math Antics Worksheets

Name:

Date:

Measuring Angles

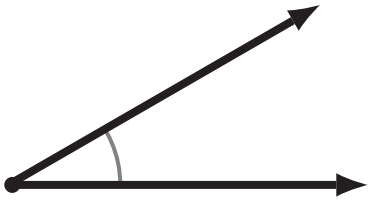
G-AAD 1

Instructions: Use a protractor to measure how many degrees each angle is. If you don't have a protractor, then just estimate and see how close you got.

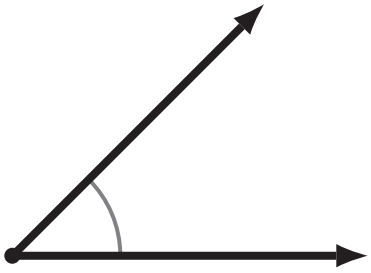
1

15°

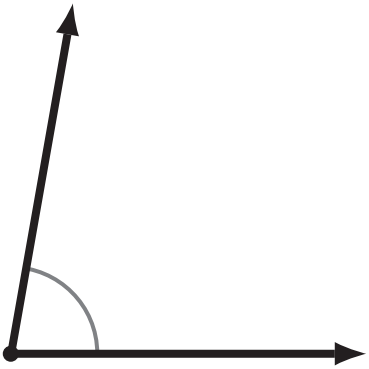
2



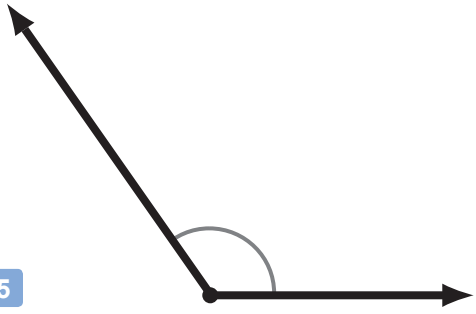
3



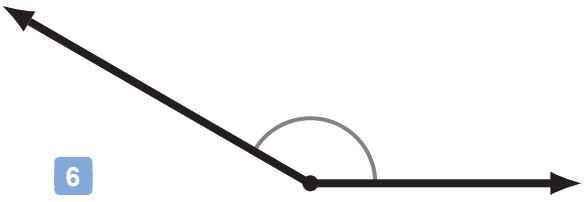
4



5



6



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Name:

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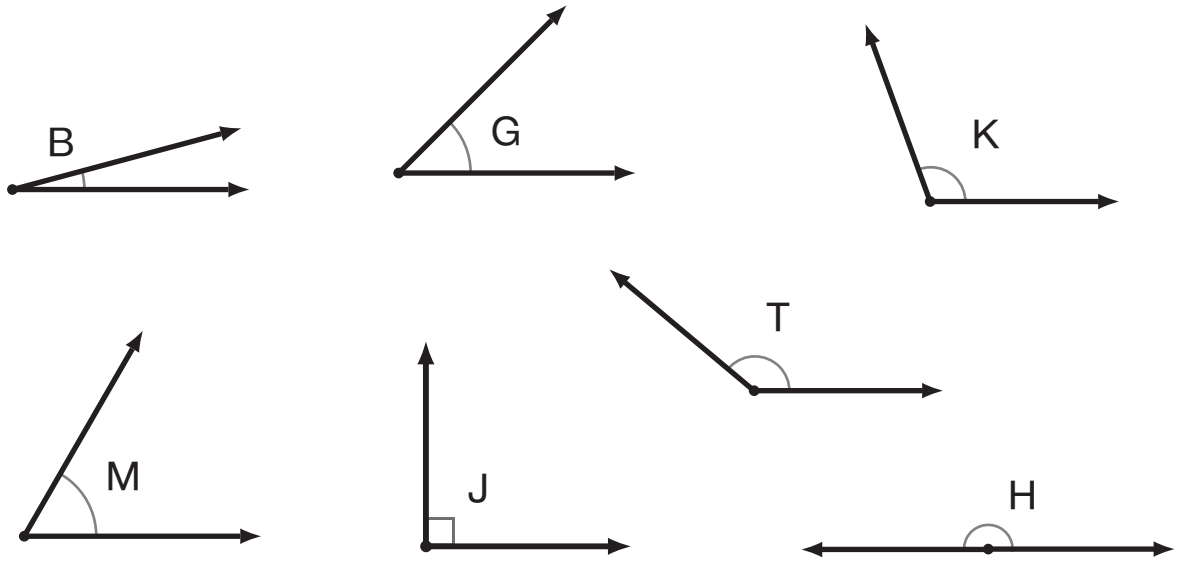
Comparing Angles

G-AAD 2

Instructions: Use the greater-than '>' and less-than '<' signs to compare these angles. (If you have trouble comparing the angles visually, you can use a protractor to measure them.)



