

Some final notes

1. I will have Exam 5 and Project 3 available for you to pick up on Friday afternoon. I will send an e-mail when I have finished grading the exam and project.
2. Our final exam is scheduled for 8:00-10:00 am on Wednesday, May 9. I will extend the exam period until 10:30 for those who want. The exam will cover material from the entire semester.
3. You can bring one sheet (standard notebook size) of notes to use on the final. You can use both sides of the sheet.
4. I will be available many hours during reading period and finals week. Feel free to stop by my office to see if I am in. To guarantee finding me, your best option is to schedule a specific appointment time. Call (3567) or e-mail (martinj@ups.edu) to set up a time to meet.
5. I will soon put a score check feature on the course web page. You should use the score check feature to see if my records match your records. If you note any discrepancy, let me know as soon as possible.
6. Here are some ways to organize your review of course material:

(a) Think about the different types of functions we have studied:

- $f : \mathbb{R} \rightarrow \mathbb{R}$
- $\vec{r} : \mathbb{R} \rightarrow \mathbb{R}^n$
- $f : \mathbb{R}^n \rightarrow \mathbb{R}$
- $\vec{F} : \mathbb{R}^n \rightarrow \mathbb{R}^n$

(with focus on $n = 2$ and $n = 3$). For each type of function, you can think about

- geometry and visualization
 - differential calculus
 - integral calculus
- (b) Categorize things into concepts/ideas, computational techniques, and applications. For example, consider the line integral of a scalar function for which we have
- The idea: Limit of a sum of terms, each of which is function output multiplying length of small curve piece.
 - A computational technique: Express as a definite integral in terms of one variable.
 - An application: Compute total mass given length mass density along a curve.