

Name: _____

Date: _____

Learning Goal 4.1

Identify and order irrational numbers.

A square root represents:

Many square roots result in _____, but we should not be too quick to judge! Especially without a calculator ...

Example Consider the relationship between the following 4 numbers:

400

40

4

0.4

0.04

How many of these numbers have **rational square roots**? How many have **irrational square roots**? Why?

Example Try again!

90

9

0.9

0.09

0.009

0.0009

How many of these numbers have **rational square roots**? How many have **irrational square roots**? Why?

Invert!

Example For each number below, write an equivalent form as the table specifies.

| | As a square root | As a cube root | As a fourth root |
|-------|------------------|----------------|------------------|
| 5 = | | | |
| 0.5 = | | | |
| 50 = | | | |

Consider the numbers that have been given to you within your table group

| | |
|--|--|
| | |
| | |

1. Decide who among you has an irrational number
2. Place your 4 numbers in order from **smallest to biggest** on the number line below

