A study of motivational factors for accounting educators: What are their concerns?

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ABSTRACT

Improving accounting educator commitment and performance is critical to the success of accounting programs. To address the goal of improving the performance of accounting educators, the authors turned to motivational theories developed by Frederick Herzberg. Herzberg developed two sets of factors: one set contained factors regarding job satisfaction, sometimes called motivators, while the second set had factors regarding job dissatisfaction which he called hygiene factors. Using Herzberg's factors as a base, the authors developed a questionnaire. This questionnaire was sent to accounting educators in order to identify their concerns and to categorize these concerns into Herzberg's motivating factors and hygiene factors. The results of the study revealed that accounting educators are concerned about areas such as conditions of work, making the transition from new hire to experienced tenured faculty, changes in research expectations, and changes in tenure requirements. Consistent with Herzberg's theory, the study found that salary, while an important hygiene factor, is not a motivating factor for accounting faculty. In conclusion, the result of the study suggest that accounting departments should stress both the motivating and hygiene factors such as those shown above and work to provide an environment where these factors will lead to accounting educator and department success.

Keywords: Accounting professors, job satisfaction, Herzberg theory, motivational factors

INTRODUCTION

Improving the performance of accounting educators, while a difficult task, is critical to the success of accounting education and the accounting profession. "Faculty has a major impact on students' leaning and is the main strength in an educational institution" (Quraishi et al., 2010, 31). As has been discussed in academia and the accounting profession, "higher education faces a severe, and growing, shortage of accounting professors" (Beyer et al., 2010, 227) so attracting and retaining good accounting faculty should be a concern to all accounting programs. Accounting programs have tried money, the desire to help students, promotions, a good teaching schedule, or even tenure to motivate accounting faculty. While these incentives may be partially successful, or work for a short period of time, the recipients frequently revert to prior, less constructive behaviors. A more scientific method needs to be developed that would identify those factors that would maximize accounting educator performance.

To accomplish this goal, the authors adopted Herzberg's "seminal two-factor theory of motivation" (Furnham et al., 2009, 766). In the late 1950s, Frederick Herzberg interviewed employees to find out what made them satisfied and dissatisfied with their jobs (Herzberg et al, 1959). From these interviews, Herzberg created several motivational theories which formed the basis for a questionnaire designed by the authors. This questionnaire asked accounting educators their thoughts concerning factors that might affect their performance. This paper reports the results from that questionnaire.

HERZBERG'S THEORY

During interviews with employees, Herzberg asked two sets of questions:

- Think of a time when you felt especially good about your job. Why did you feel that way?
- Think of a time when you felt especially bad about your job. Why did you feel that way? (Syptak et al., 1999).

From the responses he received, Herzberg developed his theory that job satisfaction and job dissatisfaction are produced by different work factors. Herzberg's "theory of motivation postulated that satisfaction and dissatisfaction were not two opposite extremes of the same continuum, but two separated entities caused by quite different facets of work" (Furnham et al, 2009, 766.) Those factors associated with job satisfaction were intrinsic and include things such as achievement, recognition, and responsibility. Herzberg named the factors 'motivators'. Those factors associated with job dissatisfaction were extrinsic and include things such as company policy, administration, interpersonal relations, and working conditions. Herzberg named these factors 'hygiene factors'. "Frederick Herzberg's motivation-hygiene factor theory, although considered non-traditional when it was introduced in 1959, has become one of the most used, known, and widely respected theories for explaining motivation and job satisfaction" (DeShields et al., 2005, 1310. A listing of motivators and hygiene factors from Robbins and Coulter (2003, 427-428) appears below:

Motivators:	Hygiene Factors:
Achievement	Supervision
Recognition	Company Polic
Work Itself	Relationship with Supervisor
Responsibility	Supervisor
Growth	Salary
	Relationship with Peers
	Personal Life
	Relationship with Subordinates
	Status
	Security

Herzberg believed that managers who tried to minimize factors that led to dissatisfaction (hygiene factors) could bring about workplace harmony, but not necessarily motivation. Because hygiene factors do not motivate employees, managers would have to emphasize intrinsic factors or motivators to increase job satisfaction (Robbins and Coulter 2003, 428). However, in order to maximize employee performance, managers should strive to motivate while creating an environment that provides satisfaction. This idea is illustrated in Figure 1 (Appendix).

Ideally, in order to be successful, accounting educators and administrators would seek to have most, if not all, departmental faculty members in the satisfied/motivated quadrant.

