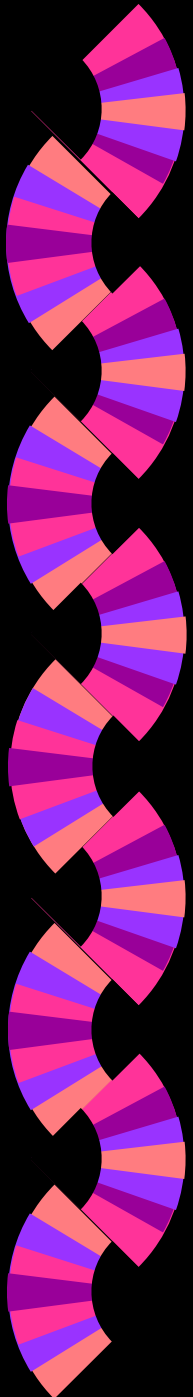


Least Common Multiple



A **multiple** of a number is the product of the number and any whole number.

$$6 \times 0 = 0$$

$$6 \times 5 = 30$$

$$6 \times 1 = 6$$

$$6 \times 6 = 36$$

$$6 \times 2 = 12$$

$$6 \times 7 = 42$$

$$6 \times 3 = 18$$

$$6 \times 8 = 48$$

$$6 \times 4 = 24$$

$$6 \times 9 = 54$$


$$6 \times 0 = 0$$

$$6 \times 5 = 30$$

$$6 \times 1 = 6$$

$$6 \times 6 = 36$$

$$6 \times 2 = 12$$

$$6 \times 7 = 42$$

$$6 \times 3 = 18$$

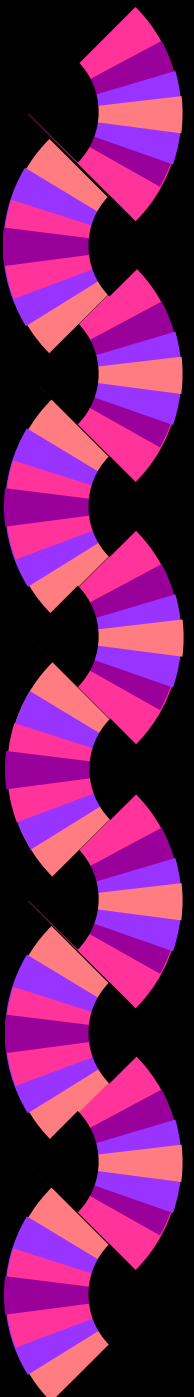
$$6 \times 8 = 48$$

$$6 \times 4 = 24$$

$$6 \times 9 = 54$$

The multiples of 6 are:

0, 6, 12, 18, 24, 30, 36, 42, 48, 54, ...³



The Least Common Multiple is the smallest multiple that two or more numbers have in common.

To find the LCM of two or more numbers you can make a list of the multiples.



Make a list of multiples:

Find the **LCM** of 4 and 6.

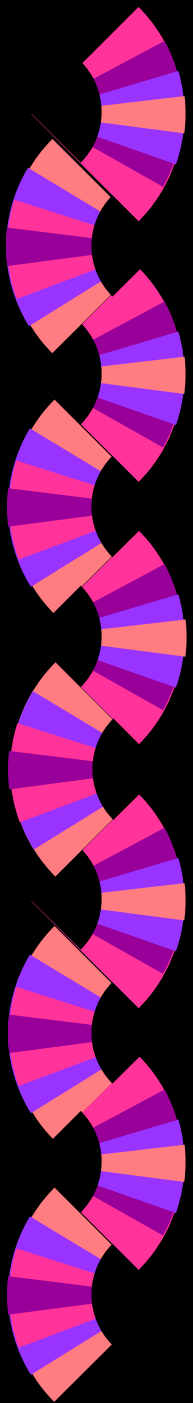
Make a list of several multiples of the numbers.

Multiples of 4:

0, 4, 8, 12, 16, 20, 24, 28, 32, ...

