The exam covers material since the last exam.

- Sections 6.1-6.3
- Factorial calculations.
  - The material was covered in class. This is spread throughout sections 4.3, 4.4, 7.1, 7.2, 7.4, 8.1, 8.2
  - The class coverage was more specific on what I expect you to know.

- You may use 2 pages (front and back) of your own notes to sue on the exam.
- I will also provide you with the Satterthwaite approximate df formula

**Posted Notes**

http://www.d.umn.edu/~rregal/stat3411_lectures.html

**Chapter 6**

6.1 Large Sample Confidence Interval for a Mean
6.2 Large Sample Significance tests for a Mean
6.3 One and Two sample Inferences for Means
6.5 One and Two sample Inferences for Proportions
6.6 Prediction Intervals

**Section 6.1 - 6.2**

**Section 6.3**

Section 6.3 One-sided Tests
Assumptions and Checking Assumptions
Advantage of Pairing
Journal of Biomechanics: Paired T-tests and P-values
T-tests and Confidence Intervals: Summary

**T-tests and Confidence Intervals: Basic Facts**

Chapters 4, 7, and 8: Analysis of Factorial Data

4.3 Fited Effects for Factorial Data
4.4 Transformations and Choice of Measurement Scale
See Also Chapter 7 Sections 1, 2, and 4: Single Factor Designs
8.1 Two-Way Factorials with Some Replication
8.2 p-Factor Studies with Two Levels for Each factor

**Chapter 4: Interactions**

**Chapter 7**

**Chapter 8 Factorial Calculations**

Section 4.3 ANOVA
Section 4.3 ANOVA Computation Summary
Section 8.1 - 8.2

Chapter 8: Summary

The Basics

Section 4.3 & 4.4 Log Models

Bending Rods

Variance Estimates and Degrees of Freedom

Sample Exam Questions

http://www.d.umn.edu/~rregal/oldexams_stat3411.html

Chapter 6: Sections 6.1 - 6.3

Questions:  Not question 12
Answers
Paired Elasticity Measurements for Boards

Sections 4.3, 4.4

Questions:  2, 5
Answers

Chapter 8

Questions patterned after class examples, assigned problems, and suggested problems

In Class April 21
In Class April 25
In Class Woods and Glues:  Not part (b)
In Class Propellants in Ln Scale

http://www.d.umn.edu/~rregal/stat3411_exams.html

Exam 3

Sample Questions with Answers on Factorial Analysis

Propellants
Painting
Syrup Interactions
Drain Tubes
Metal Rod Bridges
Rubber Band Car
Answers