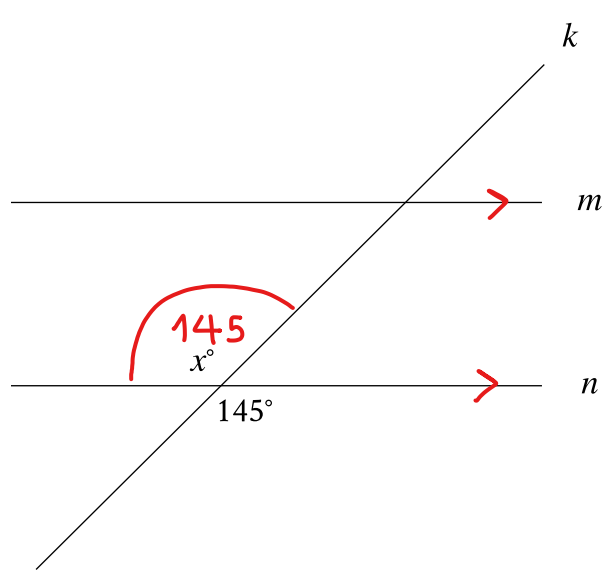


Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 4ee3fb4a



Note: Figure not drawn to scale.

In the figure, line m is parallel to line n , and line k intersects both lines. Which of the following statements is true?

- A. The value of x is less than 145.
- B. The value of x is greater than 145.
- C. The value of x is equal to 145.
- D. The value of x cannot be determined.

Question ID 6e95d2bc

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 6e95d2bc

In $\triangle RST$, the measure of $\angle R$ is 63° . Which of the following could be the measure, in degrees, of $\angle S$?

- ~~A. 116~~
- B. 118
- C. 126
- D. 180

$180 - 63 = 117$

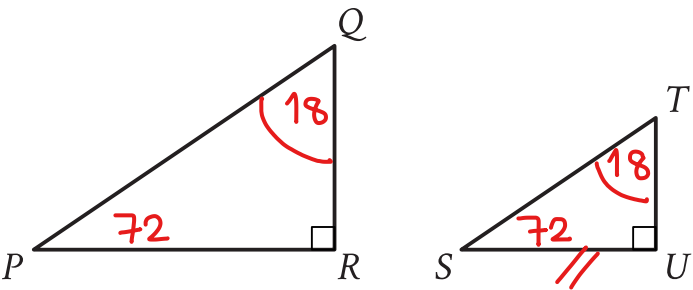
$S + T = 117$

$S, T > 0$

Question ID f963d751

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: f963d751



Note: Figures not drawn to scale.

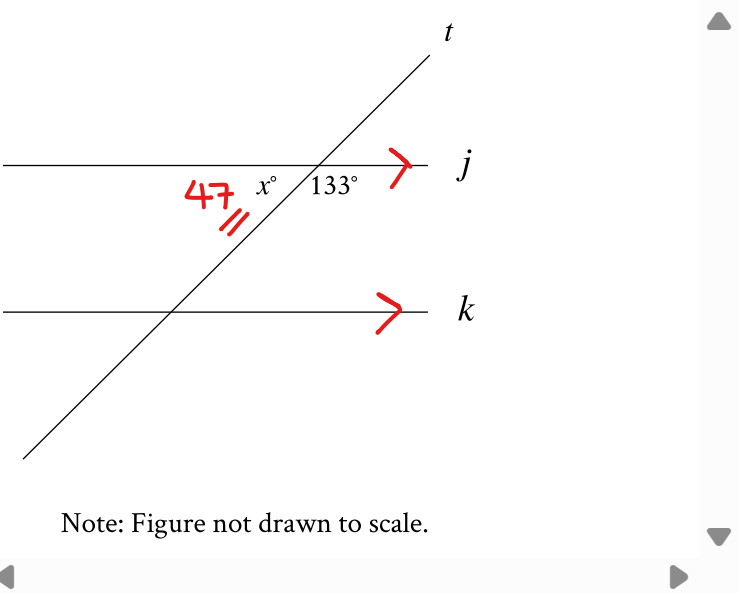
Right triangles PQR and STU are similar, where P corresponds to S . If the measure of angle Q is 18° , what is the measure of angle S ?

