

Mathematics

Angles

Downloadable Resource – Alternate angles.

Mr. Thomas

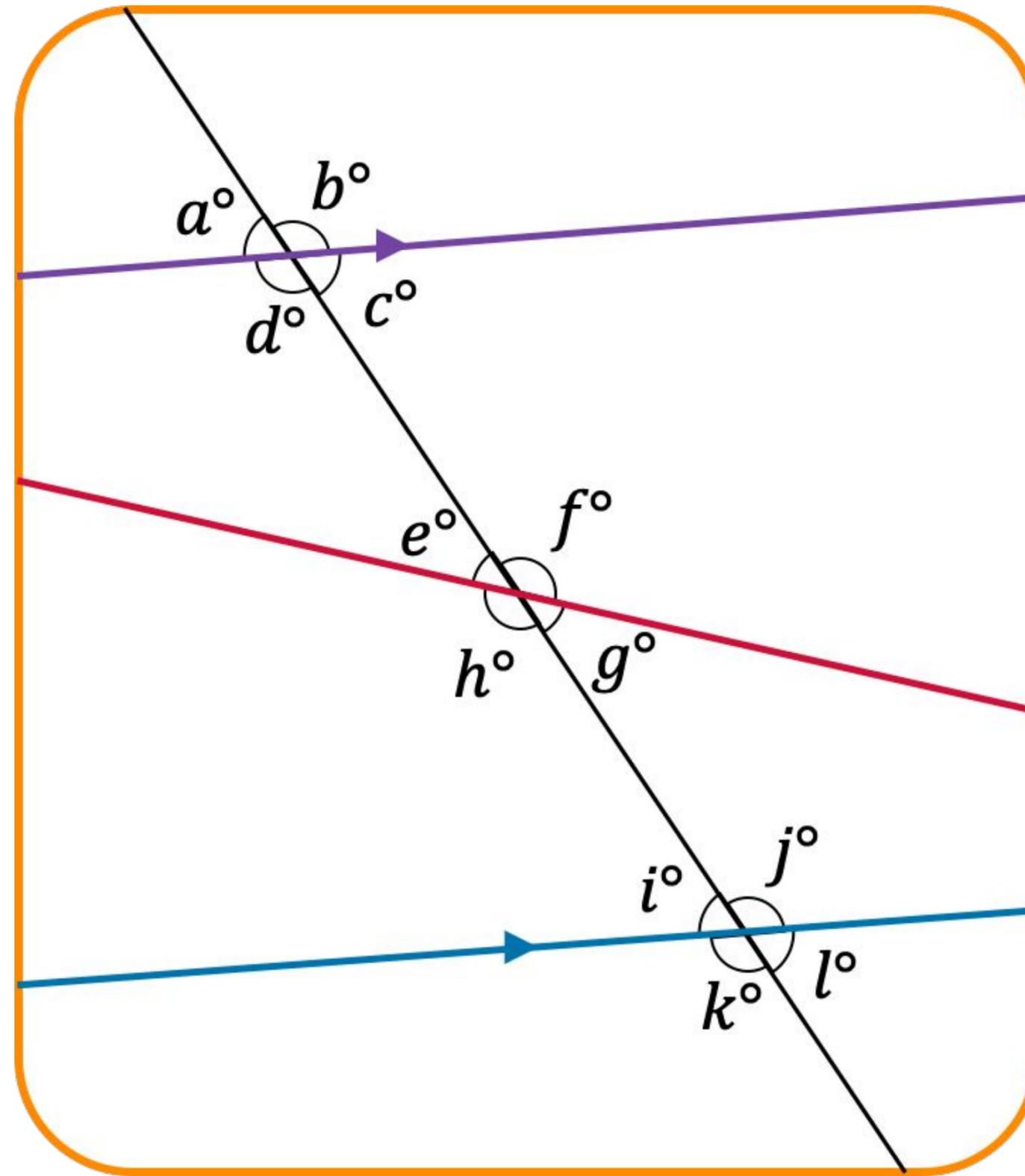


Try this

Measure each of the marked angles.

Which of them are equal?

Identify the pairs of vertically opposite angles.

