

# Female EFL Learners at the College of Basic Education: Attitudes and Experiences with Autonomous Learning

Farah Dashti<sup>1</sup>, Aysha Almutawa<sup>1</sup> & Mohammad Almutairi<sup>1</sup>

<sup>1</sup> College of Basic Education, Language Center, Public Authority for Applied Education and Training, Kuwait

Correspondence: Dr. Mohammad A. Almutairi, College of Basic Education, Language Center, Public Authority for Applied Education and Training, Kuwait. E-mail: motairi1968@gmail.com

Received: October 25, 2024

Accepted: November 24, 2024

Online Published: November 25, 2024

doi: 10.5539/elt.v17n12p56

URL: <https://doi.org/10.5539/elt.v17n12p56>

## Abstract

This study investigated the impact of autonomous learning on female students' motivation in EFL classrooms at the College of Basic Education (CBE), which falls under the Public Authority for Applied Education and Training (PAAET) in Kuwait. Specifically, the research examines whether allowing students to control their learning choices enhances their interest and participation in class. A total of 176 female students from the CBE participated in this study. A limitation of this study is that it was conducted exclusively on female students. Data was collected through pre-course and post-course questionnaires focusing on students' preferences, experiences, and topic selection in reading comprehension. The findings revealed that 90% of students preferred choosing their lessons, 98% enjoyed selecting their reading materials, and 92% felt more in control of their learning process. The results highlight the significance of providing relatable and engaging reading comprehension.

**Keywords:** autonomous learning, student motivation, EFL education, reading comprehension, relatability

## 1. Introduction

Kuwait is situated at the crossroads of several trade routes. With that in mind, although the first language of the majority of people in Kuwait is Arabic, with the country's growth, the necessity for English proficiency has grown, and communicating with non-Arabic speakers is essential. English holds official status in many companies and has become a medium of communication in schools and universities in Kuwait. "Many people believe English is a prerequisite for social and professional success as many jobs are linked with English proficiency" (Pallathadka, 8279). English is recognized as the lingua franca that enhances Kuwait's workforce capabilities, contributing to both job opportunities and overall economic growth. As a result, educational authorities in Kuwait incorporated English into the school curriculum as a compulsory subject in 1993 in a move to ensure that Kuwaitis can engage in communication with non-Arabic speakers.

### 1.1 *The Public Authority for Applied Education and Training (PAAET)*

The Public Authority of Applied Education and Training (PAAET) is a government organization that educates and trains students from different educational backgrounds. The PAAET "consists of five colleges, while the training sector comprises twelve institutes and centers. Education and training in all colleges and institutions are segregated, so there are women's colleges and institutes and men's colleges and institutes" (Al-Ali, 2010). Upon enrolment at any university in Kuwait, students are mandated by the PAAET to complete a number of English credits to fulfil the requirements for a bachelor's degree.

As part of the PAAET's admission process, prospective students must take an English Proficiency Test (EPT). The Language Centre (LC) at the PAAET is responsible for designing the EPT, which serves as the benchmark for determining the English proficiency level of a student so that they can be appropriately placed in the English foundation program. Although the (LC) offers various languages, English is the sole mandatory course for graduation across all five colleges under the PAAET. These colleges are the College of Basic Education (CBE), the College of Business Studies (CBS), the College of Medical Science (CMS), the College of Nursing (CN), and the College of Technological Studies (CTS). Each college requires students to take the English Foundation course or demonstrate proficiency by achieving a minimum score of 60% in the EPT. Students who fall below 60% must take the English foundation course. Initially, the PAAET set high standards, "but these expectations

began to diminish because the students recorded poor placement test results. In the following years, PAAET colleges continued to record low English proficiency" (Habbash et al. 2015: al-Nouri, 2019).

## 2. Literature Review

### 2.1 Origin of the Concept of Learner Autonomy

The terms learner autonomy and autonomous learning refer to the same concept, which is the idea of learners being able to take charge of their own learning. According to Egel (2009), the concept of learner autonomy originated from the Centre de Recherches et d'Applications en Langues (CRAPEL) at the University of Nancy, France. CRAPEL, which served as a centre for language studies research for developing educational issues, was established by Professor Yves Chalon. After Chalon's death in 1972, Professor Henri Holec took over the leadership of CRAPEL and continued the mission of developing and enhancing English language learning.

