

## Analysis of University Students' Performance in Matriculation, Post Matriculation and First Year Examinations in Delta and Edo States, Nigeria

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**Abstract** - This study analyzed the university students' performance in University Matriculation Examination (UME), post matriculation examination and first year examination with a view to determining whether the performance of students in UME and post UME had influenced the academic performance of students admitted into first year (100 level) in universities in Delta and Edo States, Nigeria. One research question was raised and one hypothesis was formulated and tested. The study had adopted the ex-post facto design using the correlational method. The population of the study comprised the students in all universities in Edo and Delta states that took the UME and Post UME in 2004/2005 and 2005/2005 academic sessions and a sample size of 8111 students from three universities was selected through stratified random sampling technique. Instruments used for this study included students' records containing UME and post UME scores; and students' first year GPA. The data collected were analyzed using stepwise multiple regression. The findings from the analysis showed that UME and Post UME performance of students combined, accounted for 67.2 percent of the variance in their first year academic performance in universities in Edo and Delta states. Based on these findings it was concluded, that the performance of students in UME and Post UME had impacted significantly on their first year academic performance in universities. On the basis of this conclusion, it was recommended among others that the UME and Post UME policy be allowed to continue in University admission in Edo and Delta States, Nigeria.

**Key words:** Matriculation examination, Post matriculation examination, Admission, students' performance, Grade Point Average

### I. INTRODUCTION

Education is the process of transforming an individual's capabilities, skills, knowledge and attitudes. It starts from the cradle and terminates at the grave. Individuals can acquire education through

different institutions. These institutions include formal, informal and non-formal institutions.

Education acquired through formal institutions is usually organized and systematic; and this is the type of education given in schools, colleges / polytechnics and universities. Formal education is organized in stages, starting with the basic education level, through the secondary education level, and terminating at higher education level. The higher education level is seen as the apex of educational development in Nigeria.

Higher education is the type of education given after secondary education in universities, colleges of education, Monotechnics and Polytechnics; in other to produce high level and middle level manpower in the society. The university education is seen as the apex of higher education in Nigeria in terms of hierarchical categorization.

The significance of university education to the Nigerian educational system cannot be overemphasized. The universities are essential and sacred elements of modern society for the acquisition and renewal of knowledge needed to solve social, economic and technological problems. Thus universities are seen as instrument of change and national development.

As a result of the importance of university education, there is a great longing for it. This is so because the universities are seen as about the only institutions where higher studies are offered and about the only institutional structures legally allowed to grant higher degrees such as postgraduate Diplomas, Masters and Ph.Ds in various professional and academic fields (Muhammed 1993:16). The longing for university education has also led to increase in demand for Certificates and Diplomas.

In order to meet up the yearning of university education, private individuals and successive government administrations have invested hugely into it. As can be seen from available statistics, the federal government in 1990 released and invested ₦ 2b on current and capital needs in universities (Edoziem 1993). However, this huge investment could not meet the high demand for University education. The demand

is so high that available resources and facilities could not cater for it.

Consequent on the increase in demand for university education, every year the number of candidates applying for entry is on the increase. Available statistics show that in 1980/81 session, 145,567 candidates applied for admission into Nigerian universities. In 1981/82 session, the number rose to 150,685 candidates, and in 1982/83 session, the number became 205,112 candidates (Nwandiani, 1993). Also in 2000/01 session, the number of candidates rose to 250,000. In 2005/06 session, the number became 850,000 (Taiwo, 2005). These statistics show that the number of candidates demanding university education in Nigeria is on the increase. The reason for these increments could be due to the population explosion of secondary school leavers. This has now resulted to inadequate facilities in the universities.

Following the inadequate facilities, only about 15% of those who applied for admission into universities were granted; the remaining about 85% were left unadmitted. Even among the 15% admitted, the 60:40 science: humanity ratio stipulated by law could not be maintained (Nwandiani, 1993). This could be due to the rush for university education.