- A. 18°
- ~~B. 72°~~
- C. 82°
- D. 162°

Question ID ea980ef3

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: ea980ef3

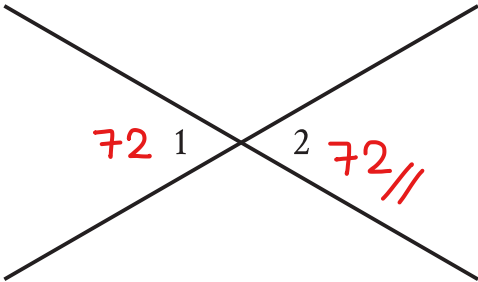


In the figure, line j is parallel to line k . What is the value of x ?

Question ID 34dd43dc

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 34dd43dc



Note: Figure not drawn to scale.

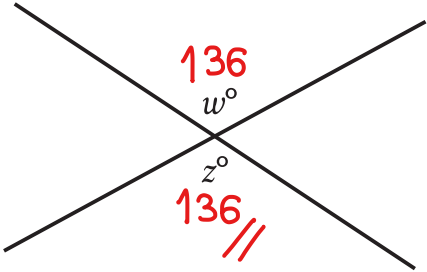
In the figure, two lines intersect at a point. Angle **1** and angle **2** are vertical angles. The measure of angle **1** is **72°**. What is the measure of angle **2**?

- ☒ A. 72°
- ☐ B. 108°
- ☐ C. 144°
- ☐ D. 288°

Question ID 9a00b5dc

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 9a00b5dc



Note: Figure not drawn to scale.

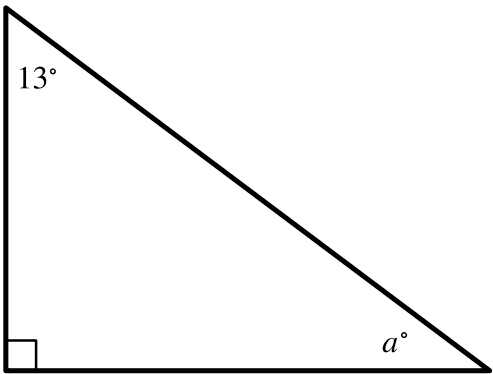
In the figure, two lines intersect at a point. If $w = 136$, what is the value of z ?

- A. 36
- B. 44
- C. 68
- ~~D. 136~~

Question ID 1540f856

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 1540f856



Note: Figure not drawn to scale.



In the right triangle shown, what is the value of a ?

- A. 13
- B. 77
- C. 90
- D. 103

Question ID aac3872b

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: aac3872b

In triangle ABC , the measure of angle B is 52° and the measure of angle C is 17° . What is the measure of angle A ?

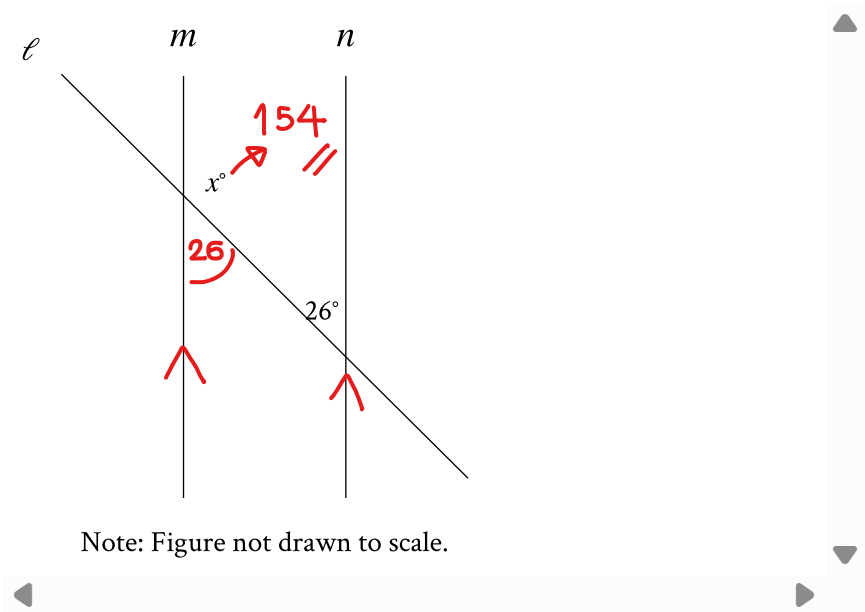
- A. 21°
- B. 35°
- C. 69°
- ~~D. 111°~~

$180 - 52 - 17 = 111 //$

Question ID f47594d0

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: f47594d0



In the figure shown, line m is parallel to line n . What is the value of x ?