Holec created several projects and designed extensive collections of second-language materials for self-directed learning, an approach that later evolved into the idea of autonomous learning. Holec (1981) first defined autonomous learning in the early 1980s as "the ability to take responsibility for one's learning." Over time, this definition has been criticized, with various scholars questioning the specific terminology used. Benson (1987) argues that Holec's definition is not clear because autonomy can be viewed either as an individual trait or a social process (self-instruction). It can imply withdrawal from the educational system or redistribution of power within it (learner control)." Furthermore, Riley (1988) points out that the terms autonomy and independence raise questions about the cultural appropriateness of autonomy in language learning (Egel, 2009). Jiménez et al. (2022) assert that autonomy remains a complex field requiring further exploration and further research.

Holec (2009) outlined two sets of pedagogical principles for autonomous learning, which operate sequentially. The first set, implemented in this research, includes the following:

- (1) Learners receive instruction from the teacher in a face-to-face classroom or through distance learning.
- (2) The focus shifts to co-directed learning, where learners collaborate with the teacher regarding their educational experience.
- (3) The goal is to empower learners to manage their educational process, including making decisions about their learning content.

While autonomous learning is not widely promoted in language education and schools due to its deviation from traditional teaching methods, it holds significant potential benefits. It encourages self-awareness of one's learning skills and interests, and some argue that learners, including gifted students or those with ADD/ADHD, can benefit from following their own learning paths. This diversity in learning styles and needs underscores the potential of autonomous learning to cater to individual learners, challenging the notion of a one-size-fits-all pedagogy.

Current curricula often focus on fostering predetermined roles, disregard certain social aspects that may impact a learner's education, and are not adaptable to accommodate learners who fall under the umbrella of special education and have special needs. However, education always has the potential to develop curricula that promote challenge, change, and personal development (Schostak, 2000).

This paper examines the feasibility and appropriateness of applying the autonomous learning approach to English as a Foreign Language (EFL) learners in Kuwait. Given that Holec was the first to define the term, his definition will be used to avoid confusion.

### 2.2 The Effect of the COVID-19 Pandemic on Learning

As a result of restrictions imposed during the COVID-19 pandemic, the adoption of technology has risen to an all-time high in Kuwait. The onset of the pandemic in 2020 led to complete lockdown measures, requiring schools and universities to transition to teaching online. As a result, the PAAET provided workshops to familiarize students and educators with Microsoft Teams. Many students and teachers encountered challenges in computer-based learning and lacked the knowledge for using certain software (Dashti et al, 2021). Although students in Kuwait have received English instruction for 12 years by the time they enter tertiary institutions, their proficiency in the language falls short of expectations.

### 2.3 The Effect of Technology on Students' Reading Skills

One of the fundamental learning skills is reading. Traditionally, reading was confined to texts on paper, but the advent of technology has transformed this medium, and reading is now done on digital screens using various devices, such as mobile phones, tablets, VR glasses, and even electronic watches. This has coincided with a decrease in the amount of time people spend on reading texts. In addition, people's attention spans have decreased, and many prefer reading short, concise information rather than in-depth explanations (Zahra, 2024; Phan, 2023; Sriram, 2023; Nitesh, 2021).

Furthermore, technology has attracted widespread interest by offering information through a combination of images, text, and sound, resulting in quicker comprehension compared to traditional text-based methods. It thus caters to all three learning styles—visual, auditory, and kinaesthetic—where traditional reading appeals primarily to visual learners. Nowadays, people use smartphones or tablets to access information, and the traditional process of getting information from books is often regarded as inconvenient and is not practiced as much. However, the school system still encourages or requires students to read books, and teachers encounter challenges in motivating their students to read assigned material. The desire to read does exist, but it has shifted to a different medium. According to Hanan Assaf, "poor reading habits among EFL students have been identified as a significant concern, characterized by weak vocabulary, lack of creativity, and limited interest in reading due to rote learning and cramming strategies (2003).

In today's digital age, many individuals rely on various social media platforms to access information according to their needs and interests. Technology offers the convenience of allowing users to select material that interests them, and the social media platforms' algorithms then curate a feed that is tailored for each user. Moreover, with devices often being in close proximity to users, daily interactions with digital platforms have increased (Subramanian, 2018). Additionally, algorithms can implement rules and signals to identify users' likes and dislikes, and as a result, users will see only content aligned with their interests; "thus, algorithms increasingly impact how young people build up understandings of the world around them" (Swart, 2021). Thus, an interaction is generated in which the algorithm delivers feed based on what a user likes, and in return, the user is motivated to read or interact with the feed. This personalized content engages users and motivates them to engage actively with their feeds, ultimately leading to increased time spent on activities such as reading.

