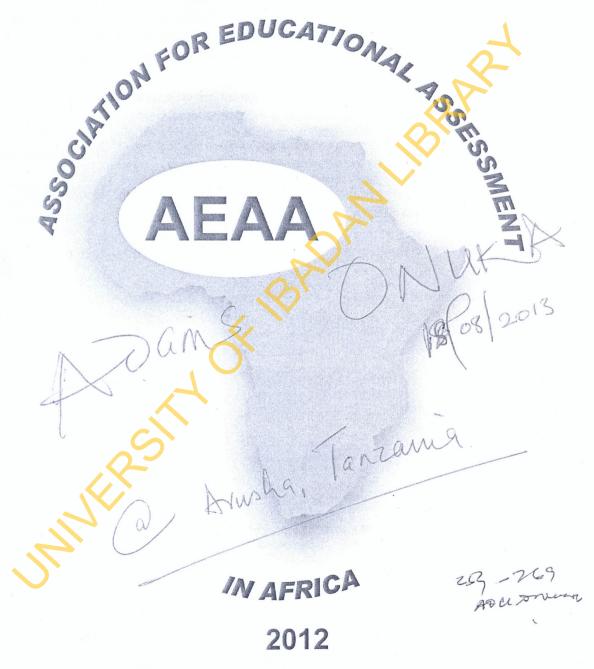
Journal of Educational Assessment in Africa



A publication of the Association for Educational Assessment in Africa (AEAA)

Purpose of the Journal

The Journal of Educational Assessment in Africa is published yearly by the Association for Educational Assessment in Africa (AEAA). The main objective of the journal is to provide information to enhance research and knowledge so as to improve educational assessment in Africa. The journal publishes manuscripts that contribute to improvement of educational assessment.

Copyright

Copyright © 2012 by the AEAA. The Journal of Educational Assessment in Africa (JEAA) is copyrighted. No part of this publication may be reproduced, stored, transmitted, or disseminated in any form or by any means without prior written permission from the Association for Educational Assessment in Africa (AEAA). Where information or data from the Journal is used, the Journal must be duly acknowledged.

Disclaimer

All papers in the Journal reflect views of the authors and not necessarily that of the Association for Educational Assessment in Africa (AEAA).

THE IMPERATIVES OF TRANS-NATIONAL APPROACH TO REFORMING EDUCATIONAL ASSESSMENT FOR AFRICAN REGIONAL DEVELOPMENT

Onuka. A.

Institute of Education., University of Ibadan, Ibadan, Nigeria Adamonuka@Yahoo.Com/ Ao.Onuka@Yahoo.Com

ABSTRACT

This paper examines the imperatives of trans-national approach to reforming educational assessment for African regional development. It states that education is a major pivot for human development and regional development. The need for trans-national approach is informed by the fact that Human Development Indices in African countries are among the least globally, thus indicating a state of underdevelopment, as other forms of development are human driven. The essence of the paper is to describe how collaboration in research, test development, monitoring and test security can engender improvement of the African examining system for effective and efficient education delivery and African development. The study is a descriptive one, drawing its sample from Anglophone West Africa. A checklist was used to collect the views of some stakeholders on enhancing educational assessment reforms through partnership among African examining bodies for improved African examining system to enhancing effective education delivery, cooperative test development and administration, monitoring of the public examining system, promoting test security of the African public examining. The data were analysed utilizing percentages and graphs. It was found that an African synergistic approach to public examining would be more beneficial than individualistic approach. Stakeholders also observed that African collaborative research in public examining will improve test development, test security, administration and monitoring, staff competence and engender public confidence in the system as well as help minimize examination fraud and could also be cost-effective. An examining system competence based cooperative mechanism (akin to the comparative advantage model) was suggested for adoption for collaboration. (Word count = 250)

Key words: Human-driven, reforming educational assessment cooperative mechanism, examination fraud, transnational approach

INTRODUCTION

It is common place knowledge that technological advancement globally portends the need for some remarkable reformation of the African public examining system to engender effective and efficient examining system. It is also obvious that synergy among the African countries in its examining system will promote greater degree of efficiency, effectiveness and transparency in regional public examining which will bring about greater public confidence in the system as well as in the education system of the region. There are some imperatives for African regional examining system. The need for trans-national approach to reforming educational assessment for African regional development, calls for examination of these imperatives that could engender the realization of such a noble and far reaching African educational and developmental objective.

