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Perception of Academic Librarians to the Use of Massive Online Open Courses as Professional Development Tools in Selected University Libraries in Osun State, Nigeria.

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Abstract

Librarians' professional development is the process of constantly strengthening professional attainment, broadening academic knowledge, enhancing the professional skills, and improving library services. The new Massive Open Online Courses necessitate academic librarians to be lifelong learners who can take advantage of available opportunities to improve their professional competence continuously. However, much research has not been done on perception of academic librarians to the use of MOOC as professional development tools. Therefore, this study examined perception of academic librarians to the use of MOOC as professional development tools in selected university libraries in Osun State, Nigeria. Also, the study adopted the descriptive survey design. Questionnaire was the instrument used for data collection and descriptive statistics were used for data analysis. Three Nigerian universities were selected which has a total number of Thirty eight (38) academic librarians. The total enumeration sampling technique was used to study all respondents for the study. The findings showed that academic librarians are fully aware of massive open online course as a tool for professional development in University libraries in Nigeria.

Keywords: MOOC, Professional development, Academic Librarian, MOOC Perception, MOOC Use

Introduction

The Industrial Revolution required skilled manpower to work in factories, which gave rise to the term "correspondence courses," but this was insufficient to meet the needs of a vast student population. This requirement was accomplished through the advent of electronic media, such as radio and television, which allowed the masses, including those located in remote geographical regions, to learn. But there was still a lack of teacher-learner interaction, which was taken care of by setting up e-learning courses with the help of the Internet. This has given rise to online courses,

as they are generally called today. Only those who at that time had access to a computer system and Internet connections may have access to online courses.

However, in the 1960s, the advent of open universities, which changed the face of distance learning by offering correspondence courses, broadcasting and publishing courses, as well as courses at the local and regional level, have introduced an open policy that allows students to have access to academic information. All of these paved the way for the growth of the first MOOC in 2008. MOOC used several collaborative ways to involve students, e.g. Facebook, tweeter, Linkedin and many others. The course was free and open.

MOOC in the online learning landscape is a new phenomenon. In general, MOOCs are intended to cater for multiple people in various locations at the same time as long as there is access to internet connectivity, and are often free of charge, with an all-encompassing experience of the course with or without qualifications. The MOOC is an online course aimed at unrestricted participation and promotion of open access through the Internet (Kaplan & Haenlein 2016). Mahraj (2012) noted that there are different ways in which MOOCs can include academic librarians, such as teaching information literacy skills, assisting with the organization, gathering accessible educational tools, and information management.

Meanwhile, perception is a reality that a person discusses or gives sense to the situation that he/she encounters. Also, perception can be characterized as the recognition and perception of sensory information by a person. It involves how we respond to information. Perception is also a method of accepting sensory input from our domain by using the information to interact with our surroundings. Perception helps us to take in sensory input and make it meaningful. This was confirmed by Pickens (2011), whose research revealed that three elements of perception are: selection, organization, and interpretation. Awareness and acceptance of stimuli play a major role in the perception

Professional growth is an ongoing process of improving professional performance, expanding intellectual capacity, enhancing technological skills and improving library services. The complexities of education systems in the 21st century emphasize academic librarian's need for an increased number of students with diverse knowledge needs and changing teaching technology (Hennessy, Habler & Hofmann, 2015). In addition, Stein, Shepherd and Harris (2011) claimed that professional development is an activity intended to strengthen the professional skills and abilities of academic librarians.

Statement of Problem

Massive Open Online Course is the latest remote educational method that has a profound impact on conventional teaching, contributes to a new trend in education, and also offers a new technique for the professional growth of academic librarians. In Nigeria much has not been done in the area of MOOC. Unfortunately, people have little knowledge about the relevance and future importance of MOOC in the contemporary educational technology of distance/online learning. The essence of this recent emergence of online teaching and learning raises questions about the perception and use of the Massive Open Online Course as the professional development of academic librarians in selected Nigerian universities.

Objectives of the Study

The specific objectives are to:

- 1. determine the awareness level of MOOCs among academic librarians in selected university libraries in Osun State Nigeria.
- 2. ascertain the perception of academic librarians on MOOC.
- 3. determine the use of MOOC among academic librarians in selected university libraries in Osun State Nigeria.
- 4. investigate the benefits of MOOC on the professional development of academic Librarians in selected university libraries in Osun State Nigeria.

