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The role of eLearning in educational attainment among students during COVID- 19: A case study of EFL students at the University Mohammed Boudiaf of M'sila (Algeria).

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Abstract

Since the year 2020, the world suffered from the global Coronavirus pandemic which hit the globe totally. It resulted in grave impacts on economy and other strategic sectors in world countries. Moreover, COVID-19 affected education in both tertiary and higher education levels: It has resulted in schools and universities shut all across the world because of quarantine procedures, and many learners were out of classrooms. As a result, education has changed dramatically, with the distinctive rise of eLearning, thereby teaching is undertaken remotely and on digital platforms. As Algeria was no exception during coronavirus pandemic, Algerian policymakers in education and higher education levels adopted eLearning as a substitute teaching/ and learning model in delivering courses to students.

The present paper attempts to analyze the role of eLearning in educational attainment among students during the Coronavirus pandemic. Taking EFL students of the University of M'sila as a case study, the researchers intended to find out either positive impacts brought by eLearning on students' educational attainment to promote the eLearning model, or negative impacts of eLearning on students' educational attainment to cite the problems of eLearning and propose workable solutions.

Key words: Coronavirus pandemic, eLearning, educational attainment, EFL Master students.

دور التعلم الإلكتروني في التحصيل العلمي بين الطلاب خلال فترة جائحة كوفيد-19:

دراسة حالة لطلاب اللغة الانجليزية بجامعة محمد بوضياف المسيلة (الجزائر)

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المستخلص

منذ عام 2020، عانى العالم من جائحة فيروس كورونا التي ضربت العالم. وأدى ذلك إلى آثار خطيرة على الاقتصاد والقطاعات الاستراتيجية الأخرى في بلدان العالم. علاوة على ذلك، أثر موفيد- 19 على قطاع التعليم في كل من مستويات التعليم العالي: فقد أدى إلى إغلاق المدارس والجامعات في جميع أنحاء العالم بسبب إجراءات الحجر الصحي، وكان العديد من المتعلمين خارج الفصول الدراسية. نتيجة لذلك، تغير التعليم بشكل كبير، مع الارتفاع المميز للتعلم الإلكتروني، وبالتالي يتم التدريس عن بعد وعلى المنصات الرقمية. نظرًا لأن الجزائر لم تمثل الاستثناء أثناء جائحة فيروس كورونا، فقد اعتمد صانعو السياسات الجزائريون في التعليم والتعليم العالي التعلم الإلكتروني كنموذج تدريس وتعليم كبديل في تقديم الدورات للطلاب.

تحاول هذه الورقة تحليل دور التعلم الإلكتروني في التحصيل العلمي بين الطلاب أثناء جائحة فيروس كورونا. مع أخذ طلاب اللغة الانجليزية من جامعة المسيلة كدراسة حالة. كان الباحثون يعتزمون معرفة الآثار الإيجابية التي أحدثها التعلم الإلكتروني على «التحصيل العلمي للطلاب لتعزيز نموذج التعلم الإلكتروني، أو التأثيرات السلبية للتعلم الإلكتروني على الطلاب» التحصيل العلمي للإشارة إلى مشاكل التعلم الإلكتروني واقتراح حلول عملية.

الكلمات الرئيسية: جائحة فيروس كورونا، التعلم الإلكتروني، التحصيل العلمي، طلاب ماستر لغة انجليزية.

Introduction

The new millennium has brought lots of changes that affected almost every sector. Being amongst the new items which were introduced, the technological revolution has shaped the world differently, and changed communication channels in the current era. Moreover, it gave birth to the Information Society (IS). Academically, the latter is a term which indicates a society where the creation, distribution, use, integration, and manipulation of information is a noteworthy economic, political, and cultural activity. Commonly known, an Information Society can be simply understood as a society where the usage and knowledge of information and computer technology is at a high level.

As technology has impacted almost every aspect of life today, education is no exception. Nowadays, education does not seem as the same as it has been for many years. Classrooms look much different. Modern students use their laptops, tablets, or smart phones. In many ways, technology has profoundly changed education. It has greatly expanded access to education via different models and channels. Additionally, massive amounts of information are available at one's fingertips through the Internet, and opportunities for formal learning are available online worldwide through MODDLE's, MOOCs, podcasts, and online degree programs. Access to learning opportunities today is unprecedented in scope thanks to technology.

As a result of technological advancements, the World Wide Web (WWW) has become a channel of knowledge which opens the door for people worldwide to access education for free, or for lesser costs. Since the Internet was adopted and further developed as a means of communication by educational institutions in the 1970s, academics have been aware of its massive potential as a learning tool. In recent years, governments of both developed and under-developed nations have become increasingly excited about the possibilities of online learning to deliver cost effective, easily accessible and ever-current education to all ages and social backgrounds, regardless of time and geography.

