Kenneth Stehlik-Barry PhD

Summary of Experience

Mr. Kenneth Stehlik-Barry has acquired expertise in a wide range of predictive analytic techniques during his 33-year tenure at SPSS and IBM. He joined SPSS as Manager of Training and subsequently took responsibility for the Technical Support and Statistics groups in addition to Training. For the past 19 years he has worked as a Project Manager and a Principal Analytics Consultant on consulting projects for major SPSS and, since 2009, IBM clients.

Synopsis of Industry Specific Implementations

Here is a sample of some specific implementations that Mr. Stehlik-Barry has performed:

- Created a web-based reporting system for all the schools and districts in a state with cross-year comparisons. Results from the state assessment test were broken down by student demographics and grade level within each school.

- Worked with school districts and state education agencies to develop evaluation systems for school and student performance.

- Used Point-of-Sale data, trade area demographics, and store attributes to predict the most appropriate product assortment for individual retail locations

- Using data from a direct mail marketing campaign, built a model predicting response likelihood and used it to score the database. Subsequent mailings targeted the most likely responders and the model is updated periodically to maintain its accuracy.

- Worked with one of the big three U.S. automakers to analyze web log data from a pilot site designed to allow customers to schedule service appointments online. Web logs were obtained weekly and processed through an analysis program that published results to a web page setup as an ASP for the client. Trends of site usage and transaction completion were made available as well as patterns of session abandonment. This allowed the client to refine the scheduling procedure and simply the overall process for the dealerships as well.

- Analyzed Medicaid claims for a state and segmented the recipients that had submitted claims for a particular prescription drug that is prone to fraudulent claims/abuse. Individual recipients were grouped based on a wide range of demographic and medical characteristics to help identify situations in which high level/long term use of the drug was warranted as well as groups were such usage was questionable. This allowed the state to focus their investigative resources more effectively.

- Teamed with a group of internal staff at the IRS to build a model that predicts the likely result of an audit based on taxpayer characteristics and the results of audits conducted by the agency in the past. By scoring tax returns with the model, the agency can obtain an estimate of the difference between the reported tax liability and the liability that an audit would establish. This makes it possible to prioritize the returns that should be audited.

- Designed and help build a process that allows a hospital to track patient satisfaction trends across departments and clinics over time. Monthly surveys are scanned into the system and reports are automatically published to an internal web page that can be accessed by managers of each department and clinic. Changes in each satisfaction measure from month to month are reported with large changes "traffic lighted" to make them stand out. Levels of satisfaction on each measure are compared to the prior three months, the department as a whole, and to the hospital as a whole. This reporting system gives managers immediate access to information on how patients are perceiving the services they provide and how this perception is changing over time. They can instantly hit the web page during staff meetings to point out areas where improvement has been made and those that require more focus.

Consulting and Instructional Background

Mr. Stehlik-Barry has experience with numerous analytical methods including linear models, clustering techniques, decision trees, structural equation modeling and neural networks. He has worked with data from all the major database environments as well as many other forms of data including web logs. Mr. Stehlik-Barry often conducts specialized training sessions as part of major consulting engagements.

Mr. Stehlik-Barry has taught as an Adjunct faculty member at Northwestern University (Spring 2001) , Dominican University (Fall 2003), and University of Illinois at Chicago (since Fall 2008).

Education and Certifications

Mr. Stehlik-Barry holds both a Bachelor of Science in Political Science from the University of Illinois at Chicago and a PhD in Political Science from Northwestern University.

Member American Political Science Association
Member American Educational Research Association

Publications and Paper Presentations

2009 **"Using Research to Foster Democracy"** in The Future of Political Science 100 Perspectives Edited by Gary King, Kay L Schlozman, Norman Nie, Routledge Press, 2009

2007 **Using Predicted Scores for Curriculum Evaluation.** Paper presented at the American Educational Research Association annual meeting, Chicago.

2006 **Incorporating Value Added Data into the School Improvement Planning Process.** Paper presented at the Illinois No Child Left Behind conference February 2006.

2005 **Predicted scores in the SPSS Student Performance System.** Paper presented at the National Center for Education Statistics Summer Data Conference, Washington, D.C.

1999 **Changes in Political Tolerance 1976-98**. Paper presented at the Midwest Political Science Association annual meeting, Chicago.

1998 **Changes in Political Tolerance 1976-96**. Paper presented at the American Political Science Association annual meeting, Boston.

1996 **Education and Democratic Citizenship in America** Norman Nie, Jane Junn and Kenneth Stehlik-Barry, University of Chicago Press, 1996.