Factorials

A new math operation

$$n! = nx(n-1)x(n-2)x(n-3)x \cdots x(3)x(2)x(1)$$

$$4! = 4 \times 3 \times 2 \times 1 = 24$$
 $6! = 6 \times 5 \times 4 \times 3 \times 2 \times 1 = 720$

define 0! = 1.