DEVELOPMENT OF THE QUESTIONNAIRE AND METHODOLOGY

The accounting educator questionnaire was adapted from a study by Underwood and Davis (1985) which was based on Herzberg's motivational hygiene theory. The questionnaire asked the respondents (accounting educators) to indicate levels of concern they experienced in different categories. Within each category, several questions were created to reveal the respondents' level of concern for a particular situation. The authors developed five categories which correspond to factors developed by Herzberg. The first three categories, (Human Relations, Personal Concerns, and Conditions of Work), contained questions that targeted extrinsic or hygiene factors. The fourth category, (Instructional Activities and Methods) focused on intrinsic factors or motivators and the last category Professional Growth) had a combination of both hygiene factors and motivators. The 5 point scale ranged from 0 ("not concerned") to 4 ("extremely concerned") with a mid-point of 2 ("concerned)".

At the beginning of the questionnaire, the authors defined a concern as any fear or problem that affects the respondent's role in the teaching-learning process. The reason for focusing on the teaching-learning process is that the authors believed that this process is one of the most important endeavors an accounting educator may perform. This belief is supported in several educational papers and studies, such as: Carroll (1963), Proctor (1984), Gage and Berliner (1992), Huitt (1995), and McIlrath and Huitt (1995). Figure 2 (Appendix), A Model of Accounting Educator's Concerns, presents a visual image of how individual parts of the study are related.

The respondents were also asked complete personal information. This demographic information was sorted into four groups: gender, length of service within the teaching profession (respondents with less than 10 years of service were divided from those with 10 years or more),

whether their department was doctoral granting, and if their department or school was AACSB accredited.

Following the initial development of the questionnaire, the authors mailed a pilot sample of 25 instruments to accounting educators in order to uncover ambiguities or author errors. After making the requisite changes to the pilot sample, 500 instruments were sent to randomly selected accounting educators listed in the "*Accounting Faculty Directory*" compiled by James Hasselback (2008).

RESULTS OF THE STUDY

Table 1 provides descriptive statistics about the research study**.** Out of 525 questionnaires sent, a total of 209 subjects participated in the study, yielding a 40% response rate, as indicated in Table 1 (Appendix).

The study had a diverse representation of participants as observed from several factors. Males represented about 80% of respondents. The 20% female percentage of respondents was a little below the 24% female representation on accounting faculties reported by Jordan et al. (2006). The mean size of the accounting department enrollment at the respondents' institutions was between 200-500 students. About 26% of subjects represented doctoral granting schools in accounting. Slightly over half of the respondents taught at urban institutions. Over 70% of the respondents had doctoral degrees while a little over 23% had master's qualifications. While only 40% of the respondents came from departments with accounting accreditation, over 72% came from schools with business school accreditation. From the descriptive statistics, the authors used a two part process to first identify accounting educator concerns applicable to all educators and second, using a T-Test significant at the 5% alpha level, the authors determined if there were any significant differences between the respondents' personal information within the five categories using Herzberg's model. The authors obtained the following results as summarized below:

SUMMARY OF FINDINGS RELATING TO HUMAN RELATIONS

The results of the Human Relations category of hygiene factors are indicate in Table 2 (Appendix). The Human Relations category focused on relationships the respondent might develop. These relationships might be with individuals within the department (Department Chair, peers, students) or individuals outside the department (administration, accounting firms, industry, community).

Of the 7 items within the human relations category, none of the items for all respondents exceeded a level of concern beyond 2.5 (midway between "concerned" and "very concerned.") Most of these factors had mean levels of concern around 2 ("concerned") with the factor "understanding expectations of administrators and supervisors" having the highest mean. When considering gender, length of service, doctoral status, and accreditation status several significant differences were noted as shown in Table 2. Gender was significant for 3 items in the human relations category. Length of service of service was significant for 4 items. Doctoral status was significant for 2 items. Accreditation status was significant for only 1 item in the human relations category.

- Respondents indicated that understanding the expectations of administrators and supervisors was their greatest concern. The concern was more pronounced for male accounting educators than for their female colleagues.

- Female educators, educators from doctoral granting schools, and those from accredited schools were concerned about establishing good relationships with students during school hours.
- Female educators and respondents with less than 10 years of professional service were concerned about understanding community problems and cultures.
- For respondents with more than 10 years of professional service and those from non-doctoral granting schools internal relationships were important.
- Establishing relationships with peers outside their departments was of concern for accounting educators with less than 10 years of experience.
- Educators from non-doctoral schools expressed concern with establishing good relations with administrative personnel.
- Finally, accounting educators with more than 10 years of experience felt that establishing good relations with their department chair was challenging.