It should be noted that education is a major pivot for human development and subsequently regional development. The need for trans-national approach to reforming the African examining system is informed by the fact that Human Development Indices in African countries are among the least globally, thus indicating a state of underdevelopment, as all other forms of development are human driven. This trend calls for a collaborative approach to rescuing the

region's education system from decadence and notably, the examining system reformation will result in the total reformation of the education system for more rapid African regional development in such a way that will no longer be a dumping ground for the so-called advanced world.

LITERATURE REVIEW

Durowoju (2012) argues that assessment of learning outcome is very cardinal to the realisation of the objectives of education in any economy, while believe that the continuous increasing number of candidates who enroll in public examinations successively constitute challenge that must be addressed squarely. Addressing such daunting challenge needs collaborative efforts African examining bodies for synergistic benefits to the cooperative bodies as the synergy will harness the individual niches of the various bodies for exponential quality examining and by extension educational outcomes. Buttressing the challenge by increasing enrolment in public examinations, Yadidi andChiuanda (2010) observe that the quest for increased access in Malawi has created challenge to public examining in that country. Furthermore, they submit that such challenges arising increased candidature in public examinations including human capital and financial incapacitation, both of which inhibit professionalism

in executing the functions of the examining body. In Zambia, the challenges were highlighted by Shkubanza and Joe (2010) to also include inadequate capacity building of officials of the examining body. This short fall in human capital, capacity building and funding calls for a collaborative trans-national approach for transformative process of the African assessment system for African educational advancement in this 21st century.

The essence of assessment, which is a form of evaluation, as a tool for engendering the accomplishment of educational objectives and by extension those of national development as well as regional development cannot be over-emphasised. It is obvious that without educational assessment, it would be impossible to measure educational attainment of the learners and the accomplishment of educational objectives of producing people with the requisite knowledge, attitude and skills to effect a positive change that brings about national and regional development. It is also well known that the assessment or examining system in Africa is fraught with some challenges such as examination fraud which has gone technological (Onuka & Durowoju, 2011; Conteh, 2008), test insecurity (Onuka, 2009), inadequate level of effective researching which is also the bane of the entire education industry (Onuka, 2011), inadequate funding level (Onuka, 2011) among other challenges.

Researching for improved examining cannot be over-stressed (Baku, 2010; Onuka, 2011). They both emphasise the usefulness of using research findings to improve both the examining system and the education sector of any nation of the world, particularly the emerging countries which are mostly found on the continent of Africa. Onuka further Onuka (2011) as well as Onuka (2012) observe that not much research is done in the West African education sector and thus, the examining system due to inadequate funding. He further pointed that there is inadequate degree of collaborative educational researching and evaluation in the sub-region. He also argues in both studies that research is known the world over as the bedrock of national and regional development and that adequate funding and effective collaborative researching which engenders synergy in research and in its results, as synergy yields exponential results as opposed to trickle effects resulting from individually undertaken researches. It is obvious that collaboration in research, test

development, monitoring and test security transnationally by examining bodies can engender improvement of the African examining system for effective and efficient education delivery and African development. Hitherto, public examining in Anglophone and Francophone Africa was largely

submits that research can be expensively and collaborative undertaken for more meaningful output and consequently comprehensive application for development. By implication, therefore, the continental examining bodies need to carry out to minimize cost, harness expertise and national niches for comprehensive and a more fruitful development of the sector.

Durowoju (2012) reports that according to various reports of the West African Examinations Council from its four original member-states of the Gambia, Sierra-Leone, Ghana and Nigeria shows abysmal performance in many core subjects. Conteh (2008) submits that examination fraud has become endemic, that it is taking a violet turn, threatening lives of examination officials both in Nigeria and the Gambia irrespective of the sizes of these countries, therefore, posing danger to the security of the testing and the concomitant examination system's integrity.

