

SIERRA VISTA HIGH SCHOOL
MATHEMATICS DEPARTMENT

Nevada High School Mathematics
Practice Proficiency Exam
Mini-Test 13

1999
(10 Questions)



Practice Proficiency #13

Numbers and Operations

1. The "cube root of 125" is written as:

- A. 125^2
- B. 125^3
- C. 125^{-3}
- D. $\sqrt[3]{125}$
- E. $\sqrt{125}$

2. Omar went to a store where he found two sale items. Each item was originally marked at \$60.00. The first item was on sale for $\frac{1}{3}$ off the original price. The second item was on sale for 30% off of the original price. Which statement below is true?

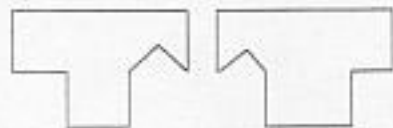
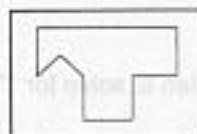
- A. The two items will cost the same.
- B. The first item will cost the most.
- C. The second item will cost the most.
- D. There is not enough information to determine which item costs the most.

3. Yesterday Robert spent $5\frac{1}{2}$ hours in school, $1\frac{3}{4}$ hours watching television, and 1 hour doing homework. How much total time did he spend on these activities?

- A. $7\frac{1}{2}$ hours
- B. $7\frac{1}{4}$ hours
- C. $8\frac{2}{3}$ hours
- D. $8\frac{1}{2}$ hours
- E. $8\frac{1}{4}$ hours

Measurement and Geometry

4. Which image is NOT a translation of the given figure?



A



B



C



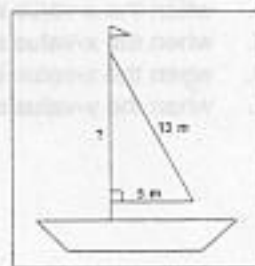
D



E

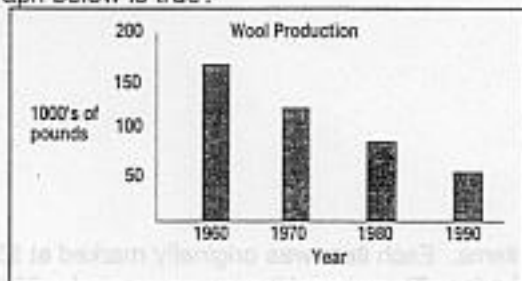
5. The longest side of a triangular sail measures 13 m, and the base of the sail is 5 m. What is the height of the sail?

- A. 5 m
- B. 8 m
- C. 10 m
- D. 12 m
- E. 13 m

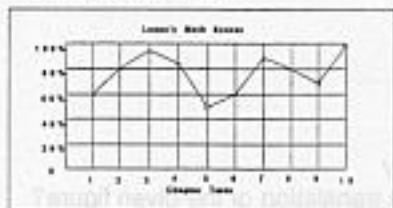


Data, Probability, and Statistics

6. Which of the statements about the relationship between wool production and time shown in the graph below is true?



- A. As time goes on, the amount of wool produced is increasing.
B. As time goes on, the amount of wool produced is decreasing.
C. There is no clear trend between wool production and time.
D. The amount of wool produced is cut in half about every 10 years.
E. The amount of wool produced is doubled about every 10 years.
7. There are two blue, one red, and two yellow marbles in a bag. One marble is chosen at random. What is the probability, expressed as a percent, that it will be blue?
- A. 10%
B. 20%
C. 40%
D. 75%
E. 100%
8. Below is a line graph of Lemar's test scores. Eighty percent is the cut off for a "B" in the class. How many times did Lemar get a "B" or better on his tests?



Algebra and Functions

9. How is $I = PRT$ rewritten to solve for T ?
- A. $T = I \div (PT)$
B. $T = I \div (PR)$
C. $T = I \div (PRT)$
D. $T = IPR$
E. $T = PR$
10. By examining the graph shown here, you can tell that:
- A. when the x-value is 0, the y-value is 10.
B. when the x-value is 10, the y-value is 20.
C. when the x-value is 20, the y-value is 40.
D. when the x-value is 30, the y-value is 30.
E. when the x-value is 40, the y-value is 0.

