

DOI: http://dx.doi.org/10.14505/jres.v6.8.04

Student Enthusiasm as a Key Determinant of their Performance

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Suggested Citation:

Abdulmumini B.A., Mohd, Z.A.K. (2015). Student enthusiasm as a key determinant of their performance, *Journal of Research in Educational Sciences*, Volume VI, 8: 26-39. DOI:10.14505/jres.v6.8.04. Available from: http://www.asers.eu/journals/jres/jres-issues.

Article's History:

Received May, 2015; *July*, 2015; *Accepted* September, 2015. 2015. ASERS Publishing. All rights reserved.

Abstract

This paper investigates students' enthusiasm and their performance over the programme they were given using 400 observations of new students from faculty of management and social sciences. Using OLS motivation, the results indicate that number of peers positively influence their performance, while change of student programme by university management negatively affect their performance. We therefore recommend a free will option to be given to students to choose any programme of their choice and as well move with peers that will positively impact on their performance.

Keywords: enthusiasm, performance, peers, programme, departments.

JEL Classification: 123.

1. Introduction

The issue of student academic performance in many universities setup has engross huge attention in the literature. Various scholars have considered a lots of factors associated with these performance particularly in modern literatures (see Chambers and Schreiber 2004, Alfan and Othman 2005, Krashen 2005, Bergin and Reilly 2006, Thapa 2011). But many studies look beyond people's kin career, because they emphasize more on socioeconomic variables as a key determinant of performance, which serve as a yardstick for them to venture into their areas of specialization. (see Dynan and Rouse 1997, Betts and Morell 1999, Chambers and Schreiber 2004, Rask 2010, Ogbemudia and Aiasa 2013, Nam 2014)

It's quite obvious and pertinent to see how individual performance increases or decreases overtime, with individual kin interest in that particular programme. The desire to pursue a lifetime career in various fields of interest among the Nigerian populace has been on increase overtime (Tawari and Koko 1996, Lough 2010), which is not favoured by the current nature of educational system. In recent years, the educational system of Nigerian do not provide adequate ground for the youths to display their skills and talents in their desired field (Pandey and Tiwari 2014, Laleye 2015), either due to their early poor economic status and pre-tertiary educational background, or due to some circumstances surrounding their intake into tertiary institutions as some candidate choice of school and programme of study does not actualise. Each year, more than one million Nigerian school-leavers (about 63% of the population under the age of 24) are struggling to gain admission into tertiary institutions (Clark 2013). While at tertiary level alone, the number of students have grown from under 15,000 in 1970 to approximately 1.2 million in 2012 (see Clark 2013, Oshemughen and Oghuvbu 2013). In 2013 alone about 1.7 million students registered for Nigeria's centralised tertiary admission examinations, all competing



for the half million places available; potentially leaving over a million qualified college-age Nigerians without a post-secondary place. (Clark 2013)

The quest for admission warrant these half a million to undertake any programme given to them by most university management, some of them tends not to be comfortable with the programme given to them, therefore, diminishing their enthusiasm. Originally, this enthusiasm by applicants can serve as a foundation on how students can build on already exiting core and values of the programme to be studied. But most of these egos are either altered due to students' educational background, parental commitment towards education or most school management (Akiwowo et al. 2011). This further affects their performance, and at the end some students turn out to be a dropout from institution. Performances normally determine whether a student can pursue higher education and contribute to the society or not (Hossain 2012). Most often, successful admitted students into higher institution of learning normally face either or both internal and external factors, which in-turn affects performance. The internal factors range from nature of programme under study, age group influence, adequate manpower, etc (Khonbi and Sadeghi 2012, Sabitova 2014, Zhan et al. 2015); while the external factors consist of parental level of income, educational background of parent, educational background of the candidate and nature of region (Tomul and Celik 2009, Misran et al. 2012, Ummet 2015).

This study further looked at the internal factors that are enthusiastic in nature; they include the programme status before and after application, the decision to read a particular programme and the department under which the student is studying. Earlier studies focused on teachers' enthusiasm by looking at their nature of excitement in the programmes taught by them (see Muzenda 2013, Eren 2012). But study like Kim and Schallert (2014) looked at the mediating effects of students' perceptions of teacher enthusiasm and that of peer enthusiasm in United State; though this study is more specific, as it only concentrate on students' enthusiasm, where change of programmes in the university system affect students' prudence. This study therefore, investigates students' enthusiasm and how it enhances their performance. The rest of the paper is organised as follow. Section 2 discusses the related literature. Section 3 presents the methodology adopted. Section 4 deals with the results and discussions. Finally, Section 5 provides conclusions and recommendation.

2. Literature review

Several empirical studies (Johnstone and Jiyono 1983, Betts and Morell 1999, Dynarski 2008, Richburg-Hayes *et al.* 2009) have discussed the determinants of performance in various degrees. Virtually most of them view student's performance from socioeconomic aspect; which Jehangir *et al.* (2015) sees as a main predictor of student performance. Betts and Morell (1999) used 5000 undergraduate data from University of California and estimate an Ordinary Least Square (OLS) model to determine their success. The findings shows that students from economically disadvantage areas perform lower than those from economically advantage areas. Study by Agasisti and Longobardi (2014) in Italy also confirmed that more economically advantage students perform better at school. Collinger *et al.* (2013) concludes that poor disadvantage students normally experience substantial psychological stress which affects their performance. Though earlier study by Johnstone and Jiyono (1983) in testing student achievement in language and mathematics in rural and semi-urban Yogyakarta, found that family encouragement is more important than family wealth or socioeconomic conditions.

