Exam Format:

Multiple Choice and programming

Most questions will center around “What is the output?”. Based on

- Reading assignments,
- labs,
- homework assignments,
- lecture activities

What you should know?

- Basic UNIX commands (ls, cp, mkdir, chmod, cd,pwd, ., .., etc.) – Chap 1&2 of Unix book plus what is in the labs
- Operators (+ - * / ^ .* ./ .^) – element-by-element
- Order of Operations
    - PPMDAS
- MATLAB creating scalar, vector and Matrices
- Manipulating MATLAB matrices
    - creating, indexing, extracting data from
    - transpose operator
- Built in functions
    - Be familiar with more common ones (sqrt, nthroot, min, max, sin, cos, tan, sum, length, primes)
- Binary Number System
    - Be able to convert from decimal to binary and vice versa
    - Be familiar with ASCII
- User Defined Functions
    - function <return value> = <fun_name> (<inputs>)
- M-Files – Script, Function and Test
    - Variable Memory in Script vs. Function m-Files
    - If-Else as scene in test files.
- Software Development Cycle
    1. State the problem

2. Describe the input and output values
3. Develop an algorithm using hand examples
4. Solve the problem (MATLAB solution)
5. Test the solution with data created in step 3

- Input/Output
  - input command
  - disp command
  - fprintf command
- Plotting
  - plot
  - title, xlabel, ylablel
  - legend
  - axis
  - hold
  - grid
  - subplot

Commands you should know

- format
- clear
- clc
- whos
- which
- input
- fprintf
- disp
- meshgrid
- plot
- title, xlabel, ylable
- legend
- hold

- grid
- axis
- subplot