1. ∠B < ∠G
2. ∠J ◯ ∠G
3. ∠M ◯ ∠B
4. ∠T ◯ ∠H
5. ∠J ◯ ∠K
6. ∠J ◯ ∠H
7. ∠T ◯ ∠M
8. ∠K ◯ ∠G
9. ∠G ◯ ∠M
10. ∠T ◯ ∠K

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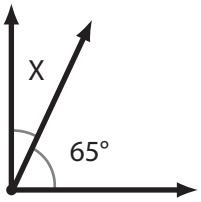
Finding an Unknown Angle

G-AAD 3

Instructions: For each set of complementary or supplementary angles, find the unknown angle (X).

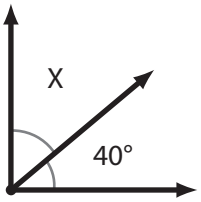
1



m∠X = 25°

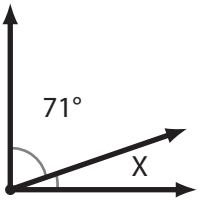
8 1
90
- 65
25

2



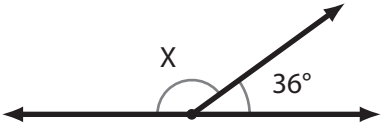
m∠X = _____

3



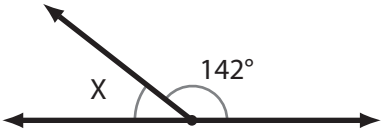
m∠X = _____

4



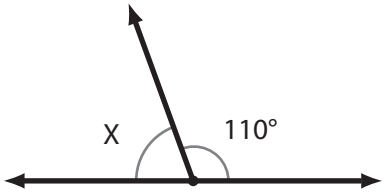
m∠X = _____

5



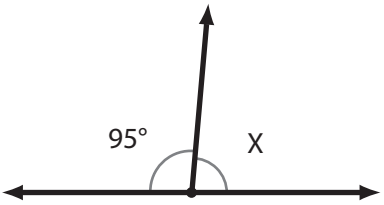
m∠X = _____

6



m∠X = _____

7



m∠X = _____

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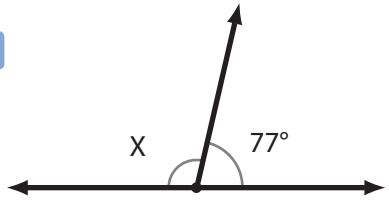
Date: _____

Finding an Unknown Angle - Set 2

G-AAD 4

Instructions: For each set of complementary or supplementary angles, find the unknown angle (X).

1

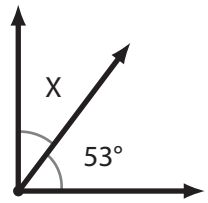


m∠X = _____

2

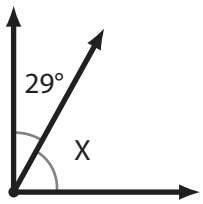
m∠X = _____

3



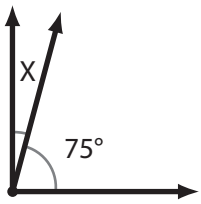
m∠X = _____

4



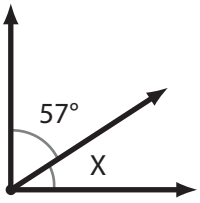
m∠X = _____

5



m∠X = _____

6



m∠X = _____

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Name: _____

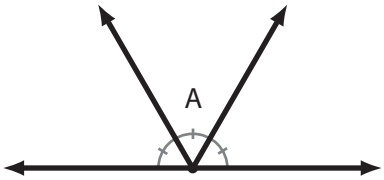
Date: _____

Finding an Unknown Angle - Set 3

G-AAD 5

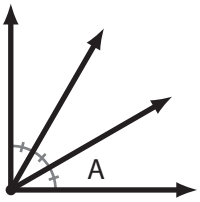
Instructions: Find the unknown angle (A). These problems are a little more tricky, so if you have trouble, ask someone for help or check the answer key to see the solutions.