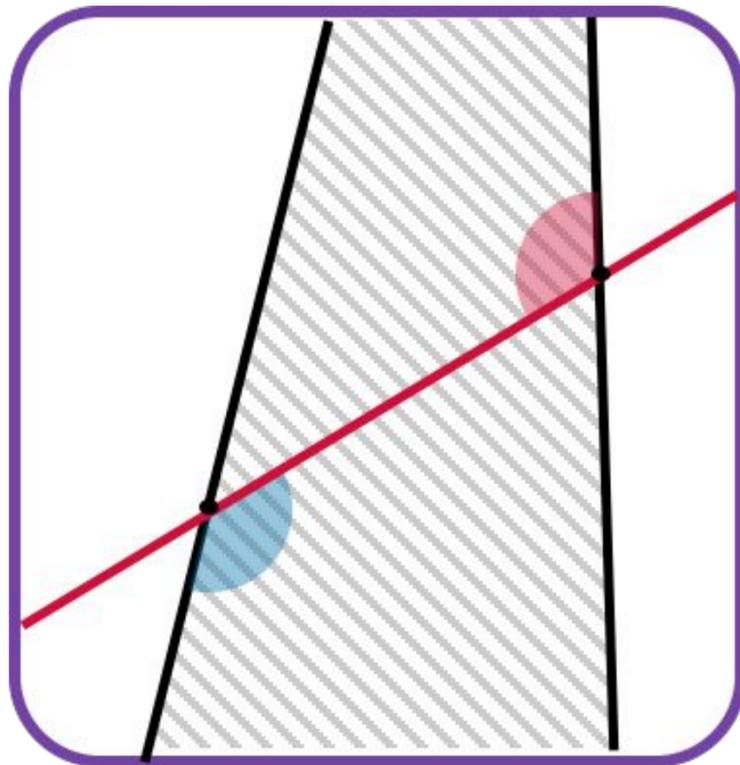


Connect

A pair of angles at different intersection points with a transversal are called **alternate** if they...

A lie on different sides of a transversal.

B are in the same 'region'.

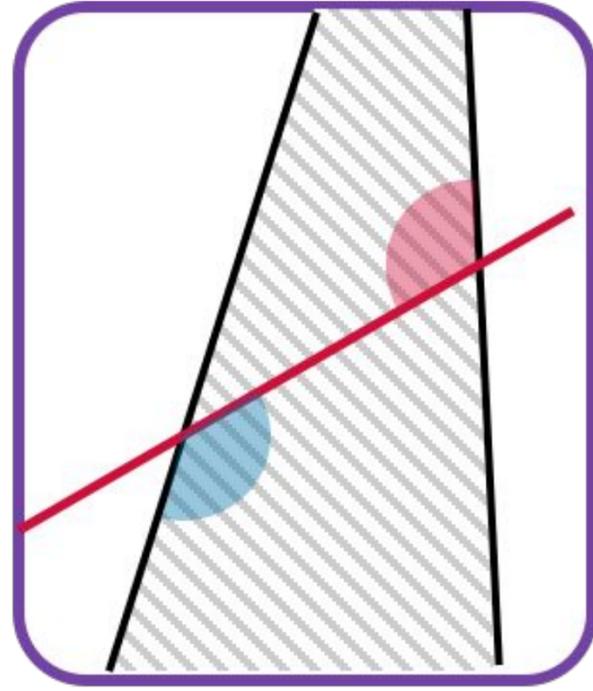
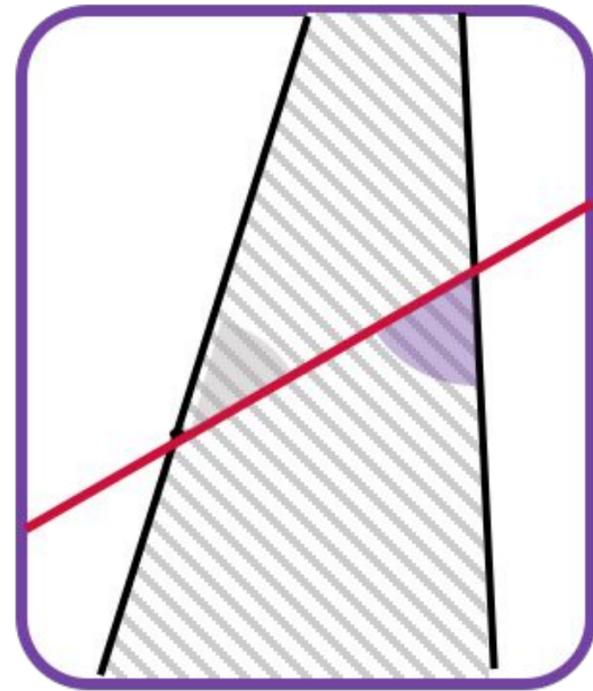


Both angles are in the interior region.

