

! kertoma

$$\binom{n}{k} = \frac{n!}{k! \cdot (n-k)!} =$$

esim 1

$$\binom{9}{3} = \frac{9!}{3! \cdot (9-3)!} = \frac{\overset{3}{9} \cdot \overset{4}{8} \cdot 7 \cdot 6 \cdot \cancel{5!}}{\underset{1}{3} \cdot \underset{1}{2} \cdot \underset{1}{1} \cdot \cancel{6!}} = \underline{\underline{84}}$$



esim 2

$$\binom{50}{22} = \frac{50!}{22! \cdot (50-22)!} = \frac{50 \cdot 49 \cdot \dots \cdot 29 \cdot \cancel{28!}}{\underbrace{22! \cdot \cancel{28!}}_{22 \cdot 21 \cdot 20 \cdot \dots \cdot 2}}$$

$$\binom{13}{4} =$$

$$\frac{n!}{(n-k)!}$$