In recent decades, the use of information and communication technologies (ICTs) for educational purposes has increased, and the spread of network technologies has caused eLearning practices to evolve significantly (Kahiigi,

Ekenberg, Hansson, Tusubira and Danielson, 2008, p. 77). The evolution of distance education, as a result of new technologies and the contributions of computer sciences to the field of education along with the conceptualisation of education as a lifelong process, poses a major challenge for educational institutions: how to integrate these technologies into their organisation and, especially, into their teaching. From simple occasional use of ICT to reinforce face-to-face teaching and learning to the use of virtual environments for courses conducted completely online according to a variety of educational models, the incorporation of ICT into the learning process is being achieved from very different perspectives and through an extensive range of formulas, albeit with one common denominator: the use of practices whose origin and pedagogical foundations lie in distance education.

As the world adjusts to the new COVID- 19 order, education has been shaken from its technological torpor by the need to deliver products remotely and cost effectively. The virus has resulted in more than 1.38bln students (approximately 90% of the total) across 185 countries being shut out of classrooms (Llyod, 2020, para. 1). Most educational institutions, colleges, and universities fell back on using eLearning as an alternative in providing education and delivering online courses to students during the quarantine times. Like many countries in the world, Algerian universities, with no exception, have relied heavily on eLearning during Coronavirus pandemic. As the Algerian policymakers have insisted on diverting the educational system from traditional to online learning, Algerian universities rushed into exercising the new educational practices by setting up several MODDLE platforms reserved for delivering online lectures, and distance ones, to its students. Therefore, since COVID- 19, eLearning has become an integral part of educational system at universities. This; in fact, has marked a shift in education at higher education sector. Accordingly, Algerian universities deliver almost all courses using web- based technology to facilitate course contents' delivery, assessments, and assignments. Furthermore, students are enhanced to successful integration of online learning, based on the increasing importance of online learning programs.

The present paper attempts to analyze the role of eLearning in educational attainment during COVID- 19. The main core of the paper is to highlight how this transition from traditional model of teaching/ and learning into eLearning platforms- using MODDLE platforms, has impacted students' educational attainment levels. Using EFL students of the University of M'sila as a case study, the researchers used students' questionnaire as the main research tool

to explore students' views and opinions on the impacts of eLearning on their educational attainment taking into account (1) students' ages, (2) students' competencies, (3) students' educational attainment levels (whether it increased or decreased), and (4) class subjects. Hence, the present study aims to identify the advantages, barriers, and the shortcomings of eLearning experience in the Algerian context. Taking into consideration the aims of the present research, the researchers intend to answer the following questions:

- How did eLearning impact students' educational attainment during COVID-19?
- Did students' educational attainment increase or decrease during COVID-19?

Definition of eLearning:

Since its development in 1969, the Internet has become the backbone of eLearning. The latter has been integrated in the current educational systems, being; thus, a new dynamic which characterizes the 21st century education.

Commonly believed, eLearning system is a formalized teaching based on electronic resources. It is that type of education which is facilitated and supported by Information and Communication Technologies (ICTs) to help learners learn anytime and anywhere. It connects teachers and students online, although they are physically miles apart. In addition, eLearning is defined as a network which enables the transfer of skills and knowledge through which the delivery of education is made to a large number of recipients at the same or different times.

The terminology in e-learning field has also not been standardized yet. Many scholars use the term differently, and some use it interchangeably. These terms have differences, and these are cited below:

- **Web-Based Instruction:** It is a 'hypermedia based instructional programme which utilizes the attributes and resources of the World Wide Web to create a meaningful learning environment where learning is fostered and supported' (Khan, 1997, p. 6).
- **Virtual Learning:** 'The educational process of learning over the Internet
  without having face-to-face contact is known as *Virtual Learning*' (French, Hale, Johnson, and Farr, 1999, p. 2). However, for some, virtual learning may also include telelearning.

- **Online Learning:** It is synonymous to web-based learning where learning is fostered via hypertext transfer protocol (http) in Internet or Intranet.
- **E-Learning:** 'The term e-learning covers a wide set of applications and processes including computer-based learning, web-based learning, virtual classrooms, and digital collaboration' (Hambraecht, 2000, p. 8). However, the term e-learning is becoming more and more accepted as substitute for web-based learning or online learning, falling in line with ecommerce and e-business.

eLearning refers to the use of ICTs to enable the access to online learning/and teaching resources. In its broadest sense, Abbad, Morris and de Nahlik (2009) defined eLearning to mean any learning that is enabled electronically. They however narrowed this definition down to mean learning that is empowered by the use of digital technologies (p. 2). This definition is further narrowed by some researchers as any learning that is internet-enabled or web-based.

