



Probability Counting - Choose N Letters from M, Count of Favorable Outcomes - To Factorial Equation

1

O C X
O U

How many ways can 2 vowels be drawn from this set? Show as a factorial.

A	$\frac{2!}{3! \cdot 1!}$	B	3!
C	$\frac{3!}{2! \cdot 1!}$	D	$\frac{4!}{2! \cdot 2!}$

2

O I C
E L

How many ways can 2 vowels be drawn from this set? Show as a factorial.

A	$\frac{3!}{2! \cdot 1!}$	B	$\frac{2!}{3! \cdot 1!}$
C	$\frac{5!}{3! \cdot 2!}$	D	$\frac{4!}{3! \cdot 1!}$
E	3!		

3

E E U
B J P
U

How many ways can 3 vowels be drawn from this set? Show as a factorial.

A	$\frac{6!}{3! \cdot 3!}$	B	4!
C	$\frac{3!}{4! \cdot 1!}$	D	$\frac{4!}{3! \cdot 1!}$
E	$\frac{3!}{3! \cdot 0!}$		

4

M H U
U U U
Q

How many ways can 3 vowels be drawn from this set? Show as a factorial.

A	$\frac{4!}{3! \cdot 1!}$	B	$\frac{4!}{2! \cdot 2!}$
C	$\frac{3!}{4! \cdot 1!}$	D	4!

5

E D A
G E A

How many ways can 3 vowels be drawn from this set? Show as a factorial.

A	$\frac{4!}{2! \cdot 2!}$	B	$\frac{3!}{4! \cdot 1!}$
C	$\frac{4!}{3! \cdot 1!}$	D	$\frac{3!}{3! \cdot 0!}$
E	4!		

6

A E H
O I B
F

How many ways can 3 vowels be drawn from this set? Show as a factorial.

A	4!	B	$\frac{5!}{3! \cdot 2!}$
C	$\frac{4!}{3! \cdot 1!}$	D	$\frac{3!}{4! \cdot 1!}$

7

I E H
Q U

How many ways can 2 vowels be drawn from this set? Show as a factorial.

A	3!	B	$\frac{3!}{2! \cdot 1!}$
C	$\frac{4!}{4! \cdot 0!}$	D	$\frac{2!}{3! \cdot 1!}$

8

M E I
A I

How many ways can 2 vowels be drawn from this set? Show as a factorial.

A	$\frac{2!}{4! \cdot 2!}$	B	$\frac{4!}{2!}$
C	$\frac{4!}{2! \cdot 2!}$		