- A. 13
- B. 26
- C. 52
- ~~D. 154~~

Question ID 1c55945b

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 1c55945b

In $\triangle XYZ$, the measure of $\angle X$ is 23° and the measure of $\angle Y$ is 66° . What is the measure of $\angle Z$?

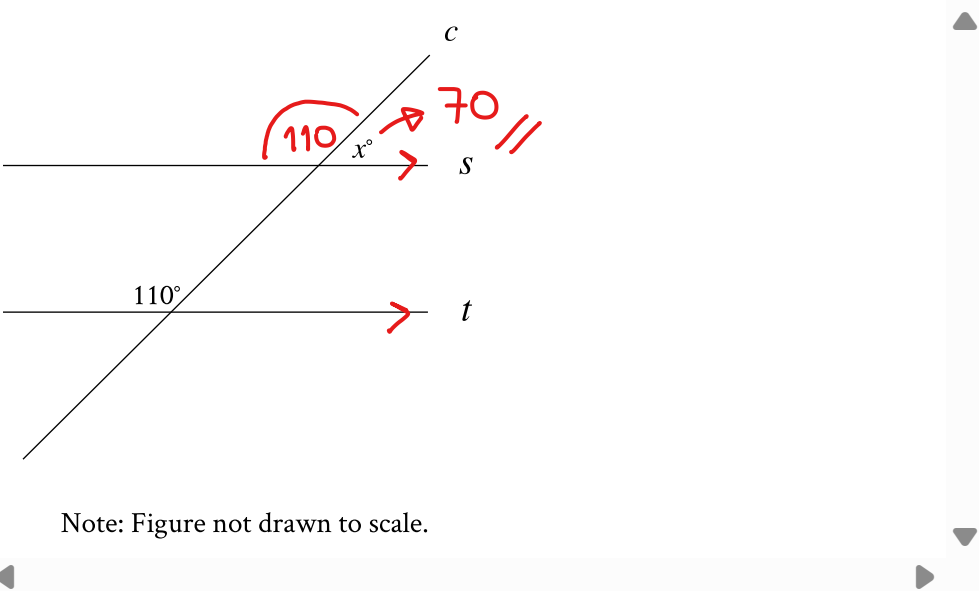
- A. 43°
- B. 89°
- ~~C. 91°~~
- D. 179°

$180 - 23 - 66 = 91 //$

Question ID 8e5cbda2

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 8e5cbda2



In the figure shown, line c intersects parallel lines s and t . What is the value of x ?

Question ID e5cc491b

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: e5cc491b

In $\triangle XYZ$, the measure of $\angle X$ is 24° and the measure of $\angle Y$ is 98° . What is the measure of $\angle Z$?

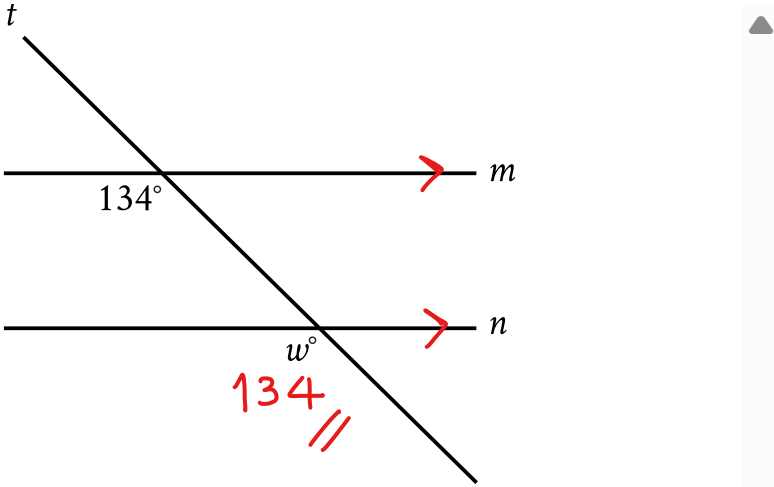
- X

58°
- B. 74°
- C. 122°
- D. 212°
- $$180 - 24 - 98 = 58 //$$

Question ID c655ab2f

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: c655ab2f



Note: Figure not drawn to scale.

In the figure, line *m* is parallel to line *n*. What is the value of *w*?

- A. 13
- B. 34
- C. 66
- ~~D. 134~~

Question ID 2384a4cb

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 2384a4cb

In triangle ABC , $AB = 4,680$ millimeters (mm) and $BC = 4,680$ mm. Which statement is sufficient to prove that triangle ABC is equilateral?