SUMMARY OF FINDINGS RELATING TO PERSONAL CONCERNS

Personal concerns focus on eight factors that directly affect the respondent such as living conditions, salary, health, and demand on time. The results relating to the personal concerns hygiene factors are indicated in Table 3 (Appendix). At the overall respondent level, note the wide range of means from 1.4 (living conditions) to 3.0 ("demands on time)". Along with "demands on time", the factor of "accepting school's philosophy and objectives concerning teaching, research and service" were the greatest concerns in this category. Two significant gender differences in personal concern item means were identified. Only 1 item each was significantly different for in this category based on length of service, doctoral status, and accreditation status.

With regard to the personal concern items in the questionnaire,

- All respondents and especially females and those from doctoral granting schools indicated that the "demand on time" was their greatest concern. Note that although "demand on time" was the greatest concern of male respondents this item was a significantly greater concern for female accounting faculty. In a recent study by Hunt et al. (2009) teaching load was the most important factor in the selection of schools by all new accounting facultyand the mean importance was significantly higher for female faculty when compared to male faculty.
- Adjusting to standards of expected teacher conduct was challenging for educators with less than 10 years of experience as compared to faculty with more experience.
- Salary was selected by all respondents as their third greatest concern.
- Poise and self-confidence were of greater concern for educators from non-accredited schools than for their accredited school counterparts.
- With regard to "physical health", male accounting educators were significantly more concerned than female accounting educators. This difference may be aged based as the percentage of female accounting faculty increases Jordan et al. (2006) may indicate that women in accounting academia are generally younger than their male colleagues.
- Although the level of significance was only .08, there is some indication that" living conditions" for educators from non-accredited schools was of greater concern than for faculty at accredited schools.

SUMMARY OF FINDINGS RELATING TO CONDITIONS OF WORK

It has been said that "universities must provide competitive levels of work environment conducive to faculty needs in order to attain faculty commitment" (Quraishi et al., 2010, 31). The results of the conditions of work items are indicated in Table 4 (Appendix). In the conditions of work category of hygiene items the authors developed eighteen questions. These questions covered not only the quality of the working environment (quality of equipment and building facilities), but the respondents' work requirements (class schedule, number of preparations, and committee work) and the level of work support the respondent might receive (administrative support and secretarial support). It is particularly noteworthy that there were 12 significant gender differences for these 18 conditions of work items and that in all but one of the dozen gender differences the female accounting faculty had significantly greater concern than their male colleagues. For 9 of the 18 conditions of work items, doctoral status was significant. Accreditation status and length of service each had only 1 significant difference in means for the conditions of work factors.

- All respondents indicated that acquiring up-to-date equipment was their most important concern. Females and respondents from non-doctoral institutions were particularly troubled by this concern, as also having enough equipment for effective instruction.
- Assignment of committee work was of significantly greater concern for respondents with longer service. The reason appears obvious, senior faculty members chair and frequently are more active in service activities than are junior faculty members (Chen et al., 2006).
- Although the mean concern for all respondents for having "teaching assignments commensurate with training" ranked next to last among the 18 items, this was a significantly greater concern with female educators and those from non-doctoral schools.
- Having access to secretarial and para-professional staff, securing supplies, sufficient office work-space, and proper appearance of teaching environment was of greater concern for female educators and those from non-doctoral schools.
- There were no significant differences in concern found relating to the" number of preparations" they are required to teach in each academic session.
- All respondents noted that a high pupil-teacher ratio impeded effective teaching. This concern was more pronounced for male educators, those from doctoral schools and from accredited institutions.
- Female educators expressed greater concern than males about class schedules and having enough school time for planning and preparing.

SUMMARY OF FINDINGS RELATING TO INSTRUCTIONAL ACTIVITIES

Questions in the Instructional Activities category center on the instructional component associated with teaching. For example, does the respondent find formulating instructional objectives difficult or does explaining the subject matter present problems? Three of the 14 items in this category had mean levels of concern exceeding 2.5 on the 0-4 scale. The highest mean for all accounting faculty was for the item "developing in students good work and study habits." As indicated in Table 5 (Appendix), gender differences were significant for 8 of the 14 items with women having greater concern for 7 of the 8. Length of service was significantly

different for 7 of the instructional activities. Doctoral status was significant for 3 instructional activities. Accreditation status was not significant for any of the 14 instructional activities.