The levels of sophistication of examination are better illustrated by the figures as shown by Onuka and Durowoju (2011) as depicted in Figures:



Fig 1: Student copying from handset Source: Onuka and Durowoju (2011)

sub-regional, but the phenomenal growth in enrolment and in access coupled with those examining bodies carrying too many examinations as well as mutual distrust among member countries in appointment of top staff members; and the desire of each country to be independent and be in control of their examining systems and in Nigeria astronomical rise in examination fraud rate led to the demand for examining bodies (Onuka & Amusan, 2008). The size and population of Nigeria as well as political considerations could also be said to be responsible for the partial nationalisation of public examining in Nigeria as it still actively participate in the subregional West African Examinations Council, and also in Ghana, where they have a separate examining board for technical examinations as in Nigeria (Onuka & Durowoju, 2010). According to them in other sub-regions of Africa, it might have been partly due to the spirit of nationalization in addition to growth in access to education and the concomitant

enrolment malpractices. and examination Nevertheless, the nationalization had not totally diminished these problems, as for instance, examination malpractices are on the increase, to the extent that someone was reported killed in Ghana in 2006 even as small as the Gambia is, it is not exempted from examination fraud (Conteh, 2008). These ugly developments emerging in the various countries of Africa point to the fact that holistic nationalization of the African public examining systems may not be a solution after all. This invariably calls for the review of the nationalization of the African examining systems and portends that there is urgent need for collaboration that can engender the quality of the African examining systems and its educational efforts.

Therefore, the study investigated how collaboration by examining bodies in Anglophone West African Countries would engender effective examining for efficient education delivery in order to improve the rate of development in the sub-region and by extension the entire African region as perceived by stakeholders (officials of examining bodies, students, teachers, officials of education departments/ministries and parents] in the examining sub-sector.

Consequently, the following questions were thus addressed:

1. Will collaboration by examining bodies improve the quality of the West African Examining systems for enhanced the quality of examination outcomes as perceived by stakeholders?

Table 1: Sample Size

- 2. Will collaboration by examining systems in the entire African region transform education delivery for African development as perceived by stakeholders?
- 3. Is there any significant difference in the perceptions of the stakeholders on whether Collaboration by public examining systems will improve the quality of education delivery in Africa?
- 4. Is there any significant difference in the perceptions of the stakeholders on the factors determining Collaboration by public examining systems?

DESIGN AND METHODS

Design

The design for this study is a descriptive one, in order to clearly describe the outcome through systematic data collection from the four original member countries of Nigeria, Ghana, Serra Leone and the Gambia.

Participants

The stakeholders in examining sub-sector of the education systems of these countries constitute the population in the study. The sample for this study was drawn from among stakeholders in the aforementioned Anglophone West Africa. The sample which was drawn by convenience sampling technique consisted of 60 participants as follows: 25 students, 15 teachers, 15 examining officials and 5 officials of departments/ministry from each of Nigeria, Ghana and Sierra Leone as well as a total of 20 participants from the Gambia (10 students, 6 teachers, 2 officials each from the examining body and department of education). This gives a total of 200 subjects. This is illustrated in Table 1.

Nigeria	25 students	15 teachers	15 examining officials	5 officials of Ministry of Educ
Ghana	25 students	15 teachers	15 examining officials	5 officials of Ministry of Educ
Sierra Leone	25 students	15 teachers	15 examining officials	5 officials of Ministry of Educ
The Gambia	10 students,	6 teachers,	2 examining officials	2 officials of Ministry of Educ
Total	85	51	47	17 = total of 200 participants

Instrumentation

Three instruments were used to collect the views of some stakeholders on enhancing educational assessment reforms through partnership among African examining bodies for improved African examining system in order to enhance effective education delivery, cooperative test development and administration, monitoring of the public examining

system, promoting test security of the African public examining and educational enhancement items.

The three instruments designed by the researcher namely:

l.a ten-item public examining collaborative checklist containing the areas of examining system as proposed by the researcher for collaboration for improved examining and enhanced education delivery in Africa. The

reliability of the instrument was determined by administering the instrument on 30 subjects in Nigeria not included in the study twice within an interval of one week and the correlation coefficient was 0.82, while it was validated using the Amin's 2005 Content Validity Ratio which gave a co-efficient of 0.78. The instrument was used to collect data for questions 1a & b. This instrument provided the data that addressed questions 2a & b.

