ISC 559 IS Appl Design-Implementation
Spring 2010

May 3, 6:00-8:00 FCE 17
May 5, 6:00-8:00 FCE 19

Final Exam Study guide

**Code explanation (60%)**

Be able to explain C# code from our course project including segments from managing state, exception handling, input validation, SOA, web services, AJAX, CSS, and Crystal reports.

See sample questions and answers (code explanations) from the exam 1 study guide.

**Multiple choice, short answer and discussion (40%)**

Be able to answer multiple choice and short answer questions from the following topics:

- Managing State in Web Applications (msdn)
  - Determining State Lifetime
  - Exception handling
- Storing State in the Session Object
  - Storing State in the In-Process Session Object
  - Using the Session Object
  - Be able to list at least two benefits of using session memory
- Storing State in Cookies
- Storing State in Hidden Form Fields
- Storing State in Query Strings (URL fields)
- Storing State in ViewState
- For client side state management there is a section called “use cookies/hidden fields… when” for each technique. Be able to list at least two items from these lists.
- Input validation
  - Be able to describe how to use validator controls and validator summary.
- Exception handling
  - What is the overall philosophy of exception handling?
  - Why not catch exceptions that can lead to unexpected or exploitable state?
  - What is an alternative to catching non-specific errors?
- AJAX
  - What is the difference between a postback and a callback?
  - Be familiar with the main points in Clay Davidson’s article. For example:
    - What is the goal of AJAX?
    - What does each part of the acronym mean?
    - What other technologies can achieve this goal?
    - How does AJAX accomplish this goal?
    - What did Jesse Garrett mean that AJAX is just a “marketing tool”??
What was Clay’s conclusion about AJAX?
What is the DOM and what is its primary purpose?
Be familiar with the issues discussed in the AJAX and XML ppt slides. For example:
   Why is HTML good for publishing but not for data exchange?
   What role does XML play in data exchange?
   Into what three parts does XML separate a document?
   Be able to briefly explain the XML in the ppt slides.
   What is the purpose of an XML schema?

CSS
   What is CSS?
   What problem does CSS solve? How does it solve it?
   What is the basic syntax of CSS?
   What are the three ways of using CSS? (external, internal, inline)
   Briefly describe the CSS box model.
   How is a id selector different from a class selector?
   Be able to discuss at least three of the reasons given in “13 Reasons Why CSS Is Superior to Tables in Website Design.”
   Be able to describe how tables can be used for page layout.
   Be able to briefly describe “page flow” and absolute versus relative positioning in Visual Studio.
   What does the Z-index define?

Crystal Reports
   Describe the process of setting up the connection of a Crystal Report to a sproc.

I embedded sample questions in some of the podcasts.

Be able to answer multiple choice, short answer and discussion questions for SOA. I will select questions directly from the questions submitted for Exercise 4 (with revisions as necessary). I will include the answers with the questions…