- Developing good work and study habits in students was the respondents' most important concern. Females found this concern to be particularly important.
- All respondents indicated that giving students a share in planning objectives and learning activities was their second most important concern. Female educators, those with less than 10 years of service, and respondents at doctoral institutions found this concern to be especially important.
- Stimulating critical thinking, the third greatest concern overall, was of particular importance to females. Given the recent emphasis by the AACSB on the importance of critical thinking, it is interesting that accreditation status was not significant.
- Educators with less than 10 years of service had greater concern than their more experienced colleagues with basic instructional activities such as planning and preparing lessons, explaining subject matter, prescribing instruction, selecting instructional material, using question-asking techniques, making appropriate and meaningful assignments, and giving students a share in planning objectives and learning activities. These differences should be expected as experience can help in teaching.
- For accounting educators at doctoral granting schools, the following three instructional activities were of significantly greater concern than for faculty at non-doctoral schools: individualizing instruction, making appropriate and meaningful assignments, and giving students a share in planning objectives and learning activities. Publication expectations at doctoral schools are generally significantly higher than at non-doctoral schools (Chen et al., 2010) so the time aspect required for these activities may account for the differences.

SUMMARY OF FINDINGS RELATING TO PROFESSIONAL GROWTH

The Professional Growth category focused on opportunities available for the respondents, changes in schools' requirements for promotion and tenure, research requirements and the respondents' willingness to adjust to change. This category includes both Motivators and Hygiene factors. Of the 11 items in this category, 3 had overall means exceeding 2.5. Gender differences were significant for 5 items. There were 2 items for which length of services differences were significant. Doctoral status was significant for 2 items while accreditation status was significant for only 1 item in the professional growth category. The various means for the professional growth items are indicated in Table 6 (Appendix).

- The highest mean concern overall within the professional growth category related to "change in research requirements toward academic journals. Interestingly, this was a significantly greater concern for male faculty than for female faculty.
- However, females were significantly more concerned than males with regard to "change in promotion and tenure requirements", the third highest item in the professional growth category. According to Chen et al. (2006, 179), 'researchers have documented that publication requirements for promotion and tenure have increased over time."
- "Opportunities for democratic decision making on school policies and practices" was the second highest concern overall among the professional growth factors. However, it was of lesser concern to men than to women.
- All respondents, particularly respondents at doctoral level institutions, were also concerned about opportunities for advancement, which had the fifth highest overall mean.

- Female respondents and educators with less than 10 years of service were concerned about opportunities to read professional literature.
- Respondents from non-doctoral granting schools were concerned about opportunities to participate in professional organizations.

IMPLICATIONS AND CONCLUSION

From the above information, the study shows that all respondents had numerous concerns in areas regarding both the Motivator and Hygiene factors. In addition, the study also shows that demographic differences exist in both Motivator and Hygiene factors. Upon examination of the Hygiene factors, one can state that all respondents were concerned about relationships with administrators, demands on time, salary, resources, and most importantly issues regarding promotion and tenure. Females and educators at doctoral institutions were quite concerned about the demands on time. Accounting educators need an environment where expectations are clearly stated for teaching, research, and service. Furthermore, educators work best in an environment where the above expectations change little during the tenure probationary period.

Regarding Motivator factors, all respondents were concerned about being able to perform well in the classroom. All educators desired the ability to both stimulate critical thinking and assist students in developing good work and study habits. Females were especially concerned about being able to provide stimulating classroom work. All educators wanted the opportunity to advance their careers while at the same time being able to participate in curriculum and program development. Females were particularly concerned about being able to participate in the school decision making process. Thus, accounting educators need an environment that provides opportunities for advancement while also allowing the educators to actively participate in the development of school, department, and curriculum policies.

In order to improve the performance of accounting educators, one can use the motivational theories developed by Frederick Herzberg. Herzberg identified Motivating factors and Hygiene or satisfaction factors. In order to truly improve accounting educator performance, educators and administrators should strive to have the educators both motivated and satisfied. This paper identified educator concerns in both the Motivator and Hygiene areas. Thus, educators and administrators alike should be aware of the educator concerns so those concerns can be addressed. All accounting educators are concerned about classroom performance. In addition, educators are concerned about promotion and tenure issues. For example, many accounting faculty are concerned that demands on time will be a constraint that may prevent them from achieving tenure. In designing policies and monitoring mechanisms, explicit attention to such concerns can greatly improve educator performance.

