



P1 - Real Numbers

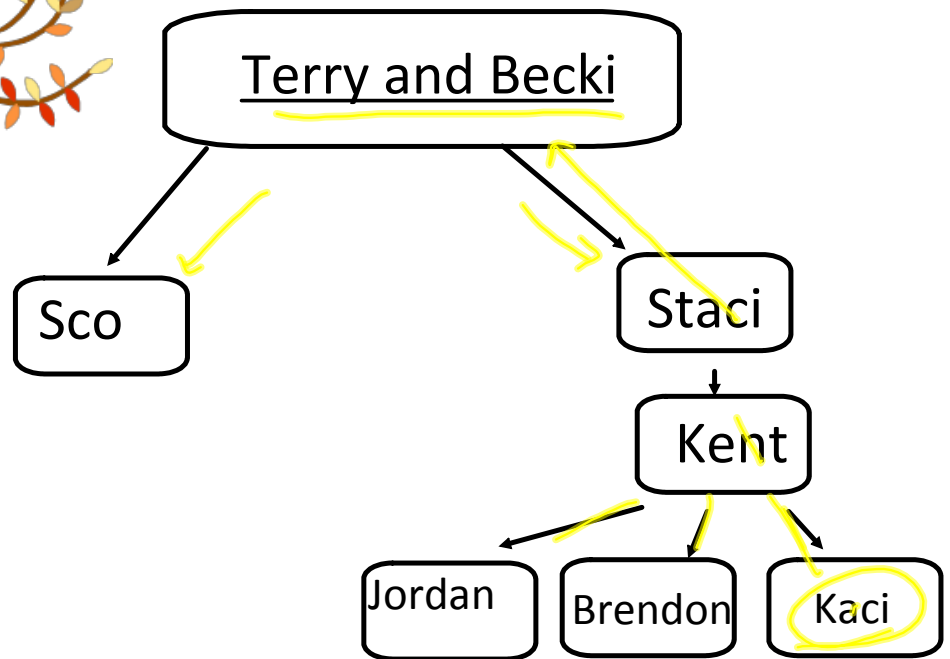
and their
properties

Task:

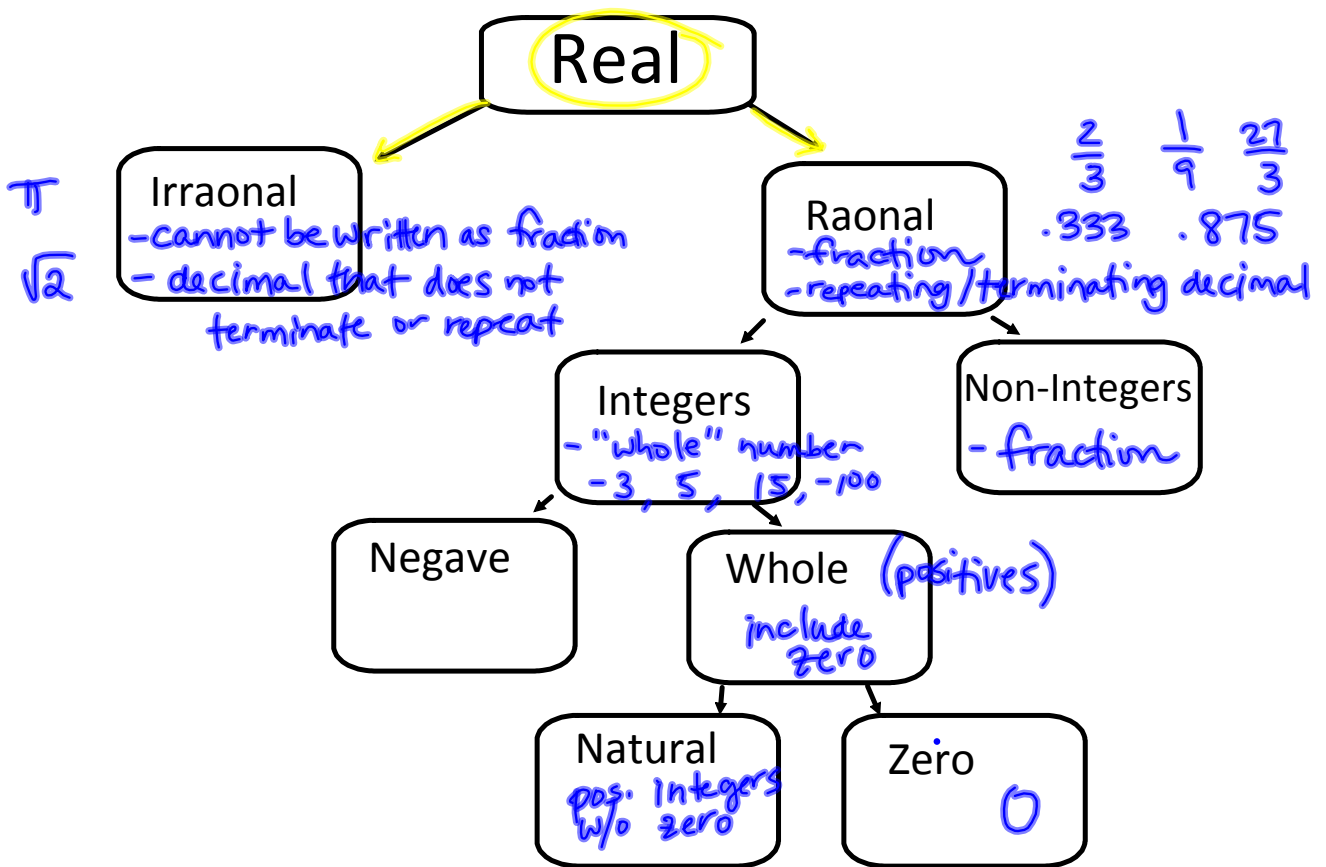
Form teams and play
Bocce Ball!