Encouragements by parents are usually more open to a child's behaviour and academic performance, which might be viewed from the educational background of parents. Krashen (2005) study from Mexico used multiple regressions on parental socio-economic-status and concluded that students whose parents are educated score higher on standardized tests than those whose parents were not educated. Also Sanzana *et al.* (2015) found parent education to be a key determinant of child performance in their study of Chile. This is because educated parents can communicate better with their children regarding the school work, activities and the information being given at school, as they can guide their children in their home work (Fantuzzo and Tighe 2000, Kukk *et al.* 2015, Trusty 1999, Wingard and Forsberg 2009). But Johnstone and Jiyono (1983) based student's performance on background, which to them is more important than students' individual characteristics and attitudes towards school. Wobmann (2005) in his cross country study concludes that student's performance is being predicted by background of a child especially in Korea and Singapore, though Aakvik (2005) experience very small magnitude in Norway.

In Nigeria context, background mostly depends on either a child attended public or private school. More often, private schools in developing countries have more resources and certainly have students from families with higher socio-economic status compared to public schools (Lane and Porch 2002, Thapa 2011). In this regard, Thapa (2011) used Ordinary Least Squares regression method to model private school and public school performance. His finding shows that private school is positive and statistically significant in explaining student's



School Leaving Certificate (SLC) performance, because in developing countries the demand for a better education system is raising day by day. But Thapa (2011) study did not control for home environment as students from community private schools in rural areas can only compute with public schools in urban centers. In investigating the influence of home environment on the academic performance in Orhionmwon Local Government Area of Edo State, Ogbemudia and Aiasa (2013) used a sample of 50 observations and applied dependent t-test and the analysis of variance ANOVA. The result entails that home location has significant influence on the academic performance of a child at 5% level of significance.

But this influence of home has to do with gender of a child, because children are seen mostly engaging in house chores from an early stage which affects their present and future performance. Chambers and Schreiber, (2004) examined the relationship between extracurricular activities and academic achievement for girls with different ethnic background in eight and tenth grade on 4382 American girls. A gap between the performance of boys and girls was found, with girls showing better performance than boys in certain instances. Equally, Rask (2010) used data from the Colgate University graduating classes of 1989 to 2004, and found that overall Economics GPA for female majors is significantly higher than that of males, while male students dominate the bottom of the grade distribution.

But on the other hand, Dynan and Rouse (1997) earlier used probit estimate and found that female students tend to have somewhat weaker math skills than their male counterparts. This might be due to their time spent on household chores which negatively affect their academic achievement as shown by The New ERA (1995) from 126 schools in 8 districts. However, Baker (2011) only concentrated on female students by determining the academic achievement between high school female athletes and non-athletes and used Gateway Algebra I scores, ACT scores, and Cumulative GPA of each of the female graduates for the class of 2010 at Stone Memorial High School. Findings indicate that female athletes earn an average GPA of 3.3182, while the female non-athletes earned an average GPA of 2.9957. But on the other hand, Chambers and Schreiber, (2004) result further shows that in-school academic organized activities were positively and significantly related to achievement, while out-of-school non-academic non-organized activities were only partially substantiated. Similarly, age has a significant influence on academic achievement (Pellizzari and Billari 2012). Study by Nam (2014) used OLS regression on the Korean Education and Employment Panel (KEEP) data, and the result shows that age has a significant effect on academic achievement because younger students upon entering high school. This enable them focus more on their academic studies and do not experience minor distractions, thereby compensating for their poor academic achievement in their middle school, but the effect does not persist when students graduate from high school and take the College Scholastic Ability Test (Nam 2014).

Another important factor is the peer group influence as children try to identify themselves through a unique context for their social and emotional development in order to enhance their reasoning ability and cooperation. A times, this peers influence retard children performance as their influence is exerted so as to conform with the attitude, values and behaviour of the group. To this end, Paola and Scoppa (2010) study from Italy found positive and substantial effect of peer group to performance. Martins and Walker (2006) used longitudinal administrative data on students per class, peers, and tutors to examine the empirical determinants of student achievement in higher education, they found that students do relatively better when paired with colleagues that also do relatively better. But Zimmerman (2003) in their study proves otherwise in US institutions, as they found that good students are not negatively affected from interacting with students that do poorly, while the latter benefit from interacting with the former.

However, studies like Suryadarma *et al.* 2004, Aslam and Kingdon 2011, Adekola 2012, Zwick 2012 focuses on the impact of individual and school characteristics of grade 4 to 6 pupil and secondary school students, while other studies (Byrne and Floo, 2008, Katsikas and Panagiotidis 2010, Garkaz *et al.* 2011) emphasis on socioeconomic background and educational outcomes of students studying in a university, with no role on individual choice of career. This career has to do with programme under concern, because programme structure entails the flexibility and rigidity of a programme and the extent to which it can accommodate students need (Moore 1991, Eom *et al.* 2006). Whittingham (2006) study from United State only looks at personality on academic performance and found a positive impact on performance from both the undergraduate and graduate success in business education. Joseph and Joseph (2000) Indonesia study see adequate information on course, job tendency, career advancement and infrastructural facilities to influence ones performance. Nyaribo *et al.* (2012) in their study of India and Kenya view career choice of students to be in terms future employment prospects, finance and institutional infrastructure; though Agarwal (2008) earlier study in India based programme choice on abilities, competencies and skills as important determinants. Despite the contribution of studies above, the choice of career programmes in most tertiary institutions in developing countries like Nigeria is still pertinent,



as it leads to student performance which are been hindered by some key factors. This study therefore looks at the determinant of student performance in relation to their choice of programmes as it allow students to build a solid learning base. Studies of this nature have not yet been seen from IBB University in Nigeria.