- ~~A. $AC = 4,680$ mm~~
- ~~B. $AC = 468$ mm~~
- ~~C. $AC = 46.8$ mm~~
- ~~D. $AC = 4.68$ mm~~

Question ID 6e2abed7

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 6e2abed7

In a right triangle, the measure of one of the acute angles is 51° . What is the measure, in degrees, of the other acute angle?

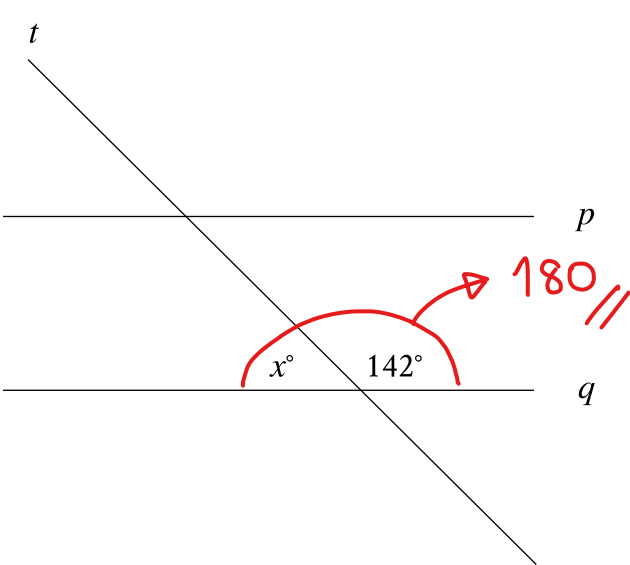
- A. 6
- ~~B. 39~~
- C. 49
- D. 51

$90 - 51 = 39 //$

Question ID 03bd81f1

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 03bd81f1



Note: Figure not drawn to scale.

In the figure, line p is parallel to line q , and line t intersects both lines. What is the value of $x + 142$?

- A. 52
- B. 90
- C. 142
- ~~D. 180~~

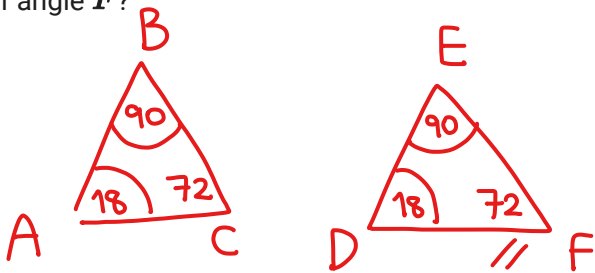
Question ID 027efe3c

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 027efe3c

Triangles ABC and DEF are congruent, where A corresponds to D , and B and E are right angles. The measure of angle A is 18° . What is the measure of angle F ?

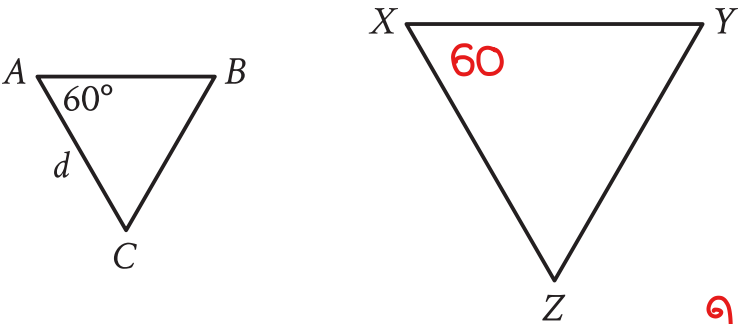
- A. 18°
- ~~X~~ B. 72°
- C. 90°
- D. 162°



Question ID 3543e575

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 3543e575



Note: Figures not drawn to scale.

ทำให้กว้างขึ้น

For the triangles shown, triangle ABC is dilated by a scale factor of 3 to obtain triangle XYZ , where $d = 16$. What is the measure, in degrees, of angle X ?

- A. 20
- B. 57
- ~~C. 60~~
- D. 63

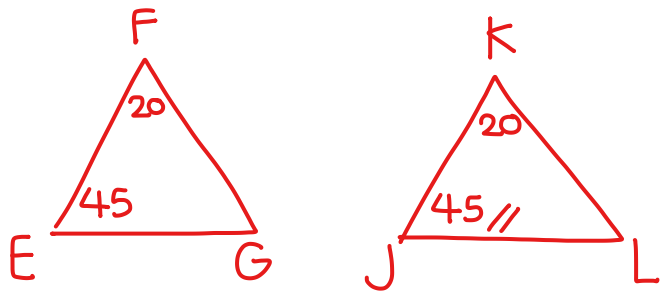
Question ID 40a475f8

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 40a475f8

Triangles EFG and JKL are congruent, where $E, F,$ and G correspond to $J, K,$ and L , respectively. The measure of angle E is 45° and the measure of angle F is 20° . What is the measure of angle J ?