This interaction, then, can also be applied to the concept of autonomous learning, in that autonomous learning is "the ability to take charge of one's own learning" (Holec, 1981). Given the success of algorithms in motivating users on social media platforms, an opportunity arises to apply a similar approach to educational materials through learning autonomy. Learning autonomy allows students to discover what they want to learn. This fulfils their human needs and allows them to grow as individuals. "An engaged student has been found to outperform their unengaged peers in academic comprehension and level of interest in the taught material. Motivation has been directly tied with reading achievement in a variety of academic areas" (Guthrie et al., 2013). Ministry of Education.

With this concept in mind, we conducted a study exploring learning autonomy. Specifically, we determined whether giving students control over their learning process would enhance their learning motivation. We realized that in order to carry out this study, we would need to create a textbook that adhered to the guidelines of the Ministry of Education and the PAAET. This textbook would require students to select their reading lessons in advance, and would thus necessitate the preparation of several reading comprehension exercises before the semester began.

### 3. Research Questions

As teachers, we wanted to encourage greater student participation and motivate students to share their opinions more in the classroom. We aimed to assess whether granting students learning autonomy would boost their motivation and encourage them to express their views more freely. Additionally, we were interested in understanding the criteria students used to choose their reading comprehension topics. This curiosity led us to formulate the following research questions:

- (1) What are EFL learners' attitudes towards being in control of their learning?
- (2) What are EFL learners' experiences with regard to being in control of their learning?
- (3) What methods do EFL learners use when selecting topics for learning?

#### 4. Method

In order to gather the data to answer the research questions, we used the quantitative method, which included two semi-structured questionnaires. The first questionnaire was distributed at the beginning of the semester to 126 female students on the girls' campus at the College of Basic Education in Kuwait. The second questionnaire was distributed to the same participants at the end of the semester. Both questionnaires were designed to measure participants' attitudes and experiences with regard to being in control of their learning, as well as investigating their methods when selecting topics for learning.

Only female EFL learners participated in this study because campuses at the College of Basic Education are segregated, and since the researchers teach on the girls' campus, they had access to female students only. This study was conducted on students in three English 099 courses (foundation courses). The English foundation course is a pass-or-fail course. Students must earn 60 points throughout the semester to pass the course.

##### *4.1 The Process EFL Learners Apply When Choosing a Reading Comprehension*

On the first day of class, students were introduced to the research study and informed about their role in selecting reading comprehension lessons for the semester. They were briefed on the study's objectives and the planned adjustments. Additionally, they were notified that the grammar, writing and language function sections had already been chosen by the course coordinator to maintain consistency across classes. They were instructed to expect a questionnaire the following day during class to indicate their reading comprehension choices.

On the second day of the semester, a total of 176 female students across three separate classes received a questionnaire in class. During the COVID-19 pandemic, the PAAET adopted the use of Microsoft Teams for all classes. Therefore, the students received the questionnaire on Microsoft Teams via Google Forms. Students were given 30 minutes to complete the questionnaire.

In the questionnaire, students were asked to select six reading comprehension topics that they preferred out of the twelve provided. From this selection, two options were presented to students, and the most favoured choice, determined by votes, was incorporated into the textbook crafted by the researchers for the course. The researchers ensured that each chapter of the textbook provided two reading comprehension choices, both aligned with the vocabulary specified by the course coordinators.

After the students had submitted the questionnaire, the educators notified them that a PDF version of the course textbook would be provided. They were instructed to bring to class an electronic copy on their tablet or laptop, or a printed copy. To minimize potential distractions, they were advised against accessing the file on their mobile devices.

##### *4.2 The Process of Designing the Textbooks*

At the College of Basic Education, at the onset of the academic year, a course coordinator is assigned to each class. Usually, course coordinators include two or three educators from the Language Centre who work together to determine the reading comprehension materials, vocabulary lists, grammar lessons, language function exercises, and writing tasks for each subject. The researchers therefore had to comply with the directives set by course coordinators to guarantee that students fulfilled the requisite assignments and uphold uniformity throughout all class sections.

Utilizing AI assistance, we designed a selection of reading comprehension options for students to choose from. We had been teaching at PAAET colleges for more than ten years and were aware of specific topics that might engage the students. These topics, which students could select from, covered specific areas: real-life lessons, important Kuwaiti and Arab issues, and stories of Kuwaiti people.

##### *4.3 Study Design*

We adopted a within subject's design experiment where students were asked to share their learning preferences and the lessons they would like to study during the course. After the completion of the course, the students participated in a post-course survey sharing their experience regarding the intervention (autonomous learning with self-selection of lessons) and how they had selected lessons they preferred. Figure 1 shows the study design.

