CALIFORNIA ALGEBRA II · UNIT 4 · 10 QUESTIONS

Statistics, Probability, and Modeling — Practice Test

This practice test was made by AI and there may be mistakes. If a question or answer looks wrong, use the Flag a mistake button to let Brett know so he can fix it.

1 **The probability of three tails in three fair coin flips is**

- **A** $\frac{3}{8}$
- **B** $\frac{1}{8}$
- **C** $\frac{1}{4}$
- **D** $\frac{1}{2}$

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2 **A value of 90 has mean 80 and standard deviation 10. Its z-score is**

- A 1
- B 2
- C 0
- D 10

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3 **About what percent of normal values lie within 2 standard deviations of the mean?**

- A 99.7%
- B 50%
- C 95%
- D 68%

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4 **For the model y = 4x - 2, the predicted value when x = 5 is**

- A 20
- B 15
- C 18
- D 22

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5 **With 2 hats and 5 scarves, the number of combinations is**

- A 25
- B 10
- C 7
- D 2

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6 **A game pays $12 if a fair die shows 6 and $0 otherwise. The expected payout in dollars is**

- A 1
- B 12
- C 2
- D 6

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7 **A correlation of 0.95 describes**

- A a strong positive association
- B no association
- C a weak positive association
- D a strong negative association

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8 **An experiment assigns subjects at random to groups in order to**

- **A** guarantee a large sample
- **B** reduce the effect of confounding variables
- **C** remove all variation
- **D** increase the mean

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9 **The number of ways to arrange 3 different books in a row is**

ANSWER _____

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10 **The mean of 5, 15 is**

ANSWER _____

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ANSWER KEY

1.	B	**5.**	B	**9.**	6
2.	A	**6.**	C	**10.**	10
3.	C	**7.**	A		
4.	C	**8.**	B		

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