3. Methodology

3.1. Data

To identify the determinants of students' performance, a total of 400 observations from 2014 first year students were used which comes from Faculty of Management and Social Science (FMSS) of IBB University. having the largest number of students within the system with a total number of 565 students from level one. Initially, the observation were to include entire students, since obtaining their information was guite affordable¹: but was limited as only few were exempted from the first departmental test given due to several excuses. The level one student's are always overzealous and inquisitive on their programme of study, especially after they have applied more than once before gaining the admission.

The various department contained in the study are Business Administration, Economics, Political Science and Sociology; Public Administration was exclude as the Department lost out from 2012 accreditation exercise and was unable to admit students for two consecutive year. Some studies of this nature actually concentrated on single department (Martins and Walker 2006; Misran et al. 2012, Zhan et al. 2015) with exception of few that study the entire university (Hossain 2012, Khonbi and Sadeghi 2012). Availability sampling techniques were used to obtain test score of students' that participated in their departmental programmes, the essence is to know how prepared are these students to undertake the four years programme under study.

3.2 Model Specification and Variable Measurement

This study used a multiple linear regression model following the empirical literatures of Betts and Morell (1999), and Nam (2014). The modified model is specified as:

$$y_i = \alpha + \beta I_i + \lambda F_i + \prod E_i + \mu_i \tag{1}$$

where y_i is the student individual test score performance; α , β , λ , and Π are the constant parameters; I_i , represents student individual characteristics (gender, age, and number of friends in peer, previous school attended), Fi denote individual family background (gender of head, education of head, employment status and residence), and lastly the new variable introduced to the model E stands for individual enthusiastic variables (programme status, programme influence and present department). The enthusiastic variables are deterministic in nature as its aid students' ability in terms of performance.

The model can therefore be expanded as:

$$TS_i = \beta_0 + \beta_1 Gch_i + \beta_2 Ag_i + \beta_3 NmbF_i + \beta_4 Ghh_i + \beta_5 Edhh_i + \beta_6 Wlfhh_i + \beta_7 Res_i + \beta_8 Prsca_i + \beta_9 Cst_i + \beta_{10} Cinf_i + \beta_{11} Dep_i + \mu_i.$$
(2)

where TS refers to students test performance. This study used students' test score as dependent (as seen in Agasisti and Longobardi 2014, Balch and Sringer 2015, Gong et al. 2014, Wobmann 2005) the test consist of background programmes notably Introduction to Business Administration, Principles of Economics, Introduction to Political Science and Introduction to Sociology for their respective students'. The curriculums for those programmes are not quite different from Higher School syllabus, which they were already taught. Gch is gender having one if male, and zero otherwise following the study of Garkaz et al. (2011); Ag is child age measured in number of years as used by Lane and Porch (2002); NmbF is number of peer friends, this is measured in terms of number of intimate friends as seen in the study of Martins and Walker (2006).

Simple variables were used for their family background based on their filled-in bio-data form, which consist of gender, educational background, employment status and place of residence, as seen in the study of Krashen (2005). Income was not captured because it's not a prerequisite for students' registration guideline. Therefore, Ghh is gender of household head, Edhh refers to education of household head, Wlfhh entails welfare of household head, Res shows the residence of students, Prsca shows type of previous school earlier attended, having one for attending private school, and zero otherwise.

¹ Thanks to Associate Dr. Bilyaminu Idris Kadandani, Dean Faculty of Management and Social Science, IBB University Lapai; for allowing the researcher gain access to students files at the faculty level, in obtaining their Socio-Economic Biodata.



The school characteristics of this study were not based on common factors like teacher-students, class size etc. as used by Aslam and Kingdon (2011), but was based on their enthusiasm on their feature carrier, which serve as a centre point for this study. Cst denotes programme status undertaken before and after admission, denoting one if the earlier programme they applied for were not changed, and zero otherwise; Inf stands for influence of student programme under study, the influence were categorically measured having one for their personal decision to read the programme, two stands for parents advise, three for university management decision which are mostly based on departmental quota and Senior Secondary Certificate Examination (SSCE) result; Dep denotes the department the student is presently undergoing the study, denoting one for Business Administration, two for Economics, three for Political Science, and four for Sociology.and μ is the error term.

However, the linear regression were estimated by students' previous school attended, programme status before and after admission if changed or not, and by the department. The essence is to see the individual influence of each category in the estimation.

4. Results and Discussion

4.1 Results

4.1.1 Descriptive Results

This section consist of both the descriptive and empirical analysis on how the performance of students are been determined by set of child, household and enthusiastic characteristics.

Table 1. Descriptive statistics

Variables	Frequency	Percentage	Mean	Standard Deviation
Gender				
Male	211	52.75		
Female	189	47.25	0.5275	0.4999
Age				
15 – 20	182	45.50		
21 & Above	218	54.50	20.5975	2.4942
Number of Intimate Peers				
None	131	32.75		
Two	15	3.75		
Three	41	10.25		
Four	33	8.25		
Five and Above	180	45.00	2.9625	2.2087
Gender of Head				
Male	302	75.50		
Female	98	24.50	0.755	0.4306
Educational of Head				
Ordinary Certificate	196	49.00		
Advanced Certificate	204	51.00	0.51	0.5005
Nature of Employment				
Unskilled	187	46.75		
Skilled	213	53.25	0.5325	0.4996
Residence				
Rural	193	48.25		
Urban	207	51.75	0.5175	0.5003
Test Score				
Below Average	303	75.75		
Above Average	97	24.25	10.465	5.0753



Previous school attended				
Private	122	30.50		
Public	278	69.50	0.695	0.4610
Programme Status				
Not Changed	131	32.75		
Changed	269	67.25	0.6725	0.4699
Influence				
Personal Decision	253	63.25		
University Management	126	31.50		
Parents Decision	21	5.25	2.1266	0.5854
Department				
Business Administration	84	21.00		
Economics	96	24.00		
Political Science	104	26.00		
Sociology	116	29.00	2.4400	1.0720
N	400	100,00		

Source: Authors Computation (2015)

The descriptive result shown in Table 1 has a total number of 400 students' from the Faculty of Management and Social Science. Out of 400 students' 52.75% were males, while 47.25% are females; this indicates gender imbalances as education of males are still higher than that of female children (see Omoregie and Abraham 2009, Atovigba *et al.* 2012). The age was grouped into two with those that had early education, and those that had a little delay in terms of their application. 45.50% of the students are below the age of 21 years, while 54.50% students are above 20 years of age, this signifies that most students do have delay in gaining admission into university (see Aluede *et al.* 2012). Having friends within Nigerian student is inevitable due to cultural assimilation as kinship are always tie right from small age, from this study students on average at least move in peers of three approximately, with 131 of them only normally move alone while the remaining 269 of them have at least a friend.

