Dear CMP 405 Student,

I am writing to tell you a little about me, to explain my hopes for the course, and to begin discussing how we can best work together. This is a “writing-enhanced” course, meaning that we will use techniques for better reading and writing to enhance the course, improve my teaching, and increase your learning. Carla Dubose is a Writing Fellow for the course. She will observe and make suggestions to make this the best possible course about computer networks. She may be writing you separately.

We will also use an experimental “virtual lab,” that enables you to do your lab assignments from home or any other Internet connection. I will ask for regular feedback on its effectiveness and ease of use.

I am writing this on the day of Barack Obama’s inaugural address. It seems appropriate today to consider where we fit in this enterprise that is America. In his address, he said:

In reaffirming the greatness of our nation, we understand that greatness is never a given. It must be earned. Our journey has never been one of short-cuts or settling for less. It has not been the path for the faint-hearted - for those who prefer leisure over work, or seek only the pleasures of riches and fame. Rather, it has been the risk-takers, the doers, the makers of things - some celebrated but more often men and women obscure in their labor, who have carried us up the long, rugged path towards prosperity and freedom.

Those of us who work with computers are “makers of things.” This can be tedious and boring, but remember that computers hold airplanes in the sky and put men on the moon. When we build computer systems, we are helping others explore, or heal, or entertain, or learn. If we do our job well, they can do theirs well; if we don’t, they may fail.

I have taught for at least 16 years and done research for more than 30. Currently, my research involves networks, so this course is dear to me. I have thought a lot about course objectives, and after years of consideration I think the most important things you can learn are how to learn what you need to know on your own; how to explain your ideas and your understanding to others; and how to apply what you know.

There are also a few important concepts and principles of computer networks that you need to learn, and we will cover them in this class. We will try to use the process of learning these to achieve all the course objectives above. I have a few specific proposals about how we can work together to achieve these objectives:

1. Because communication is crucial in today’s technical professions, the “writing-enhanced” nature of this course will give you practice in communication skills. We will do several different kinds of technical writing in this course: