Boston University
Math Boot Camp for the Political and Social Sciences
August 27 – August 31
Matthew Morse
Syllabus

Class Time: 10:00am–3:00pm, Thurs: 10:00–12:00
Website: http://math.bu.edu/people/mrmorse/bootcamp/
Email Address: mrmorse@bu.edu

Text: A Mathematics Course for Political & Social Research, by Will H. Moore & David A. Siegel

Course Description: This course will cover mathematical concepts which provide necessary background for working with quantitative data in the political and social sciences. Topics include a review of algebra and functions and an introduction to matrix algebra and calculus, including differentiation and integration. The goal of this course is preparation for future coursework in statistics and quantitative reasoning.

Homework and Grading: This course is not graded. There will be no required homework. However, practice problems will be given in class, and you are highly encouraged to work on these problems in class and on your own.

Tentative Schedule:
August 27: Algebra, Functions: Variables, algebraic properties, solving equations. Functions, graphs, linear functions. (Textbook chapters 1–3)
August 28: Nonlinear Functions: Exponents, logarithms, radicals. (Textbook chapter 3 cont.)
August 30: Advanced Differentiation: Rules of differentiation. (Textbook chapter 6)