The household characteristics to a large extent enhance students' performance. From the descriptive result, households with male heads tend to be higher having 75.50% from the students' under observation, while the remaining 24.50% students' household head were female; by implication, these few female heads were those that have been divorced or lost their husbands and decide to stay alone, which are inevitable in most society. Also 49% of heads had ordinary certificates such as primary or secondary certificate, while 51% are classified to be having advanced certificates ranging from diploma to post degree certificate; though the higher the parent education the more the tendency of the parents sending their children to school. On nature of employment, 46.75% parents do participate in unskilled jobs (such as farming, auto repair, etc), while 53.25% parents actually partake in skilled jobs like administrators, educationists, etc. On their permanent residence, 48.25% of the students stay in rural or semi-rural areas, while 51.75% resides in urban residence.

The students' enthusiastic characteristics are actually subjective in this study; they consist of variables that actually determine a student performance. The test which is ultimate was marked over 30 points with the average of 15 marks; students scoring below average (representing 75.75%) on their major core programme shows the sign of underperformance if adequate serious learning were not put on, while 24.25% performed above average showing the sign of willingness to undertake the programme even from initial stage. This test score was done to actually see their zeal over the programme and at the same time to know the level of elementary knowledge they have garnered from their previous high schools.

Though from the previous school attended, 30.50% attended private schools, while 69.50% remaining students attended public schools; this indicates that the large percentage of students performing below average were due to inefficient in public schools, which result to spill over effect at the institutional level. But this performance might not be solely on background alone, as some of them were unable to undertake their desired programme; as such 32.75% got the programme they applied for, while 67.25% have their programme changed by university management or being influenced by parents to read the programme. From this statistics, 63.25% of programme studied are being influenced by students themselves, and 31.50% are the sole decision of the



university management, while the remaining 5.25% influenced by parent. Lastly, the four departments under study had 21% from Business Administration, 24% from Economics, 26% students' obtained from Political Science, while 29% are from Sociology.

4.1.2. Empirical Results

The result from 400 observations was analysed in various stages to see the actual influence of the variables on the dependent variable with a set of control variables. Test score obtained from students was analysed using students' previous school attended, programme status, department and place of permanent residence.

Table 2. OLS Result

Dependent variable: Test score				
Gender	0.8940			
33/143/	(2.39)**			
Age	0.4103			
J -	(4.72)***			
Number of Peers	0.7408			
	(5.97)***			
Gender of Head	5.2405			
	(11.39)***			
Education of Head	0.3782			
	(0.65) 1.2900			
Household Welfare	(2.41)**			
	0.4988			
Residence	(1.28)			
	0.6339			
Previous school attended	(1.59)			
	-0.2208			
Programme Changed	(-0.38)			
	-0.1520			
Programme Influenced	(-0.42)			
	-0.3434			
Department	(-1.62)			
R^2	0.5097			
F-Statistics	36.67***			
N	400			

Note: The OLS results *; **; and *** stands for 10%; 5%; and 1% significance level respectively. The values in parenthesis are the t-value. Each regression includes a constant and set of control variables.

Source: Authors Computation (2015).

The result of Table 2 shows the entire result where all variables are pooled together, with the introduction of students enthusiastic variables within the model. From the result, variables such as gender, age, number of peers, gender of head and household welfare are positive and significant. Gender of student is positive and significant at 5% level, indicating that male students perform much better than the female students. Age is equally significant at 1% level, suggesting that the higher the student's age the more the tendency of that student performing better due to maturity. Number of students is equally positive and 1% significant, indicating that the more numbers of peers, the more the probability of having brilliant ones in the midst. Also, household welfare is significantly related to students' performance at 5% level, indicating the higher the family welfare level, the higher the students' performance. However, variables such as education of household head, residence, previous school attended, programme status, influence and department are not significant.



Table 3. Regression of Test Score result by programme status

Dependent variable: Test score	Unchanged	Changed
Gender	-0.6123	1.1114
	(-1.01)	(2.58)**
Age	0.6489	0.3639
3	(3.67)***	(3.98)***
Number of Peers	-0.3987	0.81654
	(-0.71)	(6.71)***
Gender of Head	9.4813	2.5585
Gornadi or rioda	(14.81)***	(4.43)***
Education of Head	0.0534	0.1964
Eddodion of Fload	(0.04)	(0.31)
Household Welfare	5.2457	0.2671
Trouseriola Wellare	(4.49)***	(0.48)
Residence	1.0529	0.2151
Nesidence	(1.53)	(0.51)
Previous school attended	-0.1444	0.6368
1 Tevious scrioof attenued	(-0.22)	(1.39)
Programme Influenced	0.7435	-0.5236
Programme initidenced	(1.49)	(-1.11)
Donartmont	0.3127	-0.4358
Department	(0.69)	(-1.99)**
R^2	0.6933	0.4147
F-Statistics	27.13***	18.28***
N	131	269

Note: The OLS results *; **; and *** stands for 10%; 5%; and 1% significance level respectively. The values in parenthesis are the t-value. Each regression includes a constant and set of control variables.