Research questions

- 1. what is the level of awareness of MOOCs among academic librarians in selected university libraries in Osun State Nigeria?
- 2. what is the perception of academic librarians on MOOC?
- 3. what is the level of usage of MOOC among academic librarians in selected university libraries in Osun State Nigeria?
- 4. what are the benefits of MOOCs on the professional development of academic Librarians in selected university libraries in Osun State Nigeria?

Literature Review

Academic librarians believe that MOOCs are an innovative way to facilitate teaching and learning. While encouraging scholars to set up an interactive domain for students to engage with information technology and communication skills (Milligan, Littlejohn, & Margaryan, 2013). MOOC was described as free, participatory, distributed, and promoting lifelong network learning (Cormier, 2010). Pappano (2012) states that the MOOC is an open course, inexpensive, readily available, participatory and distributed. According to Yuan, Powell and Olivier (2014), the word 'massive' is meant to spread links with the aim of establishing communities among the participants. The word 'open' means open and free admission, the word 'online' emphasizes networked learning across various channels, and the word 'course' means learners participating, exchanging resources and creating their own content with materials and peers.

Siemens (2013) indicates that MOOCs incorporate innovation and application technologies to provide a large number of people with teaching and learning opportunities. MOOCs represent both teachers and students as their audience, while also promoting a positive effect on them (Colibaba, Colibaba, Gheorghiu, Ursa, Colibaba & Ionel, 2015). Applying social media to MOOCs can increase learning outcomes. Social networking may create online communities that promote collaboration and participation among users (Bicen, 2017). Veletsianos and Navarrete (2012) stressed that MOOCs should be combined with social media platforms to allow information materials to be exchanged, to promote participation and to create consortiums via social media platforms that appear to be readily accessible to students.

Characteristics of MOOC

The high turnout in the enrollment of MOOCs over the years has been observed by institutions. There are some specific features outlined below based on these MOOCs:

Participatory

In order for a learner to take part in MOOC, he/she must be computer literate and be familiar with different instruments and applications involved.

Massive

The existence of MOOCs requires an infinite number of individuals and services at the same time, such as teachers, leaners, computers and related technology,

Online

MOOCs are mostly web-based, and in recent past institutions are starting to accept MOOCs by using their teaching materials in their classrooms either they do it online or by on one teaching.

Open

MOOC is accessible to everyone, whether young or old, male or female, as long as you can use the computer, its gadgets, and related devices such as mobile phones and interact via the internet with it.

Courses

MOOC is special in design, making use of modules when arranging the contents of its course, allowing a distinct path and receiving its certificate of a participant.

Classification of MOOC

In the literature, MOOC can be broadly classified into two

cMOOCs: The early MOOCs were 'connectivists.' Siemens (2012) described the CMOOCs due to their focus on mass communication and interaction. The emphasis will be on the development of learners growing into their peers' communities, on how they build expertise by making use of the connections and links they build within the sphere of social interaction.

xMOOCs: xMOOCs have been called the more instructivist models. These tend to use a recognition transmission model, through video recordings of classroom lectures or custom-made mini-lectures (Jona &Naidu, 2014). Therefore, an acceptable quality framework for xMOOCs could be a content-oriented form of framework which evaluates the quality of the presented content.

Types of MOOC

Clark (2013) identified eight types of MOOC taxonomy and these are stated in the following table: **Adaptive MOOCs:** This involves the use of adaptive algorithms through flexible assessment and data collection to present individual learning experiences. With the help of the content of the course, it requires prerequisites and promotes individual learning.

Mini MOOC: is a shorter content and skills MOOC, intense experiences that last for hours and days, mostly linked to universities, and more appropriate for precise areas and tasks with clear learning goals.

Synchronous MOOCs: This has a fixed start date, set aside time limits for assignments and assessments and a specific end date: for example, Coursera and Udacity.

Group MOOCs: This form of MOOC often increases the retention of participants by operating together in a smaller group. Students have mentors during the program and rate the effort and progress of each other.

Transfer MOOCs: The name of an organization normally involved, it is believed that interactions are only done between instructors with the help of the contents of the course to the student. For instance: Coursera courses category.