1 This supplementary angle is divided into three **equal** parts.



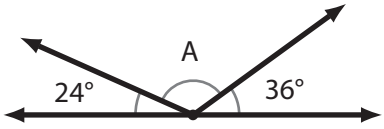
m∠A = _____

2 This complementary angle is divided into three **equal** parts.



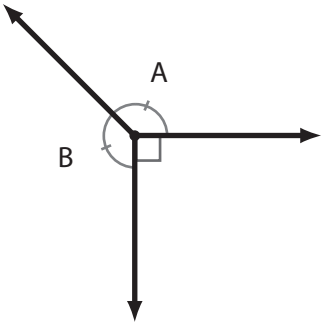
m∠A = _____

3



m∠A = _____

4 m∠A = m∠B



m∠A = _____

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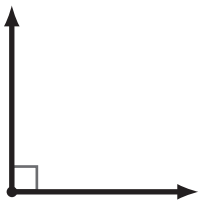
math Antics
Exercises

Name:

Date:

Angles and Degrees

1 What is the size of this angle in degrees?

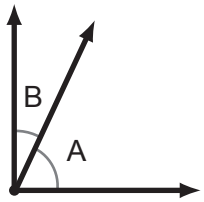


_____

2 What is the size of this angle in degrees?

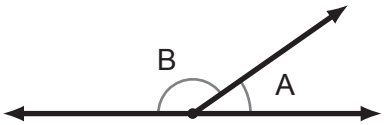
_____

3 Find the unknown angle.



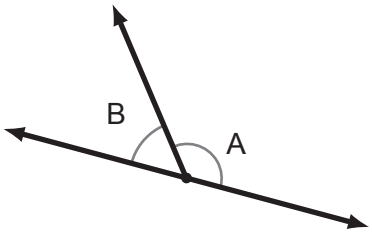
∠A and ∠B are complementary angles.
If ∠A is 65 degrees, how big is ∠B ?

4 Find the unknown angle.



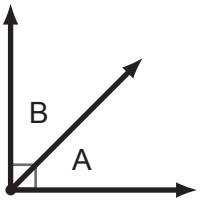
∠A and ∠B are supplementary angles.
If ∠A is 35 degrees, how big is ∠B ?

5 Find the unknown angle.



If ∠A is 128 degrees, how big is ∠B ?

6 Find the unknown angle.



If ∠A is the same size as ∠B ,
how big is ∠A ?

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Name:

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Measuring Angles

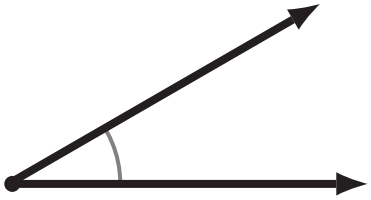
G-AAD 1

Instructions: Use a protractor to measure how many degrees each angle is. If you don't have a protractor, then just estimate and see how close you got.