Source: Authors Computation (2015).

Table 3 entails student enthusiastic result by programme status whether their programme was changed or not. Students in most cases are always happy ones they were given the programme they applied for or after the unwanted programme given to them is changed to their desired one. But on the other hand, students are always unhappy ones they are unable to study the programme they admired or desired. For students whose programme were not changed shows age, gender of head and household welfare to be positively significant with student performance, signifying that student maturity enhance child performance at 1% level of significance, being a male household head significantly at 1% influence student performance, and household welfare significantly leads high student performance at 1%, while gender, number of peers and department are not significant. But for those that their programme was changed, gender was positively significant at 5% level, while age, number of peers and gender of head was 1% significantly enhances student performance.

Also, the most important outcome of this study is that, the department at which students were later registered in after their change of programme from initial programme is negative significantly at 5% affecting their performance. Variables such as education of household head, residence, previous school attended and programme influence are not significant for both students that their programme was changed and those that were not change.

Table 4. Regression Result of Test Score by Nature of Influence

Dependent variable: Test score	Personal	University Management	Parents
Gender	1.2136	0.4732	2.2000
Gender	(2.78)**	(0.64)	(0.89)
Age	0.4357	0.3995	-0.1037
Age	(4.48)***	(2.29)**	(-0.11)
Number of Peers	0.7748	0.9576	-0.2380
	(5.93)***	(3.00)***	(-0.23)



Gender of Head	4.5513	6.4856	4.9471
	(8.14)***	(7.49)***	(1.36)
Education of Head	0.7397	0.9431	-5.4582
	(1.11)	(0.72)	(-1.20)
Household Welfare	0.5220	-0.0219	-0.6227
	(0.87)	(-0.01)	(-0.21)
Residence	-0.0556	1.9109	1.2708
	(-0.12)	(2.40)**	(0.48)
Previous school attended	0.4245	0.6534	-1.0087
	(0.90)	(0.88)	(-0.27)
Programme Changed	0.8072	-1.9211	-1.5346
	(1.09)	(-1.85)*	(-0.21)
Department	-0.6107	0.1432	0.8000
	(-2.69)**	(0.27)	(0.55)
R ²	0.5038	0.5849	0.5879
F-Statistics	24.57***	16.21***	1.43
N	253	126	21

Note: The OLS results *; **; and *** stands for 10%; 5%; and 1% significance level respectively. The values in parenthesis are the t-value. Each regression includes a constant and set of control variables.

Source: Authors Computation (2015)

In Table 4, we estimate the student enthusiasm by nature of programme influence in terms of personal, university and parents influence. In the first model of students personal influence, gender of a students and household head, age of students, number of peers positively and significantly influence performance, while the department at which they study is negative and significantly affect their performance, this might be due to general programme at first year which are mathematically inclined. But variables such as parent education, household welfare, and place of residence, school basic background and programme status are not significant. Secondly, age of student, number of peers, household head gender and place of student resident are positive and significant at 5% and 1%, while the change of programme done by the university management to student negatively and significantly affects their performance at 10% level of significance. Lastly, parents influence does not seem to enhance student performance, as none of the variables are significant.

Table 5. Regression Result of Test Score by Department

Dependent variable: Test score	Business Admin	Economics	Political Science	Sociology
Gender	0.9742	1.4911	1.1379	1.2030
	(1.28)	(0.18)	(1.62)	(1.63)
Age	0.2733	0.3837	0.6093	0.3043
	(1.68)*	(1.93)*	(3.78)***	(1.74)*
Number of Peers	1.6891	0.5695	0.5007	0.5609
	(5.64)***	(1.82)*	(2.56)**	(2.01)**
Gender of Head	0.1127	6.1605	3.1456	8.0267
	(0.10)	(6.28)***	(3.11)***	(10.41)***
Education of Head	-0.8973	1.2246	-0.4409	0.7766
	(-0.64)	(0.91)	(-0.48)	(0.68)
Household Welfare	-1.9578	1.1504	0.1460	1.8011
	(-1.34)	(0.90)	(0.18)	(1.71)*
Residence	0.3948	1.1675	-0.0760	-0.0416
	(0.51)	(1.38)	(-0.11)	(-0.05)
Previous school attended	-0.7880	0.9314	0.2995	0.7797
	(-0.96)	(1.05)	(0.40)	(1.04)
Programme Changed		-0.3657 (-0.03)	0.2876 (0.23)	-1.2799 (-1.31)
Programme Influenced	0.9155	-0.5889	-0.6555	-0.2582
	(1.18)	(-0.78)	(-0.94)	(-0.38)



R ²	0.4102	0.4639	0.3780	0.6089
F-Statistics	5.72***	7.36***	5.65***	16.34***
N	84	96	104	116

Note: The OLS results *; **; and *** stands for 10%; 5%; and 1% significance level respectively. The values in parenthesis are the t-value. Each regression includes a constant and set of control variables.

Source: Authors Computation (2015).

Table 5 shows student enthusiastic result base on departmental level, the result for the four departments² indicates that age and number of peers positively and significantly influence performance at 1% and 10% in Political Science and Business Administration, Economics, Sociology respectively. Gender of head seems to contribute to student performance in Economics, Political Science and Sociology at 1% level of significance, but not in the case of Business Administration. Also, household welfare seems to be positive and 10% level of significance among sociology students, but was not in other departments. However, the coefficient of student gender, education of head, residence, previous school attended, programme status and programme influence are not significant.

The entire models are adequate (F-statistics) at 1% level of significance with (R-square values) column 1 having 51% joint influence of independent variables; in column 2, joint influence of independent variables for public and private school attended are 52%. Though that of programme status show 69% for those their programme were not changed and the 41% for those that experience change of programme; column 4 on the other hand shows Business Administration, Economics, Political Science and Sociology to have 41%, 46%, 38% and 61% respectively.