According to Maltz et al. (2005), the term 'e-learning' is applied in different perspectives, including distributed learning, online-distance learning, as well as hybrid learning (as cited in Ekwonwune and Edebatu, 2019, pp. 24- 5). E-learning, according to OECD (2005) is defined as the use of information and communication technologies in diverse processes of education to support and enhance learning in institutions of higher education, and includes the usage of ICTs as a complement to traditional classrooms, online learning or mixing the two modes (p. 2). According to Wentling, Waight, Gallagher, La Fleur, Wang, and Kanfer (2000) the term e-learning refers to the attainment and use of knowledge that are predominantly facilitated and distributed by electronic means. To them, the e-learning depends on computers and networks, but it is likely it will progress into systems comprising of a variety of channels such as wireless and satellite, and technologies such as cellular phones (pp. 4- 5). In their literature review on definitions for e-learning, Liu and Wang (2009) found that the features of eLearning process are chiefly centered on the internet; global sharing and learning resources; information broadcasts and knowledge flow by way of network courses, and lastly flexibility of learning as computer-generated environment for learning is created to overcome issues of distance and time (p. 200). Gotschall (2000) argued that the concept of e-learning is proposed based on distance learning, thus a transmission of lectures to distant locations

by way of video presentations (as cited in Priti, 2008, para. 3). Liu & Wang (2009); however, claimed that the progression of communications technologies, particularly the Internet, did transform distance learning into e-learning (p. 208).

According to Tao, Yeh, and Sun (2006), this new environment for learning that is centered on electronic networks has allowed learners in universities to receive individualized support and also to have learning schedules that is more suitable to them as well as separate from other learners. This facilitates a high interaction and collaboration level between instructors or teachers and peers than traditional environment for learning. E-learning in academics which is characterized by the use of multimedia constructs made the process of learning more active, interesting and enjoyable (p. 428). The main constructs that have made eLearning the most promising educational technology according to Hammer and Champy (2001) include service, cost, quality, and speed (p. 223). It is apparent that e-learning can empower students at higher educational levels to acquire their education, and at the same time perusing their personal objectives, as well as maintaining their own careers, with no need to attend be subjected to rigid schedule (Borstorff and Lowe, 2007, p. 16). In support of this statement, Kartha (2006) reported that the number of courses online has vividly increased as a result of the attained benefits for both learners and universities (p. 29).

eLearning: A brief history:

Since eLearning is used in different sectors, it has different meanings. According to Campbell (2004), in the higher education sector, eLearning refers to the use of software-based, online learning, and virtual learning, whereas in Business, the Military, and Training sectors it refers to on-line practices (as cited in Kidd, 2010, p. 47).

Although the terme Learning began to appear since 1999, evidences showed that early forms of eLearning were practiced in the 19th century. Before the Internet was launched, teachers and tutors used to deliver distance courses to students to offer them education on particular subjects and skills. Issac Pitman used this form of distance education in the 1840's to teach writing through correspondence. His students used to send him their assignments via mail system when completed. The invention of testing machine in 1924 allowed students to tests themselves. In 954, Skinner, a Harvard Professor, invented the 'teaching machine', which enabled schools

to administer programmed instruction to their students ('The History of E-Learning', 2015, para. 1- 2).

Originally, eLearning stemmed from the work of Suppes (1964) and Bitzer, Lichtenberger, and Braunfeld (1962) who situated the use of technology within a broader educational agenda. It is worth to note that there is no single evolutionary point of which the eLearning originated nor is there a single agreed definition of eLearning (pp. 208- 9).

In the 1960s, despite the fact that there were few educational applications of computers used in universities, Suppes (1964) argued that:

In the future it would be possible for all students to have access to the service of a personal tutor

in the same way that ancient royals were once served by individual tutors, but that this time the

tutors would be in the form of a computer. (p. 85)

Furthermore, he argued that the single most powerful argument for the use of computers in education is individualized instruction and the dialogue that it supports. According to him, the integration of the university and computers would pave the way to the emergence of virtual learning environments.

Suppes' work (1964) and teaching was confined to structured fields and views of knowledge, with 'drill and practice' approaches. Furthermore, Suppes was concerned with both producing better learning, and learning how to be a better teacher with computers. He found that computer mediated instruction produced profound effects on learning, and identified changes in students' understandings, ranging from simple to complex. While his use of computers was essentially as a tool, he foresaw the potential for wider applications of computers in education. His research led to the foundation ground work for computer assisted learning (p. 88).

With Suppes foundation work on computer assisted learning, Blitzer (1962) created Programmed Logic for Automated Teaching Operations (*PLATO*), which is a timeshared computer system, to address concerns about student literacy. According to Blitzer (1962), *PLATO* could be used to develop and deliver computer-based education, including literacy programs. It allowed educators and students to use high resolution graphics terminals and an educational programming language to create and interact with educational courseware and to communicate with other users by means of electronic notes (p. 210). Woolley (1994) argued that as well as PLATO's advances in Computer Assisted Instruction, its communication features were equally

innovative and were the foundations of today's conference and messaging systems (as cited in Kidd, 2010, p. 47).

Zahm (2000) described computer-based training (CBT) as delivered via CD-ROM or as a Web download and that it is usually multimedia-based (p. 45). Karon (2000) discussed the convenience factor of well-designed computer-based learning. According to him, a well-designed computer-based learning whether by a networked based or delivered via the Internet is more convenient than traditional instructor-led format (p. 39). Hall (1997) underlined computer- based learning as an all-encompassing term used to describe any computer-delivered learning, including CD- ROM and World Wide Web (as cited in Kidd, 2010, p. 48).