The increase in demand for university education has led to the rapid growth and development of universities in Nigeria. However, it has been observed that this rapid increase has with it some negative effects on the Nigerian economy. It has led to situations where graduates from available institutions do not readily have available job markets to render their services to the nation.

As a result of limited available space in universities for admission of new entrants, there is high competition. The competition is so keen that candidates tend to explore every available means of getting admission. Some of the candidates with the aid of their parents engaged in lobbying, particularly some of those parents that are well to do and influential. Others engaged in unwholesome acts, such as examination malpractices during the University Matriculation Examination (UME). The rate of examination malpractices in UME is so alarming that it is giving a serious cause for concern from all stakeholders. Some of the candidates with the support of their parents/guardian collude with UME officials, to place them on so-called special examination centres, where examination malpractices were carried out in a free, conducive and unhindered environment. Others may pay UME officials to inflate their UME scores after the examination. Some may even hire the services of

“mercenaries” to help them write the UME. There were also reported cases of leakages in UME. For instance, in 1990 and 2004, it was reported that the UME questions leaked in some centres, which led to the cancellation of results in such centres.

The above situation has led stakeholders to doubt the credibility of Joint Admissions and Matriculation Board (JAMB) handling the UME. This has further led to a situation where some critics had called for a return to the practice in pre JAMB era. Okonjo (2006) for instance, stated that JAMB should be scrapped and each university be allowed to conduct its own admission. In the pre JAMB era, each university had the power vested in the senate to admit students directly into the university. This was done in line with the spirit of university autonomy; where each university has the power and right to administer the internal affairs of the university, without undue interference by any external agencies. The percentage of the students passing the mandated exam can be viewed as one of the many outputs of a school’s educational production function. The inputs used in this production function include school specific characteristics and the socio-economic characteristics of the school’s student body (Bremmer, 2007).

However, the pre JAMB era has a lot of problems associated with it. There was the problem of indigenization, where indigeneship was the criteria used by universities, instead of merit and excellence. There was also the problem of non-uniform standards among the different universities. Different universities set different standards. This created a situation where a candidate adjudged unqualified in one university, may be judged as qualified in another university. There was also the problem of double or triple admissions for the same candidate. Here different universities offer admission to the same candidate at the same time. He/she may eventually accept only one. This led to a situation where the chances of other qualified candidates were blocked or denied admission.

In trying to avoid the problems of the pre JAMB era the federal government set up the Joint Admissions and Matriculation board (JAMB), through decree number 33 of 1978. Sections 5(1) (a) and 5(1)(b) empowered JAMB to conduct the Matriculation Examination for admission into all federal, state or private universities. The board is to ensure high quality of Matriculation Examination, so that only those that are adequately prepared to benefit from university education do gain entrance to the institutions. The board is also to ensure high quality of administration of the examination to minimize the exploits of examination cheats towards

ensuring the good quality of new entrants to the universities.

However, it has been observed that the effort of JAMB towards ensuring quality candidates and reduction of examination malpractices has failed. Examination malpractice is popular and prevalent in UME, to the extent that it is shaking the quality of University Education in Nigeria. Some of the candidates that have been able to find their way into the university through cheating may find it difficult to cope with the academic rigour and demand, because they were not adequately grounded academically. Eventually such candidates end up being nuisance to the University community and society at large. Others end up as cult members, terrorizing both staff and students on campus.

In order to beat the present challenges being faced by JAMB, the Post UME was introduced in 2005/2006 session, as an additional filter to ensure that only good quality candidates get enrolled into Universities as freshmen. The introduction of the post UME has generated a lot of controversies. Some observers and stakeholders are in support of it, while others are against it. According to Taiwo (2005), the post UME being introduced into university admission has led to extra charges on candidates seeking admission, which would eventually lead to raising the cost of education beyond the reach of the commoner. According to Abubakar (2005), the high cost of post UME could lead to situation where indigent students would be denied admission and access to university education. Ogbonaya (2005) further stressed that the introduction of post UME, has the following effects on Nigerian university system: it has brought untold hardship on students and parents as a result of the high cost; it has brought a feeling of non- transparency in admission into university, just like UME, as a result of the fees been charged in the post UME; it negates the result of the national entry examination conducted by JAMB; it leads to problems encountered in the pre JAMB era; it is seen as a duplication of the admission process and a waste of time, energy and money; it is also seen as a mockery of the standard of JAMB; its policy is seen as confusing and can heat up the educational system; it is also seen as an unnecessary stress on the candidates; it was because of the above perceived effects that the house of representative in Nigeria condemned the post JAMB examination, and called on the Minister of Education to revert the decision, and directed that all monies collected from candidates with respect to the post UME be returned to the candidates. In the same vain, the Delta state house of Assembly, Asaba, condemned the collections made in respect of the post

