a little help from teacher or peer

**G** Use when you completed the problem in a group

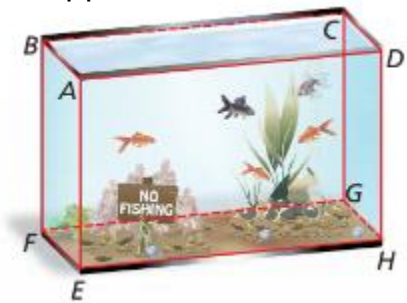
**X** Use when a question was attempted but wrong (get help)

**N** Use when a question was not even attempted

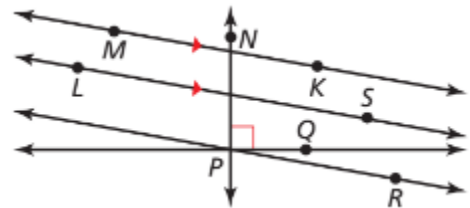
CONCEPTS	BASIC	INTERMEDIATE	ADVANCED
Identifying Parallel, Skew, Perpendicular Lines & Planes	1	5	6
Naming Parallel & Perpendicular Lines	2		
Identifying/Classifying Angles Pairs	3	4	
Vertical Angles & Linear Pairs	7		

1. Think of each segment in the diagram as part of a line. All the angles are right angles. Which line(s) or plane(s) contain point B and appear to fit in the description.

- a. Line(s) parallel to  $\overleftrightarrow{CD}$
- b. Line(s) skew to  $\overleftrightarrow{CD}$
- c. Plane(s) parallel to plane CDH



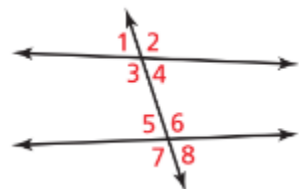
2. Use the diagram provided.
- a. Name a pair of parallel lines.
  - b. Name a pair of perpendicular lines.



3. Identify all pairs of angles of the given type.

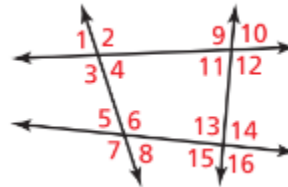
- a. Corresponding angles

- b. AIA
- c. AEA
- d. SSIA



4. Classify the angle pair as corresponding, AIA, AEA, SSIA or SSEA.

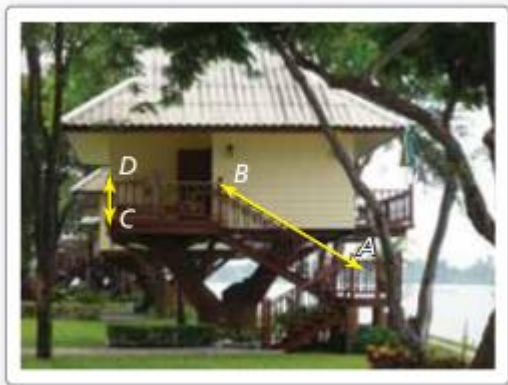
- a.  $\angle 5$  &  $\angle 1$
- b.  $\angle 11$  &  $\angle 13$
- c.  $\angle 6$  &  $\angle 13$
- d.  $\angle 2$  &  $\angle 11$



5. Describe and correct the error in the conditional statement about lines.

**X** If two lines do not intersect, then they are parallel.

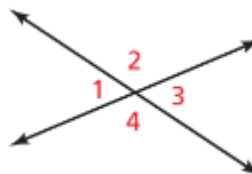
6. Use the photo to decide whether the statement is TRUE or FALSE. Explain your reasoning.



- a. The plane containing the floor of the tree house is parallel to the ground.
- b. The lines containing the railings of the staircase, such as  $\overleftrightarrow{AB}$ , are skew to all lines in the plane containing the ground.
- c. All the lines containing the balusters, such as  $\overleftrightarrow{CD}$ , are perpendicular to the plane containing the floor of the tree house.

7. Use the diagram to find the measures of the angles.

- a.  $m\angle 1 = 76^\circ$
- b.  $m\angle 2 = 159^\circ$



**CYU Reflection:** How far can you go: basic, intermediate, or advanced?

**Rate your mastery level!**

How confident are you with the skills this CYU covered? Circle the score you would give yourself.

●   ●   ●   ●   ●   ●   ●   ●

1	2	3	4	5	6	7	8
Basic		Intermediate			Advanced		Solved ALL!

