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EVALUATION OF COMPARATIVE ACADEMIC PERFORMANCE OF UNDERGRADUATE STUDENTS AT UNIVERSITY LEVEL

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ABSTRACT

The study was undertaken to evaluate the comparative academic performance of male and female students, day scholars and boarders and of rural and urban area students at undergraduate level in the University of Agriculture, Faisalabad (UAF). In all, 265 students responded to a pretested questionnaire. Of these, 96 were females. The evaluation of performance was based on GPA and CGPA obtained by students in various groups in their first and sixth semester respectively. In "above 3.00 GPA" category, less than 50% male students were placed, whereas almost 60% females attained this level in first semester. When CGPA in sixth semester in "above 3.00" category was compared, 28% more females earned higher than 3.00 CGPA, showing thereby better performance of females than their counterparts. The comparative academic performance of dayscholars and boarders was almost of the same level in first and sixth semesters, with no significant difference between the two groups. The comparison of educational performance between rural and urban students at different levels of GPA and CGPA in first and sixth semester respectively exhibited varying and mixed trends in results.

Key words: Academic performance, dayscholars, boarders, rural, urban.

INTRODUCTION

Awareness among masses to get education is on the rise. The number of schools, colleges and universities has amply increased to accommodate the increasing number of students. The trend to go for professional education has remarkably increased since there is a common feeling that professional education helps secure jobs. With improved infrastructure facilities such as roads, modes of transportation, more higher secondary education institutions even in the midst of rural areas and electronic media have encouraged people from far flung areas to get educated.

Society, in general, has realized the importance of educating the better half of population, i.e. women in Pakistan. Thus, the taboo to avoid sending girls to other villages or towns to receive education is fading away and now the females are neck to neck in competition with males in any field of study. A general feeling based on Matric and Intermediate results of Boards of Secondary and Higher Secondary Education in recents years, is that female students in many cases are outperforming the males. Also, it is opined that students from rural areas pay more attention to their studies. The situation about dayscholars and boarder students is not clear. Chen *et al*. (1999) reported that the female students in their study performed better in all classes but one. Turut-Asik and Dayioglu (2006) found that a smaller number of female students apply for university admission. Once they get admission, they work hard to earn better grades than their counterpart male students. Snyder *et al*. (2008) stated that males completed college at lower rates than females and that males fell behind even after they had decided to obtain college diploma. The research comparing performance of rural students with their urban counterparts showed mixed trend in results (Khattri, Riley and Kane, 1997). Feldey *et al*. (1994) found that urban students did better in all respects in an introductory course of chemical engineering; 80% of the urban students and 55% rural students passed with average grades of 2.63 and 1.80 respectively. Fan and Chen (1999) reported that rural students performed as well as their urban counterparts.

A study, therefore, was designed to evaluate the comparative academic performance of male students vs females, dayscholars vs boarders and rural vs urban students at undergraduate level in the Faculties of Agri., Agri. Economics, Agri. Engineering and Veterinary Sciences, in the University of Agriculture, Faisalabad.

METHODOLOGY

Data were collected using a pretested questionnaire from students of 7th semester of various first degree programs offered in the University of Agriculture, Faisalabad.

Data were collected both from male and female students. The students who passed their Matric examination from a rural area were considered as rural area students, while others as urban area dwellers. The number of female students obviously is much smaller than male students in UAF. However, effort was made to

collect data from as many female students as possible from classes such as B.Sc. (Hons) Agriculture, Agri. Economics, Agri. Engineer. and DVM. Some of the questionnaires were discarded because of being incomplete.

The information provided in 265 questionnaires (Males: 169, Females: 96) was employed for analysis using descriptive statistics and Chi-square test. The evaluation of performance was based on GPA and CGPA obtained by students in various groups in their first and sixth semester respectively.

RESULTS AND DISCUSSION

Academic Performance of Male vs Female Students: Of the total number (265) of students that responded, female students were only 36.2% (Table 1). A comparison between the performance of male and female students with reference to their GPA "up to 2.00" in first semester, showed that there were 4.7% males compared to 1% females in this GPA range. In the same way, a higher percentage (46.2) of males compared to females (39.6) was placed in GPA bracket "2.01 to 3.00".

In GPA category "above 3.00", less than 50% males were placed, whereas almost 60% female students attained this level, which showed that quality-wise, the performance of females was better (Table 1). Collectively, 51% males were placed in category "up to 2.01 to 3.00", while only 41% females were found in this GPA range. Thus, the number of males who exhibited mediocre performance was higher by 10% than that of female students. In "above 3.00 GPA" category, the females outperformed their counterparts by about 10% margin.