JAMB examination from candidates in Delta State University, and directed the Committee on Education of the House to investigate the issue and make necessary recommendations to the house.

However, despite the above criticisms of the post UME, there are still some stakeholders in support of it. According to Taiwo (2006), the post UME being introduced will ensure that quality candidates are being admitted into universities in Nigeria. It was also claimed that the post UME will help to solve the problems of examination malpractices in UME (Obaji, 2005), correct the problem where JAMB admit the wrong candidates and reduce vices on campuses (Nebo, 2005; Obaji, 2005), and sanitized admission procedure (Adu, 2006). According to Ogbonaya (2006) and Abdulkarim (2005), the post UME will help to screen out unqualified candidates and get credible candidates into the university system.

As a result of the above controversies (claims and counter claims), the researcher became interested, since the post UME affects the administration of universities in Nigeria.

Admission into universities in Nigeria has been very competitive. This is so because of the importance attached to university education. As a result of the competitiveness towards getting admission into universities, there is the tendency of candidates to device means referred to as “shortcuts”, towards getting it. One of such short cuts is through examination malpractices in UME. This has greatly affected the academic performance of candidates being admitted and invariably affected the quality of university education in Nigeria.

The introduction of post UME into the admission process has generated a lot of claims, counter claims and controversies. It was an attempt to resolve these controversies surrounding the introduction of Post UME that necessitated this study.

In the light of the above, the researchers aimed to determine on how UME and post UME performance of students are related to their academic performance during first year at universities in Edo and Delta states.

## II. OBJECTIVES OF THE STUDY

The general objective of this study is to analyze university students’ performance in University Matriculation Examination, Post University Matriculation Examination and First year Examination with a view to determining the relationship between students’ performance in University Matriculation Examination, Post University Matriculation

Examination and their First year academic performance in Universities in Edo and Delta states.

The specific objectives are to examine how students' performance in University Matriculation Examination and Post University Matriculation Examination relates to and impacts on their First year academic performance in Universities in Delta and Edo states and to make suggestions and recommendations towards the administration and implementation of Post UME in Universities in Delta and Edo states.

**Ho:** There is no significant relationship between the performance of students in UME, Post UME and their first year academic performance in Delta and Edo states

### III. MATERIALS AND METHODS

### IV. RESULTS

**Table 1. Multiple regression analysis between UME performance, Post UME performance and first year academic performance of students in universities in Edo and Delta states**

Multiple correlation coefficient R	0.820					
R Square	0.672					
Adj. R.Square	0.672					
Std Error	7.567					
<b>Analysis of variance (ANOVA)</b>	<b>Sum of square</b>	<b>df</b>	<b>Mean square</b>	<b>F<sub>cal</sub></b>	<b>F<sub>tabl</sub></b>	<b>Remark</b>
Regression	953.248	2	476.624	8.324	2.60	Reject Ho
Error	464427.749	8111	57.259			
Total	465380.997	8113				