Like CBT, online training was classified as an all-encompassing term that refers to all training done with a computer over a network, including an organizations intranet, the organizations local area network, and the internet. Additionally, online learning is also known as net-based learning (Gotschall, 2000, p. 15).

Hall (2000) contended that eLearning takes the form of complete courses with access to content for 'just-in-time' learning access. Learning is, and will continue to be, a lifelong process, that could be accessed anywhere at any time to meet a specific need as cited in Kidd, 2010, p. 49).

Similar to eLearning and its related terms is technology- based learning. eLearning covers a wide range of applications and processes, including computer-based learning, web- based learning, virtual classrooms, and digital collaborations (Urdan & Weggen, 2000, as cited in Kidd, 2010, p. 48).

The growth of eLearning in business and higher education has led to concerns about the influence of quality assurance driven models (King, 2002, p. 233). Related concerns about its ability to deliver meaningful pedagogically structured learning experiences or to have a clearly identifiable learning paradigm have also been raised (Gillham, 2002, p. 260). Since its inception, eLearning has assimilated a diverse range of pedagogical practices, however the defining aspect of e-learning is not only a result of the increasing adoption of constructivist paradigms, but is also a consequence of the affordances of ubiquitous global networks that have facilitated the realization of individualized learning and interpersonal interactivity on a large scale.

eLearning can be seen as the acquisition and use of knowledge distributed and facilitated primarily by electronic means. This form of learning depends on a variety of means; such as, networks, computers, a variety of channels, and technologies. Further, e-learning can take the form of courses as well as

modules and smaller learning objects that may incorporate synchronous or asynchronous access that can be distributed geographically with varied limits of time.

Characteristics and tools of eLearning:

eLearning has several characteristics that differentiate it from traditional classroom-based learning. The table below indicates some of the key characteristics of eLearning:

Remote learner- teacher interaction	Learners can access education from anywhere in the world and at any time that is convenient for them.
Learner-centered approach	Learners have greater control over their own learning experience. They can choose the pace of their learning, the mode of delivery, and the content they want to learn.
Course material	Learners can access course materials such as text, video, and audio files online.
Multimedia nature	Learners can engage with the material in multiple ways. This can include videos, images, interactive quizzes, and simulations.
E-communication	E-learning enables the communication between learners and teachers through digital channels such as email, chat rooms, and discussion forums.
Use of the internet	E-learning requires an internet connection and access to digital devices such as computers, laptops, or mobile phones.
Just-in-time learning	E-learning allows for just-in-time learning, which means that learners can access the information they need as they need it, rather than having to wait for a scheduled class.
Multiple collaborations	E-learning encourages collaboration among learners, which can take place through discussion forums, group projects, and online learning communities.
Learner's active participation	E-learning requires learners to be active participants in their own learning experience, which means that they need to take responsibility for their own learning and engage with the material actively.
Facilities lifelong learning	eLearning can facilitate lifelong learning, allowing learners to continue to develop their skills and knowledge.

Table 1: Key characteristics of eLearning.

In addition to characteristics, eLearning tools are a crucial part of modern education, as they provide a platform for learners and teachers to connect and collaborate in an online environment. There are several e-learning tools available, each with its own unique features and benefits. Some of the most popular e-learning tools include:

Course Management System (CMS)	It is a platform designed to help educators manage and deliver course content to students, track student progress, and communicate with students.
Massive Open Online Courses (MOOCs)	MOOCs are online courses that are available to anyone with an internet connection. They include video lectures, quizzes, and interactive activities.
Webinars	A webinar is a live or recorded online seminar that allows learners to participate in real-time or at their own pace. Webinars are often used for training, professional development, and marketing purposes.
Podcasts	A podcast is an audio program that can be downloaded or streamed online. Podcasts are often used for educational purposes, such as language learning, professional development, or sharing research findings.
Blogs	A blog is a web-based journal that can be used to share information, ideas, and opinions with others.
Wikis	A wiki is a collaborative website that allows users to create, edit, and share content.
Educational Apps	Educational apps are software applications designed to provide learning content and activities on mobile devices.
E-mails	An email is a tool that allows educators to communicate with students one-on-one or in groups.
Messenger	Messenger is a real-time chat application that allows educators to communicate with students in real time.

Table 2: eLearning tools.

Overall, e-learning tools have opened up new opportunities for learners and educators alike. They have made education more accessible and democratized, empowering learners to take control of their own learning journey. As technology continues to evolve, we can expect even more innovative e-learning tools to emerge, making education more engaging, personalized, and effective. E-learning has also proven to be an effective way of delivering education, especially in the wake of the COVID-19 pandemic, which has forced many schools and institutions to adopt online learning. E-learning tools have helped bridge the gap created by the pandemic, allowing learners to continue learning remotely while maintaining social distancing protocols.

1. eLearning: An overview of the Algerian experience:

After its independence, Algeria faced challenges on political, economic, social, and cultural levels. From this perspective, it was necessary to give huge importance to education. Therefore, the government worked to build educational institutions and adopt democratic and free education to the masses.

However, the objectives were large and the potentials were limited. Within these circumstances, there emerged the idea of establishing an academic center that works to universalize education through correspondence, and directed to learners who wish to engage in learning, regardless of age, place, and time, and the use of available means; such as, printed documents, radio, and television. As a result, the National Center for Generalized Education and completed by correspondence through radio and television was established according to Order No. 67/ 69 in May 22, 1969. Its primary mission is to provide education by correspondence and audio-visual and technical means to learners unable to carry on their studies regularly in schools, or universities; and those who are enrolled in educational institutions and intend to improve their knowledge. In addition, the center organizes Arabic language lessons in order to advance in the process of Arabization.

The center has allowed thousands of citizens to pursue their studies by using various educational methods; such as, printed documents, audiovisual documents, organizing and allocating stimulating classes for the benefit of learners, through which they met with tutors. Also, and some newspapers; such as, Al Massaa (the evening), used to publish exercises and their solutions in various referenced materials. To perform this mission and reach a wide audience of learners at the national level, 20 regional centers were established across the country, in addition to a printing press that prints all the needed documents. In order to enjoy more independence in recording lessons, an audiovisual laboratory was established in February 1987 to produce audiovisual documents. In view of the changes that occurred in the world and their impacts in Algeria, it was necessary to keep pace with the scientific and technological revolution of the new millennium. The center was transferred into the National Office for Distance Education and Training on September 30, 2001 in order to expand its tasks, diversification, and development of its means by using modern technological means.

The University of Continuous Formation is another example of distance education in Algeria. It is a public educational institution that was set up in 1990 to provide education for those who did not carry on their learning

process for some critical circumstances. Since its establishment, the University of Continuous Formation implemented a policy of distance learning using the available means of radio and television and other resources to provide a good quality of education. Recently, the University of Continuous Formation has started to adopt blended learning which merges between class presence and the exploitation of ICTs and other available resources.

In the Algerian higher educational context, universities started adopting on-line learning optionally. The ministry of higher education left the practice at the universities' will. Therefore, some universities started adopting distance education through the delivery of courses to students in the universities' websites.

The Corona Virus pandemic did not affect affected educational systems in all countries of the world, which led to the suspension and closure of schools and universities, as a preventive measure to contain the spread of the pandemic that hit the whole world. In Algeria, COVID-19 has altered the higher education system. In response to the measures taken by the Algerian President, the Ministry of Higher Education resolved to on- line education in light of the Corona Virus crisis, as the Ministry of Higher Education approved an educational plan for Algerian universities that includes details of carrying on on-line courses and completing studies.

The Algerian Minister of Higher Education and Scientific Research called on the directors of universities to lay the ground to ensure the continuity of students receiving the lessons remotely for a period of not less than a month, within the framework of what she called a pedagogical initiative classified as a precautionary measure due to the outbreak of the Coronavirus. The Minister set the date of March 15, 2020 to commence launching the implementation of the initiative in practice, pointing out the importance of strict application of the contents of the memo. In addition, he stressed in a note addressed to the directors of university institutions on the need to take into account all the necessary technical measures to maintain remote communication between teachers and students. As a result, Algerian universities have set up MOODLE electronic systems to start on- line education to complete studies, and link between teachers and students online. Taking parallel measures that guarantee the minimum in terms of working career and studying is of great importance during this crisis. In addition, it must be emphasized that the importance of eLearning makes students, teachers, and researchers carry their tasks virtually because of the closure of all educational and university institutions.

Methods

Research in educational sciences is defined as research which is carried on general knowledge, education, teaching and learning. In this regard, the research methodology is identified because it guides the researcher(s) to use the appropriate tools and materials which are compatible with the research undertaken by the researcher(s).

In the present study, the descriptive analytical approach was adopted. A students' questionnaire was used as the main research tool on which the researcher relied to collect data for the sake of analyzing the role of eLearning in educational attainment among EFL students during Coronavirus pandemic. The focus is on analyzing the impacts of eLearning on students' educational achievements to provide effective solutions for eLearning model.

The questionnaire was administered in the University Mohammed Boudiaf of M'sila with EFL students to investigate EFL students' educational achievements through eLearning. The questionnaire consisted of three main sections: background information about EFL students, the use of eLearning at the University, and eLearning satisfaction and educational attainment. The questions ranged from closed, open- ended, and Likert Scale questions. The results of the questionnaire were analyzed statistically.

