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Faculty of Letters and Languages
Department of Language and English Literature

MASTER THESIS

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**An Investigation into English as a Foreign Language
Teachers and Learners' Attitudes towards the Effect of
"ChatGPT" on Writing Skill:
The Case of Master Students at Biskra University**

Dissertation Submitted to the Department of Language and English Literature in Partial
Fulfillment of the Requirements for the **Master's Degree in Sciences of the Language**

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Declaration

I, Yousra **Mekdad**, hereby declare that the content of this dissertation is the result of my independent work. All information taken from other sources is properly cited and referenced. This work has not been copied, plagiarized, or submitted elsewhere for any academic award or qualification. I take full responsibility for the authenticity and integrity of the work presented herein.

This study was conducted and completed at Mohamed Kheider University of Biskra, Algeria.

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Dedication

*To my dearest **mother**; your endless love, prayers, and sacrifices have been the light guiding my path. Thank you for your strength and tenderness that continue to inspire me.*

*To my **father**; your belief in me, even in silence, gave me the courage to keep moving forward. Thank you for being my pillar of strength and resilience.*

*To my beloved siblings; **Jihane, Sara, Hichem, and Abderazak**. Thank you for being my lifelong companions. Your support, encouragement, and love have helped me stand tall through every step of this journey.*

*To my precious nieces and nephews; **Rafif, Tadj Eddine, Meriem, and Lina**. your smiles and energy brought me joy during my most stressful days. Thank you for reminding me of the simple, beautiful things in life.*

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*To the **reader** of this work*

*With all my heart, **Yousra Mekdad***

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Abstract

In the wake of rapid technological advancements, artificial Intelligence (AI) tools such as ChatGPT have emerged as influential resources in educational settings, particularly in supporting learners' writing development. This study investigates teachers and learners' attitudes towards the effect of ChatGPT on writing skills. The research attempts to explore both teachers and students' perception and views regarding the effectiveness and limitations associated with of AI-assisted writing, aiming to understand the extent to which ChatGPT can serve as a beneficial tool in overcoming writing challenges such as grammar, coherence, vocabulary use, and text structure. A qualitative research approach was employed, utilizing a case study design. Data were collected through semi-structured questionnaires administered to 22 Master 1 EFL students and semi-structured interviews conducted with 5 EFL teachers. The findings revealed that students generally perceive ChatGPT as a supportive and accessible tool for enhancing their writing. However, concerns persist about potential overreliance on AI and its implications for critical thinking and originality. Teachers acknowledged the benefits of AI in guiding students through the writing process but emphasized the need for balanced and ethical integration. This research contributes valuable insights into how AI can be effectively implemented in academic contexts to enhance writing proficiency, promote learner autonomy, and address common writing difficulties, while also considering the pedagogical implications and challenges of AI use in higher education. At the same time, it underlines the importance of guiding students to use these tools responsibly and thoughtfully as part of a balanced educational approach.

Keywords: ChatGPT, Artificial Intelligence, EFL writing, academic writing, learner perceptions, teacher attitudes.

List of Abbreviations and Acronyms

AI: Artificial Intelligence

ANN: Artificial Neural Network

APA: American Psychological Association

EFL: English as a Foreign Language

ELT: English Language Teaching

ESL: English as a Second Language

L2: Second Language

NLP: Natural Language Processing

ChatGPT: Chat Generative Pre-trained Transformer

TESOL: Teaching English to Speakers of Other Languages

L1: First Language (Native Language)

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General Introduction

1. Background of the Study

The rapid technological advancements in recent years have led to the emergence of AI models such as ChatGPT, which serve as effective tools for learners aiming to enhance their writing abilities and address various challenges. By offering immediate feedback and suggestions, these models empower students to refine their writing, improve clarity, and create more structured and cohesive texts.

However, the integration of AI in academic writing has ignited considerable debate among educators and researchers. Some educators perceive AI tools as valuable assets that enhance students' writing proficiency by providing personalized guidance and feedback. Research published in smart learning environments indicates that AI can alleviate writer's block by generating preliminary drafts, thereby making the writing process less daunting

Conversely, not all educators view AI as entirely advantageous. Concerns have been raised regarding the potential for students to become overly dependent on AI tools, which may impede their critical thinking skills and the development of original ideas. Educators emphasize the importance of ensuring that AI serves as a supplement rather than a substitute. This study will investigate the effects of using Artificial Intelligence, specifically ChatGPT on the writing skill.

2. Statement of the Problem

Writing in English poses a considerable challenge for learners of English as a Foreign Language (EFL) due to the language's complexity and the range of skills required for effective written communication. As English adapts to technological advancements, artificial intelligence (AI) tools, particularly ChatGPT, have become increasingly influential

in language learning. These AI-based applications provide learners with support in generating ideas, improving language accuracy, and receiving immediate feedback, thereby potentially enhancing their overall writing skills.

Despite the growing use of such technologies, there is limited research investigating their actual impact on EFL learners' writing development, especially from the perspectives of both students and teachers. While ChatGPT is gaining popularity among learners, its pedagogical value and limitations remain insufficiently explored within EFL contexts. Additionally, teachers' and students' attitudes toward integrating AI tools in writing instruction have not been thoroughly examined.

This study aims to fill this gap by investigating the attitudes of Master One EFL students and their teachers at Biskra University regarding the effect of using ChatGPT on writing skill. It seeks to explore teachers and learners' attitudes as well as the perceived benefits, challenges, and overall influence of this AI tool on learners' writing development. The findings are expected to contribute valuable insights for the effective integration of AI in EFL writing education.

3. Research Questions

The present study attempts to answer the following questions:

RQ1: What are the attitudes of Master 1 EFL students towards the effect of using ChatGPT in writing?

RQ2: What attitudes do teachers hold about the use of ChatGPT in students' writing development?

RQ3: What challenges and opportunities do students and teachers identify concerning the use of ChatGPT for writing tasks?

4. Aim of the Study

The primary aim of this study is to comprehensively explore and understand the attitudes and perceptions of Master 1 EFL students and their teachers toward the use of ChatGPT, an artificial intelligence-based application, in relation to students' writing skills. Specifically, the study seeks to investigate how both teachers and learners perceive the effect of ChatGPT on writing. Put differently, this research attempts to provide an in-depth contextualized understanding of the ways in which ChatGPT is integrated into academic writing instruction at Biskra University. The study also intends to identify challenges and opportunities encountered by students contributing valuable insights into the broader implications of AI tools on language learning and writing development in EFL settings.

5. The Research Methodology for this Study

The study aims to investigate a particular educational phenomenon, specifically the attitudes of teachers and learners regarding the use of ChatGPT in academic writing skill. Considering the nature of the research questions and aims, it is clear that the study is fundamentally descriptive. Thus, a qualitative research methodology is employed, grounded in an interpretivist paradigm that prioritizes the comprehension of participants' subjectivities, experiences and contextual realities. Shava and Nkengebza (2019) characterized qualitative research as a method of inquiry that seeks to gain a comprehensive understanding of human behavior along with the underlying reasons that influence it. To thoroughly explore teachers and learners' perceptions regarding the effect of using of ChatGPT in writing skill, this study employs a case study design. This methodology allows for an in depth investigation of participants attitudes and experiences within a specific educational context. This approach allows for a detailed and context based analysis, helping to better understand the issue through interpretation of participants' views.

6. Data gathering Tools

To gather the necessary data, the researcher employed two primary instruments: a semi-structured questionnaire and a semi structured interview. The questionnaire was distributed to Master One EFL students aiming to explore their experiences, their perceptions of using AI-based applications, namely “ChatGPT” and its influence on academic writing as well as, the potential difficulties students encounter when using ChatGPT. Moreover, semi-structured interviews were held with EFL teachers who teach Master’s students. These interviews gave detailed information about the teachers’ opinions toward the use of ChatGPT and its influence on writing skill. Because the interviews were semi-structured, the researcher was able to ask more specific questions and gather deeper information that added to the results of the questionnaire.

7. Population and Sampling Technique

The study will be conducted with 22 Master one students of English at Biskra University. The sample will consist of Master one students of English as a foreign language (EFL), selected through purposive, non-random sampling. These students will be chosen based on the expectation that they will use ChatGPT in both educational and non-educational contexts and will be required to complete substantial academic writing as part of their coursework. Additionally, five (05) EFL teachers at Biskra University will be interviewed to gain further insights into both teachers’ and learners’ perceptions of using ChatGPT as a tool to enhance students writing skill.

8. Significance of the Study

This research emphasises the critical importance of integrating AI tools such as ChatGPT to support EFL students in overcoming common writing challenges—including grammatical inaccuracies, lapses in coherence, suboptimal lexical choices,

and deficiencies in structural organization—and to foster greater learner autonomy and confidence. In addition, it examines the potential obstacles and limitations that learners may encounter when employing these technologies, such as overreliance on automated suggestions, issues of digital literacy, and concerns regarding originality. Situated within the context of Master One EFL instruction at Biskra University, the investigation aims to enhance students' capacity to produce clear, cohesive, and well-organized written work by leveraging the affordances of AI-based applications while remaining attentive to pedagogical and ethical considerations.

9. Choice of Writing Style

The present study adopts the American Psychological Association (APA) 7th edition style, which is widely recognized as suitable for research in social sciences, the academic domain of this study. However, an exception was made regarding the use of text justification. This particular formatting choice was made in agreement between the researcher and the academic supervisor to maintain clarity and uniformity throughout the document.

10. Structure of the Dissertation

The structure of this dissertation consists of two main chapters. The first chapter focuses on the theoretical background, while the second chapter addresses the practical fieldwork. The first chapter is further divided into two sections. The first section provides an introduction to Academic Writing, outlining its characteristics and features, while the second section discusses ChatGPT and the advancements in technology related to writing enhancement. The second chapter primarily deals with the practical aspect of our research. It includes data analysis and interpretation.

Chapter One: Artificial Intelligence (ChatGPT) in EFL Academic Writing

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Section One: Academic Writing in EFL Context

Introduction

This chapter aims to provide a theoretical foundation for understanding academic writing within the context of English as a Foreign Language (EFL). It begins by offering a variety of scholarly definitions that reflect the complex nature of academic writing. Since academic writing requires a range of interrelated skills, the chapter further investigates essential elements such as clarity, coherence, cohesion, and accuracy, as well as the stages involved in the writing process. Additionally, it analyzes the various types and formats of academic writing commonly found in EFL settings and discusses the teaching strategies utilized to enhance these skills. In summary, this chapter aims to provide a thorough understanding of effective academic writing and teaching practices that enhance it in foreign language context.

1.1 Definition of Academic Writing

Writing is the act of transforming thoughts, emotions, and concepts into written expression, with a strong emphasis on utilizing language in the most suitable manner. According to Hyland (2003), writing extends beyond merely structuring words into sentences, connecting sentences into a coherent text. It involves a command of grammar and vocabulary, the ability to apply this knowledge appropriately across various contexts and purposes, and familiarity with the subject matter. Furthermore, Hyland emphasizes that writing is a cognitive and learning process through which writers express and communicate their ideas to readers.

According to Widdowson (2001), writing is a way of visually representing language through its spelling and grammar. To write effectively, learners should be familiar with the writing system of the language to choose the right words and vocabulary, apply correct

grammar and ensure coherent and clarity .In this regard, Olshtain (1991, p. 235) stated, “writing as a communicative activity needs to be encouraged and nurtured during the language learner’s course of study”. Teachers play a vital role in shaping students’ writing skill by designing various activities, giving helpful feedback and providing plenty of chances to practice during class. This helps learners gain confidence and stay actively engaged in their writing skills. As Walsh (2000) said:

Writing is important because it is used extensively in higher education and in the workplace. If students do not know how to express themselves in writing, they will not be able to communicate well with professors, employers, peers, or just about anyone else. Much of professional communication is done in writing: proposals, memos , reports , applications, preliminary interviews, e -mails and more are part of the daily life of a college student or successful graduate. (p.10)

1.2 The Writing Process

According to Oshima and Hogue (1997), there are four stages in the process of writing. They are as follows: prewriting, planning, writing and revising drafts, and writing the final copy.

Figure 1.1

Writing Process

Note. From The writing process: Unlock your inner author with the 5 step writing process. English / Language Arts, Literacy. By D. Kemp. (2023)

1.2.1 Pre-Writing Stage

Pre-writing (Planning) is the first stage of the writing process. It is a preparatory stage, which can help students to gather, prepare and structure their thoughts before the actual writing activity commences. Rohman (1965) described pre-writing as "the stage of discovery in the writing process when a person assimilates his 'subject' to himself" (p. 106).

Prewriting serves as the foundational stage of the writing process, where students generate ideas to the topic and perspective suited for a specific audience. This stage is vital for organizing thoughts, shaping ideas, and planning the writing strategy before moving on to the drafting stage. It helps clarify the topic, establish the writer's viewpoint, and consider the intended audience. Common prewriting methods include brainstorming, freewriting, clustering (or mind mapping) and outlining.

1.2.2 Drafting stage

Drafting is the second step of the writing process, which writers transform their ideas into full sentences and paragraphs without focusing on grammar or spelling. The objective

at this point is simply to transfer thoughts without being concerned about spelling, punctuation, or grammar. Writers typically move forward step by step, capturing ideas as they come. When encountering a challenging section, it is advisable to leave it for later by inserting a placeholder or brief note. This approach allows writers to maintain the momentum of their thinking and focus on developing their ideas and arguments without disruption (Langan, 2009).

1.2.3 Revising Stage

Revising stage is when students review and refine what they wrote in the draft stage. Sommers (1982) emphasized that revision is at the core of the writing process, allowing writers to improve clarity, coherence and effectiveness. Hedge (1988, as cited in Tribble, 1996, p.115) mentioned: “good writers tend to concentrate on getting the content right first”.

1.2.4 Editing Stage

Editing is the final stage of the writing process, where writers concentrate on correcting mistakes in grammar, spelling, and punctuation. Tompkins defines editing as “putting the piece of writing into its final form” (p. 88).

1.2.5 Publishing Stage

Publishing stage represents the concluding stage, in which the edited and revised work is prepared for distribution, sharing and publication to the audience

1.3 Aspects of Writing

According to Harmer (2003), writing consists of three essential elements to evaluate written composition: vocabulary, grammar, content and mechanics. Alderson’s research (2005) demonstrated a significant positive connection between vocabulary knowledge and general language proficiency, emphasizing that writing is the area most influenced by

vocabulary. In a similar vein, Gillespie et al. (2013) and Johnson et al. (2016) found a direct link between student's vocabulary knowledge and the quality of their written expression.

Writing proficiency is largely determined by one's understanding of grammatical rules, as the effective transmission of ideas goes beyond isolated vocabulary; it necessitates the formation of sentences that are grammatically sound and illustrates clauses. Research indicates that students' syntactic awareness (Beers & Nagy, 2009), mastery of grammatical features including verb tenses (Javidnia & Mahmoodi, 2015), skills in error correction and grammatical assessment (Roehr, 2017), outcomes on grammar judgement tests, and the ability to clarify ungrammatical structures are all positively linked to the quality of writing. Furthermore, Talosa and Maguddayao (2018) revealed a significant relationship between learner's syntactic errors and their writing proficiency

The third crucial element of writing proficiency is content, which includes subjects or themes that students must engage in their writing process (Hyland, 2003). Content serves as a basis of building coherent paragraphs during the planning stage.

The last two components, genre and context, are interconnected. As mentioned by Devitt (2014), genre influence situational context by enabling authors to define their voice, audience, and communicative objectives. Additionally, Munoz -Luna and Taillefer (2014) provided additional evidence for this relationship, indicating that students with a more profound comprehension of metalinguistic and genre – related elements were capable of producing higher quality of writing. These high achieving of students demonstrated superior mastery of grammatical and textual structures, also were more effective in organizing their ideas coherently than their lower achieving peers.

1.4 Types of Academic Writing

The four main types of academic writing are descriptive, analytical, persuasive and critical. Each of these types of writing has specific language features and purposes (University of Sydney, n. d).

1.4.1 Descriptive Writing

Descriptive writing is regarded as the foundational form of academic writing. Its main objective is to convey factual information or summarize existing knowledge, such as identify, report, and summarize.

1.4.2 Analytical Writing

University level writing often combines both descriptive and analytical styles .The analytical part usually involves sorting facts into different categories or showing how they relate to one another. In other words, using established frameworks from a specific field or even coming up with new categories that fit the text at hand .For example, when looking at different theories, you might organize your analysis around themes like social context, language acquisition, and real world application. You will see directive prompts that contain analyze, compare, contrast, relate and examine. These terms help guide writers in structuring their analysis in a clear and effective way.

1.4.3 Persuasive Writing

It is essential to go beyond mere analytical writing to engage in perceived writing. Persuasive writing shares common element analytical with writing such as presenting and structuring information, but it also incorporates the writer's viewpoints. The majority of essays are inherently persuasive, and research papers typically contain persuasive elements, particularly within the discussion and conclusion sections.

1.4.4 Critical Writing

In academic discourse the term critical is commonly used in various contexts such as critical thinking, critical writing and critical reviews. Critical writing is defined as the process of engaging with various perspectives in a balanced and analytical manner. It requires writers to go beyond mere description or summarization by evaluating evidence, comparing arguments, and forming well-reasoned conclusions (Cottrell, 2017). Similarly, Godfrey (2013) emphasized that critical writing entails developing a clear line of reasoning, where the writer organizes different ideas by using academic sources to justify their claims.

1.5 Writing Approaches

Until the late twentieth century, writing instruction was not a central focus in the field of language education research (Krashen, 1984). However, with the rise of English as a global lingua franca in the 1990s, the development of writing skills emerged as a significant area of inquiry. Proficiency in writing a second language is now recognized as a vital competence in numerous academic and professional contexts (Long & Richards, 2003). Various methodologies have been established to teach writing effectively, with their effectiveness influenced by factors such as learner attributes and the nature of the text being created (Kumar, 2020).

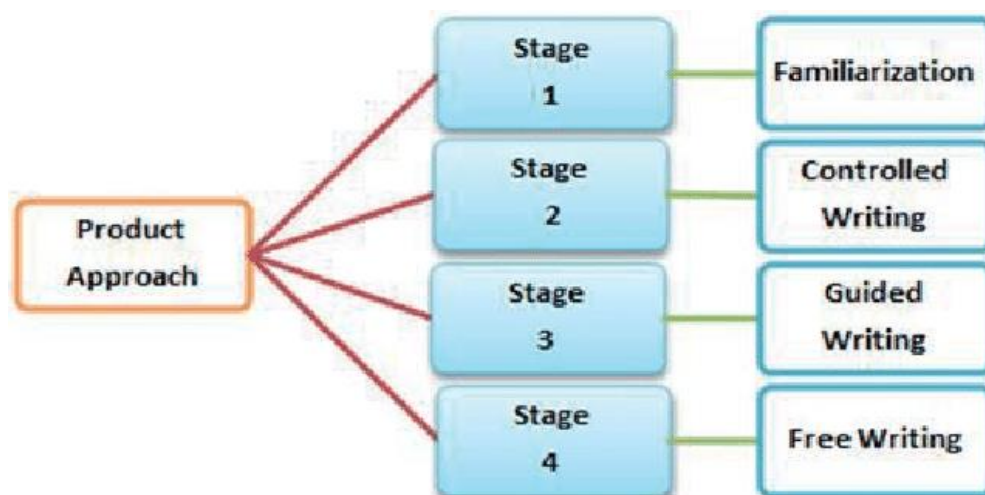
Among the most prominent methodologies for teaching writing are the product, process and genre approaches. Scholars contend that while each approach offers distinct benefits, they are not mutually exclusive and can enhance one another (Grami, 2010; Hyland, 2002; Badger & White, 2000).

The selection of a particular approach is contingent upon the instructional objectives whether the focus is on the writing process itself or the quality of the final written output. Some educators emphasize the importance of exposing students to various text forms, including essays and narratives, to foster creativity and build confidence (Tribble, 1996).

1.5.1 Product-Oriented Approach

Figure 1.2

Product Model Approach



Note. From Abdul Rahim Hj Salam (Adapted from Steele, 2004:1)

The product centric methodology represents a conventional strategy that prioritizes the replication of exemplary texts. A product approach is a “traditional approach in which students are encouraged to mimic a model text, usually is presented and analyzed at an early stage”(Gabrielatos, 2002). According to Brown (2002), instruction focused on product based writing guarantees that students generate texts that are both well-organized and grammatically sound. Pincas (1982) emphasized that this methodology is grounded in linguistic proficiency, with a particular focus on vocabulary, grammar, and textual cohesion.

The product centric approach is structured around a four phase process familiarization, controlled writing, guided writing and free writing. In the initial phase, students examine model texts to discern their structural elements and significant linguistic characteristics. The subsequent phases involve controlled and guided writing activities that facilitate the practice of crucial language structure. The concluding phase, free writing,

enables students to independently utilize their acquired knowledge , showcasing their capability to create cohesive and coherent texts (Pincas, 1982) . This methodology continues to be prevalent in EFL classrooms, as it offers a systematic framework for students to improve their writing skills.

1.5.2 Process-Oriented Approach

In contrast to the product-oriented approach, the process oriented approach emphasizes the various stages of writing rather than solely the end result. This methodology promotes a recursive cycle of brainstorming, drafting, revising and editing among learners (Harmer, 1998). Tribble (1996) pointed out that writing is inherently nonlinear, writers often revisit and navigate through different stages to enhance their work.

The process -oriented approach values the development and organization of ideas over mere grammatical precision. Writers are encouraged to generate ideas, organize their thoughts, and revise their drafts multiple times prior to final submission (Tribble, 1997). This approach enables students to continuously improve their writing, cultivating a more profound understanding of writing as a dynamic and evolving process

1.5.3 Genre Writing Approach

The genre approach highlights the significance of identifying various text types and their unique conventions. According to Harmer (1998), this method involves students analyzing exemplary texts prior to creating their own. For instance, when tasked with writing a business letter, students first review model letters to grasp their structure and style before drafting their own correspondence.

As such, Badger and White (2000) observed that the genre approach shares commonalities with the process approach, as both frameworks take into account linguistic and contextual elements in writing. Nevertheless, the genre approach also integrates social

and cultural aspects, acknowledging that different genres fulfil specific communicative functions (Zhao & Brown, 2014). Engaging in genre-specific writing necessitates that students consider the expectations of their audience, the subject matter, and the relevant stylistic conventions.

1.5.4 Creative Writing Methodology

The creative writing methodology promotes an environment where learners can articulate their thoughts and feelings without restraint. It encompasses various activities, including storytelling, poetry, and playwriting (Harmer, 2007). In contrast to expository writing, which adheres to rigid guidelines and standards, creative writing empowers students to explore language and form freely (Maley, 2012).

In addition to that, Hyland (2002) characterized creative writing as any narrative or non-narrative form that does not conform to conventional academic, technical, or journalistic frameworks. This category includes short stories, novels, scripts and personal essays. Maley (2009) broadens this definition to encompass blogs, travel narratives, journal entries, and letters, highlighting that creative writing nurtures self-expression and linguistic exploration. The role of creative writing in language acquisition is particularly significant. Maley (2012) contrasts it with expository writing, noting that while the latter follows established rules and logical coherence, creative writing encourages linguistic innovation and boundary-pushing. This approach enables students to enhance their language abilities, gain confidence, and foster a passion for writing.

1.5.4.1 Advantages of Creative Writing in Language Acquisition

Creative writing presents numerous benefits for individuals learning a new language. According to Maley (2009), it improves grammar, expands vocabulary, and enhances overall

language skills. Moreover, it cultivates a relaxed and enjoyable atmosphere for learning, allowing students to explore language freely without the anxiety of making errors.

In accordance with these definitions, creative writing stimulates the right side of the brain, which is associated with creativity and emotional processing. This mental engagement aids learners in naturally assimilating linguistic patterns. Furthermore, creative writing promotes self-expression, boosts confidence, and motivates students to write autonomously (Maley, 2009). As learners consistently participate in writing exercises, they progressively acquire an instinctive grasp of various formats and writing norms.

1.6 Characteristics of Good Academic Writing

Effective academic writing is characterized by several essential attributes. These attributes can be categorized as follows:

1.6.1. Organization

Effective academic writing necessitates a well-defined structure that includes an introduction, a thoroughly developed body, and a succinct conclusion. The coherence of ideas, clarity in paragraph organization, and logical flow of arguments are crucial components. Greetham (2001) emphasized the importance of a clear introduction in establishing the text's purpose and framework. He also points out the significance of topic sentences in body paragraphs to ensure focus and coherence. According to Greetham (2001), the conclusion should encapsulate the strength and balance of the arguments presented.

In a similar vein, Anderson and Poole (2001) stressed the importance of a structured approach, beginning with a clear statement of the problem in the introduction, followed by a logical progression of arguments in the body, and concluding with a synthesis of findings that may propose avenues for further research. While both sources highlight the necessity of structure, Anderson and Poole's focus on the development of arguments within the body is particularly noteworthy, especially in the context of postgraduate writing. The inclusion of pertinent examples further bolsters both persuasiveness and clarity.

1.6.2. Task Achievement and Relevance to the Question

Academic writing must directly engage with the assigned task or research question, ensuring relevance and focus throughout the discourse. Davies (2008) asserted that effective academic texts remain closely aligned with the topic, steering clear of digressions—even when the information presented is intriguing. The writer must guarantee that each section of the text contributes meaningfully to addressing the central question. Furthermore, utilizing online resources to clarify academic verbs such as analyze, discuss or justify can aid in understanding expectations and maintaining focus.