Further, to address the educator concerns, administrators should work to create an environment for educator success. For example, accounting departments should establish a working mentoring program where new hires learn about school policies and also are provided assistance improving classroom performance. In addition, administrators should clearly state promotion and tenure expectations and provide valuable guidance through the annual review process. Changes in promotion and tenure expectations should be minimal over time, but where changes do occur those changes should be made clear so educators can adjust in order to achieve promotion and tenure.

Future research can measure and test the association of the concerns identified in this study with the educators' performance. Further, the literature can benefit by providing

benchmark or best practices that can be adapted by specific institutions. Finally, case studies of the processes used by schools will enrich the knowledge for managing concerns and motivating educators to superior performance.

In conclusion, administrators and educators must take a proactive approach to creating an environment where educators can achieve success. Only if accounting educators are both motivated and satisfied with their work can accounting educator performance be improved. Certainly in these times of business scandals and legislation to curb the scandals, higher skill levels are needed by those entering the accounting profession. Those higher skill levels can only be developed by accounting educators who are working in an environment conducive to improving educator performance.

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APPENDIX

Figure 1

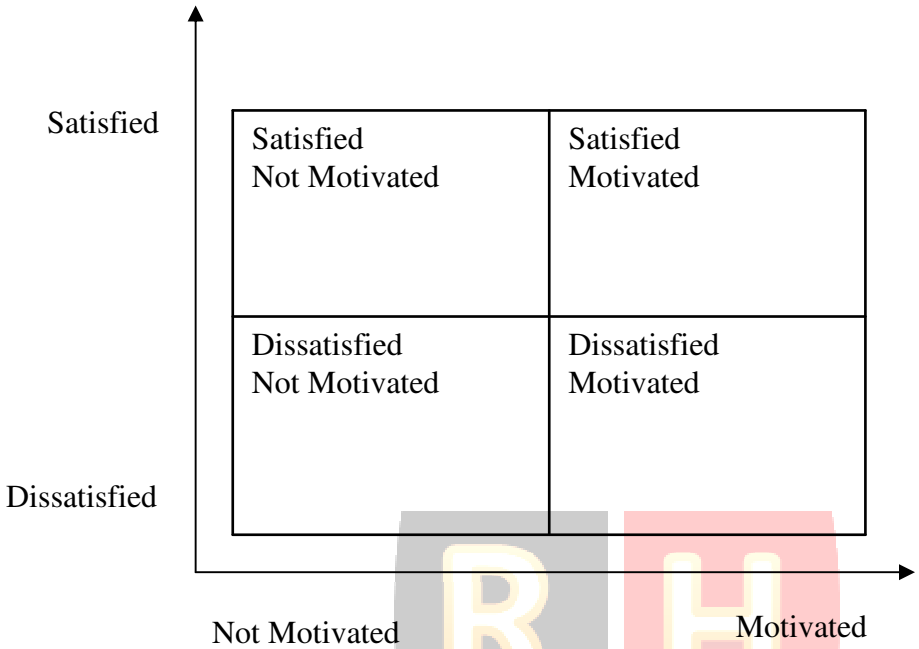

Figure 2

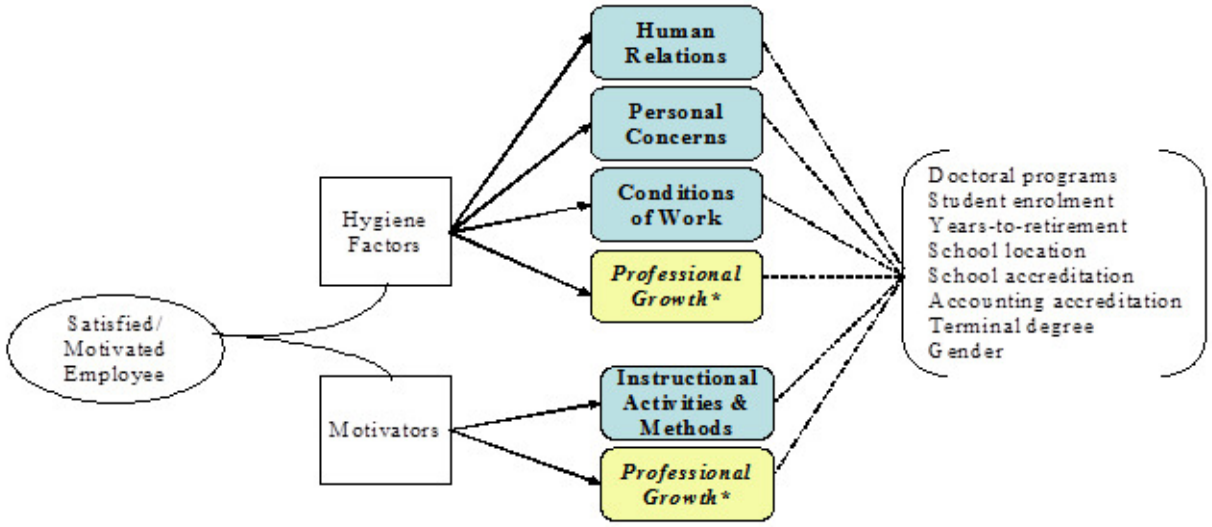

Figure 2: A Conceptual Model for Improving Performance

*: The category **Professional Growth** includes both hygiene factors and motivators.

Table 1

Descriptive Statistics

Total subjects	209
Male	168 (80.36%)
Female	41 (19.62%)
Years-to-Retirement[1]	
30 years	1%
25-30 years	10%
20-25 years	19%
Less than 20 years	70%
Student Enrolment	
Less than 100	7%
100-199	10%
200-499	41%
500-999	29%
Greater than 1000	13%
Location	
Urban	54%
Rural	7%
Small	27%
Suburban	12%
Schools with doctoral programs	26%
Subjects with Phd/DBA	70%
Schools with Accounting Accreditation	40%
Schools with Business Accreditation	72%