Results and Discussion

This section of the research presents the results of the study for the purpose of examining EFL students' educational attainment through eLearning. EFL students of Mohammed Boudiaf University of M'sila, Algeria, comprised the sample of the present study. In this regard, 153 (68%) were females, 72 (32%) were males. 126 of EFL students (56 %) enrolled in licence degree studies, and 99 (44%) master students. As for rating EFL students' ICT skills, their answers ranged from excellent (08.4%) to very good (29.3%) and good (62.3%). These answers provided by EFL students indicate that they are familiar with ICT usage, since they live in the technological revolution era.

When students were asked about whether they faced problems in their online learning or not, all of them confirmed that they encountered several problems while conducting eLearning. These problems are cited in the table below:

Table 3: Problems of eLearning.

	Frequency	%
Lack of Internet connectivity	67	29.8 %
Types of lectures delivered online	51	22.7 %
Lack of contact with teachers and colleagues	104	46.2 %
Lack of motivation to study online	3	1.3 %
Total	225	100 %

It is worth mentioning that the lack of Internet connectivity is amongst the most serious problems from which students, in general, suffer. Low Internet debit, especially in remote areas where students live makes it difficult for them to study online. In addition, the lack of contact between EFL students and teachers makes it hard for students to proceed with online learning. Another problem which hindered online learning is the lack of motivation to proceed with eLearning, since the decision was taken by the Ministry of Higher Education and Scientific Research during Coronavirus pandemic. In fact, this transition to eLearning has implications on teachers who were obliged to change their courses, and students; too, who needed to adapt to the new learning environment.

Moreover, the types of lectures which were delivered online had impacts on EFL students and their organization, self-motivation, and their total engagement in online learning. Essentially, the main problem for EFL students with online courses centered on lessons' clearance, engagement, and interactivity. All these made it difficult for EFL students to concentrate on the lessons. Also, students' commitment required time to interpret these online lectures.

Since students live; currently, in the age of technology, they are well aware of the technological tools which they use to make their learning process easier. In this context, electronic learning resources are popular with nowadays' students. The table below shows the major eLearning resources that EFL students use frequently.

Table 4: eLearning resources

	Frequency	%
CD- ROM- based	7	3.1 %
Internet- based	33	14.7 %
Video- Conferencing	21	9.3 %

Websites/ Blogs	47	20.9 %
Digital Games	3	1.3 %
Mobile Learning	77	34.2 %
Video/ Audio	31	13.8 %
Animation	6	2.7 %
Total	225	100

As for the use of eLearning technology to support teaching/ and learning at the University, EFL students' general attitude varied from very negative to very positive, as shown in the table below:

Table 5: eLearning technology to support teaching/ and learning at the university.

	Frequency	%
Very negative	14	6.2 %
Rather negative	33	14.7 %
Neither positive nor negative	25	11.1 %
Rather positive	128	56.9 %
Very positive	25	11.1 %
Total	225	100

According to the data in the above table, 128 of the students (59. 9%) have confirmed their answers to be rather positive, while 25 (11.1%) stated that they are very positive toward the use of eLearning technology. For them, eLearning model helps them increase students' involvement in learning activities. Additionally, they were encouraged to be more actively participate in online lectures.

Since eLearning technology was available to EFL students during COVID-19, EFL students have been motivated to engage in eLearning for the following purposes:

Table 6: Students' engagement in elearning

	Frequency	%
On- line learning	23	10.2 %
Distance learning	82	36.4 %

Blended learning	-	-
Additional support for on-campus students	-	-
Assignment submission	16	7.1 %
Collaborative learning	26	11.6 %
Communication with teachers/ and students	13	5.8 %
Distributing course material	-	-
Providing access to multimedia resources	17	7.6 %
Providing links to web-based resources	48	21.3 %
Total	225	100

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Basically, EFL students used eLearning for distance learning (36.4%) and online learning (10.2%). These were the primary factors of the Algerian Ministry of Higher Education and universities to adopt eLearning technology. Besides, EFL students used eLearning to provide links to web- based resources (21.3%), collaborative learning (11.6%), providing access to multimedia resources (7.6%), submitting assignments (7.1%), and for communication with teachers and students (5.8%). From the above data, eLearning model which was adopted helped EFL Students' involvement in their learning activities. Also, EFL students have used the eLearning Moodle platform provided by their university. In this regard, data were obtained about ranking Moodle eLearning platform of their university. Although (34.7%) stated it was good, (17.3%) agreed to be very good, and (9.3%) believed it was excellent, (38.7%) reported it was inappropriate. EFL students who believed so, this was because of certain factors; such as, low Internet debit, and the lack of communication with teachers and peers. Also, students' learning pace seemed slower, compared to traditional learning, and the absence of class interaction which led to the absence of motivation. In addition, the courses' contents provided through eLearning Moodle platform were not as interactive as physical classes. Finally, communication skills development was deficient in online learning.

In regard to the barriers which hinder eLearning development at students' department and their courses during COVID- 19, data were collected from EFL students' answers were reported below in the table below:

Table 7: Barriers of eLearning development at students' department during COVID- 19.

