**Find the greatest common factor and least common multiple of two or more numbers using lists and venn diagrams.**
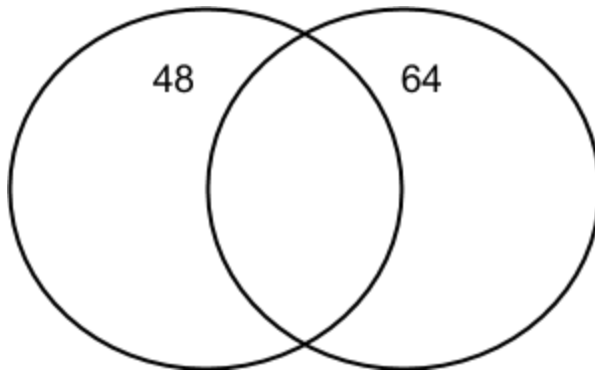
**Practice Set A**

Name:

Date:

1. List all the factors of 48 and all of the factors of 64.

   a. Use the venn diagram to organize the factors and common factors of 48 and 64.

   

   b. Explain how you can use the diagram to find the greatest common factor of 48 and 64.

2. List all the multiples of 8 that are less than or equal to 100 then list all the multiples of 12 that are less than or equal to 100.

   a. What are the common multiples of 8 and 12 from the two lists? What is the least common multiple of 8 and 12?

**Find the greatest common factor and least common multiple of two or more numbers using lists and venn diagrams.**
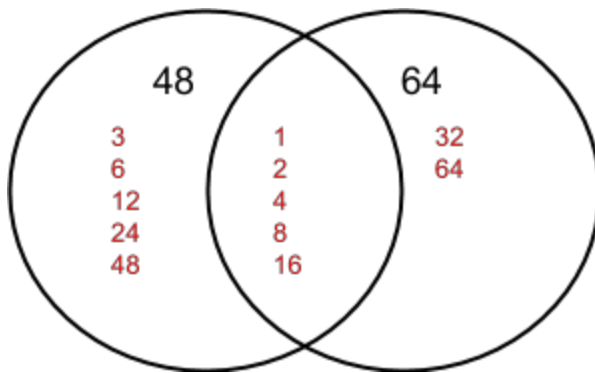
**Practice Set A Answer Key**

1. List all the factors of 48 and all of the factors of 64.

   48: 1, 2, 3, 4, 6, 8, 12, 16, 24, 28

   64: 1, 2, 4, 8, 16, 32, 64

   a. Use the venn diagram to organize the factors and common factors of 48 and 64.



   b. Explain how you can use the diagram to find the greatest common factor of 48 and 64.

   The intersection of the two circles includes a list of the factors that 48 and 64 have in common. The greatest factor that is in the intersection is 16. 16 is the greatest common factor of 48 and 64.

2. List all the multiples of 8 that are less than or equal to 100 then list all the multiples of 12 that are less than or equal to 100.

   8: 8, 16, 24, 32, 40, 48, 56, 64, 72, 80, 88, 96...

   12: 12, 24, 36, 48, 60, 72, 84, 96...

   What are the common multiples of 8 and 12 from the two lists?

   The common multiples of 8 and 12 from the two lists are 24, 48, 72, and 96

   What is the least common multiple of 8 and 12?

   The least common multiple of 8 and 12 is 24.