

## Exploring Acceleration with an Android Activity Assessment

- 1) Describe the relationship between acceleration and velocity.
  
- 2) Given the equation for the velocity of an object representing projectile motion:  $v(t) = -32t + 40$  find an equation that can be used to model the object's acceleration.

### Activity Extensions

Discuss the relationships of projectile motion for an object's position, velocity, and acceleration and answer the questions below.

- 1) Given the equation for the velocity of an object simulating projectile motion:  $v(t) = -32t + 20$ , find an equation that can be used to model the object's position.
  
- 2) Given the position equation for an object representing projectile motion,  $h(t) = -16t^2 + 65t + 40$  find equations that can be used to model the object's velocity and acceleration.