	Frequency	%
Institutional culture	17	7.6 %
Lack of appreciation of the effort	9	4 %
Lack of economic incentives for teachers	7	3.1 %
Lack of knowledge about technology	92	40.9 %
Lack of money	5	2.2 %
Lack of strategies or leadership	55	24.4 %
Lack of student engagement or motivation	18	8 %
Lack of technical support staff	13	5.8 %
Lack of time	6	2.7 %
Technical problems	1	0.4 %
Lack of formal institutional status of the initiatives	2	0.9 %
Total	225	100

According to students' answers, the major barriers to eLearning development at their department are (1) Lack of knowledge about technology (40.9%), (2) lack of strategies (24.4%), and (3) lack of students' engagement and motivation (8%), in addition to technical problems and lack of technical support staff and poor time management. Furthermore, without strong Internet connection and high bandwidth, online learning becomes nearly impossible. Keeping up with technical requirements can be stressful.

As for the benefits of eLearning, the table below illustrates EFL students' answers in relation to the aforementioned issue. Very interesting data were obtained from using eLearning resources to save time on finding eLearning resources (98.2%), developing students' problem- skills (97.3%), enhancing independent learning (94.7%), integrating eLearning in both teaching and learning (94.2%), providing opportunities for collaborative learning (93.8%), encouraging learners' active learning (92.4%), and enhancing EFL students' qualification abilities (92.9%).

Table 8: The benefits of eLearning.

Items	Strongly Agree		Agree		Neutral		Disagree		Strongly Disagree	
	F	%	F	%	F	%	F	%	F	%
Learners should have some basic IT knowledge before embarking on eLearning	1.05	46.7	1.09	48.4	1	0.4	7	3.1	3	1.3
eLearning provides powerful resources for gaining academic knowledge	170	75.5	55	24.3	-	-	-	-	-	-
eLearning helps you enhance your qualification abilities	209	92.9	7.1	6.2	-	-	-	-	-	-
eLearning provides an opportunity for collaborative learning	211	93.8	14	6.2	-	-	-	-	-	-
eLearning is helpful in developing student's problem- skills	219	97.3	6	2.7	-	-	-	-	-	-
eLearning enhances independent learning	213	94.7	12	5.3	-	-	-	-	-	-
Using eLearning resources saves a great deal of time of time on finding learning resources	221	98.2	4	1.8	-	-	-	-	-	-
eLearning encourages learners to take an active part in learning	208	92.4	17	7.6	-	-	-	-	-	-
eLearning provides useful ways of accessing students' feedback	195	86.7	17	7.6	13	5.8	-	-	-	-
eLearning enhances interpersonal relationships between students and lecturers	89	39.6	71	31.6	25	11.1	22	9.8	18	8

eLearning technologies should be integrated in both teaching and learning	212	94.2	12	5.8	-	-	-	-	-	-
Total	2052	82.9	334	13.5	26	1.1	42	1.7	21	0.8

In regard to transitioning to adopt eLearning model during COVID- 19 pandemic, EFL students had a positive attitude toward this issue. 196 (87.1%) had strongly agreed, and 29 (12.9%) agreed. Accordingly, this forced transition from face- to- face course delivery to online learning has been the only viable option for preventing a wholesale closure of many universities.

In relation to this eLearning transition, additional feedback of eLearning technologies is received to courses' delivery during COVID- 19. (43.1%) of the students confirmed that through eLearning they were able to understand their lectures. (30.7%) reported that they relied on independent learning. (21.3%) of the students stated that they succeeded to achieve collaborative learning, while (4.9%) asserted their success in lectures' follow- up. Therefore, according to most of the students (94.7%), implementing eLearning technologies in delivering online courses helped them to master their courses. In addition, 186 (82.7%) of the students reported that they were satisfied with eLearning technologies adopted by their university during COVID- 19. This satisfaction is illustrated in the data of the table below:

Table 9: Students' satisfaction with eLearning technologies.

Items	Strongly Agree		Agree		Neutral		Disagree		Strongly Disagree	
	F	%	F	%	F	%	F	%	F	%
I was able to learn from the courses which were delivered online	113	50.2	87	38.7	-	-	12	5.3	13	5.8
I would like to participate in another online course in the future	93	41.3	61	27.1	11	4.9	45	20	15	67
I was satisfied with the eLearning technology used in the courses	81	36	77	34.2	19	8.4	33	14.7	15	6.7
The diversity of topics in the online course prompted me to participate in the discussions	61	27.1	49	21.8	15	6.7	58	25.8	42	18.7

I had difficulty learning how to use the eLearning platform	71	31.6	88	39.1	19	8.4	23	10.2	24	10.7
I enjoyed participating in online course	133	59.1	67	29.8	3	1.3	17	7.6	5	2.2
Teachers were available and helpful in facilitating the use of the eLearning platform	36	16	78	34.7	9	4	41	18.2	61	27.1
I had difficulty in concentrating in online courses	59	26.2	91	40.4	13	5.8	31	13.8	31	13.8
Online lessons facilitated the learning of the topics of the courses	129	57.3	88	39.1	-	-	3	1.3	5	2.2
Total	776	38.3	686	33.9	89	4.4	263	13	211	10.4

From the data in the above table, EFL students had positive attitudes in regard to learning from online courses (50.2%), participating in online courses (41.3%), being satisfied with eLearning technology (36%), participating in online discussions (27.1%), enjoying participating in online courses (59.1%), and facilitating the learning of topics through online courses (57.3%). However, data were collected about difficulties on how to use eLearning platform (Strongly Agree 31.6% & Agree 39.1%), and teachers' availability to help facilitate the use of eLearning platform (Strongly Agree 16% & Agree 34.7%).

