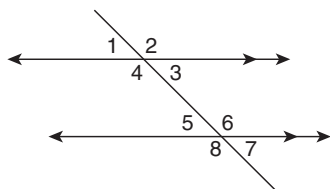


SKILL
26 **Skills Readiness**
Parallel Lines and Transversals



- Corresponding angles: $\angle 1$ and $\angle 5$, $\angle 2$ and $\angle 6$,
 $\angle 3$ and $\angle 7$, $\angle 4$ and $\angle 8$
 Alternate interior angles: $\angle 3$ and $\angle 5$, $\angle 4$ and $\angle 6$
 Same-side interior angles: $\angle 3$ and $\angle 6$, $\angle 4$ and $\angle 5$
 Vertical angles: $\angle 1$ and $\angle 3$, $\angle 2$ and $\angle 4$,
 $\angle 5$ and $\angle 7$, $\angle 6$ and $\angle 8$

Parallel line properties: If two parallel lines are cut by a transversal, then:

1. Corresponding angles are congruent;
2. Alternate interior angles are congruent; and
3. Same-side interior angles are supplementary.

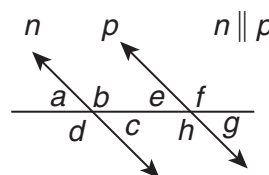
Also recall: Vertical angles are congruent and straight angles have measures of 180° .

Example: If the measure of $\angle 2$ above is 118° , what is the measure of $\angle 6$? $\angle 4$? $\angle 3$?

Answers: $\angle 6 = 118^\circ$ (corresponding); $\angle 4 = 118^\circ$ (vertical); $\angle 3 = 62^\circ$ (straight)

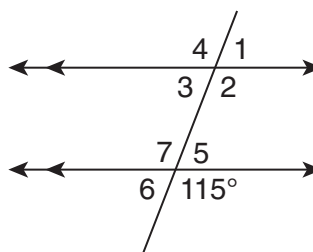
Practice on Your Own
Name the missing angle.

1. $\angle d$ corresponds to \angle _____.
2. $\angle b$ forms a straight angle with \angle _____ and \angle _____.
3. $\angle c$ is a same-side interior angle with \angle _____.
4. $\angle c$ is an alternate interior angle with \angle _____.
5. $\angle f$ is vertical to \angle _____.



Find the measure of each numbered angle.

6. $\angle 1 =$ _____
7. $\angle 2 =$ _____
8. $\angle 3 =$ _____
9. $\angle 4 =$ _____
10. $\angle 5 =$ _____
11. $\angle 6 =$ _____
12. $\angle 7 =$ _____



Check

Name or find the measure of the angle as indicated.

13. $\angle j$ is vertical to \angle _____.
14. $\angle f$ corresponds to \angle _____.
15. $\angle g$ is a same-side interior angle with \angle _____.
16. $\angle k$ is an alternate interior angle with \angle _____.
17. The measure of $\angle 1$ is _____.
18. The measure of $\angle 2$ is _____.
19. The measure of $\angle 3$ is _____.
20. The measure of $\angle 4$ is _____.