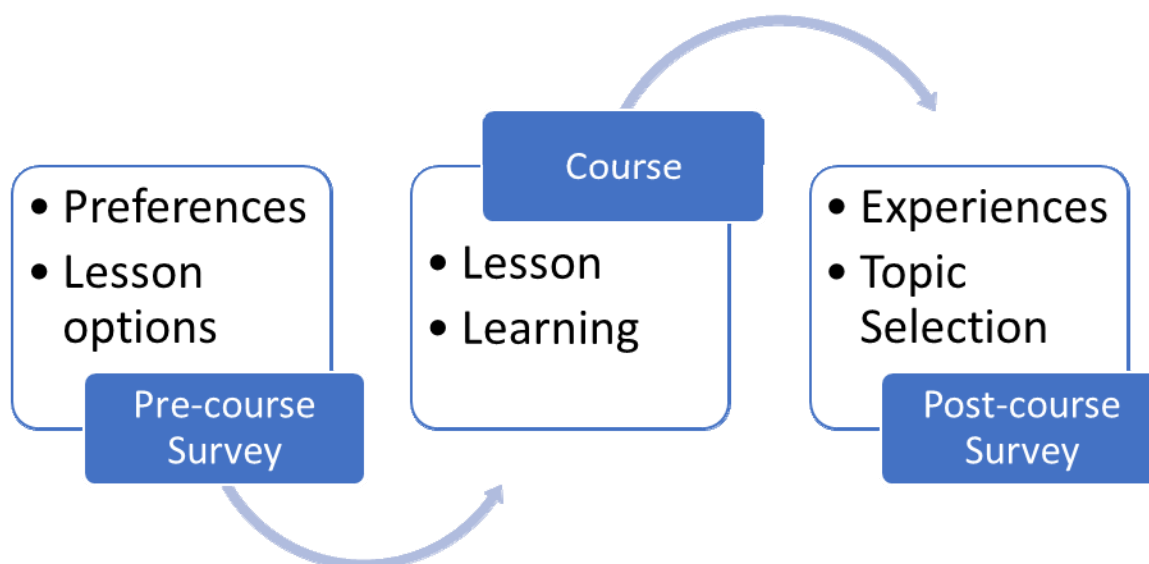


Figure 1. Study Design

#### 4.4 Data Collection

The data collection was done through the Microsoft Teams platform on Google Forms. The students were given two questionnaires: a pre-course survey and a post-course survey. The first questionnaire had two sections: The first section covered demographics, and the second section asked students to choose six out of twelve reading comprehension passages. The second questionnaire also had two sections and was given at the end of the course. The first section asked about their experience in choosing their reading material for the course and the reliability of the reading material.

#### 4.5 Data Analysis

Before the analysis, the data were checked for completeness. Out of 57 responses, five responses were removed due to missing data as these students did not complete the post-course survey. The remaining data were analysed through descriptive analysis to examine student preferences (RQ1), experiences (RQ2), and topic selection (RQ3).

### 5. Results

#### 5.1 Sample Characteristics

The respondents (N=52) in the study were female students. Table 1 shows aspects of their background, such as age, the governate under which they lived, and the number of years for which they had studied English.

Table 1. Sample characteristics

	Frequency	Percentage
Age	f	%
18-20	35	67%
21-24	14	14%
25-30	2	4%
31 and up	1	2%
Living Governate		
Aasma	8	15%
Ahmedi	18	35%
Farwaniya	11	21%
Hawalli	4	8%
Jahra	9	17%
Mubarak Al Kabeer	2	4%
How many years have you learned English?		
11 years and more	40	77%
5 years or less	6	12%
6 to 10 years	6	12%

67% of respondents were in the age range of 18–20, 14% were in the range of 21–24, 4% were in the range of 25–30, while the remainder (2%) were 31 years of age or older. 35% lived in Ahmedi, 21% each in Farwaniya, 17% in Jahra, 15% in Aasma, 8% in Hawali, and 4% in Mubarak Al Kabeer governates. Most respondents (77%) had been learning English for 11 years or more, 12% for 5 years or less, and 12% for 6–10 years.

### 5.2 Learners' Preferences

RQ1 focuses on understanding students' preferences with regard to autonomous learning. We collected respondents' views using multiple-choice questions, and the results are shown in Figure 2.

As shown in Figure 2(a), the overwhelming majority of respondents (90%) preferred to choose the lesson themselves, while Figure 2(b) shows that 87% of respondents felt that students should have the opportunity to choose a lesson. 92% of respondents indicated that that they would enjoy learning the English language more if they chose the lesson themselves (see Figure 2(c)). Most respondents (60%) did not think it best that the teacher choose the lesson rather than giving the student a choice (Figure 2(d)).

