Place-Value Patterns

Let's observe place-value patterns.

Warm-up

Notice and Wonder: Same Digits

What do you notice? What do you wonder?

8,200

820

82

8.2

0.82

0.082

Many True Equations

Use these numbers and symbols to write as many true equations as you can. You may use each number and symbol more than once.

600	0.06	100
60	×	10
6	÷	0.1
0.6	=	0.01

Describe Multiplicative Relationships

$$600$$
$$60$$
$$6$$
$$0.6$$
$$0.06$$

1. Explain or show how the value of the 6 changes in each of the numbers.

2. Which numbers come above 600 if the list continues? Explain your reasoning.

3. Which numbers come below 0.06 if the list continues? Explain your reasoning.