1.6.3. Accuracy

In academic writing, accuracy encompasses the proper use of grammar, vocabulary, spelling, and punctuation. According to Brown and Hood (1998), these components are fundamental sub-skills of writing, and they offer techniques to minimize errors that could lead to misunderstandings. For example, punctuation plays a crucial role in shaping meaning; Altakhaine (2008) illustrated how the positioning of commas can result in varied interpretations.

Jordan (1986) further emphasized the necessity of grammatical accuracy, correct spelling, and appropriate word choice. He provides instances where confusion can stem from the incorrect use of tenses or verbs that have similar meanings, such as the distinction between lend and borrow or say and tell. Recognizing these differences is essential to avoid ambiguity and ensure clear communication.

1.6.4. Range and Style

Effective academic writing is characterized by a diverse vocabulary and varied syntactic structures, while minimizing redundancy. A restricted vocabulary or inadequate sentence formation may indicate a lack of linguistic competence. Notably, repetition can seem particularly awkward in English, especially when compared to languages like Arabic.

Davies (2008) identified five essential components of effective academic style: clarity, the use of signposting, the avoidance of excessively lengthy sentences and paragraphs, and the necessity of not presuming that the reader possesses the same background knowledge. These components contribute to the clarity and accessibility of the text for a broad academic audience, rather than solely for experts in the discipline.

1.6.5. Coherence and Cohesion

Academic writing must demonstrate both coherence and cohesion. Coherence pertains to the logical progression and overall comprehensibility of the text, while cohesion relates to the employment of linking devices and signposting to connect ideas within and between paragraphs. Carter (1999) asserted that cohesion is established through explicit markers that clarify the relationships among different parts of the text, whereas coherence ensures that the text as a whole is logically consistent. Examples of cohesive devices include terms such as however, moreover and as previously mentioned.

1.7 Reasons to Teach Writing

Writing is a vital communication skill and a fundamental part of EFL education, as highlighted by Harmer (2001), who outlines key reasons for teaching writing to EFL students

1.7.1 Reinforcement

Reinforcement in language learning refers to the process of strengthening a learners' grasp of new linguistic structures or vocabulary through repeated exposure and active use. Harmer (2001) said that:

The majority of students acquire language in a purely oral / aural way, most of us benefit greatly from seeing the language down. Therefore, written language can be traced greatly in the memory than in the oral way. Students often find it useful to write sentences using a new language shortly after they have studied it. (p. 79)

1.7.2 Language Development

The act of writing supports their learning by allowing them to develop their understanding progressively, much like how learning can occur through speaking. As

Harmer (2001, p.79) stated that: "The mental activity we have to go through in order to construct proper written texts is all part of the ongoing learning experience".

1.7.3 Learning Style

Students' learning styles can vary significantly; some may acquire language rapidly through visual and auditory exposure, while others might require more time to absorb and process information. For some learners, language learning is best approached as a calm and introspective activity, rather than through the fast-paced demands of direct, face to face interaction. It may be found that students learn a language quickly just by watching and listening, while others need more time. This is illustrated by Harmer (2001) statement that "For many learners, the time to think things through, to produce language in a slower way, is invaluable. Writing is appropriate for such learners" (p.79).

1.7.4 Writing as a skill

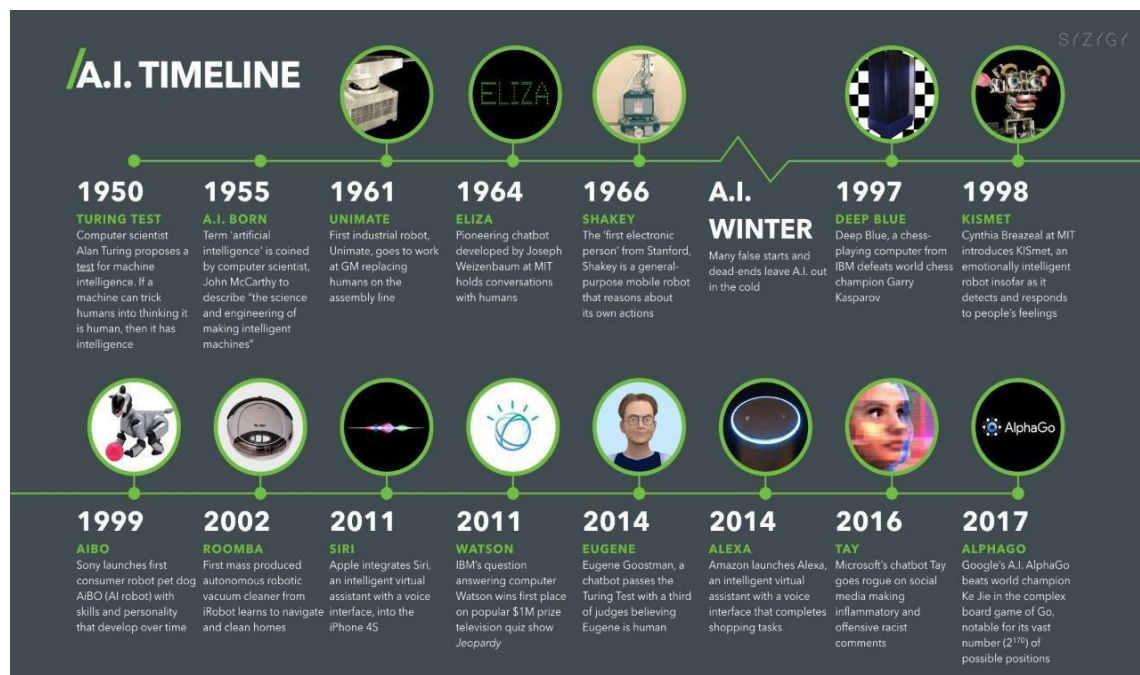
Writing is a fundamental language skill, equally essential as speaking, listening, and reading. It plays a crucial role in helping learners perform various real-life tasks such as composing letters, responding to advertisements, and preparing written reports. Given its wide range of practical applications, it is vital to raise learners' awareness of the significance of developing strong written abilities. Harmer (2001) said that:

We can get beginners to write simple poems, but we probably won't give them an extended report on town planning. When we set tasks for elementary students, we will make sure that the students have — or can get — enough language to complete the task. (P. 80)

Section two: Artificial Intelligence (ChatGPT)**1.8. Definition of Artificial**

The concept of artificial intelligence involves the utilization of technology that allows machines to imitate human cognitive functions and thought processes, which enables them to contribute to decision making, solve problems, and perform tasks that are usually undertaken by people (Glover, 2024).

Similarly, Artificial Intelligence is defined as the creation of computer systems that can replicate human cognitive abilities. According to Burns et al., (2023), AI includes a range of technologies such as expert systems, natural language processing, speech recognition, and machine vision. Likewise, Ribeiro (2021) describes AI as a domain of computer science that seeks to create intelligent agents capable of perceiving their surroundings, understanding information, learning from experiences and taking actions that improve human capabilities.

Figure 1. 3*Artificial Intelligence Timeline*

Note. Timeline Infographic From <https://digitalwellbeing.org/artificial-intelligence-timeline-infographic-from-eliza-to-tay-andbeyond/> (Marsden, 2017).

1.10 Types of Artificial Intelligence Based on Capabilities and Functionality

As noted by Amita (2024), artificial intelligence can be classified into seven distinct categories, organized according to two main criteria: capabilities and functionality;

A. Based on Capabilities:

- **Narrow AI (Weak AI):** Narrow AI is designed to execute specific tasks with high efficiency such as recognition or recommendation systems, it is highly specialized and cannot function outside its predetermined role.
- **General AI:** General AI seeks to replace human like intelligence across a diverse array of tasks. This would enable machines to learn and adapt autonomously, similar to human beings, although such systems are not currently in existence.

- **Super AI:** Super AI denotes a theoretical phase in which machines would exceed human intelligence in all cognitive domains, including problem solving, reasoning, and emotional understanding. This concept remains speculative and in the subject of ongoing investigation.

B. Based on Functionality:

- **Reactive Machines:** These AI systems react to particular stimuli in real - time but do not possess the capability to learn from previous experiences. They are confined to the present context and execute actions based on established rules.
- **Limited Memory:** In contrast to reactive machines, limited memory systems can utilize historical data to inform their decisions. Many contemporary AI applications such as self-driving cars depend on this type by storing and applying past information for future actions.
- **Theory of Mind:** This theoretical stage of AI would involve systems capable of comprehending human emotions, intentions, and beliefs. The goal is to facilitate more socially intelligent interactions between machines and humans, although this has yet to be achieved.
- **Self-Aware AI:** The most advanced and theoretical category, self aware AI, would possess consciousness and the ability to understand itself and others. This form of AI would have its own desires, thoughts, and emotions and remains a distinct prospect Amita (2024).

1.11 Components of Artificial Intelligence

Sadiku et, al. (2022) identified various components of artificial intelligence such as expert systems, neural networks, computer vision, natural language processors, fuzzy logic, machine learning, deep learning, and data mining.

- **Expert Systems:** These are also known as knowledge based systems. An intelligent computer program that uses artificial intelligence to help analyze data and choose options just like a human would .The primary use of AI in business is through expert systems , which support human experts in solving complex problems .
- **Neural Networks:** Artificial Neural Networks (ANNs) inspired by the human brain. They are designed to identify objects with nonlinear statistical data in a way to mimic human thought.
- **Computer Vision:** Computer vision, also known as Machine Vision, involves techniques and technologies employed to develop artificial systems that can obtain and interpret images.
- **Natural Language Processing:** Focuses on enabling computers to comprehend and interact with human language in both speaking and written form. There exist two fundamental methodologies approaches NLP: statistical and semantic. Natural language processing facilitates the development of intelligent search engines, and enhances accessibility for individuals with visual impairments.
- **Robots:** Robots are Programmable machines with sensors and physical manipulators which can replace repetitive human task in field of healthcare.
- **Data Mining:** Data mining serves to identify hidden patterns in large datasets through the utilization of AI techniques like neural networks and statistical methods. The integration of these approaches is frequently more efficient than relying on one singular approach.

1.12 Artificial Intelligence in Education

Manyika et al. (2017) argued that proficient educators will continue to be vital in the future, particularly in teaching methods that improve students' emotional intelligence,

creativity, and communication skills. Correspondingly, Haseski (2019) synthesized educational research, indicating that artificial intelligence can tailor learning, enhance educational experiences, aid learners in discovering their strength, stimulate creativity and ease teachers workload. According to Bailin (1987), AI technologies have been found to be able to check student's grammar and provide sophisticated feedback. Thus, Peterson (2017) believed that technology facilitates a higher degree of self sufficiency and control, thus empowering them to navigate and customize their learning process. According to Hwang et al. (2021, 2022) the technology in educational settings enhances students' academic achievement and fosters their motivation.

1.13 Artificial Intelligence In EFL Classrooms

Artificial Intelligence tools introduce innovative opportunities for enhancing language acquisition in EFL classrooms by providing personalized assistance that caters to the specific requirements of learners. These tools support both educators and students in cultivating essential language competence, including grammar, vocabulary, pronunciation and oral communication .Therefore, the integration of Artificial intelligence (AI) into educational systems has significantly transformed teaching and learning methodologies. Various studies have pointed out the increasing role of AI in educational sectors. As Zhao and Nazir (2022) indicated, AI has been a key factor in advancing innovative teaching strategies, facilitating effective knowledge transfer, and enhancing knowledge sharing.

Clearly, Artificial Intelligence offers educators advanced tools and resources that can profoundly reshape standard practices in EFL classrooms. Through the application of Artificial Intelligence, teachers have access to intelligent tutoring systems, automated evaluation mechanisms, and virtual language assistants, which empower them to craft more

customized learning experiences for students (Vera, 2023). Apart from the above mentioned in EFL classroom has identified the following AI technologies:

- **Duolingo:** The application Duolingo is recognized for its innovative use of artificial intelligence, the platform adjusts to the individual learners' skill level, tracks their progress, and delivers personalized feedback. It covers essential language skills reading, writing, listening and speaking.
- **Grammarly:** Grammarly operates as a writing assistant powered by AI that aids users to develop writing proficiency in term of grammar, spelling, punctuation, style, and clarity
- **Lingvist:** Lingvist is an artificial intelligence driven language acquisition platform, such as English for non native speakers focuses on vocabulary acquisition and providing instant feedback
- **Rosetta Stone:** Language Learning platform designed to teach English by providing interactive lessons through immersive learning techniques to develop their English language in a neutral way.
- **ELSA Speak:** ELSA (English speaking application assistant) is a mobile application designed to help English language learners improve their pronunciation and speaking skills through artificial intelligence. The app provides users with instant feedback on their spoken English by analyzing pronunciation, stress, intonation, and fluency. It adapts its instruction to the learners' level and offers targeted exercises to enhance specific areas of pronunciation.