4.2. Discussion of results

From the result above, the gender of students was found to be significant when all the observations were pooled together; likewise on enthusiastic variables, gender of those students that experience change and those that personally choose programme on their own shows a significant sign of results. This result does not concur with the studies of Chambers and Schreiber (2004), Rask (2010), because the students are from the immediate environs of the university were gender inequalities still exist in terms of education attainment. The ratio of admission and gender distribution in programme still varies as male student proportion is always high when compared to female student. But for students' whose programmes were not changed, those whose programmes are influenced by university management and parents, and the outcome from departments doesn't seem to be significant. This made studies by Baker (2011) to only concentrate on female students alone. Similarly, gender of household head equally enhance students performance, as most parents seems to be male heads, thereby encouraging their heirs in terms of performance at schools by ensuring future human capital development within the household.

The coefficient of age was seen influencing performance considering all the enthusiastic variables. This is in line with the studies of Pellizzari and Billari (2012) and Nam (2014), indicating that maturity of students actually counts on their performance. Looking at the region scenario and complexity of admission process, the tendency of students gaining admission with obtaining any advance level certificate is not rear. Because most student got delayed either by applying to universities for more than two times or have obtained other post secondary school certificate before gaining admission for degree programmes which due affects their age of gaining entrance for bachelor programmes. Also, the number of peers adversely influences students' performance in all the outcomes, this study confirm the findings of Paola and Scoppa (2010), Martins and Walker (2006). A careful observation shows that students always study together, especially those that experience change of programme by university management. Some of them are handicap as far as the widths of programme they study are concern due to either complexity of it, but are better understood when group interaction occur. This finding only confine on those students that keeps positive peers that are always deterministic in terms of academic excellence. But those students whose programme were not changed and those that are being influence by parents to read aforesaid programmes are not significant, following the study of Zimmerman (2003) as they emphasize that good students are not always negatively affected from peers interactions.

On parents' education, the assertion of Krashen (2005) and Sanzana *et al.* (2014) does not concur with the finding of this study, as parents' education doesn't seem to influence student performance. This might be due to the fact that majority of the household heads who normally aspire for their children admission into universities.

² Business Administration, Economics, Political Science and Sociology



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have attain at least a basic education, because all believe to have acquire ordinary certificate. Furthermore, household welfare encourages student performance especially for those whose programmes were not changed, which is in line with the studies of Agasisti and Longobardi (2014), Jehangir *et al.* (2015), and Collinger *et al.* (2013). Parents of students on this category seem to be fully prepared, particularly those reading sociological courses, as they normally engaged in excursions within and outside the country.

Residents and previous school attended of students does not contribute to their performance, which differ from the findings of Ogbemudia and Aiasa (2013). The fact that most students came from educated households even in rural areas, their previous school attended and residence does not counts. Though, those whose programmes are changed by university management do positively influence performance, mainly because they mostly leave in urban areas with good schooling opportunities. The programme status for those whose own have been changed by university management seems to affect students' performance, which is in conformity with the study of Agarwal (2008). By implication, most programmes changed by university management those not favour students, as most of the programme are not in line with their wishes and aspiration. Likewise, the department of those whose programmes were changed and those who personally choose those programmes negatively affects students' performance which is not in conformity with the study of Whittingham (2006). This are due to the nature of programme contents which are either mathematically inclined or theoretically based.

5. Conclusion and recommendation

This study empirically considers student enthusiasm as a key determinant of student performance. The study used 400 observations of newly admitted students into the university, by determining their enthusiasm over the programme they study. On a general model, we found gender of a child and household head, age of a child, household welfare to significantly influence students' performance. But when enthusiastic variable are put into consideration; firstly, looking at the nature of programme status when comparing those whose programmes were unchanged and changed. We found that age of a child and gender of household to be significant, while household welfare were only significant for those their programmes are unchanged; and for the students that programmes were changed, gender of a child and number of peers were significant. Secondly, looking at the student decision to read a particular programme, gender of child and household head, age and number of peers positively influence their performance, while departments and programme status negatively affect their performance. Lastly at departmental level, student age, number of peers, household head gender and household welfare are significant.

This study therefore recommends that proper option should be given to students when changing their programme from their previous application. Though most changes are due to deficiency in their schooling certificate, but better option can be provided particularly by seeking their consent base on the programmes they can easily comprehend. Also, in minimizing failure among students, the university management should stop changing students' programme haphazardly, because a time it goes beyond student ability. Students should equally know the kind of friends they have, because keeping bad friends might leads to failure and even total withdrawal from the programmes. However if this factors are properly considered, it will enhance students' enthusiasm over the programme they are studying.

Acknowledgements

We sincerely appreciate the contributions of staffs and students who attended the Economics Departmental Symposium on 'Nigeria Developmental Process - Issues and Challenges', at IBB University Lapai dated 3rd September, 2015. Special appreciation also goes to IBB University Community for their moral support during the process of this research.

References

- [1] Aakvik, A., Salvanes, K.G., Vaage, K. 2005. Educational attainment and family background. *German Economic Review*, 6 (3): 377–394.
- [2] Adekola, B.O. 2012. Home and school factors as determinants of students' achievement in senior secondary school English comprehension in four South Western States. *Research Journal in Organizational Psychology & Educational Studies*, 1 (5): 280-283.
- [3] Agarwal, T. 2008. Factors influencing career choice of management students in India. *Career Development International*, 13 (4): 362–376.