1: Assuming 30 years as the start age and 60 years as the retirement age

Table 2
Human Relations

	All respondents		Gender			Length of service			Doctoral status			Accreditation status		
	Mean	Rank	Male	Female	*p*-value	Less than 10 years	More than 10 years	*p*-value	Doctoral	Non-doctoral	*p*-value	Accr.	Non-Accr.	*p*-value
Number of observations			168	41		61	148		55	154		84	125	
Establishing good relationships with Department Chair	1.76	5	1.74	1.88	0.12	1.54	1.86	.01*	1.71	1.79	0.26	1.81	1.74	0.31
Establishing good relationships with administrative personnel	2.12	2	2.1	2.22	0.17	2.2	2.09	0.23	1.98	2.18	0.07	2.17	2.1	0.32
Establishing good relationships with peers outside department	1.93	3	1.95	1.88	0.25	2.07	1.88	.04*	1.95	1.93	0.44	1.93	1.94	0.48
Establishing good relationships with peers inside department	1.72	6	1.74	1.68	0.3	1.51	1.82	.00*	1.58	1.78	.03*	1.77	1.7	0.26
Establishing good relationships with students during school hours	1.55	7	1.51	1.71	.01*	1.59	1.53	0.26	1.69	1.5	.01*	1.67	1.47	.02*
Understanding community problems, cultures & traditions	1.85	4	1.82	2.02	.01*	2.02	1.79	.01*	1.85	1.86	0.49	1.85	1.86	0.43
Understanding expectations of administrators & supervisors	2.43	1	2.49	2.22	.02*	2.39	2.45	0.34	2.53	2.4	0.18	2.55	2.36	0.11
* : Significant at 5% alpha level														

Table 3
Personal Concerns

	All respondents		Gender			Length of service			Doctoral status			Accreditation status		
	Mean	Rank	Male	Female	*p*-value	Less than 10 years	More than 10 years	*p*-value	Doctoral	Non-doctoral	*p*-value	Accr.	Non-Accr.	*p*-value
Number of observations			168	41		61	148		55	154		84	125	
Living Conditions	1.383	8	1.39	1.37	0.37	1.34	1.4	0.22	1.33	1.4	0.13	1.31	1.43	0.08
Salary	2.316	3	2.34	2.22	0.15	2.33	2.31	0.45	2.35	2.31	0.38	2.26	2.35	0.27
Physical Health	1.555	5	1.58	1.44	.04*	1.46	1.59	0.06	1.56	1.55	0.45	1.51	1.58	0.22
Poise and self-confidence	1.469	7	1.48	1.44	0.27	1.48	1.47	0.45	1.47	1.47	0.47	1.37	1.54	.02*
Demands on time	3.014	1	2.95	3.27	.01*	3.03	3.01	0.43	3.2	2.95	.03*	2.93	3.07	0.17
Accepting school's philosophy & objectives concerning teaching, research, & service	2.517	2	2.55	2.39	0.14	2.48	2.53	0.35	2.65	2.47	0.11	2.48	2.54	0.34
Adjusting to standards of expected teacher conduct	1.493	6	1.49	1.49	0.47	1.62	1.44	.04*	1.6	1.45	0.08	1.52	1.47	0.32
Academic Freedom	1.589	4	1.57	1.68	0.15	1.66	1.56	0.23	1.62	1.58	0.37	1.6	1.58	0.46
* : Significant at 5% alpha level														