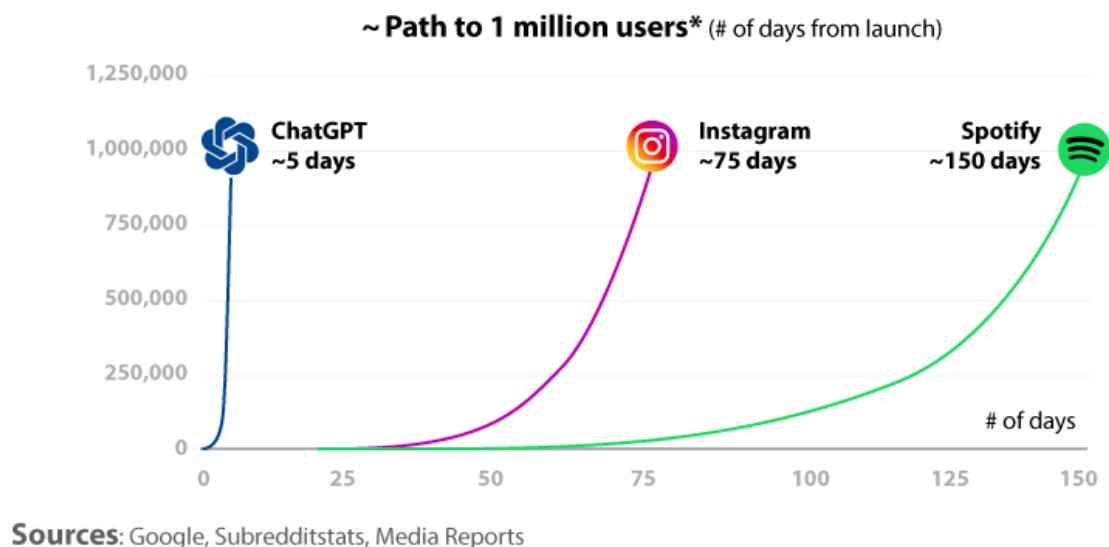
1.13 Background of ChatGPT

ChatGPT's development is fundamentally linked to Silicon Valley, where prominent technology and business leaders have been instrumental in the progression of chatbot

technologies. OpenAI, the creator of ChatGPT, was founded as a non organization by leaders such as Greg Brockman, Elon Musk; Ilya Sutskever, Wojcieh Zaremba, and Peter Thiel. The primary objective of OpenAI was to open access to its research and developments for humanity at large (Khan et al., 2023). ChatGPT encourages users to participate in engaging dialogues and undertake a variety of tasks by providing writing assistance, generating text and answering questions.

1.14 Definition of ChatGPT

Chat Generative Pre- trained Transformer, commonly known as ChatGPT, is an artificial learning powered tool developed by Open AI. It is like having a conversation with a really knowledgeable person (a way that feels natural), using language models to provide human-likeness in order to answer questions. Released in November 2022, it gained widespread attention with over a million users within five days (Gregersen, 2023). As reported by Flynn (2023), ChatGPT gained 57 million active users in one month thanks to its great response and free availability. Equally, Zhai (2023) found that ChatGPT can effectively address complex challenges in science education by facilitating assessments, grading and suggesting resources.

Figure 1.4*Path to 1 million users*

Note. From <https://www.qids-vc.com/post/fintech-trends-what-are-the-impacts-of-chatgpt-on-fintech-and-financial-services>

1.15 The Role of ChatGPT in Improving Writing Skills in EFL Learners

According to Hung and Tan (2023), the AI driven tool assists students in producing coherent and cohesive written work by providing instant feedback and recommending grammatically correct sentence options. Following this, Rahman et al., (2022) investigated the impact of an AI supported language learning tool in recognizing and correcting grammar errors. Moreover, in a study conducted by Fitria (2021) investigated the role of Grammarly as an AI assisted tool for language learning

Barrot (2023) suggested that ChatGPT functions as a reliable writing aid, providing prompt, tailored, and context -relevant feedback to students at different phases of the writing process. This study seeks to utilize ChatGPT as a tool for formative feedback, incorporating both self assessment and peer assessment, to assess its impact on enhancing students academic writing skills. Therefore, Lui et al. (2021) conducted a quasi experimental study

to assess the influence of artificial intelligence on the writing skills of EFL learners. Their findings demonstrated considerable progress in writing skills compared to traditional educational methods. This integration of AI in language learning not only improved learners' self-efficacy and self-regulation but also reduced cognitive load, thereby contributing to their writing success. In accordance with these definitions, "ChatGPT can help educators create course syllabi, teaching materials, and assessments" (Yaacoub et al., 2023 ; Zhai, 2022).

1.16 Advantages of ChatGPT in Educational Settings

1.16.1 Personalized Tutoring

ChatGPT possesses the capability to provide individualized tutoring and feedback that is specifically designed to meet the diverse learning needs and progress of students. According to Chen et al. (2020), ChatGPT supported personalized mathematics instruction.

1.16.1 Automated Essay Grading

ChatGPT can automate the grading of essays and can free up educators to engage in other instructional duties. Kim et al., (2019) indicated that a generative model, which was developed using human graded essays, exhibited a robust correlation ($r = .86$) with human grades. The study showed the model efficiently identified key essay features and provided feedback similar to human graders.

1.16.1 Language Translation

ChatGPT serves as a tool for translating educational materials into several languages to facilitate greater understanding among diverse populations. Research by John et al. (2016) indicated that a model trained on bilingual information successfully translated sentences and achieved notable results in translation evaluation.

1.16.1 Interactive Learning

ChatGPT can help students learn by allowing them to interact with a virtual tutor. According to Peng et al. (2019) interactive learning provides immediate response, time feedback and makes learning more engaging.

1.16.1 Adaptive Learning

Chiang et al. (2021) reported that an adaptive learning system utilizing ChatGPT facilitated enhancements in students' programming abilities by tailoring task difficulty to align with their existing knowledge.

1.17 Drawbacks of ChatGPT in Educational Settings

Although ChatGPT offer various potential advantages in education, there are also certain disadvantages as highlighted by research studies:

1.17.1 Lack of Human Interaction

The absence of personal interaction may pose challenges, particularly for learners who benefit from a sense of connection with their teachers. D'Mello et al, (2014) discovered that students who engaged with a virtual tutor displaying human-like emotional behaviors achieved more favorable outcomes compared to those who interacted with a tutor devoid as such behavior.

1.17.2 Limited Understanding

Generative models identify patterns within data, which did not possess the actual understanding of the content. According to Wang et al. (2020), these models often overlook the specific learning difficulties encountered by students.

1.17.2 Lack of Creativity

A significant limitation of artificial intelligence, particularly in the field of creativity, is its failure to produce genuinely original creations. Although AI can replicate patterns and generate outputs based on existing data, it frequently falls short of the deep imagination and creativity of human creators. Ziegler et al. (2019) found that "a music composition system based on a generative model had difficulty producing original and diverse melodies" (p.57).

1.17.2 Dependency on Data

Artificial intelligence systems heavily rely on the quality and relevance of data to function effectively. Without accurate or appropriate input, these models often fail to perform as intended. Kocaguneli et al. (2019) found that models designed to answer questions did not work when data are not relevant.

1.17.2 Lack of Contextual Understanding

AI systems frequently struggle to interpret and respond to information in a way that reflects human-like awareness of context. This weakness is especially evident in conversation-based tasks. Gao et al. (2019) stated that a generative dialogue system struggled to give appropriate response in a conversation

1.17.2 Privacy

Fundamentally, privacy signifies the protection of personal or sensitive information from being viewed or utilized by others without explicit permission. In educational settings, this entails ensuring that students' data remains confidential and is not improperly shared or exploited when utilizing AI tools. Privacy data and security arise when using ChatGpt in education . (Ribeiro & Vala, 2020).

Conclusion

Chapter One provided a comprehensive theoretical framework for understanding the intersection of academic writing and artificial intelligence (AI) in the context of EFL. The first section explored academic writing by defining its core components, outlining the writing process, and discussing various aspects such as vocabulary, grammar, coherence, and content. It also examined the different types and approaches to academic writing, along with its essential characteristics and the reasons for teaching academic writing in EFL contexts. The second section presented an overview of artificial intelligence, including its history, types, and main parts. It focused on how AI is used in education and how ChatGPT can improve their writing by giving feedback and support. At the same time, it pointed out some challenges of ChatGPT in academic writing. Overall, this chapter has created a firm foundation for comprehending the interplay between writing and technology in the context of language learning.

Chapter Two: Data Analysis and Interpretation of the Results

Introduction

2.1. Research Methodology for this Study: Choice and Rationale

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2.1.2. Research Approach

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Conclusion

Introduction

This study aims to explore teachers and learners' attitudes towards the use of AI-based applications, namely, "ChatGPT" on students' writing. The current chapter presents the fieldwork of the dissertation. It is devoted to unveiling the analysis and discussion of the collected data. It begins by providing a theoretical framework of the study's methodology aiming to clarify the rationale behind the choice of the approach and data collection methods. Finally, the chapter provides a careful discussion of the findings.

2.1. Research Methodology for this Study: Choice and Rationale

2.1.1. Research Paradigm

Engaging in research is fundamentally a multifaceted challenging pursuit that requires careful consideration of a fundamental set of essential principles. Kuhn (1962 as cited in Sönmez, 2013)) introduced the concept of paradigm, or in simpler terms "patterns", which was derived from the Greek origin Paradeigma. In this research, the selected paradigm provides the underlying perspective that shapes the entire study, influencing the methodological choices, research design, and data collection strategies. Rooted in interpretivism, this paradigm prioritizes gaining insight into a phenomenon from the viewpoints of those who experience it firsthand. It recognizes that reality is not objective or uniform, but rather constructed through personal experiences and shaped by individual social and educational contexts. Therefore, instead of aiming for broad generalizations, it values the distinct and diverse perspectives of each participant.

2.1.2. Research Approach

A research approach acts as a blueprint that informs every stage of the investigation, from the formulation of research questions to data analysis. According to Creswell (2014),

Research approach is the specific methods of data collection and analysis, it processed by the knowledge claims, the strategies, and the methods all contribute to a research approach that tends to be more quantitative, qualitative, or mixed method. Selecting the most appropriate approach depends on the researcher's philosophical stance and the study's objectives. The three widely recognized approaches qualitative, quantitative, and mixed methods each correspond to different types of inquiry and underlying assumptions. Given this study's interpretivist orientation, a qualitative approach has been deemed most appropriate. This approach is well-suited to exploring subjective experiences, allowing for an in-depth investigation into how educators and learners perceive the influence of social media on academic writing. It enables a comprehensive understanding of participants' thoughts, feelings, and experiences in their own words.

2.1.3 Research Design

A research design serves as the structural framework of a study, ensuring that it is both logically organized and capable of addressing the central research questions. Developing an effective design involves clarifying the research objectives and selecting a method that aligns with them. Creswell (2014) defined a research design as, “ A type of inquiry within qualitative, quantitative, and method methods approach that provide specific direction for procedures in a research study”. This research employs a case study design, which is well-suited for gaining detailed insight into a particular issue within a real-life setting. Case studies are frequently used in social sciences to explore complex phenomena in depth and within context (coombes, 2022). They are especially valuable for answering questions such as “how”, “why”, and “what” in relation to a specific group or situation. In the context of this project, the case study approach facilitates an in-depth exploration of how social media affects student's academic writing skills particularly in areas like vocabulary,

grammar, and coherence. Focusing in defined educational setting enables a through, contextualized understanding of the participants' experiences and attitudes.

2.1.4 Data Collection Methods

Data collection is crucial phase in any research endeavor, as it provides the foundational evidence required to address research questions and fulfil the study's aims. In qualitative research, the emphasis lies in gathering rich, descriptive data that captures participants' perspectives in depth. The selected data collection techniques must align with the overarching paradigm, research design, and methodological approach to ensure that the information is both relevant and meaningful. For this study two primary tools were employed: a semi-structured questionnaire for students and semi-structured interviews with teachers.

2.1.4.1 Students' Questionnaire

Questionnaires are standardized instruments composed of a set of questions to gather information from respondents. These may include both closed-and open-ended questions, and they are commonly used in educational and social sciences research to assess participants' attitudes, behaviors, or experiences. Bell (1999) claimed that "the questionnaire is essentially a structured technique for collecting primary data".

The study employed a semi-structured questionnaire to collect data from Master One EFL students hand in hand and aimed to investigate their familiarity with ChatGPT, and its perceived benefits and drawbacks. The questionnaire was developed based on a thorough review of relevant literature on the impact of ChatGPT on academic writing. It was then tailored to meet the specific goals of the research. The questionnaire was logically organized into sections to facilitate respondent understanding, with each section addressing different

components of the study including demographic information, usage patterns, and opinions about how ChatGPT enhance learners' academic writing skill. The instrument divided into two sections. The first section compiled demographic details and general trends regarding ChatGPT usage. The following section concentrated on students' opinions about how ChatGPT affects various elements of academic writing, including grammar, vocabulary growth, and coherence in writing. By combining open-ended and closed-ended questions, the questionnaire allowed for both quantifiable data and deeper insights into students' experiences. The final version of the questionnaire was distributed hand in hand to Master one students, ensuring accessibility and convenience.