Multiples of 6:

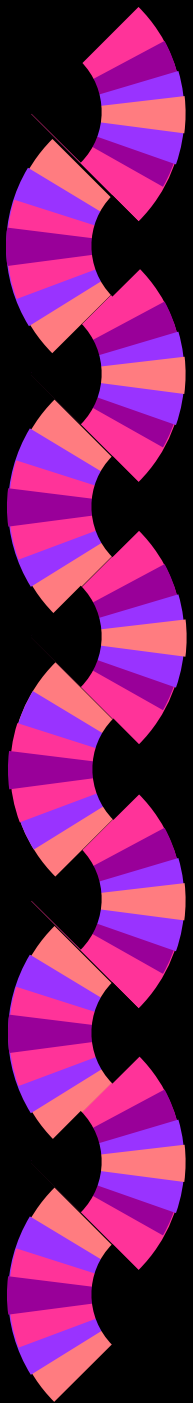
0, 6, 12, 18, 24, 30, 36, ...



4, 8, 12, 16, 20, 24, 28, 32, 36, ...

6, 12, 18, 24, 30, 36, ...

Identify the **common multiples**
of 4 and 6.



4, 8, **12**, 16, 20, 24, 28, 32, 36, ...

6, **12**, 18, 24, 30, 36, ...

Identify the **common multiples**
of 4 and 6.



4, 8, 12, 16, 20, 24, 28, 32, 36, ...

6, 12, 18, 24, 30, 36, ...

Identify the common multiples
of 4 and 6.



4, 8, 12, 16, 20, 24, 28, 32, 36, ...

6, 12, 18, 24, 30, 36, ...

Identify the common multiples
of 4 and 6.



4, 8, 12, 16, 20, 24, 28, 32, 36, ...

6, 12, 18, 24, 30, 36, ...

The common multiples are
12, 24 and 36.

The LCM of 4 and 6 is 12 .

LCM = 12



Find the **LCM** of 15 and 9.

15, 30, 45, 60, 75, ...

9, 18, 27, 36, 45, 54, ...



Find the **LCM** of 15 and 9.

15, 30, 45, 60, 75, ...

9, 18, 27, 36, 45, 54, ...

Find the **common multiples** of
15 and 9.



Find the **LCM** of 15 and 9.

15, 30, **45**, 60, 75, ...

9, 18, 27, 36, **45**, 54, ...

Find the **common multiples** of
15 and 9.



Find the **LCM** of 15 and 9.

15, 30, **45**, 60, 75, ...

9, 18, 27, 36, **45**, 54, ...

The **LCM** of 15 and 9 is **45**.

LCM = 45



Find the **LCM** of 6 and 9.

6, 12, 18, 24, 30, 36, ...

9, 18, 27, 36, 45, 54, ...



Find the **LCM** of 6 and 9.

6, 12, **18**, 24, 30, 36, ...

9, **18**, 27, 36, 45, 54, ...



Find the **LCM** of 6 and 9.

6, 12, **18**, 24, 30, **36**, ...

9, **18**, 27, **36**, 45, 54, ...



Find the **LCM** of 6 and 9.

6, 12, **18**, 24, 30, **36**, ...

9, **18**, 27, **36**, 45, 54, ...

LCM = 18



Find the **LCM** of 6 and 12.

6, 12, 18, 24, 30, 36, ...

12, 24, 36, ...



Find the **LCM** of 6 and 12.

6, **12**, 18, 24, 30, 36, ...

12, 24, 36, ...



Find the LCM of 6 and 12.

6, 12, 18, 24, 30, 36, ...

12, 24, 36, ...



Find the **LCM** of 6 and 12.

6, 12, 18, 24, 30, 36, ...

12, 24, 36, ...

LCM = 12



Find the **LCM** of 4, 6 and 8.

4, 8, 12, 16, 20, 24, 28, ...

6, 12, 18, 24, 30, 36, ...

8, 16, 24, 32, 40, ...



Find the LCM of 4, 6 and 8.

4, 8, 12, 16, 20, 24, 28, ...

6, 12, 18, 24, 30, 36, ...

8, 16, 24, 32, 40, ...



Find the **LCM** of 4, 6 and 8.

4, 8, 12, 16, 20, **24**, 28, ...

6, 12, 18, **24**, 30, 36, ...

8, 16, **24**, 32, 40, ...

LCM = 24