Beyond Self-Report: The Impact of TfU in the Classroom

For Roland Stark, a member of WIDE World’s research team, analyzing the classroom effects of Teaching for Understanding is not a simply a matter of tallying up course survey responses to see how many teachers said they liked the approach.

“It is a preoccupation with our work,” Roland noted. “A lot of people who investigate classroom instruction find that even carefully designed surveys don't always do a good job of capturing the kind of approaches teachers use. So we're trying to bridge the gap between what surveys show and what anybody might agree was happening in the classroom if they were there.”

This April, Roland, a former classroom teacher turned statistician, and David Eddy Spicer, WIDE World’s research manager, attended the American Educational Research Association’s annual conference in San Francisco to present their paper, “A Mixed-Methods Study of Shifts in Classroom Practice Related to Online Professional Development Courses.”

In addition, David organized a symposium involving several other educational research outfits, which focused on how to square invariably imperfect survey data with actual classroom change. Throughout the past year, WIDE World’s research team, which also includes Stone Wiske and Deryl Hatch, has been hard at work on this topic. For this study, they sifted through several hundred course evaluations and then through one-year follow-up surveys of 100 participants. To add extra depth to the study, they conducted interviews and observed classroom practices to get a closer look at a small group of teachers. The aim was to use quantitative and qualitative methods both to gauge the effects of the courses and (this was the hardest part) to scare up some better indicators that could be relied on to assess change in the way teachers go about their work - change related to constructivist, student-centered, or inquiry-oriented teaching.

“Teaching is such a complex process as it is,” Roland said. “And it's not as if years of research have been done on trying to measure the use of constructivist approaches to learning. We're trying to build a program at a large-scale, which means we need to quantify program effects, and there aren't any tried-and-true ways of doing that when it comes to constructivist methods.”

David and Roland's teacher interviews and classroom visits went a long way toward fleshing out some of the many positive changes teachers had reported in the one-year surveys. These changes showed up in lessons on, for example, *Lord of the Flies* (a unit creatively structured around the concept of “following a character”) and frog dissection (as a way of better understanding human anatomy). Rich profiles emerged of the ways teachers had applied what they had learned in the courses.

The researchers also found that, in certain respects, survey descriptions matched up very well with the way the lesson looked to an observer. For instance, this was true of teachers' choices of topics and the extent to which these topics seemed central, relevant, or generative. In other respects, such as teachers' strategies for assessment, it was much harder to find a match between the reported and the observed. This means that when it comes to assessment, Roland suggests, those looking to size up teachers' implementation need to rely on more kinds of information than surveys alone.

In addition refining their own methods, the research team is seeking the help of others:

“Independent evaluators of WIDE World from EDC (Education Development Center), for instance, helped us by devising a piece where we ask people to describe in several steps, and in detail, what they've tried with students and how it went. Another is a sort of mini-test of teachers' knowledge, where a teacher is asked, 'here's a situation, here's a colleague trying to do such and..."
such...- judging by what you’ve learned, what advice would you give?’ hopefully we can discover something about what people are taking away conceptually,” Roland said.

Using a combination of methods – surveys about practice; questions about conceptual knowledge; in-course performance assessment focused on lesson design; where possible, interviews and observations; and individual client studies, the research department hopes to fashion a new approach to assessing teacher change that will adequately reflect the effects of applying TfU.

As for Roland, there is one question posed at the symposium that sticks in his mind:

“One administrator asked about our prospects for showing long-term change, for sustainability of change. School leaders want to know whether constructivist change can be robust enough to last, and to show up in some objective way. That’s the kind of question that motivates us. At the same time we’re looking for promising early indicators that teachers are probably headed for long-term improvements.”

Those interested in reading David, Roland, and Deryl’s paper or viewing the accompanying PowerPoint presentation can find them at http://wideworld.gse.harvard.edu/impact/research/presentations.cfm.