Review for Midterm (Wednesday, October 9th)

Test Guidelines:
• Closed Book. You will be allowed to have one 8½” x 11” notesheet (front and back).
• Definitions, concepts and assumptions of all topics (See below).
• Four to Five problems (any applicable charts or graphs will be provided).
• You will be REQUIRED to do ALL work on engineering paper.

TOPICS:

1. Background
   • List the sources of pollution in urban runoff
   • Identify the changes in a storm hydrograph due to urbanization
   • List the typical water quality parameters in urban runoff

2. Measuring/Estimating Storm Water Quality
   • Describe and/or compute hydrograph, pollutograph, and loadograph
   • Compute Event Mean Concentration (EMC) given data
   • Estimate the amount of pollutant accumulated on a land surface
   • Estimate the pollutant removal from an impervious land surface
   • Define “First Flush”
   • Calculate Mass First Flush (MFF)
   • Determine whether First Flush is apparent in a data set.

3. Regulations
   • Describe the NPDES program
   • Describe the elements of a stormwater management program
   • Describe TMDLs.

4. Best Management Practices (BMPs)
   • Define and list BMPs
   • Design a detention pond for sedimentation

5. Reading Material (see reading list on website)