

Name _____

Serial # _____

SHORT ANSWER. Write the word or phrase that best completes each statement or answers the question.

1) If events E and F are independent with $P(E) = 0.3$ and $P(F) = 0.5$, find $P(E \cap F)$.

2) Ten tickets numbered from 1 to 10 are placed in a hat. If two tickets are randomly drawn with replacement, find the probability the sum is 15.

3) If $P(E|F) = \frac{1}{2}$, $P(E \cup F) = \frac{9}{10}$, and $P(E \cap F) = \frac{2}{5}$, determine if E and F are independent or dependent.