- 2. A 10-item checklist resultant education delivery enhancement checklist, validated following the same process as described above giving reliability and validity coefficients of 0.79 and 0.75 respectively.
- 3. Collaborative Determinant Factors Scale: This instrument contains fifteen items on factors that could facilitate trans-national collaborative reformation of the African Public Examining System and it was a four point scale. It was validated using Content Validity Ratio and Cronbach alpha statistics, which yielded 0.73 and 0.80 respectively.

Data Collection

Data were collected by the researcher's associates in each country, who are trained evaluators. Theses research assistants and researcher administered the two instruments on aforementioned participants in the various countries earlier mentioned. The participants were required to fill the instruments with respect to agreement with whether the items listed in the instruments could beneficial transnational African collaborative examining and enhanced transnational African education system. Interview was also conducted with 16 examination officials from the four countries as follows: Nigeria, 7; Ghana, 4; Sierra Leone, 3 and the Gambia, 2. They were also to respond the collaborative determinant scale to verify which factors should be considered while preparing for collaboration.

Data Analysis

The data were analysed utilizing graphs after the views of participants in four of the five Anglophone West African Countries [Nigeria, Sierra Leone, Ghana and the Gambia) were collated and aggregated. The result of the interview was

qualitatively analysed. ANOVA was also used to analysed the data for questions 3 and 4 at 0.05 level. Figure 3 presents the perception of stakeholders on areas of collaboration in the African public examining system. The bottom line of the results shown in the bar graph is the fact that all items on areas of collaboration by sub-regional examining systems for improved quality of the sub-regional examining for quality education delivery for rapid development of the sub-continent and this can be replicated by other sub-regions of the continent.

Results

It is common knowledge that East, Central and Southern parts have some form of cooperation. A critical observation shows that stakeholders were positive on the need for collaboration among African examining systems for quality education delivery and the concomitant development of the continent. The rating was between 68% and 92%. This is evidence that West African and indeed Africans are desirous to collaboration in the educational assessment sector for the emancipation of her education system and the continent's development.

The areas of partnership for improved public examination among West African States as perceived by the stakeholders in the sub-region include: test development, moderation, supervising monitoring, marking and grading, verification or authentication of the entire process of stream of public examining in member-countries. perception is that each of these areas should be highly considered for cooperation for better results from the examining systems for the improvement of holistic education delivery as none of the nine items was perceived by less than 65% of the respondents as being of great important to collaboration for greater quality education delivery and the concomitant national, sub-regional and indeed regional development.

The 10 item on transforming the quality of education delivery through collaborative public examining as shown in Figure 2, portends that public examining systems' collaboration would engender better rate of teacher preparation, teacher continuous self-improvement through from feedback from public examining systems to the teacher, improves his/her service delivery to the society he/she serves. The

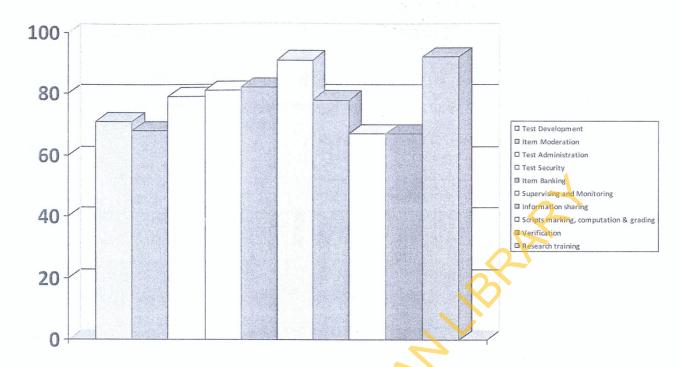


Figure 3: Areas of collaboration for improved quality public examining in West Africa as perceived by stakeholders