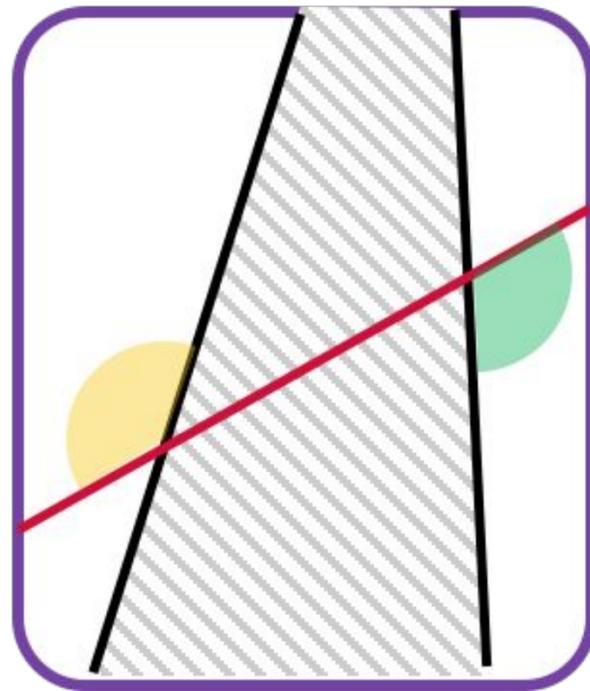
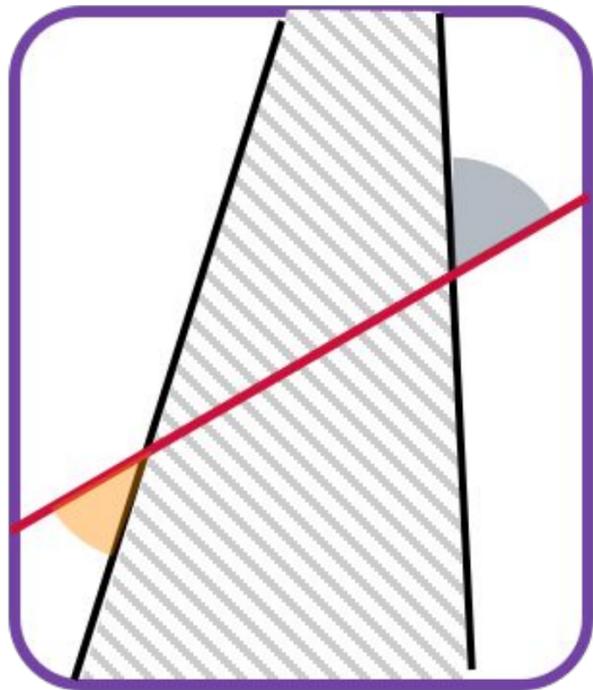
Lets now identify **all** the other pairs of angles that meet this criteria...



Connect



Alternate **interior** angles.



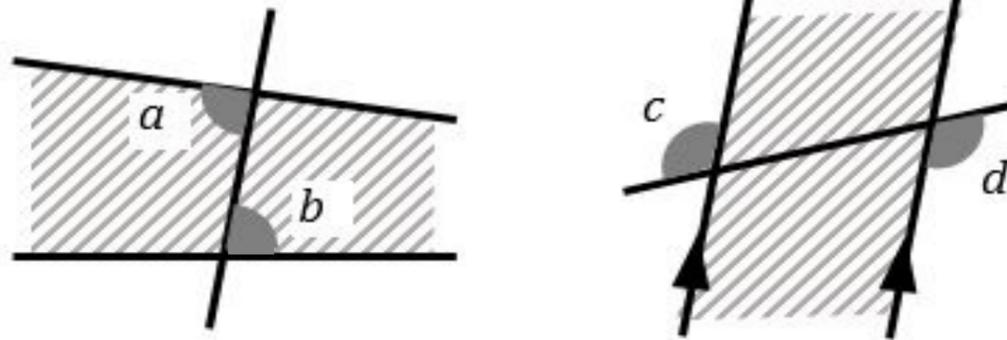
Alternate **exterior** angles.



Independent Task

Fill in the blanks for the following exercise. You may want to go back in the video for some help.

Concept Corner



Angles ___ and ___ are alternate interior angles.
Angles ___ and ___ are alternate exterior angles.
Angles ___ and ___ are equal in size.

<i>a</i>	<i>c</i>	equal
<i>b</i>	<i>d</i>	same
<i>c</i>		opposite
<i>d</i>		alternate

Angles formed by a transversal that are in the _____ region, but are on _____ sides of the transversal are called _____ angles.

Alternate angles formed in **parallel** lines are _____ in size.



Explore

For each diagram, identify any pairs of **alternate angles**.
Calculate the missing values.