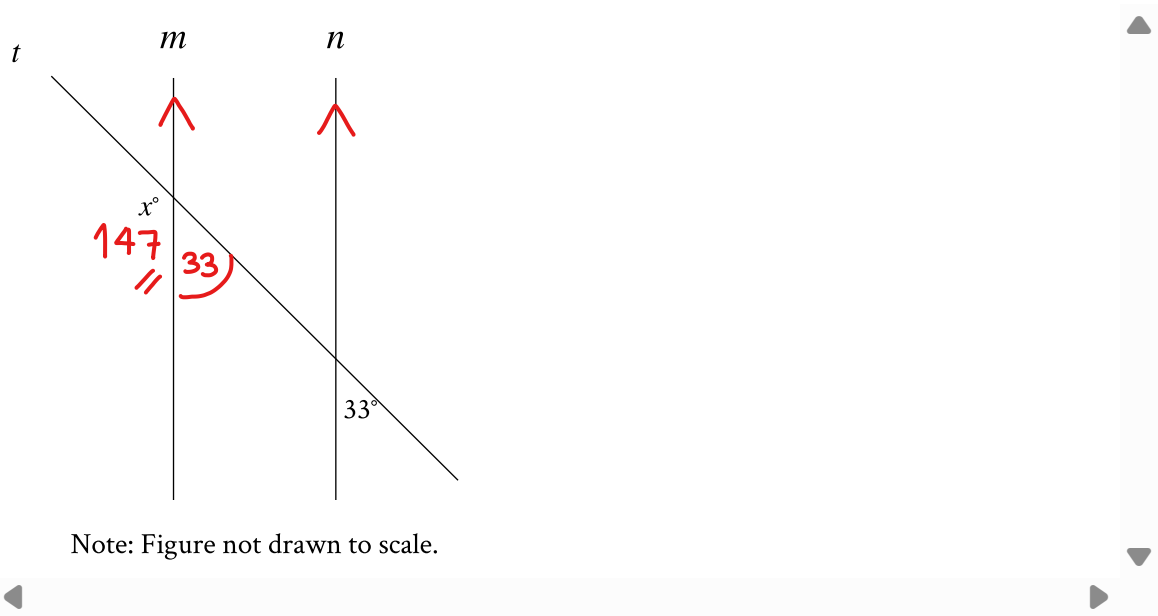
- A. 20°
- ~~X~~ B. 45°
- C. 135°
- D. 160°



Question ID 6baaa5b3

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 6baaa5b3



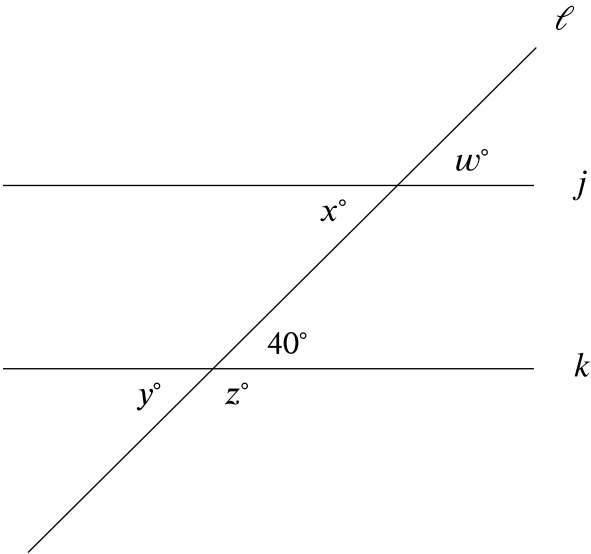
In the figure, line *m* is parallel to line *n*, and line *t* intersects both lines. What is the value of *x*?

- A. 33
- B. 57
- C. 123
- ~~D. 147~~

Question ID 8773f193

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 8773f193



Note: Figure not drawn to scale.