Asynchronous: it is the opposite of synchronous, and it requires a flexible date of operation, i.e. no fixed start dates, looser dates for assignment and assessments and no end date.

Connectivist MOOCs: This depends on network-wide links rather than predefined content to exchange information contributed by the participants, no 'fixed' knowledge.

Made MOOCs: This form of MOOC requires the use of video in order to give life to teaching and learning. It helps learners to lay their hands-on practical exercises.

Perception of Academic Librarians on the use of MOOC

The opinion and role of academic librarians in connection with the growth of the MOOC movement have received a high degree of attention in recent years. What is well known by Xu, Ouyang and Chu (2009) is the tendency for academic librarians to embrace technology early on, with terms such as "Library 2.0" which was coined out by Peltier-Davis (2009). MOOCs are different and require the library service to be re-planned and repositioned. MOOCs are on a scale that has never been previously seen, witnessed or encountered. As information professionals seek to remodel existing material or compose new content for a clamouring yet challenging and changing educational framework, "redefining the role of academic library is not for only an educational imperative, but also socially desirable" for third-party platforms (Owusu-Ansah, 2001). Academic librarians can evolve because of new technologies and ever-changing educational landscapes.

Academic librarians cannot be viewed as supporting staff to the faculty if cooperation is to take place. Proactivity is one way of asserting the professionalism of librarians, thereby going beyond the service paradigm to collegiality with the faculty" (Donham &Williams, 2004). The first step to be taken by the academic library is to identify whether MOOCs are being created on campus. In this context, it is necessary to carry out an investigation in order to have full information about the scholars leading the working groups. There will be some obstacles that, the academic librarian will be the only right person to proffer a solution, in collaboration with the faculty members, as such they take on the role of librarian consultant. The consultative librarian's viewpoint is such that it provides the best of both worlds. In connection with the faculty of the academic division, the consultant librarian is both an insider and an outsider (Donham &Williams, 2004). Academic librarians should take advantage of their distinctive position by cultivating the role of consultant: working within the same educational institution while retaining an external analytical view of the MOOC and its potential content.

Academic librarians will then advise on content suitability, whether current licenses allow it to be included in a MOOC offering, or whether it is possible to acquire a more acceptable alternative. The academic librarian can also draw on their experience of working with formally enrolled students about information and digital literacy skills and advise whether the content, structure and technology selected within the MOOC are suitable for learners or whether it may be necessary to improve pre-MOOC skills.

The second step is to increase the awareness of academic librarians' talents, skills, and experience that can be easily adapted to accommodate MOOC development. This method, which could take the means of outreach conferences, lectures, workshops, seminars, etc. within the faculties, would place the academic librarian to be included in the early stages of mapping new MOOCs rather than joining the table late in the day for MOOCs already in production. Adaptation is very important both in the institution and in its staff; the profession must find ways of inventing new perspectives

and altering many aspects of its conventional orientation. Specifically, the flexible and responsive profession will be able to cope with changes that, if viewed negatively, are interpreted as risks but, if viewed positively, emerge as golden opportunities (Veaner, 1985).

Finally, academic librarians will assist their higher institutions formally registered students in the development of their knowledge and digital literacy skills for their universities, and it is these skills that their MOOC learners, will also need as they strive to access a wide variety of channels, search, select and interpret information to inform their learning journeys. The academic librarian's role is central to the processes needed to develop a new educational platform, and with online learning registrations out performing traditional enrollment, it is an increasingly important landscape for them to navigate.

Advantages of MOOC

- i. MOOC gives room for all to have access to tertiary education, thus generating considerable interest from policymakers, tertiary institutions and commercial organizations (Yuan, Powell, & Cetis, 2013).
- ii. They have made the learning process flexible and brought tremendous hope for the unprivileged people deprived of formal education.
- iii. MOOCs allow intellectual development (e.g. lecturers, librarians, employees that are interested in enhancing their technical skills can enroll for MOOC).
- iv. MOOCs can help ameliorate the problems of faculty shortage, scarcity of funds and limited infrastructure
- v. MOOCs make provision for mechanisms to reach a large number of learners at any stage in their education or professional development

Challenges of MOOC to Academic Librarian

The majority of good universities and business organisations have engaged in MOOCs, and a significant number of students are presently taking part in MOOCs, despite that MOOCs are facing several problems such as questionable course quality, high dropout rate, unavailable course credits, limited learning assessment methods, puzzling copyright and limited hardware.

