## PHYSICS 193H - Spring 2002

Course Schedule

| Date |  | Topics | Reading | Assignment |
| :---: | :---: | :---: | :---: | :---: |
| 1-7 | (Mon) | Introduction | Chapter 1.1-1.7 | A-1, Due 1-11 |
| 1-9 | (Wed) | Linear Motion 1 | Chapter 2.1-2.2 |  |
| 1-11 | (Fri) | Linear Motion 2 | Chapter 2.3-2.4 | A-2, Due: 1-18 |
| 1-14 | (Mon) | Linear Motion 3 | Chapter 2.5-2.6 |  |
| 1-16 | (Wed) | Two-Dimensional Motion 1 | Chapter 3.1-3.2 |  |
| 1-18 | (Fri) | Two-Dimensional Motion 2 | Chapter 3.3-3.4 | A-3,Due: 1-25 |
| 1-21 | (Mon) | Martin Luther King Holiday |  |  |
| 1-23 | (Wed) | Two-Dimensional Motion 3 | Chapter 3.5-3.6 |  |
| 1-25 | (Fri) | Newtons Laws 1 | Chapter 4.1-4.3 | A-4, Due: 2-1 |
| 1-28 | (Mon) | Newtons Laws 2 | Chapter 4.4-4.6 |  |
| 1-30 | (Wed) | Newtons Laws 3 | Chapter 4.7-5.1 |  |
| 2-1 | (Fri) | Newtons Laws 4 | Chapter 5.2-5.3 | A-5, Due: 2-8 |
| 2-4 | (Mon) | Newtons Laws 5 | Chapter 5.4-5.5 |  |
| 2-6 | (Wed) | Review |  |  |
| 2-8 | (Fri) | Exam I | - | Partial Credit, Due: 2-16 |
| 2-11 | (Mon) | Work \& Kinetic Energy 1 | Chapter 6.1-6.2 |  |
| 2-13 | (Wed) | Work \& Kinetic Energy 2 | Chapter 6.3-6.4 |  |
| 2-15 | (Fri) | Work \& Kinetic Energy 3 | Chapter 6.5-6.7 | A-6, Due: 2-22 |
| 2-18 | (Mon) | Potential Energy \& Energy Conservation 1 | Chapter 7.1-7.3 |  |
| 2-20 | (Wed) | Potential Energy \& Energy Conservation 2 | Chapter 7.4-7.5 |  |
| 2-22 | (Fri) | Linear Momentum 1 | Chapter 8.1-8.2 | A-7, Due: 3-1 |
| 2-25 | (Mon) | Linear Momentum 2 | Chapter 8.3-8.4 |  |
| 2-27 | (Wed) | Linear Momentum 3 | Chapter 8.5-8.6 |  |
| 3-1 | (Fri) | Linear Momentum 4 | Chapter 8.7-8.8 | A-8, Due: 3-15 |
| 3-4 - | 3-8 | Spring Break |  |  |
| 3-11 | (Mon) | Rotational Motion 1 | Chapter 9.1-9.3 |  |
| 3-13 | (Wed) | Rotational Motion 2 | Chapter 9.4-9.6 |  |
| 3-15 | (Fri) | Rotational Motion 3 | Chapter 9.7-10.1 | A-9, Due: 3-22 |
| 3-18 | (Mon) | Rotational Motion 4 | Chapter 10.2-10.4 |  |
| 3-20 | (Wed) | Review |  |  |
| 3-22 | (Fri) | Exam II | - | Partial Credit, Due: 3-29 |
| 3-25 | (Mon) | Rotational Motion 5 | Chapter 10.5-10.7 |  |
| 3-27 | (Wed) | Statics 1 | Chapter 11.1-11.2 |  |
| 3-29 | (Fri) | Statics 2 | Chapter 11.3-12.1 | A-10, Due: 4-5 |
| 4-1 | (Mon) | Gravitation 1 | Chapter 12.2-12.4 |  |
| 4-3 | (Wed) | Gravitation 2 | Chapter 12.5-12.7 |  |
| 4-5 | (Fri) | Simple Harmonic Motion 1 | Chapter 13.1-13.2 | A-11, Due: 4-12 |
| 4-8 | (Mon) | Simple Harmonic Motion 2 | Chapter 13.3-13.5 |  |
| 4-10 | (Wed) | Simple Harmonic Motion 3 | Chapter 13.6-13.8 |  |
| 4-12 | (Fri) | Waves 1 | Chapter 14.1-14.2 | A-12, Due: 4-19 |
| 4-15 | (Mon) | Waves 2 | Chapter 14.3-14.4 |  |
| 4-17 | (Wed) | Review |  |  |
| 4-19 | (Fri) | Exam III | - | Partial Credit, Due: 4-26 |
| 4-22 | (Mon) | Superposition \& Interference 1 | Chapter 15.1-15.2 |  |
| 4-24 | (Wed) | Superposition \& Interference 2 | Chapter 15.3-15.5 |  |
| 4-26 | (Fri) | Superposition \& Interference 3 | Chapter 15.6-15-8 |  |
| 4-29 | (Mon) | Final Exam 7:45am - 9:45am |  |  |

# PHYSICS 193H Honors Physics I - Mechanics Spring 2002 General Information 

- Course Outline: Classical mechanics and waves
- Lecturer:
- Recitations: Tuesday, 10:20-11:10
- Textbook:
- Quizzes:
- Exams:
- Grades:
- Lectures: Monday, Wednesday, Friday, 10:20-11:10, PA118.

Section 1: PA120
Section 2: PA317

- Office Hours: Friday 1:00-2:00 pm and by appointment
- Homework: There will be 12 homework assignments, which are due on Fridays at 10:15 am (see course schedule). Students are encouraged to use MSU's CAPA system. A student may enter solutions to questions and problems and know immediately if they are right. There is no penalty for wrong answers and credit is earned for all correct answers entered before the due date of the assignment. If you do not use CAPA you hand in your problem solutions together with the assignment sheet at the beginning of class on Fridays in the usual way.
- Help: A TA will be available for homework questions at times to be announced.

In addition, we will set up a discussion forum within CAPA where students can post and answer questions. A TA will also be online to answer questions and discuss problems (times to be announced).

- Reading: You are expected to read the chapters listed in the course schedule prior to each lecture.
Prof. Georg Bollen
- Office: W-103 Cyclotron Laboratory
- Phone: 5-9672 ext 345 e-mail: bollen@nscl.msu.edu

Co-Lecturer: Dr. Thomas Baumann
'Physics for Scientists and Engineers'
by Fishbane, Gasiorowicz \& Thornton, Prentice Hall

There will be unannounced short quizzes during lectures.
There will be three hour exams and one final exam. The final grades will be calculated from the Homework assignments (28\%), Quizzes (5\%), Midterms ( $11 \%$ each), and the Final exam ( $34 \%$ ).

| $x=\%$ of total points | Final Grade |
| :---: | :---: |
| $90 \leq x \leq 100$ | 4.0 |
| $83 \leq x<90$ | 3.5 |
| $76 \leq x<83$ | 3.0 |
| $70 \leq x<76$ | 2.5 |
| $64 \leq x<70$ | 2.0 |
| $58 \leq x<64$ | 1.5 |
| $52 \leq x<58$ | 1.0 |
| $0 \leq x<52$ | 0.0 |