1

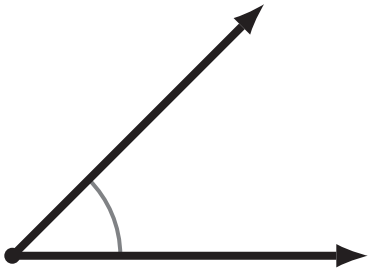
15°

2



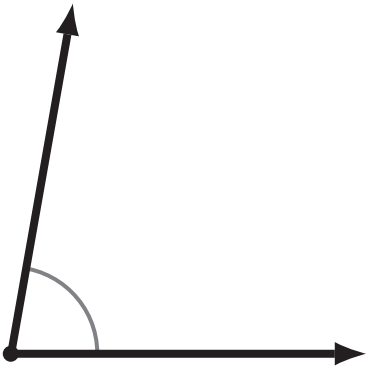
30°

3



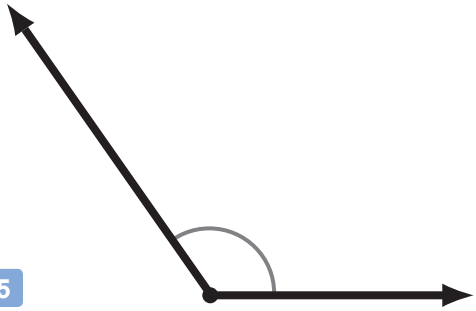
45°

4



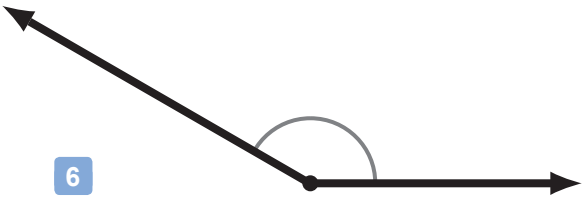
80°

5



125°

6



150°

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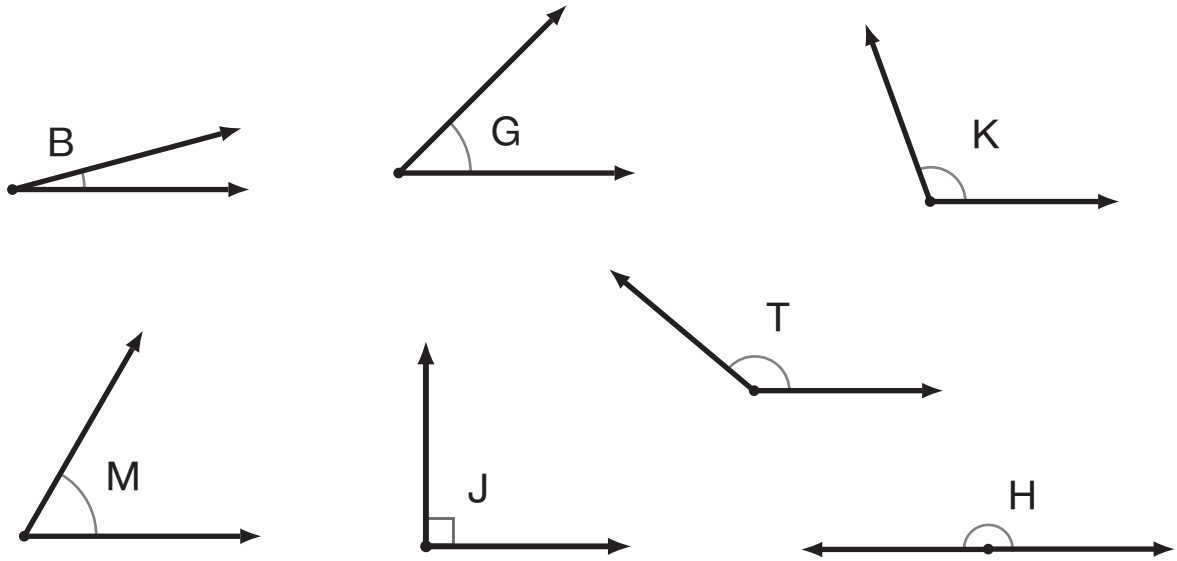
Comparing Angles

G-AAD 2

Instructions: Use the greater-than '>' and less-than '<' signs to compare these angles. (If you have trouble comparing the angles visually, you can use a protractor to measure them.)



1. ∠B < ∠G
2. ∠J > ∠G
3. ∠M > ∠B
4. ∠T < ∠H
5. ∠J < ∠K
6. ∠J < ∠H
7. ∠T > ∠M
8. ∠K > ∠G
9. ∠G < ∠M
10. ∠T > ∠K

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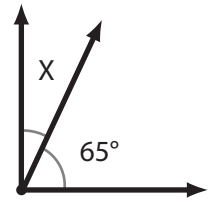
Finding an Unknown Angle

G-AAD 3

Instructions: For each set of complementary or supplementary angles, find the unknown angle (X).