Questionable course quality: A large number of MOOC learners creates significant difficulties in the relationship between instructors and learners. Social networking is commonly used by MOOCs for learning discussions. Since the percentage of students in a single MOOC course is high, it becomes problematic or very difficult for the teacher to track all course discussions, communicate with each student and provide feedback. The lack of communication between MOOC teachers and students would certainly affect the quality of the course.

High dropout rate: The high drop-out rate in MOOCs could be due to the extremely low cost on the part of the learners. Unlike traditional classes, MOOCs do not ask students to pay school fees. Any student can enroll for a MOOC without taking into account the cost.

Complex copyright: The author's copyrights of a MOOC course are multifaceted, including faculty, learners, universities and providers of MOOCs. However, MOOCs presents complex copyright issues that could threaten the partnership between a higher institution, its faculty and learners, and providers of MOOCs.

Limited hardware: As far as hardware is concerned, MOOCs need computers, headsets/speakers, microphones and an internet connection. Among the contents of the course, video lectures are the

major elements of the MOOCs. Many of the course contents of MOOCs are distributed via the Internet in video format. Learners need broadband connections to watch high-quality content. However, not all student, has full access to a strong internet connection Most MOOC learners are in developing countries and have restricted access to the Internet. This hardware restriction needs to be resolved in order to make MOOCs fully accessible to more learners.

Theoretical Framework: (One) Perception Theory

James Jerome Gibson was an American psychologist and one of the key prominent contributors to perception theory. The question that prompted Gibson's research on perception was, "How do we see the world as we do?," This triggered his empirical study, the environment, and how individuals view the social environment. There were two main forms in which James J. Gibson modified the way psychology view perception. The first is that our stimulation templates are influenced by a moving organism. This was illustrated by his experiments on optical arrays. Secondly, he proposed the ideology that three-dimensional space being conceptual. Gibson described perception as a compilation of the human physical environment and how individuals interact with it. He stressed further that perception is a means of knowledge collection that takes place over time. Events, therefore, are the fundamental source of perceptual information and a vital element of what is obtained during perceptual learning and growth.

Gibson had left a lasting influence on the way psychologists and philosophers interpret perception and action. Previous sensory meaning theories have proposed that perceptions are separate and private from one another (Heft, 2013). This position placed all of the perceptive meaning on the individual, which meant there was no way to find common ground on individuals' shared experiences. Gibson concluded that when stimulus information is sought out, the meaningful features of the stimulus are often viewed as relational.

Methodology

Descriptive research design using the survey method was adopted for this study. A questionnaire was designed and used as the survey measuring instrument. The questionnaire was divided into six sections, namely Section A: Demographic Information, Section B: level of awareness of MOOCs, Section C: perception of academic librarians on MOOC, Section D: level of usage of MOOC, and Section E: Benefits of MOOC. The population for this study is selected academic librarians in universities in Osun Sate, Nigeria. The respondent was made up of thirty four (34) Librarians who purposively selected from the sampled institution for this study. They were chosen based on their experience through a purposive sampling technique. The findings were presented in both tables and charts. In this research study, simple percentage analysis and weighted average were employed.

Results/Findings

A total number of 38 copies of a self – developed questionnaire was administered through electronic mail using Google form. The 38 respondents that made up the sampled population were drawn from Adeleke University Ede Osun State (7), Obafemi Awolowo University Ile ife Osun State (22) and Osun State University, Osun State Nigeria (9). Out of these, only 34 (91.4%) were found appropriate and fell into the needed samples. therefore, 34 copies of the questionnaire were used for this analysis. Data analyses were presented in both charts and tabular form using simple percentage analysis and weighted average.

Table 1 reveals the Demographic information of the respondents. On their gender, male 16(47%) and female 18(53%), the educational qualification of the respondents BLIS 3(9%), MLIS 25(74%), and Ph.D 6(18%) and the years of experience: 1-5 (6[17%]), 6-10 (10[29%]), 11-15 (4[12%]), 16-

20(2[6%]), 21-25 (5[15%]), 26-30 (4[12%]) 31-35 (3[9%]), and the last on the demographc Information is the age: 31-35[7, 21%] 36-40 [10, 29%], 41-45[6, 18%], 51-and above [11, 32%].