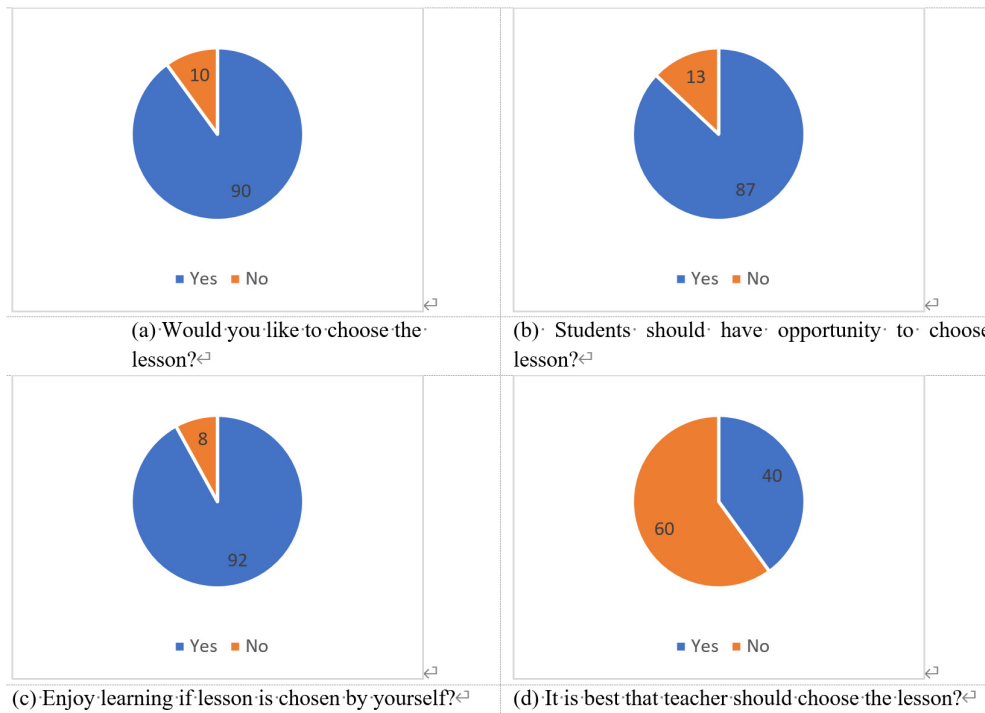


Figure 2. Students' preferences towards autonomous learning

5.3 Learners' Experiences

RQ2 focuses on respondents' experiences of being in charge of their own learning by selecting their lessons. Respondents' experiences were collected through multiple-choice questions after they had completed the course. The results are shown in Figure 3.