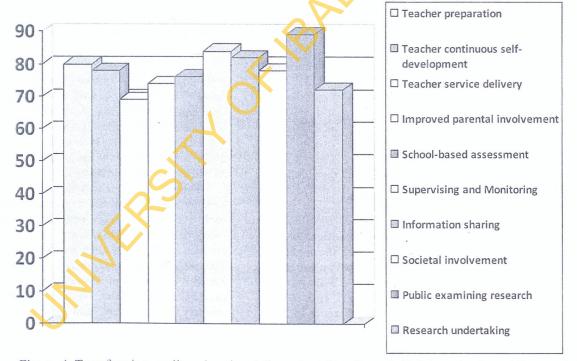


Figure 4: Transforming quality education delivery in Africa through Collaboration by public examining systems

other areas perceived by the stakeholders as possible areas where collaboration among regional public examining systems would engender quality education service delivery for African development are:

improved parental involvement across borders; exchange of ideas across borders, collaborative supervision and monitoring both the examining and the entire examining systems. It will also engender

societal involvement and possibly bring about healthy educational rivalry for the promotion of rapid regional development. The least of the items in this segment of the work as perceived by 69% of the participants as very relevant to promoting better education service delivery in Africa for speedy development of the region to hasten its desire to meet with the rest of the world. This was teacher service delivery.

The aggregate perception of the stakeholders on the various determinant factors of collaboration that participants all perceived that the following were determinant factors: Human capacity building, research undertakings, research training, test verification, Printing of question papers and scripts, training on braille, logistics support, staff exchange programme and examination supervision. The least aggregately perceived factors was 61% (research training) while the most highly rated was 81 (Supervision). These are clearly shown in Figure 3:



Figure 3.: Perceived determinant factors of collaboration

Table 2 shows an F-value of 94.91 which is significant at .05, (p < .05). This shows that there is a significant difference in the perception of the respondents on improvement of the quality of education delivery in Africa through Collaboration by public examining systems based on their cadre. The post-hoc table below shows where the difference could be found among the stakeholders. The four group means: 8.60, 14.00, 22.40, and 33.20 differed significantly (p < 05) among themselves Mean plots shows on Figure 3 that students have the highest mean, followed by the teachers, examination officers and officials of ministry the least. Table 3 shows an F-value 61.36 which is significant at .05, (p < .05). This shows that there is a significant difference in the perception of the respondents on improving the quality of public examining in West Africa through collaboration based on their cadre. A post-hoc test showed that Group1, with a mean perception of stakeholders of 11.20 differed significantly with all the other groups while Group with a mean of 17.10 did not differ from Group 3 with a mean of 18.00, but differed significantly from Group 4 with a mean of 31.30. The later group differed from all other groups.

The post-hoc analysis shows three sub-sets for alpha with the mean scores of each category under each subset. This indicates that two out of the categories are together showing that these categories are not significantly different in their perceptions. The table reveals that the significant difference is between officials of ministry and (students and examination officials), and between officials of ministry and teachers, and between (students and examination officials) and teachers. The means plot on Figure 4 shows it better.

Table 2
Differences in the perceptions of the stakeholders on whether Collaboration by public examining systems will improve the quality of education delivery in Africa

Source of Variation	Sum of Squares	df	Means Square	F	p<
Between Groups	3451.50	3	1150.50	94.91	.00
Within Groups	436.40	36	12.12		
Total	3887.90	39			1

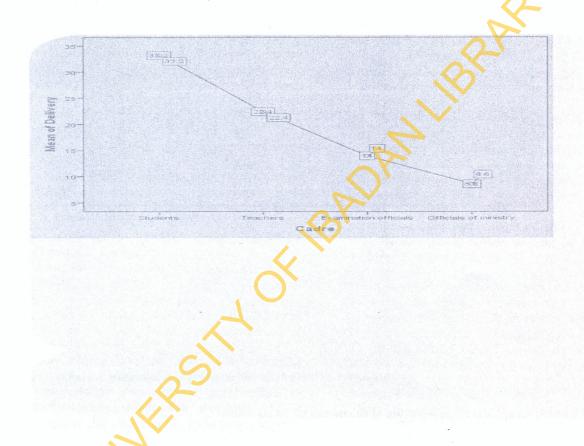
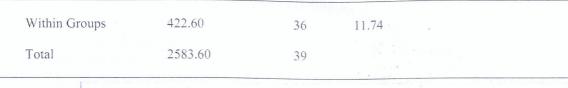


Figure 3: Graphical representation of the means based on cadre

Table 3

Difference in the perceptions of the stakeholders on the factors that may determine Collaboration by public examining systems

