Assignment 6

1 Final Project (Proposal)

The final project is a great opportunity to attack a substantial (but tractable) computational problem. This could involve numerical simulation or data analysis. The work need not be original research. However, a problem relevant to your research or thesis would be ideal. I will be available to provide advice and guidance at any stage. Some areas where you may want to look for a project:

- *Chaos*

- *Cryptography*

- *Image processing*

- *Machine learning and data mining*

- *Monte Carlos Simulation*

- *Dynamical, Finite State, and Complex Model Simulations*

- *Probability and Statistics for Simulations and Analysis*

- *Simulations Results Analysis and Viewing Tools*

- *. . .*

Find an idea or paper that you would like to develop and better understand using the computer and

- (*50 Points*) Formulate a concise (about **2-3 pp**) **proposal** which should:

  - provide a mathematical definition of the problem,
  - state your goals,
  - describe (as best you can at this point) the approach you intend to take.
  - provide some references