English Spanish

9 Standardized Test Practice

Test-Taking Strategy
Use Intelligent Guessing

1. Mercury's distance to the Sun is approximately 5.79×10^7 kilometers. Write this distance in standard form.

A. 5,790,000,000 km

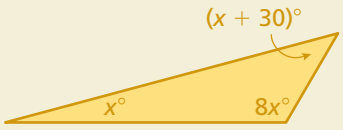
B. 579,000,000 km

C. 57,900,000 km

D. 5,790,000 km

2. The steps Jim took to answer the question are shown below. What should Jim change to correctly answer the question?

How many degrees are in the largest angle in the triangle below?



$x + 8x + x + 30 = 180$

$10x = 150$

$x = 15$

F. The left side of the equation should equal 360° instead of 180°.

G. The sum of the acute angles should equal 90°.

H. Evaluate the smallest angle when $x = 15$.

I. Evaluate the largest angle when $x = 15$.

3. Which expression is equivalent to the expression below?

$$2^4 2^3$$

A. 2^{12}

B. 4^7

C. 48

D. 128

4. Your mean score for four rounds of golf was 71. Your scores on the first three rounds were 76, 70, and 70. What was your score on the fourth round?

5. The temperature in Frostbite Falls has never been above 38 degrees Fahrenheit. Let t represent the temperature, in degrees Fahrenheit. Write this as an inequality.

F. $t < 38$

G. $t \leq 38$

H. $t > 38$

I. $t \geq 38$

6. A bank account pays interest so that the amount in the account doubles every 10 years. The account started with $5,000 in 1940. How much would be in the account in the year 2010?

A. $40,000

B. $320,000

C. $640,000

D. $1,280,000

7. Which expression is equivalent to $5\sqrt{5} + 2\sqrt{5}$?

F. $7\sqrt{5}$

G. $10\sqrt{5}$

H. $7\sqrt{10}$

I. $10\sqrt{10}$

8. The gross domestic product (GDP) is a way to measure how much a country produces economically in a year. The table below shows the approximate population and GDP for the United States.

Think Solve Explain

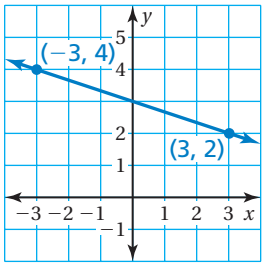
United States 2008	
Population	300 million (300,000,000)
GDP	14.4 trillion dollars ($14,400,000,000,000)

Part A Find the GDP per person for the United States. Show your work and explain your reasoning.

Part B Write the population and GDP using scientific notation.

Part C Find the GDP per person for the United States using your answers from Part B. Write your answer in scientific notation. Show your work and explain your reasoning.

9. What is the equation of the line shown in the graph?



A. $y = -\frac{1}{3}x + 3$

B. $y = \frac{1}{3}x + 1$

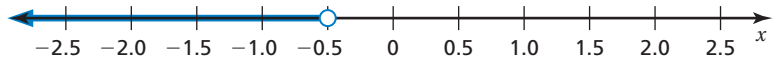
C. $y = -3x + 3$

D. $y = 3x - \frac{1}{3}$

10. Which graph represents the inequality shown below?

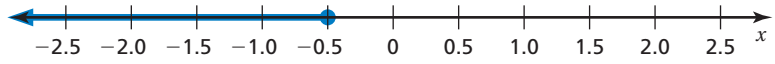
$$x - 1.5 \leq -1$$

F.

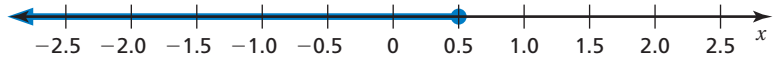


G.

H.



I.



11. Find $(-2.5)^{-2}$.

12. The director of a research lab wants to present data to donors, showing how a great deal of donated money is used for research and how only a small amount of money is used for other expenses. Which type of display is best suited for showing this data?

A. box-and-whisker plot

B. circle graph

C. line graph

D. scatter plot

13. You earn \$14.75 per hour at your job. Your goal is to earn more than \$2000 next month. If you work h hours next month, which inequality represents this situation algebraically?

F. $14.75 + h > 2000$

G. $14.75 + h \geq 2000$

H. $14.75h > 2000$

I. $14.75h \geq 2000$