

Lecture 19

Pre-Lecture Preparation:

- Read pages 316 – 327 and 332 – 337
- Do the Conceptual Questions (p. 339): 5 and 11
- Do Problems and Exercises (p. 340) 1, 3, and 7

Goals for the Lecture:

- 1) Understand how to use rotational kinematics equations to solve rotation problems
- 2) Understand what torque is and how to calculate it
- 3) Understand how to use Newton's 2nd Law for rotation ($\sum \tau = I\alpha$) to solve problems
- 4) Know how to use the chart of rotational inertias to find rotational inertia of common shapes about typical axes of rotation

Post-Lecture Study Guide:

Review the worksheets or other lecture material within 24 hours (preferably the same day as the lecture) to reinforce the ideas

Do problems:

Ch 9: Problems and Exercises: 10 and 37

Continue with the additional recommended study problems from chapter 9