When the performance of both these groups was evaluated till the end of sixth semester, the situation further tilted in favour of female students. In collective CGPA category of "up to 2.01 to 3.00", only 16.7% females were placed, whereas in contrast more than 44% male students fell in this category (Table 2). This can be interpreted to mean that majority of males probably did not strive to get better grades. The situation became further clear when their performance was considered with reference to the CGPA in "above 3.00" category, wherein compared to males, about 28% more females secured higher than 3.00 CGPA, the difference being highly significant.

Overall performance of female students is obviously better than that of males. This strengthens the general feeling that female students work harder and devote more time to studies than males who involve themselves more in social and physical activities. Most of the female students also realize the importance of good grades, which of course, help in competing for good jobs. Good jobs in turn can attract good life partners as well as can lead to financial security in future life.

The following studies substantially support the results of the present study in relation to gender differences in academic performance. Chen *et al*. (1999) reported that contrary to all previous findings, the female students in their study performed much better than the males except in one class. This was despite the sexist attitudes and actions of faculty and fellow students. Snyder *et al*. (2008) found that males completed college at lower rates than females. Conger and Long (2010) reported that in all 11 public institutions having 4-years program in Florida, males obtained 0.43 less credits than females in first semester and got even lesser in subsequent semesters. By the end of sixth semester, males had a cumulative disadvantage of 6.6 credits. Moreover, in each year of college, females got better grades than males.

Blau (1998) observed that males are usually overrepresented in fat-salaried positions and industries, the growing female advantage in college completion may disturb the balance in employment chances in favour of females.

Possible explanations for better performance of female students could be better initial grades of most of the entering female students for professional studies and self-confidence in their skills and abilities. Factors such as better class attendance, more study time and skills and motivation of female students can lead to better performance by them.

Comparative Academic Performance of Dayscholar Students vs Boarders: The number of dayscholar students was only 38% of the total 265 respondents. The performance of dayscholar students and boarders was evaluated with reference to their collective GPA in first semester and CGPA in sixth semester. The data given in Tables 3 and 4 did not show any significant difference between the two groups. More than 50% students of each group secured "above 3.00" GPA in first semester. Similarly, a clear majority of dayscholars and boarders earned "above 3.00" CGPA in sixth semester, which apparently indicated that with minor variations both home and hostel provided equally conducive environment for studies. Of course, individual cases of D and F grade students can be easily traced in both groups alike.

Comparative Academic Performance of Rural vs Urban Students: The number of rural students constituted a little more than one-third of the total students (265) examined for this study.

A comparison of performance (Exam. Marks) of rural and urban students at Intermediate (pre-engineering and pre-medical) level showed that overall performance of urban students was better than rural although not significantly so.

While having been admitted to various first degree programs in the UAF, a comparison of performance between rural and urban students in respect

of GPA obtained in first semester showed that in "up to GPA 3.00" category, urban students performed somewhat better, but in "above 3.00 GPA" class, rural students tended to show better GPA by a difference of 5.6%, being non significant. Coming to sixth semester, it was found that in "up to 2.00" CGPA category, the performance of rural and urban students was almost at the same level. However, a comparison of CGPA of two groups in "2.01 to 3.00" category indicated a clear-cut lead of rural group over the urban by a margin of about 19%, but this lead was reversed by the same magnitude in favour of urban group when the CGPA in "above 3.00" category was compared between the two groups in question (Tables 5 and 6).

Table 1. Gender* GPA in first semester

			GPA in first semester			
			Up to 2.00	**2.01 – 3.00**	**Above 3.00**	**Total**
Gender	Male	Count	8	78	83	169
		% within gender	4.7%	46.2%	49.1%	100%
	Female	Count	1	38	57	96
		% within gender	1%	39.6%	59.4%	100%

Table 2. Gender* CGPA uptil sixth semester

			CGPA in sixth semester			
			Up to 2.00	**2.01 – 3.00**	**Above 3.00**	**Total**
Gender	Male	Count	3	72	94	169
		% within gender	1.8%	42.6%	55.6%	100%
	Female	Count	-	16	80	96
		% within gender	-	16.7%	83.3%	100%

Table 3. Dayscholar/Boarder* GPA in first semester

		GPA in first semester			
		Up to 2.00	**2.01 – 3.00**	**Above 3.00**	**Total**
Dayscholar	Count	3	45	53	101
	% within dayscholar-boarder	3.00%	44.6%	52.5%	100%
Boarder	Count	6	71	87	164
	% within dayscholar-boarder	3.7%	43.3%	53.3%	100%