Table 4
Conditions of Work

	All respondents		Gender			Length of service			Doctoral status			Accreditation status		
	Mean	Rank	Male	Female	*p*-value	Less than 10 years	More than 10 years	*p*-value	Doctoral	Non-doctoral	*p*-value	Accr.	Non-Accr.	*p*-value
Number of observations			168	41		61	148		55	154		84	125	
Quantity & quality of resource & materials	2.455	3	2.4	2.68	.01*	2.56	2.41	0.14	2.05	2.6	.00*	2.33	2.54	0.07
Quantity & quality of equip.	2.431	4	2.36	2.71	.00*	2.46	2.42	0.39	2.13	2.54	.00*	2.39	2.46	0.34
Building facilities	2.234	7	2.2	2.37	0.09	2.13	2.28	0.14	2.13	2.27	0.13	2.27	2.21	0.32
Class schedule	1.842	15	1.78	2.1	.00*	1.93	1.8	0.14	1.85	1.84	0.44	1.88	1.82	0.3
Pupil-teacher ratio	2.153	9	2.2	1.95	.02*	2.02	2.21	0.07	2.45	2.05	.00*	2.37	2.01	.01*
Number of preparations	2.062	11	2.06	2.07	0.46	2.11	2.04	0.29	2	2.08	0.25	1.99	2.11	0.19
Appearance of teaching envirn	1.99	13	1.95	2.15	.05*	1.92	2.02	0.22	1.95	2.01	0.31	1.98	2	0.43
Office & work space	1.885	14	1.86	2	0.1	1.89	1.89	0.5	1.64	1.97	.00*	1.96	1.83	0.17
Secretarial & para professional staff	2.459	2	2.39	2.73	.00*	2.36	2.5	0.17	2.18	2.56	.00*	2.4	2.5	0.28
Securing supplies	2.038	12	1.99	2.22	.03*	2.07	2.03	0.4	1.71	2.16	.00*	1.94	2.1	0.14
Having enough school time for planning & preparing	2.316	8	2.27	2.49	.05*	2.28	2.33	0.35	2.36	2.3	0.31	2.29	2.34	0.36
Gaining administrative and supervisory support	2.359	5	2.39	2.24	0.11	2.31	2.38	0.32	2.31	2.38	0.31	2.37	2.35	0.45
Length of class period	1.531	16	1.48	1.76	.00*	1.62	1.49	0.11	1.56	1.52	0.32	1.62	1.47	0.09
Teaching assignment commensurate with training	1.421	17	1.39	1.56	.02*	1.48	1.4	0.23	1.29	1.47	.02*	1.51	1.36	0.08
Policies for personal business and sick leave	1.354	18	1.35	1.39	0.28	1.34	1.36	0.44	1.36	1.35	0.43	1.44	1.3	0.08
Assignment of committee work	2.105	10	2.08	2.2	0.17	1.89	2.2	.01*	2.16	2.08	0.26	2.02	2.16	0.17
Acquiring up-to-date equip.	2.522	1	2.46	2.78	.01*	2.44	2.55	0.24	2.25	2.62	.01*	2.61	2.46	0.19
Having enough equipment for effective instruction	2.325	6	2.27	2.54	.03*	2.26	2.35	0.28	2.07	2.42	.01*	2.36	2.3	0.37
* : Significant at 5% alpha level														