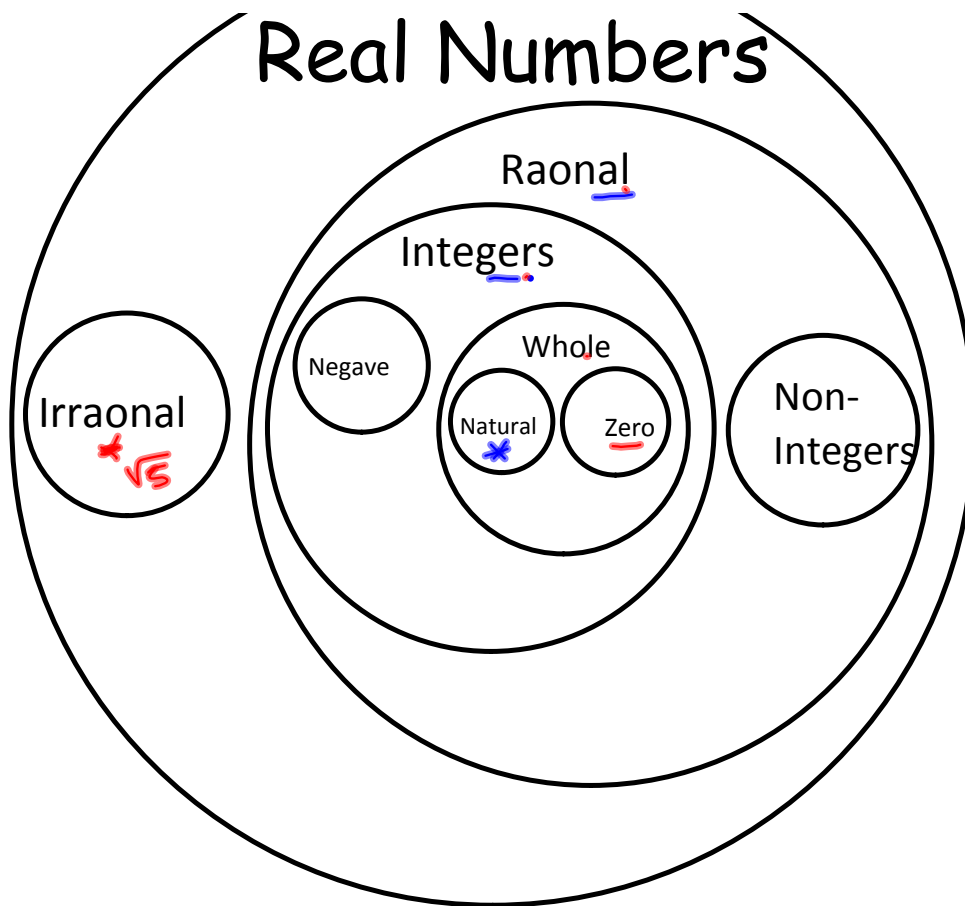
players?
Rules?
point?





Real Numbers





Interpreting inequalities:

a) c is at most 2

$c \leq 2$, $(-\infty, 2]$

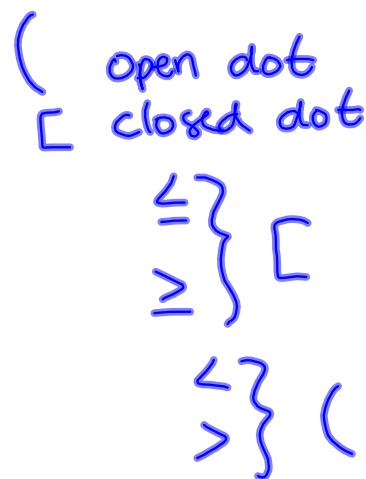
lowest \leftarrow \leftarrow highest

b) m is at least -3

$-3 \leq m$ $[-3, \infty)$

c) All x in the interval $(-3, 5]$

$-3 < x \leq 5$



Basic Rules of Algebra:



- Commutative Property (add + mult.)

$$3+2 = 2+3$$

$$5 \cdot 7 = 7 \cdot 5$$

- Associative Property (add + mult.)

$$(3+2)+6 = 3+(2+6)$$

$$(5 \cdot 7) \cdot 2 = 5 \cdot (7 \cdot 2)$$

- Distributive Property

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

$$(2+5)^2 \neq 2^2 + 5^2 \text{ No!}$$

- Additive Identity

$$3 + \underline{\underline{0}} = 3$$

$$a + 0 = a$$

- Multiplicative Identity

$$3 \cdot \underline{\underline{1}} = 3$$

$$a \cdot \underline{\underline{1}} = a$$

- Additive Inverse

$$3 + \overset{=0}{\underline{\underline{-3}}} = 0$$

$$a + \underline{\underline{-a}} = 0$$

- Multiplicative Inverse

$$2 \cdot \overset{=1}{\left(\frac{1}{2}\right)} = 1$$

$$a \cdot \left(\frac{1}{a}\right) = 1$$

HW:

- Vocab
- Pg 9 # 5, 22, 23, 38, 47, 59, 66, 83, 86-96 evens, 111

