

## CHAPTER 3

### METHODOLOGY

A holistic approach of inquiry involving the use of multiple methods and sources of data collection was used for examining the meanings, trade-offs and social consequences of the evaluation of teaching in the context of a research university, particularly to how the evaluation addressed diversity and equity concerns. The study used both qualitative and quantitative methods of data collection, including participant observation, in-depth and focus group interviews, document analysis, and survey research. The decision of using both qualitative and quantitative methods of data collection was because of their appropriateness for examining different facets of the phenomena under study, for triangulation, and for adding breadth and depth to the examination of the issues studied. These purposes are consistent with the suggestions made by Green, Caracelli, & Graham (1989) about the use of both quantitative and qualitative methods of research in a singular study.

A qualitative paradigm, however, was the dominant paradigm in use. Quantitative data collected through an online survey were used to probe in detail some aspects of the emerging issues of a major qualitative case study. The orientation of the inquiry allowed for understanding the processes and events taking place and the complexities of the context within which the study was conducted (Patton, 1980; Stake, 1995).

The first part of the research was an instrumental case study of a junior professor of minority ancestry (in the USA). The case was used for identifying and understanding the meanings given within the department to information about the quality of an instructor teaching. Attention was given to how different stakeholders interpret and use such evaluation

results, as well as to the tradeoffs faced by professors trying to improve their teaching. In addition, attention was given to how the issues identified in the case study were influenced by campus policies for evaluation and professional development. Robert Stake's<sup>1</sup> approach to case study was used, given its compatibility with the research orientation and the researcher's familiarity with this type of case study methodology.

After the case study was completed, as expected with instrumental case studies, two of the five prominent issues were selected for further analysis. This part of the research focused on understanding how gender, race, and ethnicity affected the evaluation ratings of the women and minority professors of the College of Arts and Sciences at Midwestern University. Then, a sample of undergraduate students from the same college was selected to further examine the meaning that students give to the construct "good teaching," and to the processes followed by different students when rating their instructors.

#### Sources of Data

Data collection started during the last week of August of 1999. At that time, preliminary interviews were conducted with administrators of the College of Arts and Sciences at Midwestern University trying to identify the ideal department to use for conducting the research. The original intent was to carry out the study of an instructor working for a department that was known for paying little attention to teaching. It was intended that the instructor participating in the case study would be a junior professor obtaining low ratings for his or her teaching. The reason behind selecting a department and

---

<sup>1</sup> Stake (1995). The Art of Case Study Research.

instructor with these characteristics was that this provided a unique opportunity for learning if the ratings and other evaluations were appropriately representing the quality of the instructor's teaching or something else. In addition, there was the belief that the study could be more beneficial for an instructor experiencing problems in teaching than for a very successful instructor working in a department offering strong support for improving teaching.

Unfortunately, the administrators of the Midwestern Departments suggested by an Associate Dean of the College of Arts and Sciences as ideal for conducting the study, declined to participate. At the end, the study was conducted in the History Department, a department well known for its strong reputation in both teaching and research in the campus community. So, instead of conducting the study in a Department that was not supportive of teaching, the study was conducted in a Department that had a reputation for excellence in instruction.

A similar situation took place in relation to the selection of the instructor. Although the Chair of the History Department offered a list of instructors who were going for tenure that year, they were not able to participate because they were either receiving very high ratings or were just hired. But one of these professors offered to ask a young colleague of his whom was very interested in improving her teaching. That instructor was Christy Evans. Even though she was not up for tenure that year, nor obtaining very low ratings for her teaching, Evans accepted and agreed to participate in the study.

#### Data Collection

Data in this study were collected using different methods. Participant observations were conducted in each of the courses taught by Evans. In-depth interviews were also

conducted with her, with some of her peers, with members of the Department Executive Committee and the Chair of the History Department. Additional in-depth interviews were conducted with campus administrators and with staff members and directors of the different units on campus involved in the evaluation and improvement of teaching. These units included the Teaching Advancement Board, the teaching academies, the Office of Instructional Support and Improvement, and The Center for Writing Studies.

In addition, a focus group interview was conducted with the students enrolled in Evans' 300 level course. Students who participated in the focus group were later asked to confirm or disconfirm the summary of findings obtained from the interview by responding to an e-mail inquiry.

As a final gathering of issue-based data, in-depth interviews were conducted with three legal counselors specializing in Employment Discrimination, Administrative Law and Tort Law, and with a sample of women and minority professors from the College of Arts and Sciences. Although the original invitation was extended to all 200 women and minority instructors working in that College, only twenty professors agreed to provide summaries of their Teacher Evaluation System (TES) profiles for analysis. Four of these instructors made themselves available for an in-depth interview. Another ten instructors who did not provide their summary reports were also interviewed. All the interviews conducted in this study took place in the interviewees' private offices, and lasted from 40 minutes to an hour. Document analysis also was conducted by reviewing campus policy documents, policy manuals, the evaluation forms of the instructor rated by her students, classroom materials, peer evaluations reports, and other records.

Still other data were collected from a random sample of 1,523 students enrolled in the College of Arts and Sciences. All were asked to respond to an online survey. The sample of students selected for the study, stratified by class, race, age, and gender is described in Table 2.

Table 2.

Sample Drawn of Students of the College of Arts and Sciences.

	Total	Class <sup>2</sup>				
		A	B	C	D	E
Total	1,523	330	397	372	423	1
Gender:						
Male	807	183	216	181	226	1
Female	716	147	181	191	197	0
Race:						
A. A	300	84	86	64	66	0
Asian	300	62	82	65	91	0
Caucasian	300	46	78	91	85	0
Hispanic	300	78	74	78	70	0
N. American	23	6	6	6	5	0
Other	300	54	71	68	106	1
Age:						
Mean:	20.8	19.2	20.1	21.2	22.5	
S.D.	1.9	0.7	1.0	2.0	1.3	

Of the 1523 students in the original random sample, responded to the online survey. The non-degree student included in the sample did not respond. Some students completing the survey omitted some demographic information. The response rates are described in Table 3.

<sup>2</sup> Note: Class A = freshmen; Class B = Sophomores; Class C = Juniors, Class D = Seniors; Class E = Non degree students.

Table 3.

Percentage of Respondents by Class, Gender, and Ethnicity

Class	Frequency	Percent
Freshmen	43	22
Sophomore	45	23
Junior	61	31
Senior	48	24
Gender		
Females	125	63
Males	72	37
Ethnicity		
Asian	50	23
African American	28	14
Caucasian	68	35
Hispanic	26	13
Native American	3	2
Other	21	11

Note: Two students did not complete the demographic section of the survey.

Data collection resulted in multiple statements, testimony, documents, and observation reports, as well as summaries of data.

Instruments

The main “instrument” used in the qualitative process of data collection was the researcher. The instrument most used in the quantitative process of data collection was an online survey.

The researcher. My background and experiences have shaped my perceptions about the evaluation and the improvement of teaching in higher education. I grew up in Merida, the capital of Yucatan, one of four children of working class parents. My father worked very hard, sometimes at two or three jobs, to give each of his children the opportunity to have an education, an opportunity that he had not had. My paternal grandparents were teachers, as were my two sisters who are kindergarten teachers. I am married and have no children. My husband is of White European ancestry, and like me, was the first child of a working class family to attend college. We have both lived in more than one country and share an interest for learning about other cultures and international issues.

My interest in teaching improvement began during my early practice as an attorney in Mexico. During that time, I had the opportunity to observe several cases in which young attorneys had made simple mistakes that resulted in serious consequences for their defendants. These experiences made me realize the importance of providing solid preparation to attorneys, and the enormous responsibility that higher education institutions have with the society that they serve. My growing interest for improving the preparation of attorneys led me later to accept an open position as a lecturer for the College of Law at the Universidad Autonoma de Yucatan. After accepting that position, I began to develop a more profound interest in the evaluation and improvement of teaching while trying to improve my own practice as a novice law instructor. Later, during studies for a Master in Education degree, I continued developing these interests as well as a concern for the organizational context for supporting instructional improvement. By being exposed to multiple perspectives in research

and evaluation during my doctoral studies, my interest in these areas began to increase even more, as did my concerns about the ethical aspects of research and evaluation.

As a researcher I bring with me my prior training from law and education and my experiences as an international student. They shape my perceptions and provide me with a means of looking at the issues.

As an attorney, I conducted research with a strong concern for social and ethical consequences. I feel comfortable using a case approach because the logic of the study allows me to do an interpretive in-depth analysis and to move from the general to the particular and vice versa. This gives me good opportunity to ponder how the general context applies to the case, and how the case can be used for identifying broader issues for the system as a whole. All this is highly compatible with the legal logic of analysis in civil law countries.

My experiences as an international student unquestionably influence my perceptions. By being born abroad, I am aware that my understanding of American society is limited, in comparison to most natives. In one sense, it warns me against rushing into interpretation. It helps me realize that meanings and understandings change as we move from one context to another. It also increases my concern for being careful and fair in my interpretations. Being born in a foreign country perhaps influences the way I look at people. I tend to look at them as individuals rather than as members of groups. Although I recognize the influence of the social and cultural context, I tend to view each person as unique. Labeling people makes me feel as if I deny them their humanity. Living in another country has also changed my perception about my own society. Now I am more critical about preconceptions of meanings and the construction of social truth.

As a doctoral student in Education, I have been exposed to different views of research and evaluation. My research methodology emphasis was on program evaluation, but following the advice of one of my professors, I also completed coursework on quantitative and qualitative methods of research. I would say have a strong interest in qualitative methodology because of my orientation toward complexity and uniqueness.

Being exposed to a range of teaching styles and views of research and evaluation was very important for my preparation. It helped me identify the issues for this study. It was precisely my interaction with non-traditional teaching styles and different approaches to teaching and learning that raised already developing concerns about how the evaluation could fairly represent different kinds of teaching. My concern increased about the possible trade-offs that could take place when adopting a singular approach for evaluating teaching. I began to explore these trade-offs in three case studies that I conducted in Midwestern University prior to planning this dissertation. The emic issues that resulted from those cases were later to frame the issues that guided this study.

So, my interests and research focus have evolved as a result of the various experiences and long-acquired knowledge background. I believe all of it has created certain preconceptions, resulting in both in strengths and limitations. I also know that I, as any other researcher, have biases and preconceptions, many of which I am not aware. I realize of course that acknowledging my biases does not authorize me to treat my impressions as respectable evidence. Qualitative methods do encourage personal interpretation of phenomena, but also insist on triangulation, i.e., on efforts to find confirmation or redefinition in other perceptions of the same phenomena (Stake, 1995). The principal triangulation in this study is the use of

multiple data sources and alternative data gathering procedures in order to substantiate important observations.

The survey. An online survey was used to collect information from the sample of students from the College of Arts and Sciences described earlier. This survey was based on the responses and issues identified by Christy Evans' students during the focus-group interview that took place at the end of her 300 level undergraduate course. The survey had a demographics section that asked students to indicate their class level, race or ethnicity, and gender. It also included seventeen items, of which eleven were open-ended and five were multiple-choice. The seventeen items focused on the meanings of good teaching and the processes followed by students when completing the TES evaluation (See Appendix A for a copy of the survey).

The decision to develop and administer the survey was made in November of 2000, after students and professors who participated in the first part of the study raised concerns about the fairness of evaluation. It took me five months to obtain permission to send an e-mail message to the students included in my sample. The survey was available online in April, one week before final-exams of the Spring semester of 2001. Perhaps this timing was part of the reason for the small number of respondents (13%).

Getting permission to invite students to complete the survey took a long time, but even more time was devoted to obtaining permission to obtain a list of minority faculty members working in the College of Arts and Sciences. Several administrators stated that the reason for not providing the list was that this information was confidential. The heads of the "cultural centers" on campus told me that it would be very difficult to obtain this information

because, although University administrators had classified the instructors by race, it was not necessarily a classification that the instructors would agree to. The heads of these units added that a request that professors release their TES Summary Profiles was difficult for faculty members to grant. Even with many protections, the small number of minority faculty members on campus might make participants easy to identify.

### Data Analysis

Qualitative data analysis, as in most interpretive studies, started as soon as data collection began and continued to the end of the study. Much of the qualitative data collected was transcribed, stored electronically, and organized around the issues of the study. The analyses were interpretive. "Member checking" was used for verifying the facts and interpretations made by the researcher. Transcriptions and written interpretations were made available to the interviewed, an opportunity for confirming the accuracy of quotes and descriptions. Quantitative data analyses took place after collecting the information from the online survey. Descriptive statistics were used to analyze survey responses, including frequency and percentages of responses to each of the items of the survey. Chi Square statistics were then calculated to determine if there were statistically significant differences among the different respondent groups in relation to their class (freshman, sophomore, junior, senior), gender, race or ethnicity.

The methods used, the length of the time devoted to data collection on site, and the use of multiple sources of evidence were organized for understanding and redefinition of the issues of the study. As data were analyzed, issues were refined, and the design of the study was extended into another round of data collection. As Stake indicates (1995), this is not

slipping into a new study or correcting faults in the design but a legitimate method of emergent qualitative study.

### Ethical Considerations

As a qualitative researcher, I used several safeguards for protecting the participants of the study. First, the research objectives were verbally articulated so the participants could understand and discuss their concerns with me or with others. Written permission was obtained prior to the study, as well as approval from the Campus Research Board. In addition, because the records collected included personal and private information, consent of the parties involved in the study was obtained prior to accessing to the data. To ensure confidentiality, pseudonym was used as names of the participants. Some events were presented in ways that diminish personal recognition.

Some circumstances, however, may not allow the full protection of subjects. Some of the students at the focus-group session told Christy Evans what their classmates had said about her and the class during the interview. Because all comments were generally positive, it was not an issue that someone could be hurt because of his or her comments about the instructor. Some of Evans' colleagues also learned about the case study because some of the interviewees commented about their participation in the case. This affected Evans indirectly because it increased the image that she was interested in teaching, and the following semester she was put in charge of the teaching assistant training for the Department.