**5.1a Finding Ratios**

**EQ:** What is a RATIO and how do we find them?

**RATIO:** a comparison of two quantities using division that can be written three different ways.

***Ex:*** As a **fraction:** $\frac{3}{4}$

 With the word ***to*** between the quantities: 3 to 4

 With a **:** between the quantities: 3:4

HOW TO FIND RATIOS:

-Write the quantity of each item being compared in the order they are given in the question (first-on top, second-on bottom) in FRACTION FORM!

-Then **simplify/reduce** the fraction.

**Ex 1:** The bus has 45 males and 60 females.

 **Q1:** What is the ratio of MALES to FEMALES?

$\frac{males}{females}$ **=** $\frac{45}{60}$ **÷** $\frac{15}{15}$ =$\frac{3}{4}$

**Q2:** What is the ratio of MALES to ALL PASSENGERS?

$\frac{males}{all passengers}$ **=** $\frac{45}{105}$ ÷ $\frac{15}{15} $= $\frac{3}{7}$

**\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**Ex 2:** There are 12 dogs and 15 cats at the pet store.

 **Q1:** Find the ratio of DOGS to CATS?

$\frac{dogs}{cats}$ **=** $\frac{12}{15}$ **÷** $\frac{3}{3}$ =$\frac{4}{5}$

**Q2:** What is the ratio of CATS to ALL PETS?

$\frac{cats}{all pets}$ **=** $\frac{15}{27}$ ÷ $\frac{3}{3} $= $\frac{5}{9}$

**5.1a Finding Ratios**

**EQ:** What is a RATIO and how do we find them?

**RATIO:** a comparison of two quantities using division that can be written three different ways.

***Ex:*** As a **fraction:** $\frac{3}{4}$

 With the word ***to*** between the quantities: 3 to 4

 With a **:** between the quantities: 3:4

HOW TO FIND RATIOS:

-Write the quantity of each item being compared in the order they are given in the question (first-on top, second-on bottom) in FRACTION FORM!

-Then **simplify/reduce** the fraction.

**Ex 1:** The bus has 45 males and 60 females.

 **Q1:** What is the ratio of MALES to FEMALES?

$\frac{males}{females}$ **=** $\frac{45}{60}$ **÷** $\frac{15}{15}$ =$\frac{3}{4}$

**Q2:** What is the ratio of MALES to ALL PASSENGERS?

$\frac{males}{all passengers}$ **=** $\frac{45}{105}$ ÷ $\frac{15}{15} $= $\frac{3}{7}$

**\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**Ex 2:** There are 12 dogs and 15 cats at the pet store.

 **Q1:** Find the ratio of DOGS to CATS?

$\frac{dogs}{cats}$ **=** $\frac{12}{15}$ **÷** $\frac{3}{3}$ =$\frac{4}{5}$

**Q2:** What is the ratio of CATS to ALL PETS?

$\frac{cats}{all pets}$ **=** $\frac{15}{27}$ ÷ $\frac{3}{3} $= $\frac{5}{9}$

**5.1a Finding Ratios**

 **EQ:** \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

**RATIO:** \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

***Ex:*** As a **fraction:**

 With the word ***to*** between the quantities:

 With a **:** between the quantities:

**HOW TO FIND RATIOS:**

- \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

 \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

 \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

- \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Ex:** The bus has 45 males and 60 females.

 **Q1:** What is the ratio of MALES to FEMALES?

$\frac{males}{females}$ **=** $\frac{ }{ }$ **÷** $\frac{ }{ }$ =$\frac{ }{ }$

**Q2:** What is the ratio of MALES to ALL PASSENGERS?

$\frac{males}{all passengers}$ **=** $\frac{ }{ }$ ÷ $\frac{ }{ } $= $\frac{ }{ }$

**Ex 2:** There are 12 dogs and 15 cats at the pet store.

 **Q1:** Find the ratio of DOGS to CATS?

$\frac{dogs}{cats}$ **=** $\frac{ }{ }$ **÷** $\frac{ }{ }$ =$\frac{ }{ }$

**Q2:** What is the ratio of CATS to ALL PETS?

$\frac{cats}{all pets}$ **=** $\frac{ }{ }$ **÷** $\frac{ }{ }$ =$\frac{ }{ }$

**IXL R.2 (6th) Practice as a CLASS**

|  |  |
| --- | --- |
| $\frac{ }{ }$ **=** | $\frac{ }{ }$ **=** |
| $\frac{ }{ }$ **=** | $\frac{ }{ }$ **=** |
| $\frac{ }{ }$ **=** | $\frac{ }{ }$ **=** |
| $\frac{ }{ }$ **=** | $\frac{ }{ }$ **=** |
| $\frac{ }{ }$ **=** | $\frac{ }{ }$ **=** |
| $\frac{ }{ }$ **=** | $\frac{ }{ }$ **=** |
| $\frac{ }{ }$ **=** | $\frac{ }{ }$ **=** |
| $\frac{ }{ }$ **=** | $\frac{ }{ }$ **=** |