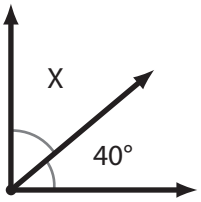
1



m∠X = 25°

$$\begin{array}{r} \overset{8}{\cancel{9}}\overset{1}{0} \\ -\ 65 \\ \hline 25 \end{array}$$

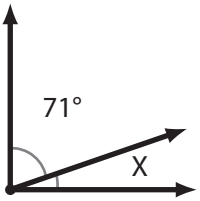
2



m∠X = 50°

$$\begin{array}{r} 90 \\ -\ 40 \\ \hline 50 \end{array}$$

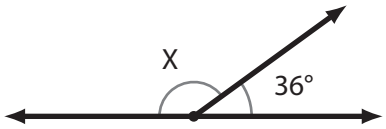
3



m∠X = 19°

$$\begin{array}{r} \overset{8}{\cancel{9}}\overset{1}{0} \\ -\ 71 \\ \hline 19 \end{array}$$

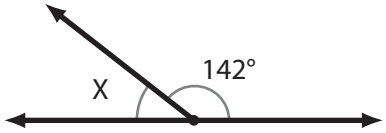
4



m∠X = 144°

$$\begin{array}{r} \overset{7}{1}\overset{1}{\cancel{8}}0 \\ -\ 36 \\ \hline 144 \end{array}$$

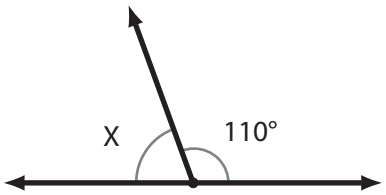
5



m∠X = 38°

$$\begin{array}{r} \overset{7}{1}\overset{1}{\cancel{8}}0 \\ -142 \\ \hline 38 \end{array}$$

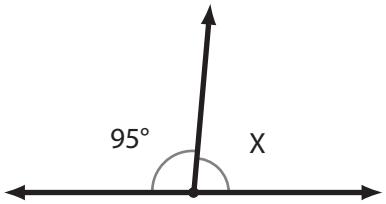
6



m∠X = 70°

$$\begin{array}{r} 180 \\ -110 \\ \hline 70 \end{array}$$

7



m∠X = 85°

$$\begin{array}{r} \overset{17}{\cancel{1}}\overset{1}{\cancel{8}}0 \\ -\ 95 \\ \hline 85 \end{array}$$

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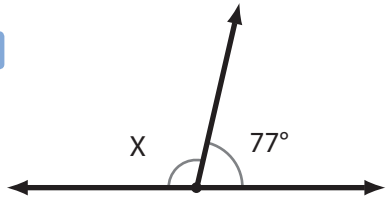
Finding an Unknown Angle - Set 2

G-AAD 4

Instructions: For each set of complementary or supplementary angles, find the unknown angle (X).

1



m∠X = 103°

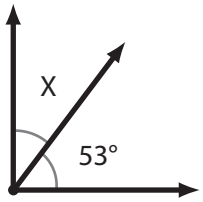
$$\begin{array}{r} {}^{7}\cancel{1}{}^{1}\cancel{8}0 \\ -\ 77 \\ \hline 103 \end{array}$$

2

m∠X = 18°

$$\begin{array}{r} {}^{7}\cancel{1}{}^{1}\cancel{8}0 \\ -\ 162 \\ \hline 18 \end{array}$$

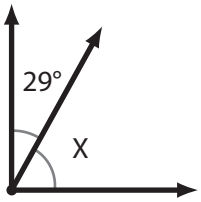
3



m∠X = 37°

$$\begin{array}{r} {}^{8}\cancel{9}{}^{1}0 \\ -\ 53 \\ \hline 37 \end{array}$$

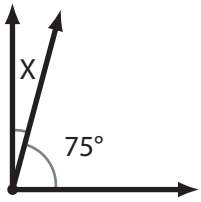
4



m∠X = 61°

$$\begin{array}{r} {}^{8}\cancel{9}{}^{1}0 \\ -\ 29 \\ \hline 61 \end{array}$$

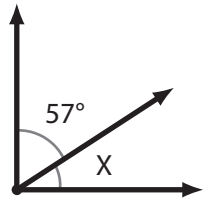
5



m∠X = 15°

$$\begin{array}{r} {}^{8}\cancel{9}{}^{1}0 \\ -\ 75 \\ \hline 15 \end{array}$$

6



m∠X = 33°

$$\begin{array}{r} {}^{8}\cancel{9}{}^{1}0 \\ -\ 57 \\ \hline 33 \end{array}$$

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math Antics Worksheets

Name: _____

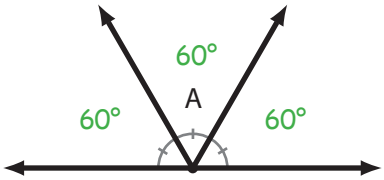
Date: _____

Finding an Unknown Angle - Set 3

G-AAD 5

Instructions: Find the unknown angle (A). These problems are a little more tricky, so if you have trouble, ask someone for help or check the answer key to see the solutions.

