

## **Space Science Topics**

### **How Space-Time Bends Around Mass**

Space-time is like a fabric that fills the whole universe. Big things like planets and stars sit on this fabric and bend it. Think about placing a heavy ball on a stretched-out rubber sheet. The ball makes a dent, and smaller balls roll toward it. In the same way, planets and stars bend space-time around them, and this bending is what we feel as gravity. When the Sun bends space-time, the Earth moves around it because it is following the curved space. Even light bends when it moves near a big mass! Scientists have observed this when light from distant stars bends around massive objects like galaxies. This shows that space-time is not just empty space; it can curve and move.