Table 5
Instructional Activities

	All respondents		Gender			Length of service			Doctoral status			Accreditation status		
	Mean	Rank	Male	Female	*p*-value	Less than 10 years	More than 10 years	*p*-value	Doctoral	Non-doctoral	*p*-value	Accr.	Non-Accr.	*p*-value
Number of observations			168	41		61	148		55	154		84	125	
Formulating instruction objectives	1.56	12	1.56	1.56	0.49	1.62	1.53	0.12	1.6	1.55	0.24	1.55	1.57	0.41
Sequencing instructions	1.545	13	1.57	1.44	.05*	1.56	1.54	0.42	1.62	1.52	0.12	1.55	1.54	0.48
Explaining subject matter	1.507	14	1.48	1.61	.05*	1.74	1.41	.00*	1.58	1.48	0.13	1.55	1.48	0.24
Prescribing instruction	1.598	11	1.56	1.76	.01*	1.74	1.54	.01*	1.65	1.58	0.18	1.61	1.59	0.43
Individualng instruction	2.153	4	2.13	2.27	0.13	2.16	2.15	0.45	2.42	2.06	.00*	2.19	2.13	0.32
Selecting instructional material	1.962	7	1.92	2.12	.03*	2.13	1.89	.01*	1.95	1.97	0.41	1.89	2.01	0.15
Making appropriate & meaningful assignments	1.828	8	1.84	1.78	0.27	1.98	1.76	.01*	2	1.77	.01*	1.88	1.79	0.2
Planning & preparing lessons	1.656	9	1.67	1.61	0.25	1.89	1.56	.00*	1.71	1.64	0.21	1.63	1.67	0.34
Stimulating critical thinking	2.799	3	2.75	3	.03*	2.95	2.74	0.06	2.84	2.79	0.35	2.75	2.83	0.29
Leading class and small group discussions	2.057	5	2.01	2.24	.02*	2.16	2.01	0.1	2.15	2.03	0.14	2.08	2.04	0.37
Using question-asking techniques	1.99	6	1.98	2.05	0.27	2.18	1.91	.02*	2.05	1.97	0.24	2.01	1.98	0.39
Giving students a share in planning objectives & learning activities	2.818	2	2.74	3.15	.00*	3.1	2.7	.00*	3.02	2.75	.03*	2.86	2.79	0.33
Developing in students good work & study habits	3.096	1	3.04	3.34	.00*	3.21	3.05	0.1	3.05	3.11	0.33	2.96	3.18	0.06
Mastering subject matter	1.617	10	1.63	1.59	0.34	1.7	1.58	0.13	1.73	1.58	0.07	1.71	1.55	0.08
* : Significant at 5% alpha level														

Table 6
Professional Growth

	All respondents		Gender			Length of service			Doctoral status			Accreditation status		
	Mean	Rank	Male	Female	*p*-value	Less than 10 years	More than 10 years	*p*-value	Doctoral	Non-doctoral	*p*-value	Accr.	Non-Accr.	*p*-value
Number of observations			168	41		61	148		55	154		84	125	
Opportunities for advancement	2.359	5	2.33	2.49	0.1	2.48	2.31	0.12	2.18	2.42	.04*	2.32	2.38	0.34
Opportunities to participate in professional organizations	1.976	10	1.99	1.93	0.3	2.1	1.93	0.11	1.78	2.05	.02*	1.93	2.01	0.3
Opportunities to read professional literature	2.081	8	2.03	2.29	.02*	2.36	1.97	.00*	2.07	2.08	0.46	1.92	2.19	.02*
Opportunities to work in curriculum development & improvement	2.053	9	2.06	2.02	0.39	2.34	1.93	.00*	2.04	2.06	0.43	2.08	2.03	0.36
Opportunities for democratic decision making on school policies & practices	2.531	2	2.48	2.76	.03*	2.59	2.51	0.31	2.49	2.55	0.37	2.61	2.48	0.23
Adequate policies for leaves of absence	1.818	11	1.77	2.02	.01*	1.9	1.78	0.19	1.69	1.86	0.08	1.76	1.86	0.25
Change in promotion & tenure requirements	2.545	3	2.48	2.83	.01*	2.66	2.5	0.17	2.6	2.53	0.32	2.55	2.54	0.49
Change in research requirements toward academic journals	2.761	1	2.82	2.54	.03*	2.59	2.83	0.06	2.85	2.73	0.2	2.82	2.72	0.27
Change in research requirement towards practitioner journals	2.311	7	2.32	2.27	0.36	2.28	2.32	0.38	2.45	2.26	0.09	2.3	2.32	0.44
Accepting school's philosophy concerning promotion & tenure	2.478	4	2.47	2.51	0.39	2.52	2.46	0.34	2.64	2.42	0.09	2.55	2.43	0.25
Adjusting to changes in tenure & promotion requirements	2.354	6	2.31	2.54	0.06	2.44	2.32	0.21	2.47	2.31	0.15	2.33	2.37	0.41
* : Significant at 5% alpha level														