2.1.4.2 Piloting and Validation of the Students' questionnaire

The pilot study allows gathering preliminary knowledge about the studied phenomenon (Mutz & Muller, 2016). In this case, the preliminary version of the student questionnaire was tested with three Master 1 students who very often use ChatGPT.. These participants completed the survey in person, offering feedback on question clarity, logical flow, and relevance. The pilot was conducted on January 13th , 2025, and the feedback confirmed that the questionnaire was well-structured and clear.

In addition, the instrument was sent via email to two academic experts for content validation. Their feedback led to minor revisions that improved the clarity and precision of the questions. These adjustments were incorporated into the final version of the questionnaire used in the study.

2.1.4.2 Teachers' Interviews

Interviews are a qualitative data collection technique involving direct interaction between the researcher and participants, allowing for an in-depth exploration of experiences

and perspectives. As Kumar (1992) defined “interviewing is a process of personal interaction between a researcher and a respondent”.

For this study, semi-structured interviews were conducted with EFL teachers to explore their attitudes and perceptions towards the effect of ChatGPT on students’ writing. The interview was carefully designed to elicit thoughtful and reflective responses. Questions were open-ended, with the flexibility to include follow-up prompts based on participants’ replies. This allowed the researcher to gather concrete examples and detailed insights grounded in classroom experience. The interviews were recorded, transcribed, and later subjected to thematic analysis to identify emerging patterns and themes.

2.1.4.2.1 Piloting and Validation of the Teachers’ Interview.

To ensure the effectiveness and clarity of the interview questions, a pilot interview was conducted with two EFL teachers who were not included in the main sample. This trial allowed the researcher to evaluate whether the questions prompted deep, insightful responses and effectively targeted the key goals of the research (Kvale & Brinkmann, 2009). Feedback from this phase led to minor adjustments that improved clarity and question flow.

Further validation was sought by consulting two academic experts. The interview and accompanying opinionnaire were emailed to them for review. Their input confirmed that the instrument was appropriate, relevant, and effectively aligned with the research focus.

2.1.4. Data Analysis Procedures

Qualitative data analysis is a dynamic and reflective process that begins during data collection and continues as the researcher engages deeply with the data to derive research in a continuous and reflective process that begins during data collection and continues as the

researcher engages deeply with the data to derive meaning through methods such as coding and pattern recognition (Patton, 2015).

Since this study follows a qualitative design, most of the collected data is descriptive in nature. Responses from the semi-structured student questionnaire, particularly the open-ended questions were analyzed to explore their perceptions of AI application and particularly ChatGPT influence students' writing. Similarly, insights from teacher interviews were thematically analyzed to supplement and deepen the understanding obtained from students responses. The results were organized and presented using thematic charts, graphs, and pie diagrams for clarity and comparison.

2.1.5 Population and Sampling Technique

In the social sciences, sampling techniques are generally classified into broad types: probability sampling, where every member of the population has a known chance of being selected, and non-probability sampling, where selection is based on the researcher's judgment or specific characteristics of the population (Bryman, 2016).

This study adopted a purposive sampling strategy a form of non-probability sampling due to its alignment with qualitative, case-based research participants were selected intentionally based on their relevance to the topic: Master one EFL students and EFL teachers from the department of Language and English Literature at Biskra University. These individuals were considered most likely to provide meaningful insights into the impact of ChatGPT on writing skill.

A total of 22 Master one students were invited to complete the questionnaire. Additionally, 5 EFL teachers with expertise in teaching academic writing were selected for in-depth interviews. While this sampling method does not aim for statistical generalization,

it ensures that the collected data are rich, contextually grounded, and closely tied to the research focus. The purposive selection of participants ensured the inclusion of individuals with firsthand experience and a deep understanding of the phenomenon being studied.

2.2. The Students' Questionnaire

2.2.1. Aim of the Questionnaire

The questionnaire aimed to explore students' attitudes towards the use of ChatGPT in academic writing and the effects associated with it. It was designed to examine the frequency and purposes for which students utilized ChatGPT, as well as to explore how they engage with the tool and the way in which they benefit from its use. It attempted to identify the perceived advantages and challenges related to the integration of ChatGPT into students' academic writing.

2.2.2 Description of the Questionnaire

The semi-structured questionnaire was designed specifically for Masters' One students at Biskra University . The students' questionnaire begins with a brief introduction that describes the aim of the study with a focus on the importance of the respondents' answers. It was composed of (14) questions divided into three section:

Section One: General Information (Q1-Q5)

The first section stands as a students' profile. It aims to gather general background knowledge about Master one students. **Section Two: General attitudes towards using ChatGPT in academic writing skill (Q6-Q9)**

The second section of the questionnaire is allocated to investigating the role of ChatGPT in enhancing writing skills, specifically, exploring whether it is perceived as a helpful tool in the writing process.

Section Three: Challenges and ethical considerations (Q10_Q14)

The third section of the questionnaire primarily focuses on identifying the key challenges of integrating ChatGPT in the writing process and explores their perceptions regarding the usefulness of incorporating ChatGPT as a supportive tool to improve writing proficiency.

2.2.3 Administration of the Questionnaire

The final version of the questionnaire was distributed hand in hand to Master one students. The responses were collected on 27February 2025.

2.2.4 Analysis of the Students’ Questionnaire

Section 1: Personal Information

Item 1. What is your gender?

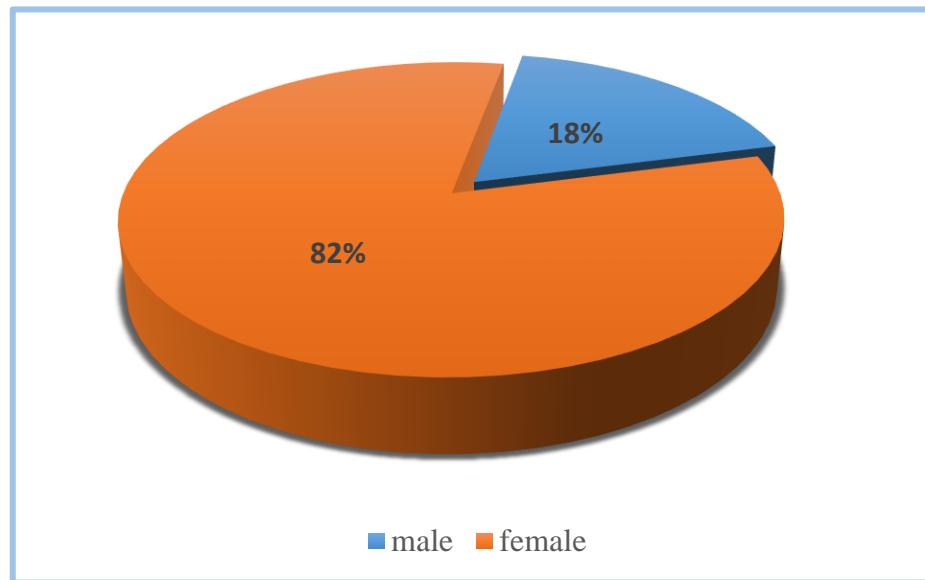
Table 2.1

Frequencies and Percentages of Learners’ Gender

Option	Frequency	Percentage
a) Male	4	18%
b) Female	18	82%
Total	22	100%

Figure 2.1

Frequencies and Percentages of Learners' Gender



The first question principally accounts for gender distribution in the study under investigation. Table 2.1 and figure 2.1 above indicate that out of 22 participants, 18 (82%) of those participants are females whereas 4 participants (18%) are males. This means, the highest majority of master students are female. Clearly, the number of females significantly exceeds that of males.

Item 2. What is your age?

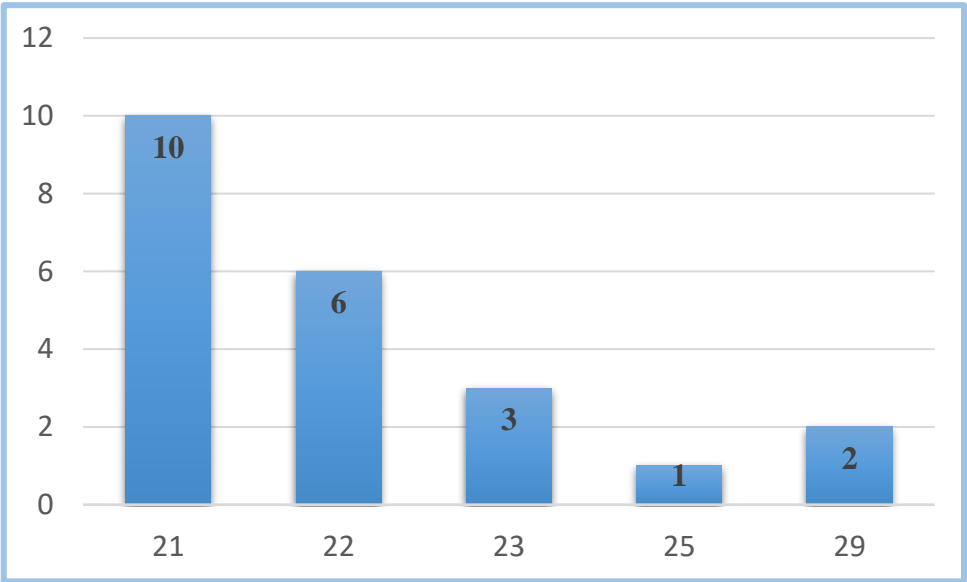
Table 2.2

Frequencies and Percentages of Learners’ Age

Age	Frequency	Percentage
a) 21	10	45%
b) 22	6	27%
c) 23	3	14%
d) 25	1	5%
e) 29	2	9%
Total	22	100%

Figure 2.2

Frequencies of Learners’ Age



Based on the data collected from the students’ responses, it is evident that the majority of participants are relatively young. Specifically, 10 participants (45%) are 21 years

old, followed by 6 (27%) who are 22. A smaller portion of the sample falls within the older age range, with 3 participants (14%) aged 23, 2 participants (9%) aged 29, and only 1 participant (5%) aged 25.

Item 3. How do you rate your English writing proficiency?

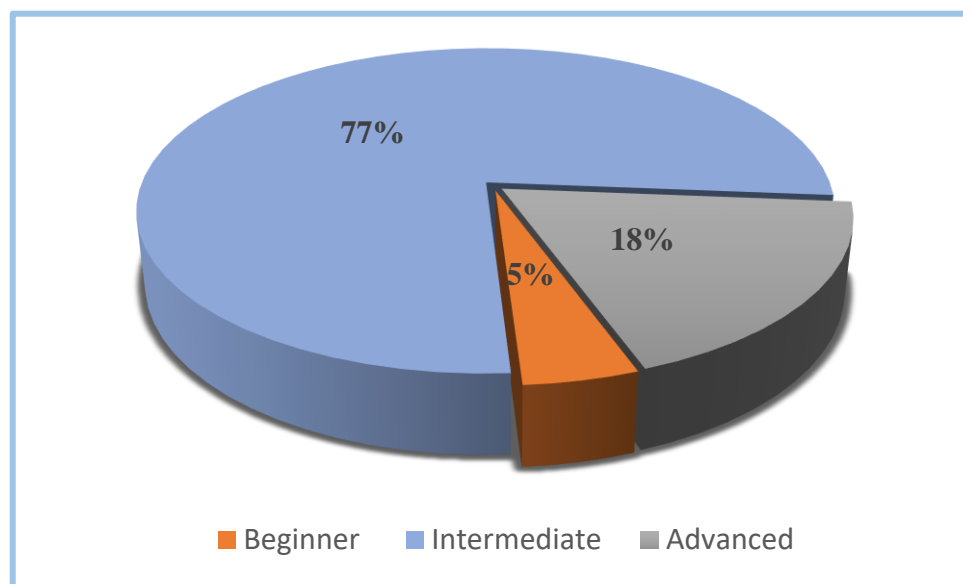
Table 2.3

Learners' Self-Rated English Writing Proficiency

Option	Frequency	Percentage
a) Beginner	1	5%
b) Intermediate	17	77%
c) Advanced	4	18%
Total	22	100%

Figure 2.3

Learners' Self-Rated English Writing Proficiency



Based on the data above, it can be seen that the majority of the students have an intermediate level of English proficiency, representing 17 participants (77%) are intermediate proficiency level. This implies that they have a reasonable grasp of the language allowing them to participate in everyday conversation and comprehend written materials. Additionally, 4 participants (18%) consider they hold an advanced proficiency level which indicates that they have a higher level of competence in English language, possessing the ability to communicate effectively and understanding more difficult text due to their strong language skill. Conversely, only one participant (5%) reported being at the beginner level. This student is likely at the initial stages of learning English and may require significant guidance and support to enhance the language skill.