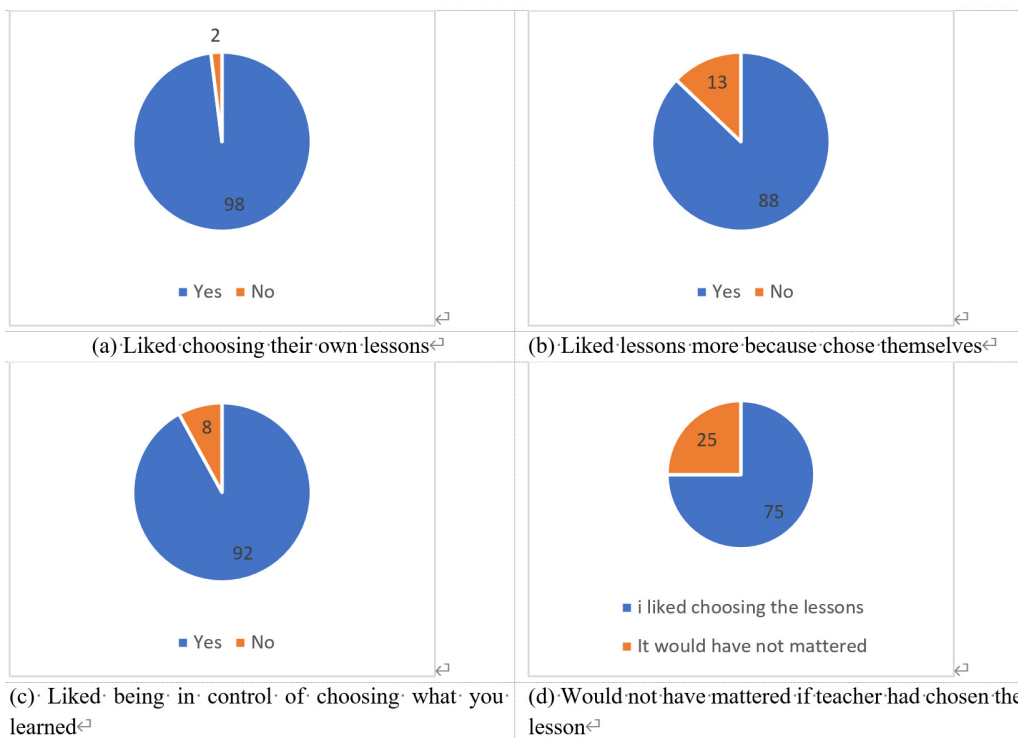


Figure 3. Students' preferences regarding autonomous learning

After the course, 98% of respondents indicated that they preferred choosing their own lessons (Figure 3(a)). Among the respondents, 88% liked lessons more if they chose them (Figure 3(b)), while 92% of the respondents liked being in control of their learning (Figure 3(c)). Before respondents began their English course, we asked whether they felt it was better that the teacher should select the course (Figure 2(d)). Once they had completed the course, 75% of the respondents liked choosing their lessons, while 25% stated that it would not matter if the teacher had chosen a lesson for them.

Apart from the above, we further inquired whether for future course design, students and teachers should work together in choosing the lessons. 96% of the respondents favoured the approach that topic selection should be done in consultation between students and teachers.

We further explored respondents' experiences by asking if they would like other students to have a similar type of autonomy in selecting their lessons. 92% of the respondents felt that this approach of self-selecting lessons should be adopted in other classes as well.

#### 5.4 Learners' Selections of Lessons

During the pre-course survey, respondents selected the lessons they would like to study during the course. These lessons were titled Karma, Time Management, The Importance of Self-Care, How to Find Your Purpose in Life, The Beauty of Forgiveness and How to Forgive, and Work Ethics. To investigate why participants selected certain topics, we asked if the lessons were relatable. As shown in Figure 4, 87% of respondents found the lessons relatable.

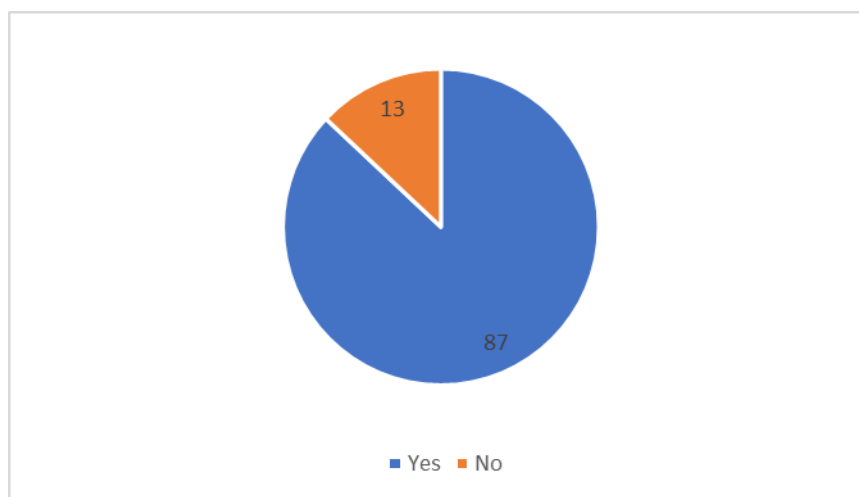


Figure 4. Were the lessons relatable?

We further explored why the lessons were found to be interesting. As shown in Figure 5 (a), 85% of respondents found lessons interesting because they were relatable.



