



SBI Apprentice 2020 की तैयारी

Quantitative Aptitude



Permutation & Combination **(क्रमचय और संचय)**

2:00 PM





**PERMUTATION
&
COMBINATION**



PERMUTATION



ARRANGEMENT

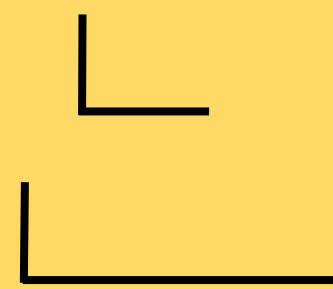
COMBINATION



SELECTION

Total number of permutations of 'n' distinct objects, taken 'r' at a time is denoted by-

$${}^n P_r = \frac{n!}{(n-r)!}$$



COROLLARY

$$\blacklozenge \quad {}^n P_1 = n$$

$$\blacklozenge \quad {}^n P_0 = 1$$

$$\blacklozenge \quad {}^n P_n = n!$$

$$\blacklozenge \quad 0! = 1$$

VALUE OF IMPORTANT FACTORIAL

$$0! = 1$$

$$1! = 1$$

$$2! = 2 \times 1 = 2$$

$$3! = 3 \times 2 \times 1 = 6$$

$$4! = 4 \times 3 \times 2 \times 1 = 24$$

$$5! = 5 \times 4 \times 3 \times 2 \times 1 = 120$$

$$6! = 6 \times 5 \times 4 \times 3 \times 2 \times 1 = 720$$

$$7! = 7 \times 6 \times 5 \times 4 \times 3 \times 2 \times 1 = 5040$$

$$8! = 8 \times 7 \times 6 \times 5 \times 4 \times 3 \times 2 \times 1 = 40320$$

ARRANGEMENT OF LETTERS (DISSIMILAR THINGS)

(i) D E L H I

$$n = 5$$

$$= 5$$

$$= 5 \times 4 \times 3 \times 2 \times 1$$

$$= 120$$

(ii) L U C K N O W

ARRANGEMENT OF LETTERS (DISSIMILAR THINGS)

(i) HOME

(ii) BHOPAL

ARRANGEMENT OF LETTERS (SIMILAR THINGS)

(i) A P P L E

(ii) C O C O N U T

ARRANGEMENT OF LETTERS (SIMILAR THINGS)

(i) OPERATE

(ii) SUCCESS