In summary, the varying levels of English proficiency among students offer valuable insights into their capability for self-directed learning through technological means. Moreover, it also highlights the necessity of considering language skills when developing educational strategies or providing academic assistance in this research context.

Item 4. Have you utilized ChatGPT or any other AI-based tool for academic writing?

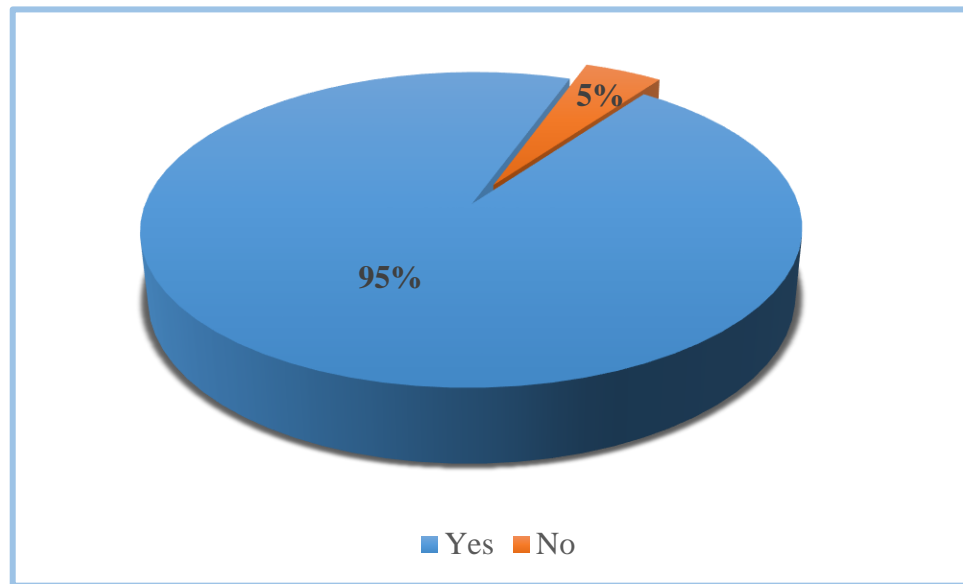
Table 2.4

Usage of ChatGPT and Other AI Tools for Academic Writing

Option		Frequency	Percentage
a)	Yes	21	95%
b)	No	1	5%
Total		22	100%

Figure 2.4

Usage of ChatGPT and Other AI Tools for Academic Writing



This question aimed to explore the extent to which learners used ChatGPT for academic writing purposes. According to the above results, nearly all participants (95%) have used ChatGPT, while only (5%) stated they do not use ChatGPT. This overwhelming majority suggests that the use of artificial intelligence in academic contexts is becoming highly common, especially among EFL students who may benefit from its language support, immediate feedback and quick responses, which can enhance and improve their academic writing skill.

Item 5. How often do you engage with ChatGPT for academic writing tasks?

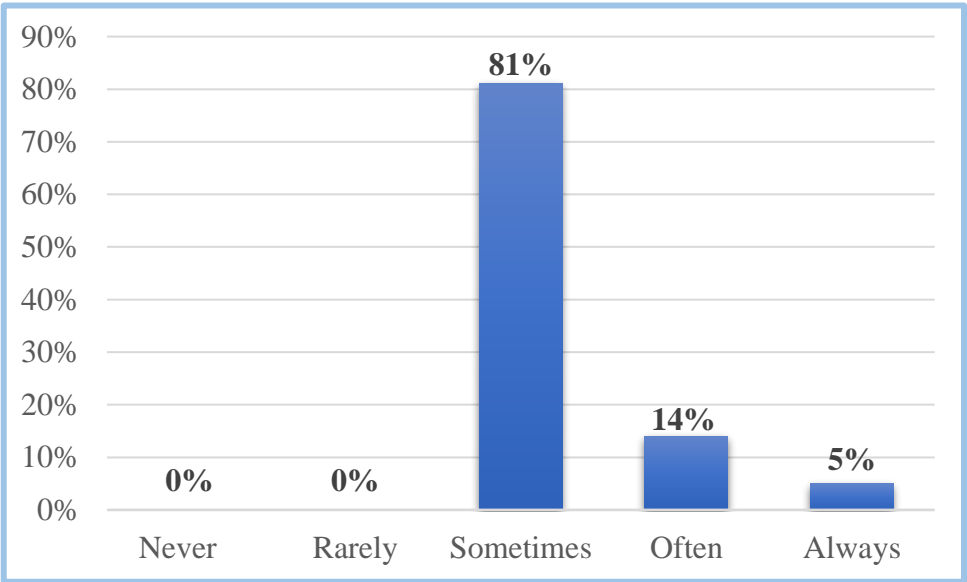
Table 2.5

Frequency of ChatGPT Usage for Academic Writing Tasks

Option	Frequency	Percentage
a) Never	0	0%
b) Rarely	0	0%
c) Sometimes	17	81%
d) Often	3	14%
e) Always	1	5%
Total	22	100%

Figure 2.5

Frequency of ChatGPT Usage for Academic Writing Tasks



This question aimed to measure how often students rely on ChatGPT during their writing assignments. The results showed that (81%) of the students reported using ChatGPT.

A high familiarity suggests students are interested in exploring new tool to learn English, and the same rate (14%) stated that they use it often while (5%) claimed to use it always. No respondents indicated that they never or rarely use ChatGPT. These findings indicate that most students integrated ChatGPT into their writing process to varying degrees

Section 2: AI and Writing Skill Development

Item 6. To what extent do you agree that ChatGPT helps improve your academic writing?

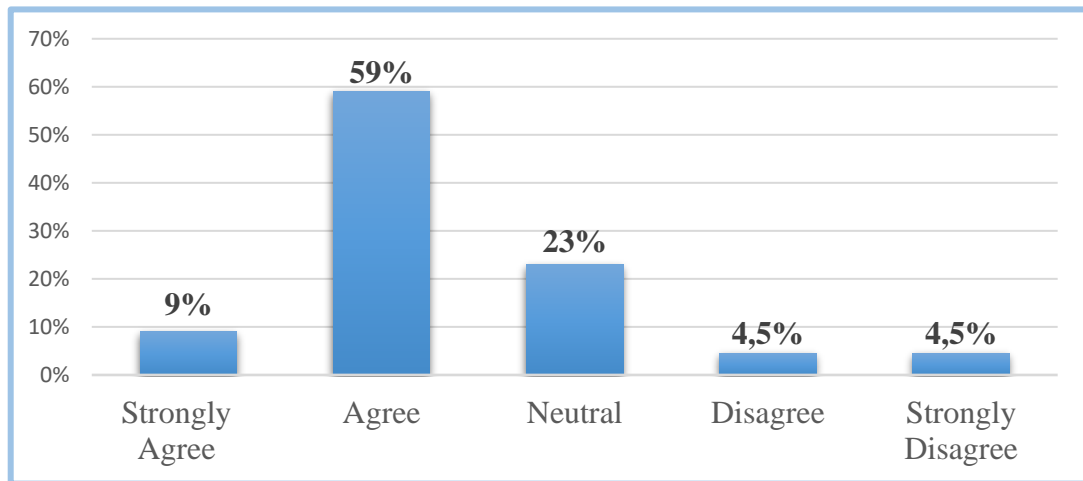
Table 2.6

Perceived Impact of ChatGPT on Academic Writing Improvement

Option	Frequency	Percentage
a) Strongly Agree	2	9%
b) Agree	13	59%
c) Neutral	5	23%
d) Disagree	1	4,5%
e) Strongly Disagree	1	4,5%
Total	22	100%

Figure 2.6

Perceived Impact of ChatGPT on Academic Writing Improvement

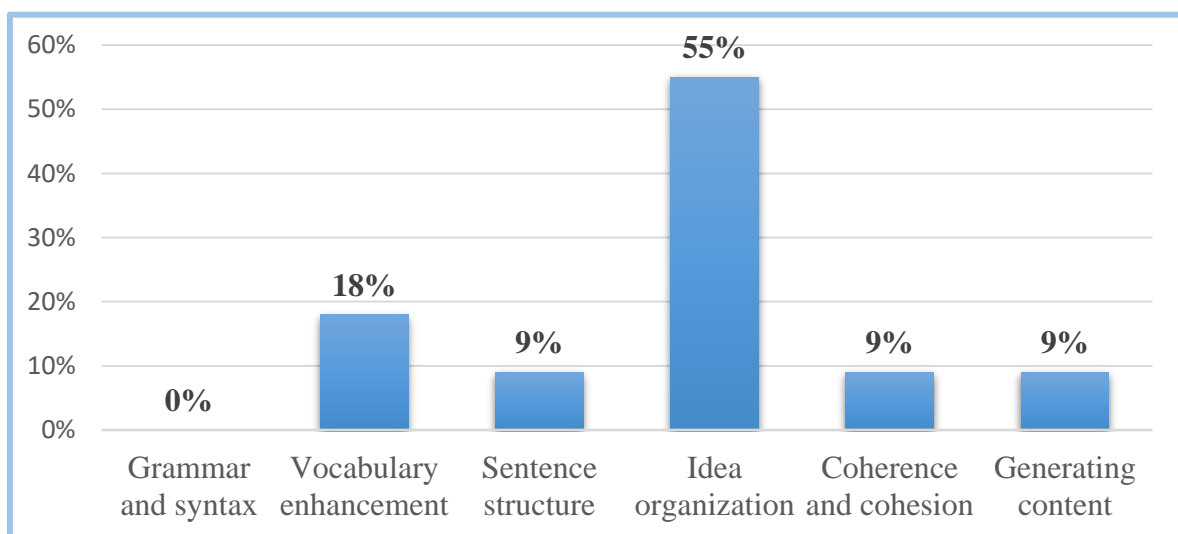


This question sought to understand whether students felt that ChatGPT helped them to improve their writing skills. The results revealed that 13 (59%) of students agreed that ChatGPT enhances their writing skill, while 2 (9%) strongly agreed. Five participants (23%) were neutral, while a minority showed skepticism, with one participant (4.5%) disagreeing and another (4.5%) strongly disagreeing. This data implies that most learners regard ChatGPT as an advantageous tool for enhancing their academic writing skill.

Item 7. Which aspects of writing do you find ChatGPT most helpful with? (Check all that apply)

Table 2.7*Aspects of Academic Writing Where ChatGPT Is Found Most Helpful*

Option	Frequency	Percentage
a) Grammar and syntax	0	0%
b) Vocabulary enhancement	4	18%
c) Sentence structure	2	9%
d) Idea organization	12	55%
e) Coherence and cohesion	2	9%
f) Generating content	2	9%
Total	22	100%

Figure 2.7*Aspects of Academic Writing Where ChatGPT Is Found Most Helpful*

The seventh question identifies which aspects of writing learners find ChatGPT most helpful with. Table 2.7 and Figure 2.7 detail the responses. The majority of participants (55%) expressed that ChatGPT is effective in organizing their ideas. Vocabulary enhancement was acknowledged by 18% of the respondents, while sentence structure, coherence and cohesion, and content generation were each recognized by (9%). Interestingly, no participants reported receiving help with grammar and syntax. These findings suggest that learners primarily regard ChatGPT as a valuable tool for organizing and developing their ideas.

Item 8. Do you believe ChatGPT has improved your confidence in academic writing?

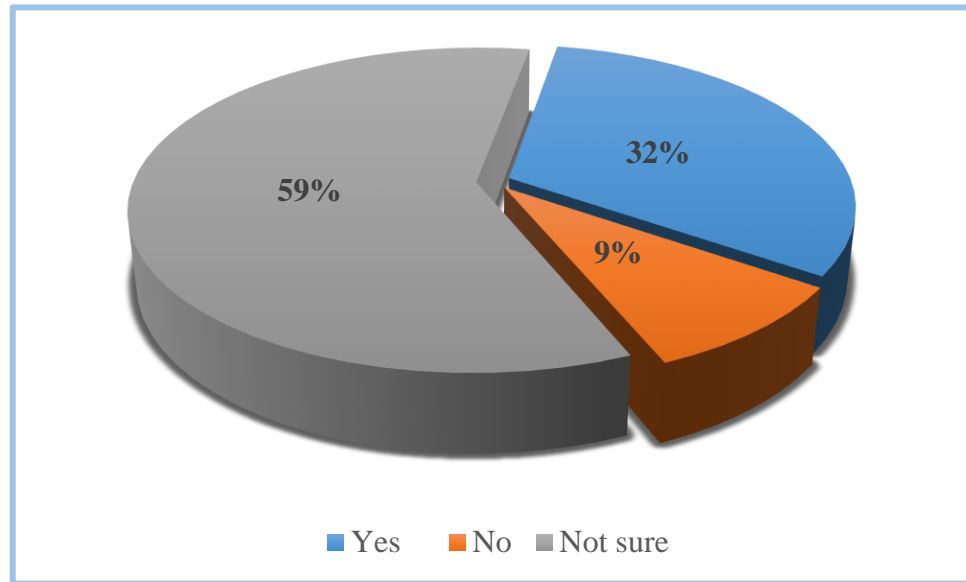
Table 2.8

Impact of ChatGPT on Learners' Confidence in Academic Writing

Option	Frequency	Percentage
a) Yes	7	32%
b) No	2	9%
c) Not sure	13	59%
Total	22	100%

Figure 2.8

Impact of ChatGPT on Learners' Confidence in Academic Writing



This question explores whether ChatGPT usage has influenced learners' confidence in academic writing. Table 2.8 and Figure 2.8 display the distribution among participants, 7 participants (32%) indicated that ChatGPT had a positive effect on their confidence, while 13 (59%) expressed uncertainty regarding its impact, and merely 2 (9%) believed it had no effect in enhancing learners' confidence in writing skill. The considerable proportion of uncertain responses may indicate either a neutral effect or a developing understanding of the tools role in building confidence.

