

Application_Grade-9_Probability

Empirical Probability of Events

1. There are 13 girls and 15 boys in a line. If one student is chosen at random, then find the probability that he is a boy.
2. In a group of 70 persons there are 15 boys, 20 girls, 30 men and rest women. Find the probability that a selected person is a woman.
3. A survey of 500 families was conducted to know their opinion about a particular detergent powder. If 375 families liked the detergent powder and the remaining families disliked it, find the probability that a family chosen at random :
 - (i) Like the detergent powder
 - (ii) Does not like it
4. In a cricket match, a batsman hits boundary in 20% of the balls he played. Find the probability that he did not hit a boundary.
5. A box contains 50 bolts and 150 nuts. On checking the box, it was found that half of the bolts and half of the nuts are rusted. If one item is chosen at random, find the probability that it is rusted.
6. Some bags of rice containing the following weights of rice (in kg) : 4.97, 3.999, 5.05, 5.08, 5.03, 5.00, 4.35, 5.06, 5.00, 5.07, 5.04, 5.00, 4.098, 4.098, 5.001. Find the probability that any one of these bag chosen at random contains less than 5 kg of rice.
7. Eleven bags of wheat flour, each marked 5 kg, actually contained the following weight of flour (in kg) : 4.97, 5.05, 5.08, 5.03, 5.00, 4.86, 5.08, 4.98, 5.04, 5.07, 5.00 Find the probability of a bag chosen at random which contains more than 5 kg of flout