#### Coefficients<sup>a</sup>

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	-9.305	.921		-10.103	.000
	UME	-.00166	.172	-.00158	-.0097	.992
	PUME	1.311	.095	.820	13.789	.000

a. Dependent Variable: FIRST YEAR

Table 1 shows the stepwise multiple regression analysis for the predictor variables. In this analysis, the multiple correlation coefficient R was 0.820, while the coefficient of determination  $R^2$  was 0.672. The adjusted  $R^2$  was 0.672. The mean square was 476.624 and the calculated F- value was 8.324. The  $R^2$  of 0.672 shows that the variables of UME performance and Post UME performance accounted for 67.2% of the variance in

first year academic performance of students in universities in Edo and Delta states, while other factors such as examination malpractice, condition in which the examination was conducted, and the mental and emotional state of the students accounted for 32.80%. The R of 0.82 also revealed that the relationship between the two predictors and the first year academic performance is high. Furthermore, since the calculated

F- value of 8.324 exceeded the table value of 2.60, at  $P < 0.05$ , the null hypothesis which states, there is no significant relationship between performance of students in UME, Post UME and first year academic performance of students in universities in Edo and Delta states was rejected and the alternative hypothesis upheld. We therefore concluded that there is a significant relationship between performance of students in UME, Post UME and first year academic performance of students in universities in Edo and Delta states.

The relative contribution of each of the predictor variable to the variance in first year academic performance of students in the model was determined by testing the null hypothesis ( $B=0$ ). The result of the test as shown in table 1, revealed that the Post UME performance of students had the highest correlation coefficient of  $B= 1.311$ , while that of UME performance was 0.00166. The standard coefficient, beta of  $b= 0.820$  indicates that influence of Post UME performance of students was reduced when the impact of UME performance of students and other variables in the model were held constant.

This finding was supported with student t- test values as shown in the table 1. The t-test was significant at 0.05 level of significance for Post UME performance, while there was no significant difference for UME performance. In summary, the Post UME performance of students predicted better their first year academic performance.

## V. DISCUSSIONS

Ordinarily, the quality of students can be judged from the level of performance in public examinations. However, if such performances were not objective, due to examination malpractice, the quality being measured becomes questionable.

From the analysis of the data, it was discovered that there is a significant relationship between Post UME performance of students and their first year academic performance. This implies that the Post UME scores significantly correlated with students' first year academic performance / scores. This significant relationship could be due to the fact that the Post UME was properly monitored and examination malpractice was greatly minimized if not prevented altogether. Consequently, the institutions were able to screen out all unqualified candidates, leaving candidates who obtained scores that reflected their actual performance. Since most of the qualified students knew the reason why they were admitted and in school; and they also

have the required capabilities, they tend to perform well also in their first year.

The above finding is in agreement with studies carried out by Abubakar (2005), which stated that the post UME would produce better students; students who know why they have gone to the university; students who want to study, and earn a degree. Also, Hakkinen (2004) and Bremmer (2007) stated that performance of students in current examinations is related to their performance in previous examinations. However, the relationship may be positive or negative. Thus the Post UME has impacted significantly on the academic performance of students in first year in universities in Edo and Delta states.

Furthermore, before the Post UME was introduced, some products of universities have been unable to measure up to expected academic standard. For instance, in 2005 rating; no single university in Nigeria fell within the first 200 universities in the world university rating, (2006 Annual Report, Ministry of Education, Asaba). Although the academic performance of students admitted into university is not the only criteria to be used to rate universities, it is one of the determinants of university output. This further confirms that the Post UME performance influence first year academic performance.

## VI. CONCLUSIONS AND RECOMMENDATIONS

The findings of this study revealed that students' performance in University Matriculation Examination and Post University Matriculation Examination had significantly impacted on their first year academic performance in Universities in Delta and Edo states.

In view of the findings and conclusions of the study, the following recommendations were made, which if carried out would improve the administration of university education, through improved admission procedure or policy: UME conducted by JAMB should remain as part of the admission processes into higher institutions in Nigeria; the Post UME policy should be allowed to continue in university admission in Nigeria. This will help to complement the effort of JAMB in getting credible and capable university materials to be admitted; and the federal government through the appropriate bodies (NUC, JAMB, Ministry of Education), should encourage the implementation of the Post UME policy in all higher institutions in Nigeria, including Universities, Polytechnics, and Colleges of Education by passing it into law.

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