Item 9. Has the use of ChatGPT decreased the time you allocate to writing assignments?

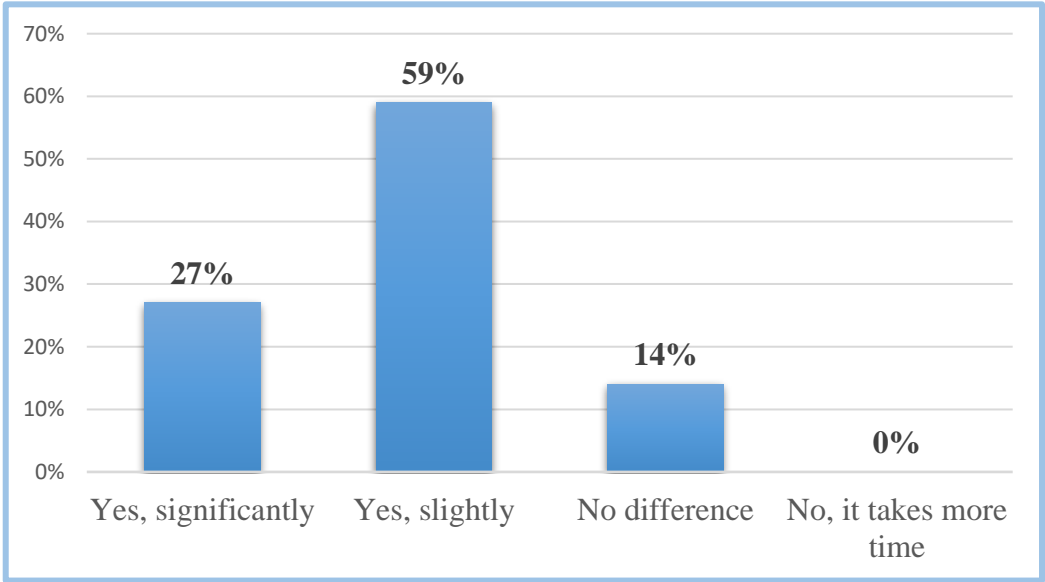
Table 2.9

Effect of ChatGPT on Time Spent Completing Writing Assignments

Option	Frequency	Percentage
a) Yes, significantly	6	27%
b) Yes, slightly	13	59%
c) No difference	3	14%
d) No, it takes more time	0	0%
Total	22	100%

Figure 2.9

Effect of ChatGPT on Time Spent Completing Writing Assignments



The students' responses regarding whether using ChatGPT affects the time learners spend on their writing assignments. Based on table 2.9 and Figure 2.9 summarize the findings. Most participants, 13 (59%) indicated that ChatGPT slightly reduced the time

required to complete tasks. Additionally, 6 participants (27%) noted a significant reduction. Only 3 (14%) reported no difference, and none indicated that it increased the time needed. These findings demonstrated that learners view ChatGPT as a time-saving aid when completing academic writing tasks.

Section 3: Challenges and Ethical Considerations

Item 10. What primary challenges do you encounter when using ChatGPT for academic writing?

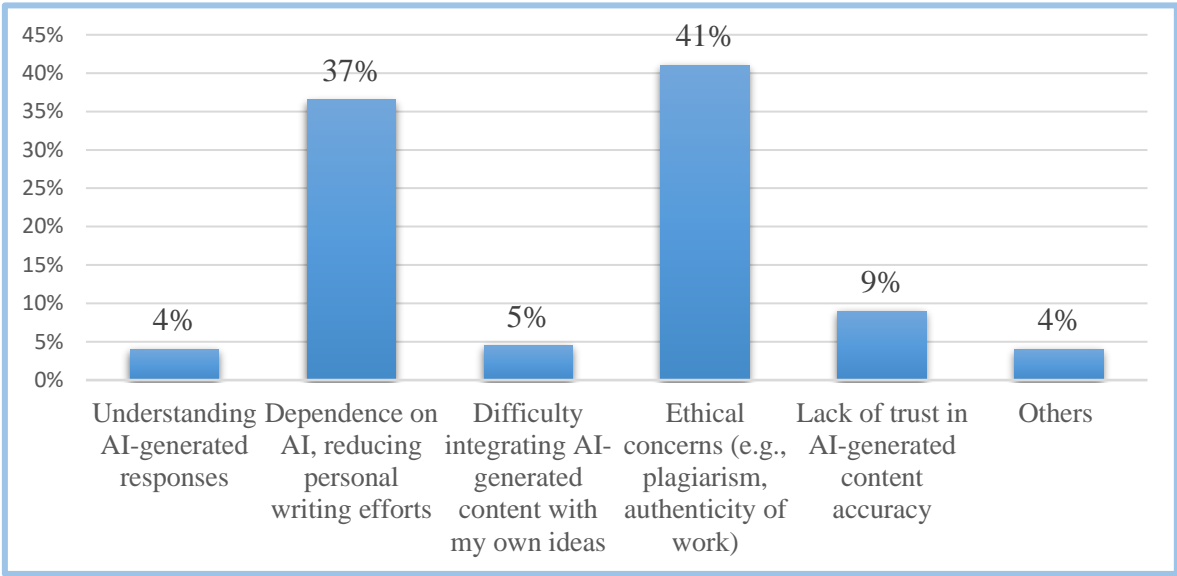
Table 2.10

Challenges Faced When Using ChatGPT for Academic Writing

Option	Frequency	Percentage
a) Understanding AI-generated responses	1	4%
b) Dependence on AI, reducing personal writing efforts	8	37%
c) Difficulty integrating AI-generated content with my own ideas	1	5%
d) Ethical concerns (e.g., plagiarism, authenticity of work)	9	41%
e) Lack of trust in AI-generated content accuracy	2	9%
f) Others	1	4%
Total	22	100%

Figure 2.10

Challenges Faced When Using ChatGPT for Academic Writing



As illustrated in Table 2.10 and Figure 2.10, the most commonly reported issue was ethical concerns with 9 participants (41%) highlighting concerns such as plagiarism and authenticity. Furthermore, 8 participants (37%) expressed worries about the risk of becoming overly reliant on AI which could reduce their individual writing skill efforts. Other identified challenges included a lack of trust in the accuracy of AI outputs (9%), difficulties in integrating AI with their own ideas, and a misunderstanding of AI generated responses (4%). These findings underscore both ethical and practical issues associated with AI supported academic writing.

Item 11. Do you think AI tools like ChatGPT can negatively impact students'

creativity and critical thinking?

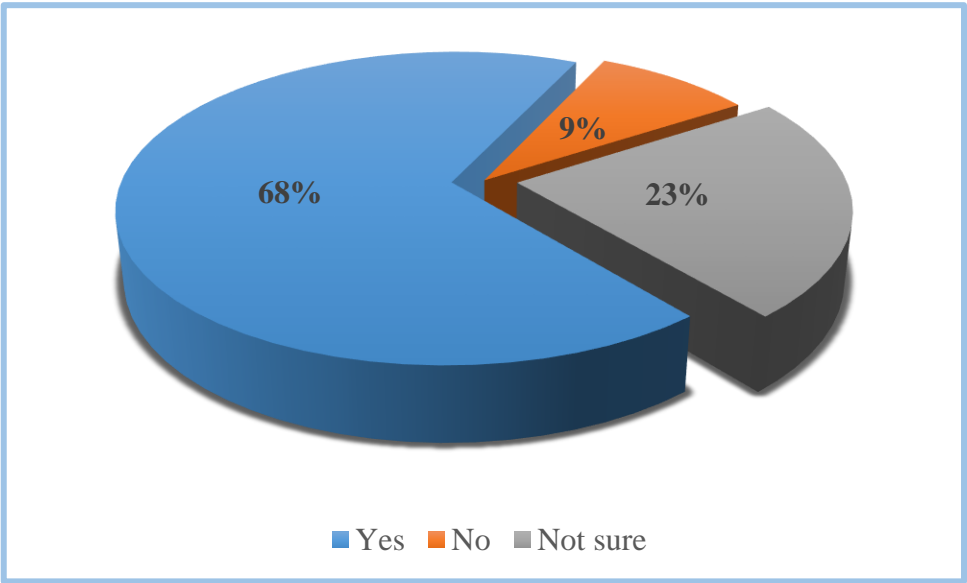
Table 2.11

Perceptions of AI’s Impact on Students’ Creativity and Critical Thinking

Option	Frequency	Percentage
a) Yes	15	68%
b) No	2	9%
c) Not sure	5	23%
Total	22	100%

Figure 2.11

Perceptions of AI’s Impact on Students’ Creativity and Critical Thinking



This question was designed to assess students’ perceptions regarding the potential drawbacks of using AI tools such as ChatGPT, particularly in relation to essential academic skills like creativity and critical thinking. The responses indicate a strong concern among the participants.

A significant majority (68%) believe that ChatGPT and similar AI tools may have a negative impact on students’ ability to think critically and generate creative ideas. This suggests that many learners perceive a risk of over-reliance on AI, possibly leading to reduced engagement in cognitive processes essential for academic development. Only 2 participants (9%) disagreed with this statement, indicating they do not see AI tools as a threat to creativity or critical thinking. Meanwhile, 5 participants (23%) expressed uncertainty, which might reflect either a lack of experience with AI tools or mixed feelings regarding their benefits and risks. These findings highlight a recurring ethical and pedagogical concern about the integration of AI in education: while these tools offer support, they may unintentionally encourage passivity or dependence.

Item 12. Do you believe AI tools should be integrated into academic writing courses?

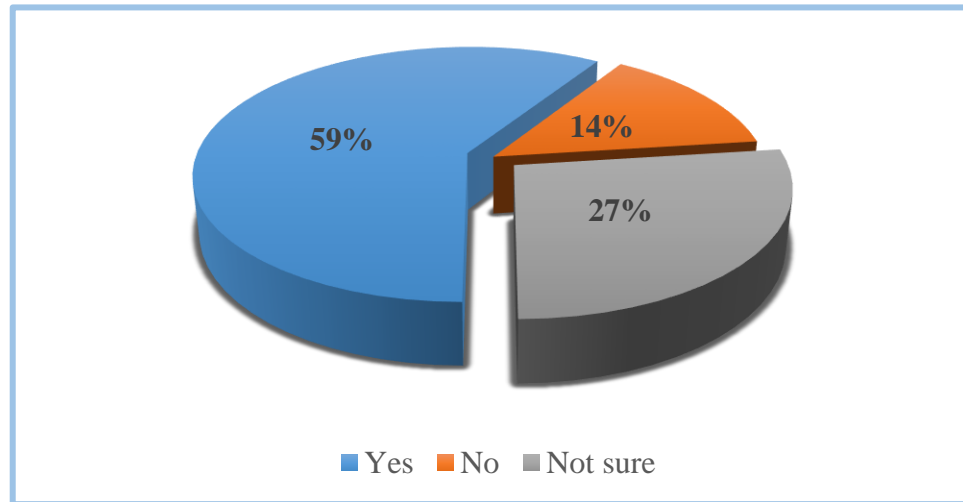
Table 2.12

Learners Opinions on Integrating AI Tools into Academic Writing Courses

Option	Frequency	Percentage
a) Yes	13	59%
b) No	3	14%
c) Not sure	6	27%
Total	22	100%

Figure 2.12

Learners Opinions on Integrating AI Tools into Academic Writing Courses



As shown in Table 2.12 and Figure 2.12, the responses to this question were varied; a significant majority of students (59%) believe that they are in favour of integrating ChatGPT into such courses. Conversely, (14%) opposed the integration of ChatGPT in writing courses while (27%) remained uncertain about its possible benefits. This distribution indicates that although most respondents perceive AI tools as advantageous, a notable number of students remain unsure about their role in improving academic writing skill.

Item 13. What limitations or challenges did you encounter when using ChatGPT?

