HOMEWORK #3 - 8.01 MIT - Prof. Kowalski

Due 4:00PM Thursday Sept. 25, 2003

Topics: circular and relative motion and Newton's first two laws

The following problems are from Young and Freedman 11th edition. Additional parts are indicated after some of the problems.

- 1. 4.4
 - c) What is the effect of the 20 degree tilt of the plank on the answers to a and b?
 - d) What are Fgx and Fgy, the components of this same force with respect to a coordinate system whose x axis is parallel to the ground?
- 2. 4.30 Solve part a by finding first the average velocity and then the time.
 - c) Find the acceleration directly from the velocities without considering the time.
- 3. 4.25
- 4. 5.98
- 5. 4.39