

MASSACHUSETTS INSTITUTE OF TECHNOLOGY
Department of Physics

Physics 8.012

Fall Term 2005

PROBLEM SET 6

Due: Friday, October 28 at 4:00pm.

Reading: Read Kleppner & Kolenkow, Chapter 4. Section 4.14 on collisions will be covered in the next assignment.

0. **Collaboration and discussion.** Please give a brief statement at the top of your homework telling us the names of all the students with whom you discussed the homework problems.
1. Kleppner & Kolenkow, Problem 4.2 (10 points)
2. Kleppner & Kolenkow, Problem 4.4 (10 points)
3. Kleppner & Kolenkow, Problem 4.5 (10 points)
4. Kleppner & Kolenkow, Problem 4.7 (10 points)
5. Kleppner & Kolenkow, Problem 4.8 (10 points)
6. Kleppner & Kolenkow, Problem 4.10 (10 points)
7. Kleppner & Kolenkow, Problem 4.11 (10 points)
8. Kleppner & Kolenkow, Problem 4.13 (10 points)
9. Kleppner & Kolenkow, Problem 4.14 (10 points)
10. Kleppner & Kolenkow, Problem 4.15 (10 points)