As for educational attainment, the table below illustrates the subjects which EFL students they had achieved enough knowledge.

Table 10: Students' educational attainment through eLearning during COVID- 19.

Percentage / Subjects	20%		40%		60%		80%		100%	
	F	%	F	%	F	%	F	%	F	%
US History	50	22.2	35	15.6	42	18.7	98	43.6	-	-
British History	125	55.6	86	38.2	10	4.4	4	1.8	-	-
American Literature	147	65.3	67	29.8	11	4.9	-	-	-	-
British Literature	163	72.4	59	26.2	3	1.3	-	-	-	-
African Literature	169	75.1	36	16	11	4.9	9	4	-	-
ICTs Skills	193	85.8	32	14.2	-	-	-	-	-	-
Research Methods	187	83.1	33	14.7	5	2.2	-	-	-	-
Teaching EFL Culture	177	78.7	43	19.1	5	2.2	-	-	-	-
Literary Theory	136	60.4	70	31.1	11	4.9	8	3.6	-	-
TEFL	186	82.7	29	12.9	7	3.1	3	1.3	-	-
Translation Studies	191	84.9	24	10.7	6	2.7	4	1.8	-	-
Discourse Analysis	189	84	33	14.7	3	1.3	-	-	-	-
Language Sciences	179	79.6	31	13.8	12	5.3	3	1.3	-	-
Applied Linguistics	181	80.4	33	14.7	11	4.9	-	-	-	-
Total	2273	72.2	611	19.4	137	4.3	129	4.1	-	-

According to the data in the aforementioned table, thirteen subjects were reported to achieve between 20% to 60% of educational attainment, except one subject, namely US History in which EFL students (43.6 %) had 80% of achievement. These convergent percentages of the thirteen subjects can be explained to the absence of interactivity in the eLearning Moodle platform between EFL teachers and students, and the non- use of other available additional resources by teachers and students. In contrast, in the US History subject, the teacher has exploited the available resources to deliver his courses online and interact with his students.

Students' perspective of the challenges of eLearning amid the COVID- 19 were reported in the table below:

Table 10: Challenges of eLearning during COVID- 19.

	Frequency	%

Problems with internet access	89	39.6 %
Negative comments about E-learning	17	7.6 %
Inadequate ICT and E-learning infrastructure	19	8.4 %
Lack of interaction between students and teaching staff	38	16.9 %
Lack of Time required to have online exams/assignments	23	10.2 %
Inaccessibility of course notes/materials	9	4 %
Lack of technology/software required for home access	11	4.9 %
Lack of technical support/advice	8	3.6 %
Inaccessibility of audio/video material, PDF, PowerPoint	6	2.7 %
Lack of training courses provided by the institution	1	0.4 %
The software of E-learning is too complicated to use of	4	1.8 %
Total	225	100

The most serious problem encountered is Internet access. EFL students cannot fully access to eLearning with low bandwidth of Internet access. Additionally, the lack of interaction between students and teaching staff and lack of time to proceed with online exams and assignments contribute to the problems of eLearning access. Moreover, inadequate eLearning infrastructure and lack of technical support and lack of training courses of eLearning are among the crucial issues that should be resolved in order to achieve successful access of eLearning.

Generally, we can conclude that EFL students maintained a positive attitude towards the role of eLearning in their educational attainment during COVID-19. The level of EFL students' satisfaction is measured (M= 3.90, SD= 1.89), and the ability to master courses' contents due to eLearning (M= 3.78, SD= 1.28). A moderate correlation has been found between EFL students' attitudes of eLearning and the mastery of courses' contents ($r=.312$, $p<.04$). Also, a positive correlation has been found between eLearning delivery of courses and EFL students' educational attainment during COVID- 19 ($r=.323$, $p<.01$).

Conclusion

The present paper analyzed the role of eLearning in achieving educational attainment among EFL students during the COVID- 19. According to the data obtained from the study, the results of the impacts of eLearning on EFL students' educational attainment are acceptable, but with some drawbacks. The researchers concluded that the two pillars of the eLearning system, namely teachers and students have not yet fully acquired the real management of eLearning. Also, they have not

exploited the available resources in eLearning to achieve successful interaction between both of them in the eLearning system. Therefore, both teachers' and students' training in the use of eLearning seems necessary to have knowledge and achieve success in the management of eLearning platform.

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