The Weight [Activity]

This is a simple, straight-forward lab activity. Students typically get excellent results. The activity is also intended to help drive a division between the concepts of mass and weight. While weight and mass are usually related to each other, they are distinct quantities.

Answers to the Procedure Question

1. Slopes of 10 N/kg are typical with the apparatus described. Slopes of 9.8 N/kg are typical if a computer-connected force sensor is used in place of the spring scale.

Answers to Summing Up Questions

- 1. About 10 N
- 2. The slope of the moon line is shallower.
- 3. Jupiter has a stronger gravitational field than Earth.