MASSACHUSETTS INSTITUTE OF TECHNOLOGY
Department of Physics

Physics 8.01L   **Fall 2005**

Problem Set 3: Newton's Laws

Due Friday, October 7 at the start of class at 10am.

Please write your name, recitation number, table number, and tutor name on the top right corner of the first page of your homework solutions. Please place your solutions in the Problem Set Solution hand-in bin at the entrance of the classroom.

Reading:
Young & Freedman Chapter 3 (Review sections 3.4 and 3.5)
Young & Freedman Chapter 4 (All sections)
Young & Freedman Chapter 5 (All sections)

This problem set will give you a chance to review some recent material not covered on previous assignments and also begin to work on basic dynamics.

Problem 1 Spiraling Bird
Young & Freedman Problem 3.50 (Page 113)

Problem 2 Fast/Slow Airplane Race
Young & Freedman Problem 3.82 (Page 117)

Problem 3 Icy Pull
Young & Freedman Problem 4.39 (Page 151)

Problem 4 Pity the Poor Nail
Young & Freedman Problem 4.47 (Page 152)

Problem 5 Have you see the classic movie "2001, a Space Odyssey"?
Young & Freedman Problem 5.49 (Page 197)

Problem 6 Which Way Slide
Young & Freedman Problem 5.84 (Page 201)

Problem 7 Frustrated Monkey
Young & Freedman Problem 5.99 (Page 203)

Problem 8 Friction Tutorial
Young & Freedman Problem 5.25 (Page 196)