Source of Variation	Sum of Squares	df	Means	F	p<
	Square				
Between Groups	2161.00	3	720.33	61.36	.00



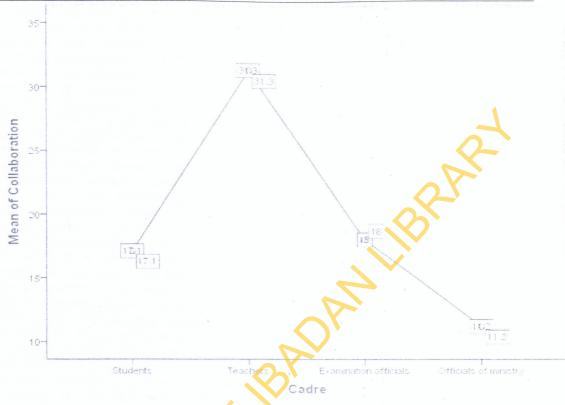


Figure 4: Graphical representation of the means based on cadre

The plot shows that teachers have the best mean followed by examination officers, students and officials of ministry the least.

DISCUSSION, CONCLUSION AND RECOMMENDATIONS

The study revealed that an African synergistic approach to public examining would be more beneficial than individualistic approach, this is in tandem with the finding of Turyatemba (2008) found that a positive relationship exists between assessment and learning and Onuka (2007) who posited that assessment can improve learning in large size classes

as well as Baku (2008) who believes that assessment whether for learning or of learning, contributes to teacher preparation and self-development. Stakeholders also observed that African collaborative research & verification of the workings of public examining in the sub-region and indeed the region of Africa will engender public confidence in the system and will thus improve the test development process in the region through the resulting synergy from transnational collaboration as well as test security of the system through the removal of the systemic rot because of the involvement of other nationals in test administration and monitoring, the trans-border collaboration will improve staff competence as they will learn both from the strengths and weakness of one another and learn from the mistakes of others and thereby avoiding their own pitfall Onuka and Durowoju (2010). The resultant effect of this transboarder collaborative public examining undertakings in transforming the African education for development will engender public confidence in the system as well as help minimize examination fraud and could also be cost-effective (Onuka and Durowoju, 2010). The implication of trans-national collaboration is that it could reduce cost of examining, reduce examination fraud thereby enhancing and reinforcing the image of the public examining and the African education system as this will enable the public examining systems to provide appropriate feedback for transforming African education for African rapid development. This would be so, because, healthy rivalry will evolve among African nations' education sectors with the resultant development of the entire African economies. Thus, the imperatives for using public examining systems as a means of transforming the area can be seen manifesting the foregoing results from the African collaboration among its examining bodies being proposed in this study cannot but be pursued with the necessary vigour through the Association for Educational Assessment in Africa [AEAA]. It also implies that there is a need for joint training and postgraduate training in cooperation with selected universities across where public examining will be taught in order to produce almost ready-made products for the system.

Most participants believe collaboration is very needful in the area of examination supervision, possibly due the increasing nature of examination malpractice (Conteh, 2006; Onuka & Duorwoju, 2011) who variously found that the menace of examination malpractice has continued to be on the increase, in spite of all the efforts of the examining bodies on the sub-region of West Africa. The 61% of the respondents observed that collaboration in research training which was the least of the determinants by their own reckoning, possibly because AEAA annual conferences have provided the impetus for research impetus for staffs of African examining bodies. Logistics support has the next has highest rating of 80% seems to provide support for their perceptions of the need for collaboration in the area of examination supervision. The bottom line of these perceptions, however, is the fact that the need for collaboration cannot be over-emphasised.

It was discover that collaboration among African examining bodies will yield synergistic benefits to the examining bodies which may in the long run reduce cost and fatigue on their parts. It will also engender quality examining system on the continent

and since the feedback from the examining system will enhance the quality of the African education output, the region will be rapidly developed thereby confirming the submission of Afolabi (2012) which implies that quality examination is a tool for national development. Nevertheless, these perceptions by various stakeholders point to the fact that the need for collaboration by African examining system quality education delivery for rapid development of the continent cannot be overemphasized. By implication African examining bodies must strive to come together to improve the African examining system for the rapid development of both our education and of the continent. This is in tandem with discovery of Onuka (2011) that collaborative effort in the education sector was essentially necessary for rapid development. The African examining bodies should, therefore, go beyond the current conferences to joint efforts in human resource development, test development and administration as well as examination among several other areas of possible cooperation.