Table 2: Demographic Information of Respondent in academic libraries in Selected Universities in Osun State,

Nigeria			
S/N	University library	Respondent	Percentage (%)
1	Adeleke University Ede Osun State	5	15
2	Obafemi Awolowo University Ile ife Osun State	20	59
3	Osun State University, Osun State Nigeria	9	26
	Total	34	100
	Gender		
4	Male	16	47
5	Female	18	53
	Educational Qualification		
6	BLIS	3	9
7	MLIS	25	74
8	Ph.D	6	18
	Years Ofexperience		
9	1-5	6	17
10	6-10	10	29
11	11-15	4	12
12	16-20	2	6
13	21-25	5	15
14	26-30	4	12
15	31-35	3	9
	Age		
16	31-35	7	21
17	36-40	10	29
18	41-45	6	18
19	51-and above	11	32

Source: Field work, 2020.

Table 3 below reveals the level of awareness of MOOCs among academic librarians in university libraries, according to the finding majority of the librarians are fully aware of MOOCs with the range of 11 (32%) to 19 (56%), while very few librarians are not aware with constant rate of 1 (3%). Therefore it could be concluded that majority of librarians in universities are fully and averagely aware of MOOCs.

Table 3: level of awareness of MOOCs among academic librarians in university libraries

level of awareness of	Fully	Averagely	Scarcely	Not Aware
MOOCs	Aware	Aware	Aware	
Transfer MOOCs	19 (56%)	10 (29%)	4 (12%)	1 (3%)
Made MOOCs	16 (47%)	11 (32%)	6 (18%)	1 (3%)
Synchronous MOOCs	18 (53%)	10 (29%)	5 (15%)	1 (3%)
Asynchronous	16 (47%)	11 (32%)	6 (18%)	1 (3%)
MOOCs				
Adaptive MOOCs	11 (32%)	15 (44%)	6 (18%)	2 (6%)
Group MOOCs	16 (47%)	10 (30%)	6 (18%)	2 (6%)
Connectivist MOOCs	10 (30%)	8 (24%)	15 (45%)	1 (3%)
Mini MOOCs	11 (33%)	10 (30%)	11 (33%)	2 (6%)

Table 4 below reveals the Perception of academic librarians on MOOCs, all the respondents 34 (100%) have heard of MOOCs, are interested in doing MOOCS courses, would study if their preferred courses are offered as MOOCs, and they think they would benefit by learning using MOOC. While very few respondents 1 (3%) Do not differentiate between traditional learning and learning via MOOCs, would not recommend their colleagues to learn via MOOCs. With the above finding it concluded that majority of academic librarian have positive perception of MOOCs.

Table 4: Perception of academic librarians on MOOC

perception of MOOCs	Yes	No
Have you heard of MOOCs?	34 (100%)	-
Do you differentiate between traditional learning and learning via MOOCs?	33 (97%)	1 (3%)
Are you interested in doing MOOCS courses?	34 (100%)	
Will you studyif your preferred courses are offered as MOOCs?	34 (100%)	
Do you know of any MOOCS providers for your discipline of study?	29 (85%)	5 (15%)
Do you know of any MOOCS providers for your discipline of study?	27 (80%)	7 (20%)
Do you think you will benefit by learning using MOOCs?	34 (100%)	
Will you recommend your collegues to learn via MOOCs	33 (97%)	1 (3%)
Will you prefer education through MOOCs over conventional education?	31 (91%)	3 (9%)

Figures 2, 3 and 4 below reveal chart on percentage of use of MOOC among academic librarians in Nigerian university libraries while the table 5 below also presents the use of MOOC among academic librarians in Nigerian university libraries in but percentages and frequency. Of all the respondents just 1(3%) never encourage people to enroll for MOOC, while more than 40% have enrolled for MOOC for professional development in 12 months and more than 70% have certificate earned through MOOC programme. All these indicate significant use of MOOC among academic librarians in selected university libraries in Osun State in Nigeria.

How often do you encourage people to enroll for MOOC?

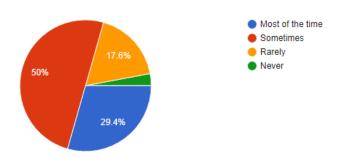


Figure 2: How often Librarians encourage people to enroll for MOOC?

