$$\{[(3^2+3^4):3^2]^3\cdot 10^2\}:\{[2^{24}:2^{20}+11]\}^5-1=$$

$$=\{[1+3^2]^3\cdot 10^2\}:\{[2^4-11]\}^5-1=$$

$$=\{10^3\cdot 10^2\}:\quad 5^5-1=$$

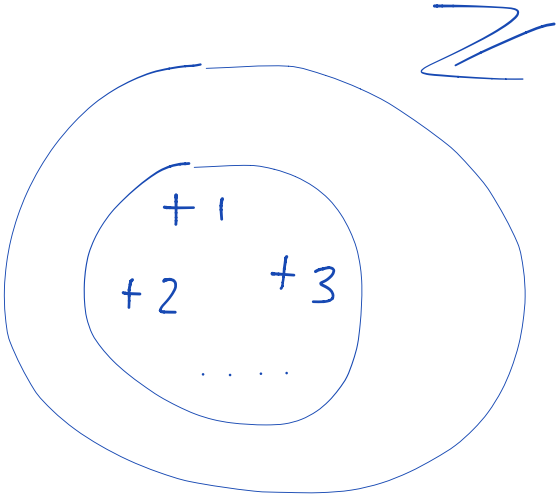
$$=10^5:5^5-1=(10:5)^5-1=$$

$$=2^5-1=32-1=31$$

Numeri interi relativi

$$\mathbb{Z} = \{ \dots, -n, \dots, -3, -2, -1, 0, +1, +2, +3, \dots, +n, \dots \}$$

$1 \in \mathbb{N}$ non è $+1 \in \mathbb{Z}$



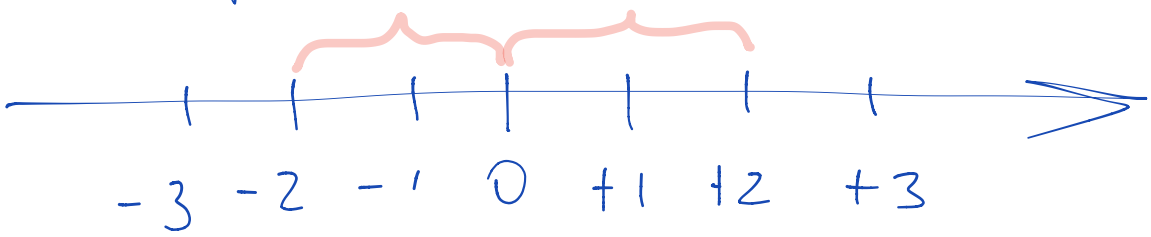
$\mathbb{Z}$ ha un sottoinsieme che si comporta come $\mathbb{N}$.

$$\forall a, b \in \mathbb{Z} \Rightarrow a - b \in \mathbb{Z}$$

$$\forall a \in \mathbb{Z} \Rightarrow a + 1 \in \mathbb{Z}$$

$$\forall a \in \mathbb{Z} \Rightarrow a - 1 \in \mathbb{Z}$$

Valore assoluto



$$|+2| = |-2|$$

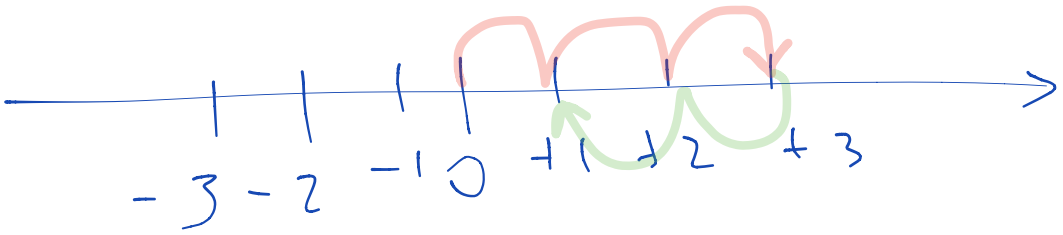
$$|a| = \begin{cases} +a & \text{se } a \geq 0 \\ -a & \text{se } a < 0 \end{cases}$$

$|-2|$ $\qquad -a$

$-(-2) = +2$

$-a$ non si legge meno a

$-a$ si legge opposto di a



$+3-2=+1$

$-3-5=-8$

$-7+3=-4$

Potenze

(base intera, esponente positivo)

$(-2)^2=(-2)\cdot(-2)=+4$

$(-2)^3=(-2)(-2)(-2)=-8$

$(+2)^3=+8$

$(-2)^3 \cdot (+2)^2 = -2^5$

$= (-2)^3 \cdot (-2)^2 = (-2)^5$

$(-2)^3 \cdot (+2)^5 = -2^8$

$-$ $+$

$(-2)^8$

$-x^2$

$(-x)^2$