# ICPSR BULLETIN

Volume XXIX, No. 2 Fall 2009



# Introducing TeachingWithData.org

## **Lynette Hoelter**

University of Mlchigan

The Instructional Resources and Development unit is excited to announce a new resource for faculty teaching undergraduate social science courses! ICPSR has partnered with the Social Science Data Analysis Network (SSDAN), also at the University of Michigan, to create a repository of materials and tools to make it easier to use real data in undergraduate social science classes. TeachingWithData.org provides a single portal where faculty can find resources to bring real data into post-secondary classes. Instructors are encouraged to infuse quantitative reasoning throughout the social science curriculum with readily available, user-friendly, data-driven instructional materials. Including data early and often throughout the curriculum not only allows students to practice quantitative skills such as reading a table or translating numbers into a graph or chart, but their interest in and understanding of course material can be piqued by the excitement of doing empirical work. Additionally,

opportunities to see how social scientists really work should reduce some of the disconnect students often feel between substantive and methods/statistics courses.

Instructors can find links to many types of student activities and supporting materials on TeachingWithData.org. Those who want to pull a number or two to enhance lecture materials or locate data to create an activity will find tabular and downloadable data from a variety of sources. Interactive and static data-based maps are also offered for more thorough exploration activities. Student exercises, complete with instructions and pre-packaged data, and games and simulations are readily available. A later stage of the project involves repackaging the complex American Community Survey for instruction with simple, easy-to-use extracts for multiple levels of geography and a wide range of topics. The site also



Lynette Hoelter is the Director of Instructional Resources and Development. She has a Ph.D. in Sociology from Penn State and this, combined with her passion for teaching

and learning, make working on projects like TeachingWithData.org a natural fit. Lynette directs ICPSR's Online Learning Center and is involved in a project to assess the effectiveness of online resources on students' quantitative literacy skills. Her substantive interests are in family sociology and social psychology (relationship dynamics) and research methods.

contains faculty resources that promote quantitative literacy in the social sciences. These include pedagogical research on teaching and learning with data and other materials that facilitate the integration of data

See TeachingWithData.org, p. 2

## INTER-UNIVERSITY CONSORTIUM FOR POLITICAL AND SOCIAL RESEARCH

George Alter, Acting Director Mary Vardigan, Assistant Director

### **COUNCIL MEMBERS**

Aletha C. Huston, Chair University of Texas at Austin

Francine Berman University of California, San Diego

Michael F. Goodchild University of California, Santa Barbara

Michael R. Haines Colgate University

Kathleen Mullan Harris University of North Carolina at Chapel Hill

Thomas LaVeist Johns Hopkins University

Jeffrey Moon Queen's University

Samuel L. Myers Jr. University of Minnesota

C. Matthew Snipp Stanford University

Lori M. Weber California State University, Chico

Ann Wolpert Massachusetts Institute of Technology

Christopher Zorn Pennsylvania State University

#### **BULLETIN STAFF**

Editor: Jenna Tyson

TeachingWithData.org (cont. from page 1)

from government sources, opinion polls, and social science surveys into courses. Comprehensive metadata make the collection searchable by discipline, content area, type of source, course level, and more. Materials are also linked to the Pedagogy in Action service at the Science Education Resource Center (Carleton College) where applicable. Resources are especially relevant for courses in demography, economics, geography, history, political science, public policy, social psychology, and sociology.

Although Teaching With Data.org is currently in its early stages, plans are already in the works for expanding the site to become more than merely a repository. Data-related tools will be added to assist faculty in creating their own learning modules by automating data extraction, and easily connecting data with analysis or visualization tools. These tools will allow instructors (or students) to identify relevant data and create custom data extracts using only the variables that are needed for an exercise and to display survey data in tabular, graphic, mapped, or other forms. A "toolkit" will simplify the process of creating and sharing data-driven learning modules with other faculty. The ability to use data will be broadened for less experienced users by making it easy to develop datasets customized with only variables of interest, using common statistical packages such as SAS, SPSS, and Stata. Online analysis software — such as the Survey Documentation and Analysis (SDA) package currently used by ICPSR and WebChip, used by SSDAN — can alleviate the need for students to learn additional statistical packages. This allows instructors to concentrate

on teaching content or working through exercises in class rather than spending valuable time teaching the software package itself. A further goal of the project is to build community



among social science faculty by training them and encouraging them to use and share materials though workshops, webinars, and outreach activities. Web 2.0 features and involvement of editorial and advisory committees will also provide opportunities for interaction and collaboration among users.

TeachingWithData.org is a National Science Digital Library funded by the National Science Foundation. The project receives additional collaboration and support from the following organizations: American Economic Association Committee on Economics Education, American Political Science Association, American Sociological Association, Association of American Geographers, Consortium for the Advancement of Undergraduate Statistics Education, MAA Mathematical Sciences Digital Library, National Numeracy Network, and Science Education Resource Center at Carleton College. TeachingWithData.org was launched in late 2009, with many additions, changes, and updates forthcoming! Please feel free to contact Lynette Hoelter, lhoelter@umich.edu, with questions or comments about any of the resources ICPSR offers to promote the use of data with undergraduates.