NPTEL » Applied Econometrics About the Course Ask a Question Announcements Progress Mentor Week 2:Assignment 2 Course outline How does an NPTEL online The due date for submitting this assignment has passed. course work? Due on 2021-08-18, 23:59 IST. As per our records you have not submitted this assignment. Week 0: 1) 1 point Which of the following are examples of Discreet Random variable? Week 01 a. How tall you are Week 02 Number of wrong answers in this assignment Lecture 13: Probability The pH level in a shampoo Distribution Number of goals scored in a football match Lecture 14: Double Structure of Variable Lecture 15: Probability a Distribution □ b (Discrete/Continuous Variable) Random Variable _ c □ d Lecture 16: Probability Mass Function (PMF), Probability No, the answer is incorrect. Density Function (PDF) Score: 0 Lecture 17: Expectation, Accepted Answers: Variance, Covariance d Lecture 18: Expectation, Variance, Covariance (Contd.) 2) 1 point If Y is a random variable, then E(Y) is Lecture 19: Covariance Rule Lecture 20: Bernoulli Geometric Mean Distribution Arithmetic Mean Lecture 21: Bernoulli Distribution (Contd.) Harmonic mean Lecture 22: Normal Approximation of Bernoulli d) None of the above Distribution Quiz: Week 2:Assignment 2 b Feedback for Week 2 0 c New Lesson \bigcirc d Week 03 No, the answer is incorrect. Week 04 Accepted Answers: Week 05: 3) 1 point Which of the following are examples of Discrete probability distribution? Week 06 Week 07 a) Poisson Distribution b) Normal distribution Week 08 Bernoulli Distribution Week 09 Binomial Distribution Week 10 Week 11 a _ b Week 12 С \Box d Course Material No, the answer is incorrect. **Download Videos** Accepted Answers: Assignment Solution d 4) 1 point Which of the following statements are CORRECT if A and B are two independent random variables? a. E(AB) = E(A) + E(B)b. Var(A - B) = Var(A) + Var(B)c. Cov(A, B) = 0d. Var(A + B) = Var(A) + Var(B)a \Box d No, the answer is incorrect. Score: 0 Accepted Answers: d 5) 1 point Tata is planning to launch a new Electric Car, and expects the first-quarter net profit to be Rs. 30 lakhs for bullish market condition, and Rs. 10 lakhs for average market condition. It also expects that market can be bearish and it may incur a loss of Rs. 10 lakhs. The chance of market being bullish, bearish and average is 25%, 35% and 40%, respectively What is the expected value and standard deviation of the first quarter net profit for the car? a) Rs. 4 lakhs, Rs. 12.4 lakhs b) Rs. 8 lakhs, Rs. 15.4 lakhs Rs. 4 lakhs, Rs. 10.2 lakhs d) Rs. 8 lakhs, Rs. 10.2 lakhs O a O b 0 c \bigcirc d No, the answer is incorrect. Score: 0 Accepted Answers: 6) 1 point In an econometrics MCQ test there are 3 questions with four choices each and only one of the choices is correct. A student answers the MCQ randomly without any knowledge about the answers. What is the probability that at least two of the answers will be correct? a) 0.50 b) 0.157 c) 0.175 d) 0.255 \bigcirc b 0 c \bigcirc d No, the answer is incorrect. Accepted Answers: 1 point 7) Which of the following statements are correct? The probability mass function can be negative sometimes. b. Probability Mass function uses continuous random variables c. Probability Mass function uses discreet random variables d. Probability density function uses continuous random variables a □ b С \Box d No, the answer is incorrect. Score: 0 Accepted Answers: d 8) 1 point If X is a random variable and c is constant, which of the following are false? a. Var(X+c) = Var(X) + cb. Var(cX) = cVar(X)c. E(cX) = cE(X)d. E(X + c) = E(X) + ca d d No, the answer is incorrect. Score: 0 Accepted Answers: b 9) 1 point Identify the false claim about binomial distribution. Mean is always greater than its variance Nature of random variable is continuous Each trial is independent d. Sampling without replacement is assumed a □ b С _ d No, the answer is incorrect. Score: 0 Accepted Answers: 10) 1 point A and B are two random variables with expected values 20 and 30 respectively. The variance of A is 49 and the variance of B is 64. The covariance between A and B is (-13). What is the value of Var(A-B)? a. 100 b. 87 c. 139 d. 76 O a \bigcirc b Ос \bigcirc d No, the answer is incorrect. Accepted Answers: