

STUDENT PERCEPTION OF GOOD TEACHING

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INTRODUCTION

University faculty and administrators have been formally gathering data from students about their teaching and learning experiences for more than a century (see Aleamoni 1999 for an informative history). The most frequent technique for soliciting student views has been to administer paper and pencil questionnaires, most often during a course session. While the most common use for these data has been to evaluate the teaching performance of professors, especially for the purposes of the retention, promotion and recompense (see Wachtel 1998 and Wolfer and Johnson 2003 for two useful reviews), other studies focus on students' use of and response to particular teaching strategies or media of instruction, while still others examine pedagogical methods in specific disciplinary contexts.

This paper reports finding based on a questionnaire survey of more than 13,000 university students at a private university in Istanbul. The survey included measures for several variables but, in this presentation, my analysis centers around those factors which student respondents identified as more or less helpful in their own learning. The survey was not an evaluation of specific faculty or of courses; rather, it asked students to rank several generic factors that made them more successful as learners.

LITERATURE REVIEW

In the United States over the last 50 years, student evaluations of professors have become routine. In most American university classrooms near or at the end of each term, faculty, administrators, or their assistants pass out and collect standardized instruments which ask students to evaluate their professors on a variety of factors, such as competence,

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helpfulness, friendliness, promptness, fairness, and a bevy of other items. The responses are carefully collected, guarded, stored, analyzed and reported to the faculty concerned, as well as to their supervisors and to various university bodies. The data for each faculty are compared to those collected from their peers within their departments and programs as well as across the entire university faculty. The results are reported to the faculty concerned, to their supervisors, and sometimes to the public. This large-scale inventorying of student responses is justified primarily on two grounds: first, to evaluate instructor performance as a basis for decisions on retention, compensation, and promotion; and, second, to help faculty members identify areas of strength and weakness in their teaching and thereupon remedy those weaknesses identified while building on the strengths. The expensive and time consuming exercise continues despite two well-known problems.

First, there is little evidence to support the idea that students are able to evaluate effective teaching. The research is consistent: students judge those faculty whom they "like" as effective and those whom they "dislike" as ineffective teachers. That is, from the student perspective, the evaluations are largely a popularity ranking. A recent popular entry into the "how much do you like your professor" sweepstakes is ratemyprofessors.com, which includes the additional evaluation item of "how hot" rated professors rank (Felton, Koper, Mitchell and Stinson 2008).

Second, there is little evidence that faculty members overall make systematic use of these data to enhance their teaching skills or to ameliorate their weaknesses (Aleamoni 1999; Entwistle, McCune and Hounsell 2002; Kember and Kwan 2000; Kember and Wong 2000; Lizzio, Wilson and Simons 2002; Neumann 1994; Sojka, Gupta and Deeter-schmelz 2002; Trigwell, Prosser and Waterhouse 1999; Wachtel 1998; Wolfer and Johnson 2003; and Wubbels and Brekelmans 2005).

Studies about the non-use of student evaluations for improving their teaching note factors including long-standing (and well-warranted) concerns with the validity of student evaluations, a widely-held perception that student evaluations are little more than 'popularity' measures, a lack of tie-in between the evaluations and faculty-perceived self-



improvement goals, the routinization of the student evaluations, and others (see Feeley 2002; Gray and Bergmann 2003; Greenwald 1997; Morgan, Sneed and Swinney 2003; Nasser and Fresko 2002; Simpson and Siguaw 2000; and, Sojka, Gupta and Deeter-schmelz 2002).

In addition to general measures of the effectiveness of a given professor, student surveys have also been used to measure the effectiveness of teaching techniques and innovations in a variety of disciplines. Examples include studies reported for teacher education (Baysal, Arkan and Yıldırım 2010; Eren 2009; Gülseçen and Kubat 2006; Gürbüz 2006; and Palfreyman 2005), medical education (Demirören, Palaoglu, Kemahli, Özyurda and Ayhan 2008), music education (Hamann, Baker, McAllister and Bauer 2000); and science education (Trigwell and Prosser 1996), among many others.

The recent increase in on-line coursework and programs has prompted a flurry of studies investigating whether students find on-line offerings effective. Most students offered positive evaluations with the caveat that learning on-line is learning in isolation; the effects of peers and the classroom environment, minimal in the on-line setting, were seen as a missing helpful ingredient for their learning (Akdemir 2008; Aydin 2005; and Turk 2010). Still other studies have examined student satisfaction with English-medium instruction in non-native English speaking nations (Kırkgöz 2005; Roberston, Jones, and Thomas 2000; Üstünlüoglu 2007) or various technological aids for instruction such as PowerPoint (Selimoglu, Arsoy and Ertan 2009).

Studies that examined student perception of teaching and learning across the disciplines for other than faculty-evaluation purposes are rare (Aleamoni 1999; Entwistle, McCune and Hounsell 2002; Hamann, Baker, McAllister and Bauer 2000; Kember and Kwan 2000; Lizzio, Wilson and Simons 2002; Neumann, 1994; and Wentzel 2003). This paper follows in this later tradition.



## RESEARCH QUESTIONS AND METHODS

This project grows from two goals. First, I have a long-standing interest in strengthening pedagogy and promoting student learning (See Scarboro 2003; Scarboro 2004; Scarboro and Cadwallader 1982; Scarboro and Coker 1990; Scarboro, Emert and Vandergriff 2002; Scarboro and Husain 2003; and Scarboro and Reese 2004).

Second, the project was designed as a learning task for a second-semester research methods class for sociology undergraduates at my university, a private university located in suburban Istanbul. The student body includes more than 13,000 students, including 900 international students. The other students come from all regions of Turkey, although those from Istanbul are over-represented. The student body is 51% female and 49% male.

I wanted to use an experiential approach for helping students understand the steps in conducting a research project—from initial research question through conceptualization, operationalization, questionnaire construction and administration. The survey was constructed over a period of eight weeks through individual and group assignments and inclass discussion. As a group, the students and I formulated a research question and choose a variety of variables which we thought students might find as conducive to their learning and academic achievement. In small groups, students drafted questionnaire items to measure each variable. These draft items were discussed in whole-class discussions and then reassigned to small groups for fine tuning. The draft questionnaire was pretested using second year sociology students then was further revised.

The focus of our research question was, "What do undergraduate university students perceive as the teaching strategies, environments, and tools that promote their learning?" We were further interested to discover if gender, student residence (at home, in a dormitory, or in an apartment), academic achievement, discipline of study, national or international student status, year in school, and other factors shaped student preferences for teaching and learning approaches (See Appendix 3 for the English version of the questionnaire).



In addition to the demographic background information, several items asked students to indicate their overall assessment of their learning environment. The questionnaire included twenty-seven items asking students to indicate if selected faculty and peer characteristics, teaching techniques, pedagogical tools such as overhead projectors, and learning support facilities, such as the library, computer and science laboratories, and other factors supported their learning. Each item called for a forced-choice modified Likert scale response.

The questionnaire was pre-tested, revised and translated into Turkish. Two versions of the questionnaire were administered: one in Turkish to students whose first language was Turkish and one in English to international students whose English was stronger than their Turkish (our university undergraduate student body is nearly10% international students).

The survey was administered by the more than 50 students enrolled in the research methods class—each student surveyor was assigned a quota of 20 respondents from a specific department and required to solicit volunteer respondents. The quota required no more than 12 students of one sex, at least five international students, and roughly equal numbers of students from each year in school. However, at least three departments at our university (Turkish Language and Literature, Turkic Languages and Literature, and Russian Language and Literature) had no international students enrolled. Student surveyors first gathered signed informed consent statements from the volunteer respondents then administered the questionnaire in a face-to-face setting. The survey was distributed in May of 2010; 762 completed questionnaires were collected.

The responses to the survey were coded and stored in an SPSS file. Data analysis was conducted using SPSS.

### PRESENTATION AND ANALYSIS OF THE DATA

## The Respondents

A total of 762 survey instruments were completed, although not all respondents replied to every questionnaire item; missing data were eliminated from the analysis. Respondents included 431 females and 320 males, a proportion roughly commensurate with the gender



ratio in the student body. The sample over-represented students in the second and third year of school: about two-thirds of the respondents were either second or third year students; about 18% were fourth year while only 5% were first year. Respondents came from 30 different departments at the university; the number of respondents per department ranged from a low of 12 from the Department of Russian Language and Literature department to a high of 47 in International Relations. There were more than 40 respondents from each of seven departments.

More than a third of the respondents live at home while attending university and another third live in off-campus apartments with friends while more than 20% live in university dormitories. The remainder lived alone or did not reply to the question. Because of the large percentage of students in off-campus housing, daily commute times from home to campus is often large. More than 41% commute more than 30 minutes each way and almost 21% commute more than one hour.

Respondent GPAs ranged from a low of 0.31 to a high of 4.0; the mean reported GPA was 2.59, with a standard deviation of 0.74. About 16% of the students replied to the English version of the questionnaire, an indication of international student status, while the remaining 84% replied to the version in Turkish.

## Rating of Factors that Enhance Student Learning

Three items were included in the questionnaire to gauge the students' overall assessment of their learning environment. The first item asked students to identify their perception of the general effectiveness of their faculty and the second asked them to compare their level of learning with their friends who attend other universities. Roughly 77% of the respondents either agreed or strongly agreed that their faculty were "very effective in helping [them] understand the subjects [they are] studying," while about 23% disagreed or strongly disagreed.



In the other two items, more than 59% of the respondents indicated that their university has better professors than the universities of their friends, while only 43% state that they learn more than their friends at other universities. Students tend to rate their individual professors highly while they are more modest in the ranking of their general educational experience.

A total of 27 items were included on the questionnaire asking respondents to indicate their perception of the contribution that various factors made to their learning. The factors included characteristics of faculty that promote learning, the helpfulness of teaching aids such as overhead projectors and wireless connections, the contributions of learning environments, and other factors. See Table 1 in 1 for a list of the items and their perceived usefulness.

Happily for faculty, the two items with the most favorable rating indicate that students perceive their faculty as very important in their success as learners. Students see those professors active in research (rank 1) as the most important among the 27 factors listed in enhancing student learning. Students seem not to see a conflict between professors' high activity in research and their role as learning facilitators. In addition, these respondents indicate that the availability of faculty to meet with students in faculty offices (rank 2) is highly important in the students' learning.

The next two most highly rated items refer to the students' peer environment: they see peer to peer sharing of information about classes (rank 3) as supportive of their learning and they see a large number of international students at the university (rank 4) as enriching their learning.

Rounding out the top five items, students perceive that involvement in student research projects (rank 5) promotes their learning. Student perception of the critical value of out-of-class activities is further underscored by the presence of two other items in or near the top ten: students perceive themselves learning more when more homework is assigned (rank 10) and learning more from faculty who assign more homework (rank 11).



Two of the top ranked items that students perceive as supporting their learning refer to the use of modern technological aids in teaching: the use of overhead projectors (rank 6) and the availability of wireless connections in classes (rank 9) are both seen as supportive of the respondents' learning. The final two factors in the top ten items deal with the library: both the availability of electronic journals in the library (rank 7) and the skills of the human librarians (rank 8) are valued highly as supports to student learning.

Factors that rank low in the students' perceptions of their contribution to their learning include the following. Professor availability in their offices (rank 21) is not seen as supportive of learning—note a conundrum here: students rank those professors who are helpful in their offices as making a very important contribution to their learning but they complain that often the faculty cannot be found during their office hours). Faculty rank seems unrelated to student learning (rank 22). Ancillary programs such as the Career Center and FUSEM (a program supporting language acquisition) are seen as not very helpful (ranks 23 and 27, respectively) to student learning.

Two low ranking items deserve comment. One item was included to measure if the gender of the professor impacted on student perception of their learning. Rather than asking directly for an assessment of the effect of instructor gender on learning, we choose to focus on the complaint that "female professors get less respect and therefore cannot control their classes." Students rejected that perception (rank 26). Another item was designed to see whether students found international professors more difficult to understand (rank 25) and, therefore, as less effective teachers. One can conclude then that neither gender nor national origin of the professor is perceived as impacting on student learning.

Items which I expected to receive higher ranks, indicating their usefulness in student learning, include several that deal with peers. Respondents gave modest value to group work (rank 12), friends working together (rank 16), group study (rank 17), and the role of peers in developing strong values (rank 19)—all were perceived as making relatively modest contributions to student learning.



Less surprisingly, students saw the quantity and quality both of library holdings (rank 12) and laboratory equipment (rank 14) as offering only modest support to their learning. Volunteer comments written on the questionnaires by respondents indicate that these respondents find both the relatively low number of books in the university library and the insufficient quantity and quality of university laboratories and their equipment to be detriments to their learning.

In general then, students perceived that faculty who were active in their research and were helpful in their offices, as well as the characteristics of their peers as both sources of information and as a diverse student body, and out-of-class activities such as research projects and homework as the most important factors supporting their learning. It is worthy of note: students did not rank in-class activities among the more important factors supporting their learning.

## Relationships among Factors that Enhance Student Learning

An exploratory analysis of the relationships among several variables was conducted through several bivariate correlations.<sup>1</sup> I had hypothesized that the gender of the respondent, respondent GPA, place of residence while at university, year in school, and department of study might be related to differences in student perceptions. None of these predictor variables had strong significant relationships with those items employed to measure student perceptions.

There were weak to modest significant relationships between the following:

- gender and the perception that faculty were helpful in their offices [.071, alpha=.05];
- year in school and finding other students helpful in sharing information [.067, alpha=.05];

<sup>1</sup> Those interested in copies of the correlation matrixes may contact the author at soccas@gmail.com.

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- GPA and faculty helpful in their offices [.107, alpha=.05];other students sharing helpful information [.098, alpha=.05]
- number of international students and promoting learning [.060, alpha=.01], and faculty assigning homework useful [.064, alpha=.01];
- and place of residence at university and the usefulness of research projects [.066, alpha=.01].

Given the large number of variables examined, one should be cautious in drawing conclusions from these results. However, two themes seem to emerge from the correlations: the impact of faculty availability in their offices to offer informal consultations with their students and the role of students helping each other both appear to be important in promoting student learning.

A second exploratory correlational analysis was performed to identify the variables that students perceived as related to instructors as "effective teachers." Several significant relations emerged: effective teachers were also seen as those active in research (Kendall's tau b=.115), as assigning student research projects (Kendall's tau b=.179), as assigning homework (Kendall's tau b=.153), and those requiring use of electronic journals in the library (Kendall's tau b=.221; for all these taus, alpha=.001). These results suggest that students perceive themselves as learning more when engaged more in active learning activities.

A regression analysis was employed to measure the relationship among those variables the student respondents identified as important and the assessment of faculty as effective teachers. The independent variables selected for the analysis included: gender, year in school, GPA, residence while at university, faculty helpful in their offices, other students helpful in developing values, foreign students enhance the learning environment, learn more with more homework, and research projects helpful in learning while the dependent variable was the perception of faculty as effective teachers (See Appendix 2for more details). Several variables in the equation showed significant relationships to the perception



of the faculty as effective teachers. They include faculty helpful in their offices (B=.184, p<.001), GPA (B=-.089, p<.012), and the presence of foreign students enhances learning (B=.068, p<.05). Note again that the one act that faculty have control over is their presence in their offices so they may offer help.

This perception by students, however, runs contrary to most faculty practice wherein they see themselves as teachers most when they are in a lecturing role. However, students seem to find themselves as learning more when they are active participants in their learning than when as auditors to their professors' learning.

### **CONCLUSIONS**

This study served two goals. First, the production of a research question and carrying that question through conceptualization and operationalization to data gathering and analysis provided the central learning activity for a group of more than 50 first year sociology students. As such, this project is an example of the active learning approach to teaching and learning. The students worked hard and enthusiastically and completed a complex task within the allotted time. I am proud of them and want to use this opportunity to acknowledge and thank them.

Second, this project explores several variables that my students and I thought might be related to students' perception of settings and approaches that supported them as successful learners. While our findings cannot be generalized beyond the students of one university at one point in time, our data suggest that several factors seem important to students.

One cluster of factors centers around the way faculty act out their role: those faculty who themselves are active researchers, who assign heavy out of class homework, especially those who assign student research activities, and those faculty who are available for informal interaction with their students are seen as powerful contributors to student learning.

A second set of factors center around student peer-to-peer activities. To my surprise, these respondents did not give very positive ratings to group assignments but they did see less formal peer-to-peer interaction as supportive to their learning. They perceive the sharing of information among peers, informal study groups, and students engaged in common homework projects as supportive to their learning.

A third set of factors focus on university facilities: strong libraries and helpful librarians, ease of access to electronic journals, strong computer laboratories and well-equipped science laboratories were all seen as vital to their learning.

Finally, students take their learning seriously. They value those professors and those setting that facilitate their learning and they take pride in their accomplishments.

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Appendix 1 Table 1. Summary Statistics, Factors that Enhance Student Learning<sup>2</sup>

Rank of Item from Most Helpful to Least Helpful	Questionnaire Item	Number of Respondents	Mean Response	
1	Faculty Active in Research Better Teachers	740	1.9189	
2	Faculty Helpful in Office	754	1.9257	
3	Share Info Re Classes with Friends	752	2.0824	
4	Many Foreign Students Make Univ Better	753	2.0956	
5	Research Projects Helpful	759	2.1318	
6	Overhead Projectors	755	2.1391	
7	Electronic Journals in Library Sufficient	740	2.1541	
8	Librarians Helpful	754	2.1737	
9	Wireless in Class Helpful	744	2.2030	
10	Learn More When More Homework	748	2.2166	
11	Learn More When Faculty Assign Homework	751	2.2716	
12	Group Work Helpful	735	2.2748	
13	Library Books Sufficient	757	2.3197	
14	Lab Materials Sufficient	685	2.3285	
15	Faculty Provide Info Re Deptl Requirements	754	2.3528	
16	Friends Support My Learning	750	2.3547	
17	Learn More with Group Study	750	2.3747	
18	Lab Research Assts Helpful	708	2.3870	
19	Other Students Help Dev Stronger Values	750	2.4133	
20	Career Center Helpful	735	2.4327	
21	Professor Available in Office	745	2.4470	
22	Higher Rank More Effective	751	2.4554	
23	Computers Available in Lab	757	2.6063	
24	Career Center Helpful	735	2.4327	
25	Foreign Teachers Talk Fast	722	2.6510	
26	Female Professors More Disciplined	748	2.7674	
27	FUSEM Supports Lang Learning	686	2.7741	

<sup>&</sup>lt;sup>2</sup> Code: 1= Strongly Agree, 2= Agree, 3= Disagree, 4= Strongly Disagree; therefore the higher the score, the less the student ranks the factor as supporting her learning.



# Appendix 2 Regression Equation Independent Variable: Faculty Effective Teachers

**Model Summary** 

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.321(a)	.103	.090	.62953

a Predictors: (Constant), Research Projects Helpful, Gender, GPA, Other Students Help Dev Stronger Values, Year in School, Where Live at Fatih, Faculty Helpful in Office, Many Foreign Students Make Univ Better, Learn More When More Homework

## ANOVA(b)

Model	•	Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	26.885	9	2.987	7.538	.000(a)
	Residual	233.426	589	.396		
	Total	260.311	598			

a Predictors: (Constant), Research Projects Helpful, Gender, GPA, Other Students Help Dev Stronger Values, Year in School, Where Live at Fatih, Faculty Helpful in Office, Many Foreign Students Make Univ Better, Learn More When More Homework

## Coefficients(a)

		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
Model		В	Std. Error	Beta	В	Std. Error
1	(Constant)	1.462	.187		7.815	.000
	Gender	.030	.053	.023	.555	.579
	Faculty Helpful in Office	.184	.038	.199	4.895	.000
	Year in School	018	.020	037	913	.362
	Other Students Help Dev Stronger Values	.055	.038	.061	1.467	.143
	GPA	089	.035	100	-2.522	.012
	Many Foreign Students Make Univ Better	.068	.032	.088	2.121	.034
	Learn More When More Homework	.053	.038	.063	1.414	.158
	Where Live at Fatih	.019	.020	.039	.955	.340
	Research Projects Helpful	.040	.037	.049	1.080	.281

a Dependent Variable: Faculty Effective Teachers

b Dependent Variable: Faculty Effective Teachers