

Example 3

In Lotto 6/49, 6 different numbers must be selected from the numbers 1 to 49. Calculate the odds against winning first prize.

Example 4

Three people form a queue at a grocery store. What is the probability that they line up in descending order of age?

Example 5

Nine horses are entered in a race. In an attempt to predict the finish of the race, three horses are selected by lot to finish first, second and third. What is the probability that the choice is correct?

Example 6

A committee of five people is to be selected from ten males and eight females. What is the probability that there are exactly three males on the committee?

Example 7

The school yearbook is to be produced by a student staff of two boys and three girls, chosen by lot from five boys and six girls. One of the boys is the boyfriend of one of the girls. What is the probability that both will be chosen to be on the editorial staff of the yearbook?