

6.1.3.

Problem: How many ways are there to distribute 3 prizes among 16 contestants?

Solution: There are 16 ways to award the first prize. There are 15 ways to award the second prize and there are 14 ways to award the third prize. Thus, the total number of ways to distribute these prizes is

$$16 \cdot 15 \cdot 14 = 3360$$