CSC408F/CSC2105F – Software Engineering **Fall 2003/2004**
Mid Term Test (15% of course mark) **October 29, 2003.**

5 questions on **1** page. **100 marks total. 50 minutes total Open Book & Notes**
Answer ALL 5 questions. All questions have equal weight. WRITE LEGIBLY!
If you need to make any assumptions to answer a question, state those assumptions clearly in your test book.

1. Assume you are managing a large software project. You have 3 sub-managers and 35 developers working for you. Your team has been working on this project for 2 years. You expect that it will take another 2.5 years to finish the project.. Another large project has just finished and 2 more sub-managers and 25 more skilled software developers are being transfered to your project. What are the major management issues that you will have to deal with in handling this influx of new people? How do you think this change will affect progress in your project over the next year? Explain your answers.

2. One of the hardest issues in software project management is getting an accurate picture of the **true state** of the project. Assuming that the information you receive from the software developers may not be accurate (i.e. they might lie) what other ways are there to get accurate information on project progress?

3. It was argued in lecture that it was very important for software developers to build **exactly** the software called for in the system requirements and specifications. Explain why this principle is so important for successful software development.. Did the teams that made BigString into a Java **package** in Phase B violate this principle?

4. Assume the instructor has given you the ability to form an **optimal** 5-person team for the CSC408H course project from all of the students in the class.
a) What mix of software development skills would you want the people on your team to have?
b) How would you select members for your team?

5. The personal capabilities discussed in lecture are:

1. Ability to perform the work
2. Interest in the work (project)
3. Experience with similar projects
4. Experience with project tools and languages
5. Experience with similar techniques
6. Experience with the project development environment
7. Education and training
8. Ability to communicate with others
9. Written communication skills
10. Ability to share responsibility with others
11. Management skills

Rank these capabilites into three categories **very important** , **important** and **less important** in terms of how much they contribute to the success of a software development project. Justify your answer.