1 This supplementary angle is divided into three **equal** parts.



m∠A = 60°

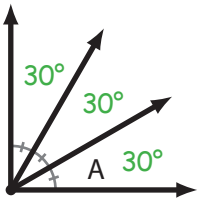
3A = 180°

so

A = 180 ÷ 3

A = 60

2 This complementary angle is divided into three **equal** parts.



m∠A = 30°

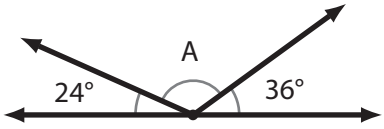
3A = 90°

so

A = 90 ÷ 3

A = 30

3



m∠A = 120°

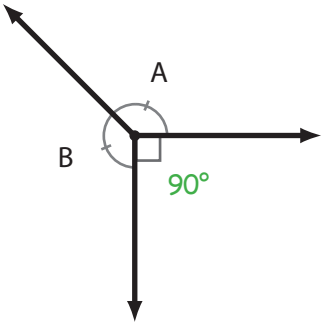
A + 24 + 36 = 180°

A + 60 = 180°

A = 180 - 60

A = 120

4 m∠A = m∠B



m∠A = 135°

The total of A and B must be 270° because 360° - 90° = 270° (remember that a full circle is 360° and a right angle is 90°)
And since we know that A and B are equal, A must be half of 270°

A = 270 ÷ 2

A = 135

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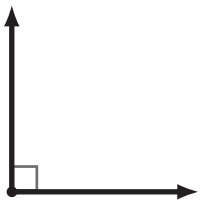
math Antics Exercises

Name:

Date:

Angles and Degrees

1 What is the size of this angle in degrees?

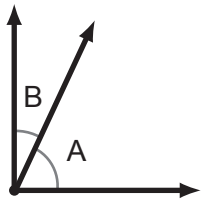


90°

2 What is the size of this angle in degrees?

180°

3 Find the unknown angle.

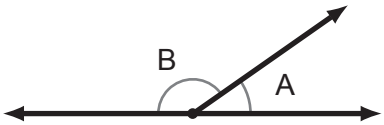


∠A and ∠B are complementary angles.
If ∠A is 65 degrees, how big is ∠B ?

$$\begin{array}{r} \overset{8}{\cancel{9}}\overset{1}{0} \\ -\ 65 \\ \hline 25 \end{array}$$

m∠B = 25°

4 Find the unknown angle.

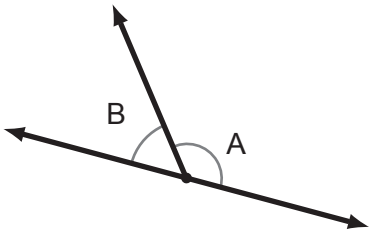


∠A and ∠B are supplementary angles.
If ∠A is 35 degrees, how big is ∠B ?

$$\begin{array}{r} \overset{7}{1}\overset{1}{\cancel{8}}0 \\ -\ 35 \\ \hline 145 \end{array}$$

m∠B = 145°

5 Find the unknown angle.

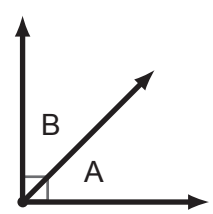


If ∠A is 128 degrees, how big is ∠B ?

$$\begin{array}{r} \overset{7}{1}\overset{1}{\cancel{8}}0 \\ -\ 128 \\ \hline 52 \end{array}$$

m∠B = 52°

6 Find the unknown angle.



If ∠A is the same size as ∠B ,
how big is ∠A ?

If A and B are equal, then they must each be half of the total. Since they form a Right Angle, the total must be 90 degrees, so Angle A is half of 90. which is 45 degrees!

m∠B = m∠A = 45°

See Video for step-by-step solutions to each problem.

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