Needs in the following areas of public examining were the perceived as factors that could determine collaboration: Human capacity building, research undertakings, research training, test verification, Printing of question papers and scripts, training on braille, exchange programme of staffs of examining logistics support and examination supervision. The implication of this is that any regional examining bodies wanting to collaborate with each other or among one another should first consider areas of their needs before concluding on the form of collaboration they should embark. However, stakeholders are agreed that collaboration is essential among African examining bodies, thus corroborating the observations of Shkubanza and Joe (2010) and Yadidi and Chiuanda (2010) that the Zambia and Malawi are deficient in some areas particularly with regard to human resources and human resource capacity building among others. Thus, to cost the need for collaboration is recommended. Interaction with some examining officials and the finding equally reveal the need for joint training in the area of braille for the visually impaired. Staff exchange programme will assist in the training especially on the job training for staffs of various African examining bodies. As in every issue of collaboration, there is the need to determine the areas of needs and terms of collaboration that will be of mutual benefit without necessarily national culture of the cooperating bodies. In fact, the African examining organs can jointly approach some universities for the training of their staffs or in the alternative AEAA can set up an Examinations Training Institute for the purpose of collaborative capacity building and cooperation in other areas so identified by member bodies possibly through needs assessment.

Conclusion

The imperatives of using sub-regional and by extension regional cooperation among Africa public examining systems to promote and transform the African education systems for African development as can be deduced from the study cannot be overemphasised and cannot and must not be ignored. This is because the public examining system is the main source of providing feedback to the education system. Any system without a feedback system is programmed to fail hence, there is need for collaboration among African examining systems in order to provide feedback for better management of the African education sectors. Just as in the economic parlance of comparative advantage, examining systems should begin to learn from one another and also tap from one another's strengths. The process has already begun as there had been training programmes conducted for examining bodies in Africa. It should extend to exchange of staff and second of staff among them. Some designated universities can be approached for partnership by AEAA as the only authentic African examining association where public examining will be taught to help staff members to improve themselves. In the alternative AEAA could float an Examinations Institute of its own to train the staffs of its members in all aspects of public examining as the need for capacity was revealed to be paramount. The institute could also double as African examinations research institute.

An examining system competence based cooperative mechanism (akin to the comparative advantage model) was suggested for adoption for collaboration.

Recommendations

Arising from the foregoing, the following recommendations:

- Those African examining bodies should, as a matter of urgency, begin to collaborate beyond the areas of conferences and training, and extend such to exchange of notes and personnel for the conduct of examinations in their various countries.
- That they should also cooperate with one another in the areas of test development, test security, moderation and monitoring as well as in research for improved service delivery and appropriate feedback for transforming the African education landscape for the development of the continent.

- That a model akin to the economics comparative advantage model international trading should be evolved for cooperation among member-countries of AEAA to take advantage of one another's strength thereby deriving a synergy that would result in their 2+2 efforts becoming 5 instead of the usual 4. In other words, if Botswana is better in the area of test security as result minimal examination fraud it recorded over the years, in relative terms, than say Nigeria, Nigerian examining bodies could thus send some of her officials to Botswana to learn from them and their (Botswana examining officials can be brought to give the practical lessons on security of the test during the conduct of examinations, and if on other hand, Nigeria has better expertise than Ghana, Uganda and South Africa etc, they can also learn from her and use her personnel to assist in this direction.
- There is no doubt in the area of research, the public examining systems in Africa will benefit immensely from one another. Thus, is equally recommended that examining should collaborate in the area of researching among members.
- Finally, it is recommended that the Communiqué ensuing from this and every AEAA conference henceforth be handed to officials of Ministries or State Departments of Education who should be coopted as members of AEAA, so that they could feel and know the import of the examining systems as a the greatest means of providing feedback for transformation of our education systems for the development of the continent.
 The examining could jointly under auspices
- The examining could jointly under auspices of AEAA set up an African examinations institute to achieve permanent collaboration in capacity building, research training and execution, test development and administration, training on braille development and use with regard to testing and other aspects of examination special needs among others.