- [4] Agasisti, T., Longobardi, S. (2014). Inequality in education: Can Italian disadvantaged students closethe gap? Journal of Behavioral and Experimental Economics, 52: 8–20.
- [5] Akiwowo, A.O., Nwoha, P., Ojokwu, M., Uwakwe, C.B.U. and Adekeye, A.O. 2011. Time management, peer influence and study habits as correlates of academic achievement motivation among adolescents in private catholic secondary schools in Ibadan archdiocese. *Journal of Applied Education and Vocational Research*, 8(2): 166-182.
- [6] Alfan, E., Othman, M.N. 2005. Undergraduate students' performance: The case of the University of Malaya. *Quality Assurance in Education, 13*(4): 329–343.
- [7] Aluede, O., Idogho, P.O., Imonikhe, J.S. 2012. Increasing access to university education in Nigeria: Present challenges and suggestions for the future. *journal of the African Educational Research Network, 12*(1): 342-323
- [8] Aslam, M., Kingdon, G. 2011. What can teachers do to raise pupil achievement? *Economics of Education Review*, 30: 559–574.
- [9] Atovigba, M. V., Vershima, A. M., O'Kwu, E. I., Ijenkeli, E. 2012. Gender trends in Nigerian secondary school students' performance in Algebra. *Research Journal of Mathematics and Statistics*, *4*(2): 42-44.
- [10] Baker, J. 2011. A comparison of academic achievement high school female athletes vs. non-athletes. Tennessee: Tennessee Technological University.
- [11] Balch, R., Springer, M.G. 2015. Performance pay, testscores, and student learning objectives. *Economics of Education Review*, 44: 114–125.
- [12] Bergin, S., Reilly, R. 2006. Predicting introductory programming performance: A multi-institutional multivariate study. *Computer Science Education*, *16*(4): 303–323.
- [13] Betts, J.R., Morell, D. 1999. The determinants of undergraduate grade point average: The relative importance of family background, high school resources, and peer group effects. *The Journal of Human Resources*, 34(2): 268-293.
- [14] Byrne, M., Flood, B. 2008. Examining the relationships among background variables and academic performance of first year accounting students at an Irish University. *Journal of Accounting Education*, 26: 202–212.
- [15] Chambers, E.A., Schreiber, J.B. 2004. Girls' academic achievement: Varying associations of extracurricular activities. *Gender and Education*, *16*(3): 327-346.
- [16] Clark, N. 2013. Education in Nigeria. Nigeria: World Education News & Reviews.
- [17] Collinger, J.L., Wodlinger, B., Downey, J.E., Wang, W., Tyler-Kabara, E.C., Weber, D.J., McMorland, A.J.C., Velliste, M., Boninger, M.L. and Schwartz, A.B. 2013. High-performance neuroprosthetic control by an individual with tetraplegia. *The Lancet*, *381*(9866): 557-564.
- [18] Dynan, K.E., Rouse, C.E. 1997. The underrepresentation of women in economics: A study of undergraduate economics students. *The Journal of Economic Education*, 28(4): 350-368.
- [19] Dynarski, S. 2008. Building the stock of college-educated labor. *Journal of Human Resources*, 43: 576–610.
- [20] Eom, S.B., Wen, H. J. 2006. The determinants of students' perceived learning outcomes and satisfaction in university online education: An empirical investigation. *Decision Sciences Journal of Innovative Education*, 4 (2): 215-235.
- [21] Eren, A. 2012. Prospective teachers' interest in teaching, professional plans about teaching and career choice satisfaction: A relevant framework? *Australian Journal of Education*, 3: 303–318.
- [22] Fantuzzo, J., Tighe, E. 2000. A family involvement questionnaire. *Journal of Educational Psychology*, 92 (2): 367-376.
- [23] Garkaza, M., Banimahd, B., Esmaeili, H. 2011. Factors affecting accounting students' performance: The case of students at the Islamic Azad University. *Social and Behavioral Sciences*, 29: 122–128.



