MA 558  Statistical Consulting  Spring, 2002

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1  Overview of the Course

The following pretty much summarizes what I want to do in this course. We may or may not do all of these things, depending on how busy we get with clients. If you have different goals you'd like to address, let me know: maybe we can work them in.

Goal 1: Develop professional, personal and “person” awareness and skills in consulting.

- **Resources**
  - Boen and Zahn, *The Human Side of Statistical Consulting*; available in the library.
  - Papers by Joiner, Deming, Kirk, Hoadley et al and Penner and Watts.

- **Activities**
  - Discussions of readings.
  - Analysis and discussion of videotaped practice consulting sessions.
  - Consultations with “live” clients (if any can be captured).

Goal 2: Statistical practice

- **Resources**
  - Papers by Mark and Workman, Sterling et al, Chatfield, etc.
  - Consulting problems.

- **Activities**
  - Read and discuss the papers.
  - Discuss and solve consulting problems.

Goal 3: Design of studies.

- **Resources**
  - Paper by Coleman and Montgomery.
  - Initial consultation form (written and web-based). The paper version is found in /math/projects/GRAD/statconsult/forms/consultsheet1.tex. The web-based version is found at http://www.math.wpi.edu/statconsult/sc1.html.
  - DOE planning form (courtesy of last year’s MA 558 group). This is a Microsoft Word document found in /math/projects/GRAD/statconsult/forms/doeform.doc.
  - Observational study planning form (courtesy of last year’s MA 558 group). This is a Microsoft Word document found in /math/projects/GRAD/statconsult/forms/observe.doc.

- **Activities**
  - Read materials.
  - Practice using materials.
Goal 4: Develop knowledge of the breadth of statistical applications, and an ability to critically evaluate statistical analyses done by others.

- Resources
  - Various journal articles.
- Activities
  - Read and discuss materials.

2 Grades

As with most seminar courses, there is no formula for grades, but a student’s grade will be based on in-class participation, on the overall level of the student’s consulting and statistical problem-solving skills as reflected in the student’s submitted work and work in class, and on the student’s improvement in those skills over the course of the semester.