

11. What is required for a rocket to lift off into space?
 - a. very little air resistance
 - b. mass that is greater than Earth's mass
 - c. thrust that is greater than Earth's gravity
 - d. more velocity than friction
12. When you know both the speed and the direction of an object's motion, you know the
 - a. average speed of the object.
 - b. acceleration of the object.
 - c. velocity of the object.
 - d. distance the object has traveled.
13. If velocity is measured in kilometers per hour and time is measured in hours, the unit of acceleration is
 - a. hours.
 - b. kilometers.
 - c. kilometers per hour per hour.
 - d. kilometers per hour.
14. When the only force acting on a falling object is gravity, the object is said to be
 - a. decelerating.
 - b. stationary.
 - c. in free fall.
 - d. a projectile.
15. Which of the following is an example of rolling friction?
 - a. a boat on the water as it sails
 - b. bike tires on the road as you ride
 - c. your shoes on a sidewalk as you walk
 - d. two hands rubbing together
16. Objects falling through air experience a type of friction called
 - a. rolling friction.
 - b. air resistance.
 - c. terminal velocity.
 - d. inertia.
17. The amount of matter in an object is called its
 - a. force.
 - b. weight.
 - c. mass.
 - d. balance.
18. The tendency of an object to resist any change in its motion is known as
 - a. mass.
 - b. inertia.
 - c. balance.
 - d. force.
19. In physical science, a push or a pull is called a(n)
 - a. inertia.
 - b. acceleration.
 - c. force.
 - d. motion.
20. Which of the following is an example of increasing friction intentionally?
 - a. throwing sand on an icy driveway
 - b. waxing skis
 - c. adding grease to gears on a bike
 - d. oiling a squeaky door