- [24] Gong, X., Ding, Y., Tsang, M.C. 2014. Gender differences of academic performance in compulsory education in rural Southwestern China. *International Journal of Educational Development*, 39: 203–214.
- [25] Hossain, A., Zeheen, A., Islam, M.A. 2012. Socio-economic background and performance of the students at presidency university in Bangladesh.
- [26] Jehangir, K., Glas, C.A.W., Berg, S.V. 2015. Exploring the relation between socio-economic status and reading achievement in PISA 2009 through an intercepts-and-slopes-as-outcomes paradigm. *International Journal of Educational Research*, 71: 1–15.
- [27] Johnstone, J., Jiyono. 198). Out-of-school factors and educational achievement in Indonesia. *Comparative Education Review*, 27(2): 278-295.
- [28] Joseph, M., Joseph, B. 2000. Indonesian students' perceptions of choice criteria in the selection of a tertiary institution: strategic implications. *International Journal of Educational Management*, *14*(1): 40-44.
- [29] Katsikas, E., Panagiotidis, T. 2011. Student status and academic performance: Accounting for the symptom of long duration of studies in Greece. *Studies in Educational Evaluation*, 37: 152–161.
- [30] Khonbia, Z.A., Sadeghib, K. 2013. The effect of assessment type (self vs. peer) on Iranian university EFL students' course achievement. *Social and Behavioral Sciences*, 70: 1552–1564.
- [31] Kim, T., Schallert, D.L. 2014. Mediating effects of teacher enthusiasm and peer enthusiasm on students' interest in the college classroom. *Contemporary Educational Psychology*, 39: 134–144.
- [32] Krashen, S. 2005. The hard work hypothesis: Is doing your homework enough to overcome the effects of poverty? *Multicultural Education*, 12(4): 16-19.
- [33] Kukk, A., Rajalaane, R., Rei, M.L., Piht, S. 2015. Parents opinions on homework in the II stage of primary school (Estonian example). *Social and Behavioral Sciences*, *171*: 134–144.
- [34] Laleye, A. 2015. Educational technology for effective service delivery in educational training and research in Nigeria. *Social and Behavioral Sciences*, 176: 398–404.
- [35] Lane, A., Porch, M. 2002. The impact of background factors on the performance of nonspecialist undergraduate students on accounting modules a longitudinal study: a research note. *Accounting Education*, 11(1): 109–118.
- [36] Lough, B.J. 2010. The perpetual education fund: Providing higher education loans in the voluntary sector. *International Journal of Educational Development*, 30: 345–350.
- [37] Martins, P., Walker, I. 2006. Student achievement and university classes: Effects of attendance, size, peers, and teachers. *The Institute for the Study of Labor*.
- [38] Misran, N., Sahuri, S.N.S., Arsad, N., Hussain, H., Zaki, W.M.D.W., Aziz, N.A. 2012. The Influence of socio-economic status among matriculation students in selecting university and undergraduate program. *Social and Behavioral Sciences*, *56*: 134–140.
- [39] Moore, M.G. 1991. Editorial: Distance education theory. *The American Journal of Distance Education, 5*(3), 1–6.
- [40] Muzenda, A. 2013. Lecturers' competences and students' academic performance. *International Journal of Humanities and Social Science Invention*, *3*(1): 6-13.
- [41] Nam, K. 2014. Until when does the effect of age on academic achievement persist? Evidence from Korean data. *Economics of Education Review, 40*: 106–122.
- [42] Nyaribo, M., Prakash, A., Edward, O. 2012. Motivators of choosing a management course: A comparative study of Kenya and India. *The International Journal of Management Education*, 10: 201–214.
- [43] Ogbemudia M.I., Aiasa M.V. 2013. Influence of home environment on the academic performance of primary five pupils' in English Language in Orhionmwon Local Government Area of Edo State. *Merit Research Journal of Education and Review, 1*(5): 120-125.
- [44] Omoregie, N., Abraham, I.O. 2009. Persistent gender inequality in Nigerian education. *Delta, 18*(301): 450-786.



- [45] Oshemughen, H.O., Oghuvbu, E.P. 2013. Implications of scrapping jamb and UTME from tertiary education admission process: The educational administrators' perspective. *Social Sciences and Humanities*, *4*(4): 469-476.
- [46] Pandeya, S., Tiwari, S. 2014. Education and prosperity through technology Case of virtual education limited, Nigeria. *Social and Behavioral Sciences*, *157*: 55–62.
- [47] Paola, M.D., Scoppa, V. 2010. Peer group effects on the academic performance of Italian students. *Applied Economics*, 42: 2203–2215.
- [48] Pellizzari, M., Billari, F.C. 2012. The younger, the better? Age-related differences in academic performance at university. *Journal of Population Economics*, 25: 697–739.
- [49] Rask, K. 2010. Attrition in STEM fields at a liberal arts college: The importance of grades and pre-collegiate preferences. *Economics of Education Review*, 29: 892–900.
- [50] Richburg-Hayes, L., Brock, T., LeBlanc, A., Paxson, C., Rouse, C.E., Barrow, L. 2009. Rewarding persistence: Effects of a performance-based scholarship program for low-income parents. *Building Knowledge To Improve Social Policy*.
- [51] Sabitova, N.M. 2014. Current issues of financial education in Russia. *Social and Behavioral Sciences*, 152: 911–915.
- [52] Sanzana, M.B., Garrido, S.S., Poblete, C.M. 2015. Profiles of Chilean students according to academic performance in mathematics: An exploratory study using classification trees and random forests. *Studies in Educational Evaluation*, 44: 50–59.
- [53] Suryadarma, D., Suryahadi, A., Sumarto, S., Rogers, F.H. 2004. *The determinants of student performance in Indonesian public primary schools: The role of teachers and schools.* Jakarta: SMERU Research Institute.
- [54] Tawari, O.C., Koko, M. 1996. Student enrolment and educational expenditure in university education: An examination of trends in Nigeria (1980-1990). *International Journal of Educational Development, 16*(1): 79-87.
- [55] Thapa, A. 2011. Does private school competition improves public school performance? The case of Nepal.
- [56] Tomul, E., Celik, K. 2009. The relationship between the students' academics achievement and their socioeconomic level: cross regional comparison. *Social and Behavioral Sciences*, *1*: 1199–1204.
- [57] Trusty, J. 1999. Effects of eighth-grade parental involvement on late adolescents' educational expectations. *Journal of research and development in education*, 32 (4): 224-233.
- [58] Ümmet, D. 2015. Self esteem among college students: a study of satisfaction of basic psychological needs and some variables. *Social and Behavioral Sciences*, 174: 1623–1629.
- [59] Whittingham, K.L. 2006. Impact of personality on academic performance of MBA students: qualitative versus quantitative courses. *Decision Sciences Journal of Innovative Education*, 4 (2): 175-190.
- [60] Wingard, L., Forsberg, L. 2009. Parent involvement in children's homework in American and Swedish dualearner families. *Journal of Pragmatics*, 41: 1576–1595.
- [61] Wo"ßmann, L. 2005. Educational production in East Asia: The impact of family background and schooling policies on student performance. *German Economic Review*, 6 (3): 331–353.
- [62] Zhan, Z., Fong, P.S.W. Mei, H., Liang, T. 2015. Effects of gender grouping on students' group performance, individual achievements and attitudes in computer-supported collaborative learning. *Computers in Human Behavior*, 48: 587–596.
- [63] Zimmerman, D. 2003. Peer effects in higher education: evidence from a natural experiment. *Review of Economics and Statistics*, 85: 9-23.
- [64] Zwick, T. 2012. Determinants of individual academic achievement Group selectivity effects have many dimensions. Centre for European Economic Reasearch.



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