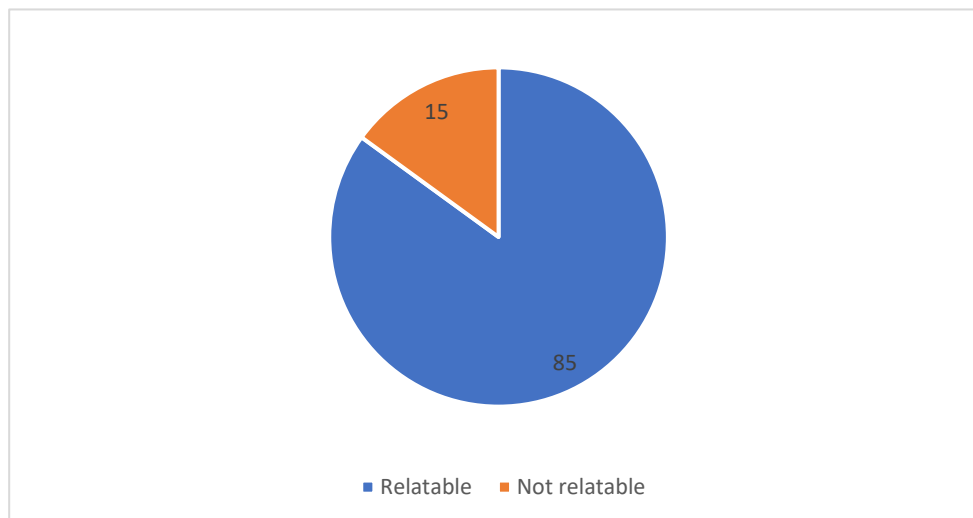


Figure 5. Why were lessons interesting

## 6. Discussion

The findings of this study supported the notion that autonomous learning significantly benefits EFL students at the CBE in Kuwait. A notable 90% of students participating in the study preferred selecting their own reading comprehension material for each chapter because 98% of them valued having control over their learning. As Anwar (2018) noted, "What English as a Foreign Language teachers do in the classroom is not enough to assist learners in developing a high command of English. To achieve a high level in learning a foreign language, learners are required to be independent learners who continue to learn outside the classroom on their own."

Developing effective learning habits is crucial for educational progress. Educators play a vital role in guiding students to cultivate these habits, enabling them to become self-reliant and proficient in their skills. Allowing students greater control over their learning processes could increase enjoyment and engagement in their education.

While the prevalence of social media and its algorithms may have shifted student attention away from traditional reading, we can learn much from these platforms. Social media's ability to captivate users and encourage engagement through personalized content offers valuable insights. Observing these mechanisms allows us to adopt similar strategies to enhance educational practices. Our study found that 92% of participating students thoroughly enjoyed having control over their learning. This suggests that fostering autonomy in learning can significantly enhance students' sense of ownership and responsibility, which is critical for sustained motivation and engagement. Furthermore, students' preference for relatable and engaging topics underscores the importance of incorporating culturally relevant content into educational materials. Textbooks and curricula should reflect students' interests to maximize learning effectiveness and engagement.

After the COVID-19 pandemic, the educational landscape in Kuwait was profoundly transformed. The adaptation of technology in the field of education in Kuwait has drastically increased. At first, this shift was difficult, but as time progressed, many saw its benefits. The economic advantages and widespread appeal of technology cannot be overlooked. It caters to all three learning styles: visual, auditory, and kinesthetic.

The younger generation is well-versed in social media and has moved away from traditional reading materials such as books. On the other hand, educational institutions continue to emphasize conventional teaching methods and encourage book reading. However, autonomous learning offers a promising way to merge traditional educational practices with modern technological advancements. Using advanced tools, educators can collaborate with students to design textbooks that resonate with their interests and learning preferences.

The study respondents' strong preference for involving teachers in lesson selection (96%) highlights the value of a collaborative approach. Such collaboration allows educators to gain insights into students' interests and fosters a more motivated and engaged classroom environment. Integrating student input into curriculum design bridges the gap between traditional and modern teaching methods and enhances educational experiences by aligning them more closely with students' needs and preferences.

## 7. Conclusions and Limitations

This study demonstrates that empowering students with more control over their learning can significantly enhance their engagement and participation. The primary goal of educational institutions is to equip learners with real-life skills. Autonomous learning enables students to actively develop these skills while taking ownership of their educational journey. Collaboration between students and teachers to create relatable reading materials can capture students' attention and facilitate simultaneous learning.

A limitation of this study is that it was conducted exclusively on female students due to segregation rules in Kuwait. It would be valuable to explore the outcomes of a similar study involving male students to determine whether gender influences the results. Additionally, a longitudinal approach could provide insights into whether students' opinions on autonomous learning evolve.

Overall, this study offers valuable insights into the adaptability of autonomous learning in 2024, particularly with the integration of AI tools. It underscores that students are more motivated to learn when provided with relatable and engaging content that aligns with the educational curriculum.