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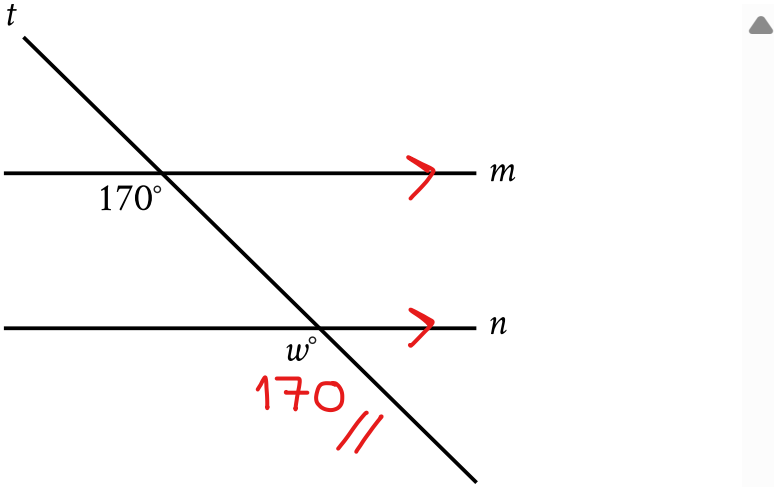
In the figure shown, line ℓ intersects lines j and k . Which additional piece of information is sufficient to prove that lines j and k are parallel?

- ~~A. $w = 40$~~
- B. $x = 140$
- C. $y = 40$ ~~X~~
- D. $z = 140$ ~~X~~

Question ID e01724ba

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: e01724ba



Note: Figure not drawn to scale.

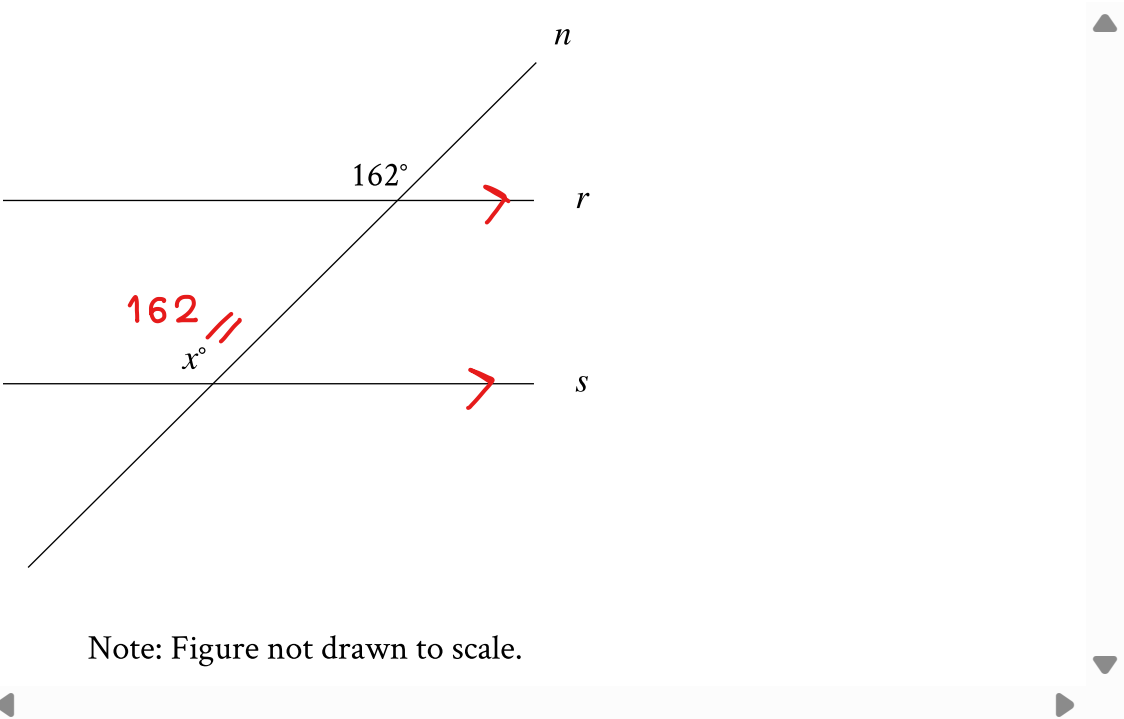
In the figure, line m is parallel to line n. What is the value of w?

- A. 17
- B. 30
- C. 70
- ~~D. 170~~

Question ID 08049d70

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Geometry and Trigonometry	Lines, angles, and triangles	Easy

ID: 08049d70



In the figure, line n intersects lines r and s . Line r is parallel to line s . What is the value of x ?