

STAT 8801 Statistical Consulting

Methodological Discussion

A consulting statistician must be jack of all trades and master of some. You've learned a lot about statistics from your courses, but there are many, many other methods out there.

Below is a list of methods/topics that could conceivably be useful in consulting and may not have come up in your coursework. Each of you is to prepare a presentation of ten minutes on one of these methods. Your presentation should

- Describe what the method is for.
- Give an example of a potential or preferably real application.
- Give a reference where others could go to find out more.
- Is software available for this method? If so, tell us about it.
- Include a **one-page handout** that summarizes your talk and provides references. The handout must include your name and the date of your presentation.

You should also be prepared to answer questions from the audience.

You will be given evaluations of your presentation by every member of the audience.

Feel free to ask me questions. A schedule of topics, speakers, and dates is given below.

| Name | Topic | Date |
|-----------------|---------------------------------|--------|
| Shengjie Zheng | Bioequivalence | Apr 17 |
| Jinghan Meng | Ecological inference | Apr 17 |
| Luke Chmura | Instrumental variables | Apr 17 |
| Sally Gustafson | ROC curves | Apr 17 |
| Aysel Yilmaz | Item Response Theory | Apr 24 |
| Tianyang Zhou | Measures of Agreement | Apr 24 |
| Ji Hoon Ryoo | Structural Equation Modeling | Apr 24 |
| Qihui Chen | Seemingly Unrelated Regressions | Apr 24 |
| Fanhuan Zhou | Errors in variables | May 1 |
| Chen Xing | Imputation of missing values | May 1 |
| Julia Molony | Intent to treat | May 1 |
| Michael Soma | Kaplan-Meier estimator | May 1 |