REFERENCES

Afolabi, E.R.I. (2012). *Test and Measurement: A Tale Bearer or A False Witness?* Inaugural Lecture Series. Obafemi Awolowo University, Ile-Ife, Nigeria.

Adenku, E.N.K & Offei, G.A (2010). Increasing Enrolment in Public Examinations and the Challenges to Quality Assessment: The BCCE

- Ghana Experience. Journal of Assessment in Africa. 5, 275-288.
- Amin, M. E. (2005). Social Science Research: Conception, Methodology & Analysis, Kampala, Uganda: Makerere University Printery.
- Baku, J. J. K. (2008). Assessment for Learning and Assessment of learning: a Search for an AppropriateBalance. Assessment for Educational Assessment in Africa. *Journal of Educational Assessment in Africa*. 2, 33 43.
- Baku, J. K. (2010). The development and use of the research process for quality assurance in educational assessment: The WAEC-Ghana experience. *Journal of Educational Assessment in Africa.* 5, 209-226
- Conteh, M. B. B. (2008). Comparative study of examination malpractice in Nigeria and the Gambia at West African Senior School Certificate Examinations (2003-2007). *A dissertation* submitted at the Institute of Education, University of Ibadan.
- Durowoju, E. O. (2012). Effect of continuous assessment modalities on students' learning outcome in senior secondary school commerce in Ibadan. M.Phil dissertation in the Institute of Education, University of Ibadan, Nigeria.
- Onuka, A, O. U. (2009). Stakeholders' Perception of test security as management tool for curbing malpractices in the Nigerian Examining System. *African Journal of Educational Management*. 12. 1, 31-52
- Onuka, A.O.U. & Amusan, M. A. (2008). Causes, effects and probable solutions to examination malpractices: A
 Case study of the West Examinations Council examinations in Abeokuta. *Ghana Journal of Teaching*. 1.6., *1* 9
- Onuka, A O. U. (2008). Teacher initiated student peer-assessment: A means of improving learning-assessment in

 Large Classes. A paper presented at the West

African Examinations Council Monthly Seminar, Lagos: Research

Division April 30, 2008.

- Onuka, A. O. U. (2010). Continuous Assessment (CA) in Open and Distance Learning (ODL). In A.O.U.Onuka, [Ed.] Some Fundamentals of Evaluation in Managing Open and Distance Learning. Ibadan, DLC, University of Ibadan. 75 83.
- Onuka, A. & Durowoju, E. O. (2010). Nature, causes, methods, effect and solutions to examination malpractices in Nigeria. A presentation made at the Interactive Session on Examination Malpractices

- by Orderly Society Trust (OST) in Lagos in Sept. 16^{th} , 2010
- Onuka, A. O. U. & Durowoju, E. O. (2011). Curtailing examination fraud for improved quality assurance in the African examining system. A paper presented at the 2011 AEAA Annual Conference, Nairobi, Kenya, August 1-5, 2011.
- Onuka, A.O. U. (2011). Collaborative funding university research undertaking for national development. A Paper presented at the 6th Regional Conference of the Higher Education, Research and Policy Network [HERPNET] held at the University of Lagos Conference Centre. 8-12, August, 2011.
- Onuka, A. O. U. (2012). Partnering for effective educational researching for development. African Higher Education Review (AHER), 5, 41 57.
- Owolabi, H.O. (2010). Perspectives on coping with increasing enrolment in public examinations and the challenge of quality of assessment in Nigeria. Journal of *Journal of Educational Assessment in Africa*, 5, 37-46.
- Turyatemba, J. (2008). The Relationship between Educational Assessment and Learning the Ugandan Experience.
 - Journal of Assessment of Educational Assessment in Africa, 2, 13 22.
- Shkubanza, B. & Joe, K. (2010). Innovative technologies in enhancing performance in the conduct of public examinations: A reflection on the Examinations Council of Zambia *Journal of Educational Assessment in Africa*. 5, 163-175.
- Yadidi, D.C & Chiuanda, G.A. (2010). Increasing enrolment in public examinations and challenges in quality assessment: The Case of Malawi National Examinations Board. *Journal of Educational Assessment in Africa*. 5, 47-58.