How long have you enrolled for MOOC for professional development?

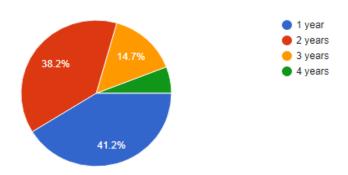


Figure 3: How long Librarians enrolled for MOOC for professional development

How many certificate have you earned through MOOC programme? esponses

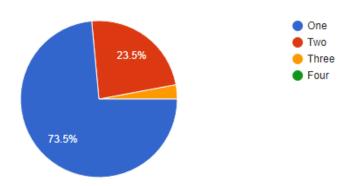


Figure 4: certificates librarians have earned through MOOC programme?

Table 5: Use of MOOC among academic librarians in Nigerian university libraries

Statement	Most of the	Sometimes	Rarely	Never
	Time			
How often do you encourage people to	10 (30%)	17 (51%)	6 (18%)	1 (3%)
enroll for MOOC?				
Statement	1 year	2 years	3 years	4years
How long have you enrolled for MOOC	14 (42%)	13 (39%)	5 (15%)	2 (6%)
for professional development				
Statement	One	Two	Three	Four
How many certificate have you earned	25 (73%)	8 (24%)	1 (3%)	-
through MOOC programme?				

Table 6 below reveals the benefits of MOOC on professional development of academic Librarians in Nigerian university libraries. All the respondents 34 (100%) affirm that MOOC is helpful for librarian professional development, MOOC provides information and references which are useful

for librarian academic research, and MOOC helps to attain course goals. However, 12 (36%) agree that MOOCs do not facilitate learning for people with special needs.

Table 6: benefits of MOOC on professional development of academic Librarians in Nigerian university libraries.

Benefits of MOOC on Professional Development of Academic	Yes	No
Librarians		
Does MOOC reinforced self-paced learning	32 (94%)	2 (6%)
Is MOOC helpful for my professional development	34 (100%)	
MOOCs facilitate learning for people with special needs	28 (84%)	12 (36%)
Does MOOC provides information and references which are	34 (100%)	
useful for your academic researchers		
MOOC helps me to meet students' individual differences	32 (94%)	2 (6%)
Using MOOCs in higher education can help students to	23 (67%)	11 (33%)
Improve their level of education		
MOOC helps me to attain course goals	34 (100%)	
MOOC reducing cost of education	27 (80%)	7 (20%)
MOOC offers high- quality education	23 (67%)	11 (33%)

Conclusion

Massive open online courses (MOOCs) are one of the emerging innovations in tertiary education in this contemporary age. In this changing community, academic librarians have a crucial role to perform in the enhancement and support of MOOCs .Massive open online courses (MOOCs) are one of the recent innovations in tertiary institutions in this contemporary age. This study is aim at evaluating the level of awareness, benefits and usage of MOOC in improving professional development of academic librarians in Osun State, Nigeria. It was discovered that librarians are aware of the types and benefits as well as the usage of MOOC to their professional development.

Recommendations

- 1. Academic Librarians should organise special seminars workshops, discussions etc, on how to teach in MOOcs platforms, and provide information materials that will assist effective teaching.
- 2. Organizers of MOOC should charge learners fees that are commensurate to what they learn, so that such funds will be used to provide adequate resources to support quality MOOCs
- 3. MOOC instructors should group their learners into several categories so as to reduce the number of people that attend their lectures at a time such as preliminary stage, intermediate stage and advanced stage.
- 4. In order to get learners commitment, a fee needs to be attached to every stage of learning. Because the moment an individual pays for a particular service he or she becomes dedicated to it thereby making sure he or she gets value for the amount paid.
- 5. The admission process for MOOC should be taken seriously, as such questionnaires should be made available online to ascertain the ability and educational background of the learners before he or she is admitted.
- 6. Institutions, Faculty and individual authors should see MOOC's copyright has a collective reward, such as institutional repository.

- 7. Hardware limitation needs to be overcome by making all necessary equipment available such computers, headsets/speakers, microphones and also subscribing for fast internet connection (broad band) in order to have effective operation of MOOCs.
- 8. Learners should be exposed to the lessons that suit their educational level through the use of learning stages which are elementary, intermediate and advanced so that each learner already know where to fit in.

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