Table 4. Dayscholar/Boarder* CGPA uptil sixth semester

		CGPA in sixth semester			
		Up to 2.00	**2.01 – 3.00**	**Above 3.00**	**Total**
Dayscholar	Count	2	27	72	101
	% within dayscholar-boarder	2.0%	26.7%	71.3%	100%
Boarder	Count	1	61	102	164
	% within dayscholar-boarder	0.6%	37.2%	62.2%	100%

Table 5. Rural/Urban* GPA in first semester

			GPA in first semester			
			Up to 2.00	**2.01 – 3.00**	**Above 3.00**	**Total**
Rural/Urban	Rural	Count	2	38	52	92
		% within rural/urban	2.2%	41.3%	56.5%	100%
	Urban	Count	7	78	88	173
		% within rural/urban	4.0%	45.1%	50.9%	100%

Table 6. Rural/Urban* CGPA in sixth semester

			CGPA in sixth semester

			Up to 2.00	2.01 – 3.00	Above 3.00	Total
Rural/Urban	Rural	Count	1	42	49	92
		% within rural/urban	1.1%	45.7%	53.3%	100%
	Urban	Count	2	46	125	173
		% within rural/urban	1.2%	26.6%	72.3%	100%

The results of the present study regarding comparative academic performance of rural and urban students (CGPA up to sixth semester) appeared to show a mixed trend as also reported by Khattri *et al*. (1997). Some studies did not find any significant difference in this respect, while others reported better performance of rural area students than those from urban areas (Haller *et al*., 1993 and Alspaugh and Harting, 1995).

Differences in educational performance have been observed between students from rural and urban backgrounds. In an introductory course, 80% of the urban students and 55% of the rural students passed the chemical engineering course with average grades of 2.63 and 1.80 respectively. The urban students persistently earned higher grades in subsequent courses (Felder *et al*., 1994). Fan and Chen (1999) found that compared to urban school students, rural students performed almost equally well. These findings are in line with those found in the present study. Contrarily, migration of young people to urban areas and economic decline may not be helpful to improve the quality of rural schools (Herzog and Pittman, 1995).

REFERENCES

Alspaugh, J. W. and R. D. Harting (1995). Transition effects of school grade-level organization on student achievement. J. Res. & Development in Education, 28:145-149.

Blau, F. D. (1998). Trends in the well-being of American Women, 1970-75. J. Economic Literature, 36: 112-165.

Chen, J. C., S. O. Ofori, D. Pai, E. T. McDowell, S. L. Wang and C. K. Waters (1999). A study of female academic performance in mechanical engineering. Dept. of Mech. Engineering, North Carolina A & T State University.

Conger, D. and M. C. Long (2010). Why are men falling behind? Gender gaps in college performance and persistence. George Washington University, Washington, DC and University of Washington, Seattle, USA.

Fan, Xitao and M. J. Chen (1999). Academic achievement of rural school students. A multi-year comparison with their peers in suburban and urban schools. J. Res. Rural Education, 15: 31-46.

Felder, R. M., P. H. Mohr, E. J. Dietz and L. Baker-Ward (1994). Engineering students performance and retention. 11. Rural/Urban student differences. J. Engineering Education. July: 209-217.

Gibbs, N. (2008). Affirmative action for boys. Time Magazine, [accessed 20 August, 2008]. Available from http://www.time.com/time/magazine/article/html .

Haller, E. J., D. H. Monk and L. T. Tien (1993). Small schools and higher-order thinking skills. J. Res. Rural Education, 9: 66-73.

Herzog, M. J. R. and R. B. Pittman (1995). Home, family, and community: Ingredients on the rural education equation. Phi Delta Kappan, 77: 113-118.

Khattri, N., K. W. Riley and M. B. Kane (1997). Students at risk in poor, rural areas. A review of research. J. Res. Rural Education, 13: 79-100.

Kimura, D. (2005). Sex differences in the brain. Scientific American, Battle of the Sexes (Exclusive Online Issue # 20).

Snyder, T. D., S. A. Dillow and C. M. Hoffman (2008). Digest of Education Statistics, Institute of Education Sciences, U.S. Dept. of Education.

Turut-Asik, S. and M. Dayioglu (2006). Gender difference in academic performance in the Middle East Technical University, Ankara, Turkey.

Viadero, D. (2006). Concern over gender gaps shifting to boys. Education Week, 25(27), 1:16-17.