## References

- Abdelrazeq, A. (2018). Autonomous Learning Levels of students majoring in EFL and the role of their teachers in developing autonomous learning. *Journal of Educational and Psychological Studies [JEPS]*, 12(4), 724. <https://doi.org/10.24200/jeps.vol12iss4pp724-738>
- Al-Ali, K. (2010). *Automating PAAET: The Kuwaiti distance learning project—a personal reflection*. Proceedings of the fifth conference of learning international networks consortium. 2010.
- Alotaibi, A. M, et al. (2014). AN INVESTIGATION OF THE FACTORS WHICH CONTRIBUTE TO LOW ENGLISH ACHIEVEMENT IN SECONDARY SCHOOLS, AS PERCEIVED BY KUWAITI AND NON-KUWAITI ENGLISH TEACHERS. *European Scientific Journal*, 10(25), 440-459.
- Assaf, H. (2023). *A Comprehensive Exploration of Challenges That English as Foreign Language Learners In Kuwait Encounter and Suggestions for Enhancement*. Asia e University, Asia E University, 2023, pp. 1-69.
- Benson P., & Voller P. (eds.). (2013). *Autonomy & independence in language learning*. Routledge, 2013. <https://doi.org/10.4324/9781315842172>
- Dashti, F. et al. (2021). Why are Arabic adult learners in Kuwait afraid of making mistakes in their English classroom? *European Scientific Journal ESJ*, 17(12). <https://doi.org/10.19044/esj.2021.v17n12p15>
- Egel, I. P. (2009). Learner autonomy in the language classroom: From teacher dependency to Learner Independency. *Procedia - Social and Behavioral Sciences*, 1(1), 2023-2026. <https://doi.org/10.1016/j.sbspro.2009.01.355>
- Holec, H. (1981). *Autonomy and foreign language learning*. Oxford: Pergamon.
- Holec, H. et al. (2009). *Chapter 1: Autonomy in Language Learning: A Single Pedagogical Paradigm or Two? Mapping the Terrain of Learner Autonomy: Learning Environments, Learning, Communities, and Identities*, Tampare University Press and Authors, Tampare, 2009, pp. 21-47.
- Jiménez R. et al. (2022). *Autonomy in Language Education: Theory, Research and Practice*. Routledge, Taylor et Francis Group, 2022.
- Kuwait: EF English Proficiency Index: EF Global Site (English). (2024). EF Education First, [www.ef.com/wwen/epi/regions/middle-east/kuwait/](http://www.ef.com/wwen/epi/regions/middle-east/kuwait/). Accessed 27 May 2024.
- Littlewood, W. (1999). Defining and developing autonomy in East Asian contexts. *Applied Linguistics*, 20(1), 71-94. <https://doi.org/10.1093/applin/20.1.71>
- Murad, D. et al. (2018). *Report: The quality of education in Kuwait*. (2018): 1538040718718.
- Nitesh, T. (2021). Effects of Smartphone on Attention Span of Youth. *Vivekananda Journal of Research*, 11(2), 42-52.
- Pallathadka, H. et al. (2020). PROBLEMS ENCOUNTERED BY ARAB POPULATION IN ACQUISITION OF ENGLISH AS SECOND LANGUAGE. *European Journal of Molecular & Clinical Medicine*, 7(11), 8278-8287.
- Phan, F. (2023). *How has social media affected future economists? How has social media affected Swedish high school economic students' perception of their attention spans? (Dissertation)*. Retrieved from <https://urn.kb.se/resolve?urn=urn:nbn:se:hh:diva-50545>

- Riley, P. (1988). The Ethnography of Autonomy. In A. Brookes and P. Grundy (eds.) *Individualization and Autonomy in Language Learning*. ELT Documents 131. London, pp.12-34.
- Schostak, J. (2000). Developing under developing circumstances. The personal and social development of students and the process of schooling. In H. Altrichter, & J. Elliot (Eds.), *Images of educational change* (pp. 37–52). Buckingham, UK: Oxford University Press.
- Semenak, S. (1995, December 28). Feeling right at home: Government residence eschews traditional rules. *Montreal Gazette*, A4.
- Sriram, K. (2023). To what extent does social media usage impact the ability to delay gratification and attention span of teenagers in Mumbai? *British Journal of Multidisciplinary and Advanced Studies*, 4(6), 71-86. <https://doi.org/10.37745/bjmas.2022.0363>
- Subramanian, K. (2018). Myth and Mystery of Shrinking Attention Span. *International Journal of Trend in Research and Development*, 5(3).
- Sumbal Z. et al. (2024). EFFECT OF INCREASED SOCIAL MEDIA NETWORKING DUE TO COVID-19 OUTBREAK ON THE SPAN OF ATTENTION IN ADOLESCENTS IN PAKISTAN. *Pakistan Journal of Educational Research*, 7(1), 72-83. Retrieved from <https://pjer.org/index.php/pjer/article/view/1030>.
- Swart, J. (2021). Experiencing algorithms: How young people understand, feel about, and engage with algorithmic news selection on social media. *Social Media + Society*, 7(2), 205630512110088. <https://doi.org/10.1177/20563051211008828>

### Copyrights

Copyright for this article is retained by the author(s), with first publication rights granted to the journal.

This is an open-access article distributed under the terms and conditions of the Creative Commons Attribution license (<http://creativecommons.org/licenses/by/4.0/>).