

## Marble Sizes and the Solar System

**Activity:** Do some solar system research and pick out marbles that represent the relative size of the planets - Sun, Mercury, Venus, Earth, Mars, Jupiter, Saturn, Uranus, Neptune, and Pluto. Arrange the marbles by their relative solar system location. **A Circle** is a geometric shape with no straight edges or corners. Most marble games are played on a circle because all points on a circle are the same distance from the center; everyone has an equal chance at the marbles in the middle.

**Radius** is the length of the line from the center of a circle to any point on its edge of the circle.

**Diameter** is the measured distance across a circle through the center. A four-foot diameter circle will measure four feet from one side to the other. The size of a marble is usually described as the diameter of the marble. For example, a 1-inch marble will measure one inch from one edge of the marble to the opposite edge. A caliper tool is a good way to measure a marble's diameter.

**Circumference** is the distance around a circle, which you can establish by measuring the distance across the circle, through the center, and multiplying it by 3.14. For example; to find out how long a piece of pipe you would need to make a 4-foot hoop ring, you multiply 4 times 3.14.





**The Metric System**, also known as the International System of Units (SI), is a Base-10 system of measurement, built on three main units: meters, liters, and grams. The United States is one of only 3 countries that doesn't not use the Metric System.

**Mega Marbles literature uses the Metric System** to sizes their marbles because they are manufactured in Guajajara, Mexico.