Table 2.13

Common challenges faced by learners encounter while using ChatGPT

Theme	Number of Responses
Over-reliance and Loss of Skills	5
Ethical and Academic Integrity Concerns	2
Limitations in Understanding and Relevance	3
Writing Style and Structure Issues	4
Mixed or Positive Feedback	2
Context-Specific Limitations	2

The answers to Question 13 revealed a range of perspectives, reflecting the varied experiences of students regarding the challenges of integrating ChatGPT into academic writing context. In order to enhance clarity, the responses were classified into themes. The most frequently noted issue was over-reliance and loss of skills, students were worried that the frequent use of ChatGPT might weaken their critical thinking and reduce personal writing efforts. Another notable theme was writing style and structure issues, where students noted that ChatGPT produced repetitive and unstructured ideas. Some participants reported limitations in understanding and relevance, stating that ChatGPT failed to grasp their exact meaning and provided irrelevant topic. Overall, students had different experiences with ChatGPT, a few found it useful while others pointed out that it didn't perform well in certain subjects.

2.3 Discussion of the Students' Questionnaire Results

The incorporation of artificial intelligence tools such as ChatGPT in the educational environments has generated significant interest, particularly in EFL context. English. As

Darvishi et al., (2024) stated, the growing use of technology has raised concerns about how it might affect education and learning .Therefore, this research sought to explore EFL teachers and learners' attitudes towards utilizing ChatGPT and its potential effect on the academic writing skill. In order to meet this aim, two data gathering tools were used, an interview for teachers and a questionnaire for students. The data collected from the questionnaire offered important insights into students' awareness, usage habits, perceived effectiveness, and concerns about integrating ChatGPT into academic writing.

Relying on the results of students' semi-structured questionnaires, most EFL students have a positive attitude towards using ChatGPT into academic writing courses. The majority of students believe that using technology to improve their language abilities is more beneficial than using traditional methods. Furthermore, a significant number of students believe that technology-integrated instruction is crucial for achieving success in both academic and professional endeavours such as, enhancing clarity, increasing writing accuracy, and providing easier access to diverse language resources. Despite the advantages of using AI tools in academic writing, a small number of participants expressed a preference for traditional methods. These students reported feeling apprehensive about relying on such technology due to potential issues. The most frequently cited concerns were the risk of plagiarism and the loss of authenticity in their work. Specifically, some students believed that using AI-generated content might compromise the originality of their ideas and reduce the personal voice in their writing. They feared that their work could appear less genuine or overly mechanical, lacking the critical thinking and personal engagement typically expected in academic writing.

Many students expressed fear of becoming overly reliant on the tool, which they believed could negatively impact their writing abilities and critical thinking skills. These

concerns are consistent with ongoing debates in educational research, where scholars highlight that, without careful guidance, AI could promote passive learning and hinder cognitive development among students.

In summary, the questionnaire findings show that students perceive ChatGPT as a beneficial resource for enhancing academic writing skill and find it useful for developing ideas, improving vocabulary, and organizing texts. Nonetheless, they are conscious of the ethical implications and the risks of becoming overly reliant on the tool. This indicates that, if applied thoughtfully, ChatGPT can support learning while still promoting essential writing skills.

2.4 Teachers Semi Structured Interview

2.4.1 Aim of Semi Structured Interview

The interview aimed to investigate teachers' attitudes and perceptions towards integrating ChatGPT in academic writing contexts. Specifically, it intended to assess how teachers and students perceive the impact of ChatGPT on students' writing skill, and what ethical and pedagogical concerns they relate to its incorporation. It also attempted to suggest ways to use ChatGPT wisely and in a helpful way, so that students can improve their writing skills.

2.4.2 Description of Semi Structured Teachers' Interview

The semi- structured interview was the second data gathering instrument used in this study. All questions are open-ended, allowing participants to elaborate freely and provide additional insights on the use of ChatGPT in the context of EFL academic writing. The interview is divided into four main sections

Section One: included only one question (Q1) and focused on teacher's general attitudes regarding the use of ChatGPT in academic writing

Section Two: consisted of two questions (Q2-Q3). It aimed to explore teachers' attitudes towards the impact of using ChatGPT on students' writing skill development, and to identify challenges and ethical dilemmas associated with its use.

Section Three: included one question (Q4) to describe the potential challenges and ethical dilemmas when using ChatGPT in academic writing.

Section Four: composed two question (Q5-Q6) to explored teachers' view on integrating ChatGPT in academic programs.

2.4.4 Administration of the Semi -Structured Interview

Face to face interviews were conducted with five teachers of English at Biskra University. These interviews were audio-recorded and approximately lasted for 15 to 20 minutes. The interviews were, then, transcribed and analyzed using thematic analysis to capture and interpret the participants' responses accurately.

2.4.5 Analysis of the Semi-Structured Interview

The analysis of the teachers' semi structured interview provided insightful information that would, hopefully, enrich the research findings. Teachers' responses were analysed and categorized into four main themes:

A. General Perceptions

Question One: What is your general opinion about using AI tools like ChatGPT in academic writing ?

Teacher A : "I think using AI in academic writing can help students improving the quality of their writing if they respect the ethical regulations."

Teacher B : " ChatGPT is a helping tool but not to the extent that a student or a teacher rely on it all the time . It can assist , but the teacher / student explores one's abilities."

Teacher C : "I believe that writing is a human endeavor that should be accomplished without any technology powered tools. Yet , it may be beneficial for students to use these tools for guidance ."

Teacher D : "They can be beneficial if well-used . "

Teacher E : "In my view, AI tool like ChatGPT can be valuable in academic writing skill as long as support learning rather than replace critical thinking. "

The teachers' responses to the first interview question expressed varied perspectives regarding the utilization of AI tools such as ChatGPT in academic writing. The majority indicated that, when employed appropriately and ethically, these tools can enhance students' writing skills. However, some teachers warned that students should not depend on it all the time and should use their own thinking.

B. The Impact on Students' Writing Skill Development

Question Two: Depending on your experience, does ChatGPT enhance or hinder EFL students' writing skill ? How so ?

Teacher A: "ChatGPT can improve students writing skills if students use it wisely .Also, can help students to develop their critical thinking and enhance their logic in dealing with complicated issues".

Teacher B: “ ChatGPT may help them, but in fact it has become an obstacle to promoting students’ writing skills. It becomes a rockstone in their progress. We are obliged to withdraw their cellphone to give them a writing assignment because it would be 90% AI generated”.

Teacher C: “It apparently hinders students’ academic writing development because students do not use it appropriately and ethically”

Teacher D: “Both of them, it can enhance students’ writing skills when ethically used without plagiarism source information. It is an effective means to research and gather a great deal of information and data. However, if it is used wrongly, it may kill learners’ creativity and critical thinking ”

Teacher E : “It can enhance students’ writing if writers the tasks given him and tries to improve it relying on ChatGPT ; on the contrary,I if he asks it to do for him/her, he will not develop any writing skill. ”

The Teachers provided varied views on whether ChatGPT enhances or hinders EFL students’ writing skills . Some believe that it can improve writing and support critical thinking when used wisely and ethically. In contrast, others argued that overdependence on ChatGPT might lead to diminishing creativity and limiting the development of essential skills. Only a few teachers noted that while it can be a helpful research tool, misuse may negatively affect learning.

Question Three: Which Specific writing aspects (e.g., grammar, coherence, vocabulary) do you think ChatGPT improves ?

Teacher A: “ChatGPT helps improve almost all writing aspects, but it can not replace human when it comes to create meanings or new ideas which remains typically human.”

Teacher B: “Vocabulary and grammar yet coherence is dependent to students’ understanding first. ”

Teacher C: “It could improve all aspects if it is used wisely. ”

Teacher D: “All of them. Good and effective learners will remember and consider all corrections and get profit from such an application. ”

Teacher E: “It can develop any aspect in writing ; the students should be able to notice any deficiency because there are sometimes mistakes made by the machine. ”

The teachers generally agreed that ChatGPT can improve various aspects of writing, especially grammar and vocabulary. While other teachers noted that it could support all writing components, including coherence, if students use it properly. They also emphasized that creating original ideas remains a human skill and that students should be careful, as AI tools sometimes make mistakes.

C. Challenges and Ethical Consideration

Question Four: What potential challenges and ethical dilemmas do you perceive in employing ChatGPT for academic writing ?

Teacher A: “Ethical standards stand among many other challenges that I face when using ChatGPT. This forced me to reconsider every sentence I write. ”

Teacher B:. “ChatGPT fosters writing, but our students are relying on it to produce a passage, which we can not evaluate and assess students’ capabilities and skills. ”

Teacher C: “One of the most challenge is the risk of plagiarism which present a content without proper acknowledgment . There are also concerns about bias and misinformation, which can produce incorrect content. ”

Teacher D: “The first challenge is the learners’ over-reliance . They become completely dependent on this tool . It prevents them from being creative and critical thinkers . This fact hinders their writing proficiency especially when taking official exams where the use of apps is forbidden. ”

Teacher E : “Plagiarism, academic integrity, and lack of critical thinking, ”

Teachers mentioned several challenges and ethical concerns about using ChatGPT in academic writing. Among these, plagiarism was a prominent issue.

They expressed concerns that students over-reliance on AI-application to write could result in unoriginal work being submitted as their own. This raises serious questions about academic honesty and integrity, as it becomes difficult to distinguish between the student’s authentic voice and that of the AI. Moreover, teachers were worried that such practices could undermine the development of students' critical thinking and writing skills.

D. Pedagogical Integration

Question Five: Would you support the integration of AI tools like ChatGPT into academic writing programs? Please explain why.

Teacher A: “Yes I do. The Integration of ChatGPT into academic writing has become inescapable so pedagogical staff need to develop their teaching methods, programs, lessons’ contents according to the technological development of AI tools. ”

Teacher B: “ I do not support at all I prefer students make mistakes and show their gaps in knowledge to learn and to promote instead of showing stagy skill. ”

Teacher C: “ I continuously recommend it, tasks like generating an outline, checking coherence, and language mistakes could be permitted. ”

Teacher D: “Yes, I do advise my learners to use them to gather data. It is a quick database just like a deep seek app. At the same time, I teach them how to avoid being over-reliant by looking for other sources like reading articles, chapters, and journals. Then compare their findings”.

Teacher E: “Yes, by introducing AI as a module in training the student to benefit from its use / It is going to be included in text year’s programmes”.

According to the answers, most teachers supported adding AI tools to academic writing programs, noting that it can assist with outlining, grammar correction, and information gathering. Some emphasized the importance of modernizing teaching approaches to align with technological advancements. Conversely, just one teacher preferred students to learn through their own efforts rather than depending on AI tools.

Question Six : What approaches would you suggest to assist students in balancing the use of AI with their development as independent writers ?

Teacher A : “I think students have to balance the us of AI with their writing skills because the excess use of AI tools will lead to the decline of human capabilities.

Teacher B : “Student-centered and teacher-centered when necessary. But not AI centered.”

Teacher C : “By using it as an aid to write, not a tool. ”

Teacher D : “AI apps can be used as a support to develop and promote learners’ research. The balance can happen when using other sources that need reading, comprehending, analysing, and synthesising findings. ”

Teacher E : “Train the student in the use of AI as a writing assistant, not to write for them. Making the students aware of the value of multiple drafts and peer feedback/ training in drafting then asking AI for assistance to edit the final draft. ”

According to the answers above, teachers agreed that AI should assist students in writing but it should not be used to replace or substitute their own writing efforts. They suggested AI mainly for editing, generating ideas, or using feedback. They recommended using other sources for research and keeping the focus on teachers and students centred approaches. Overall, the goal is to help students become independent writers while using ChatGPT wisely.

2.6 Discussion of the Semi-Structured Interview

The semi-structured interview was carried out with five EFL teachers at Biskra University. It uncovered diverse viewpoints on the application of ChatGPT in academic writing contexts. According to Imran and Almusharraf (2023), ChatGPT offers immediate, individualized support during writing activities by providing prompt feedback tailored to students’ unique writing styles and preferences. Generally, the majority of teachers regarded ChatGPT as a potentially beneficial resource that, when utilized ethically and responsibly, could improve students’ writing capabilities such as, providing personalized feedback, facilitating language analysis, and improving engagement. Nonetheless, they also expressed concerns about overreliance on AI, which might hinder students’ critical thinking and creativity.

Regarding the impact on writing development, some teachers believed that ChatGPT could support vocabulary, grammar, and overall structure. Some teachers noted that ChatGPT could serve as a source of inspiration for students, helping them to generate ideas and organize their thoughts. However, concerns were raised about students' overdependence on the tool, which could limit originality, and academic integrity. Several participants pointed out ethical issues, including plagiarism and the potential for students to present AI generated as their original work. Despite some concerns, most teachers supported the integration of ChatGPT into academic writing instruction, as long as there are clear guidelines established.

The analysis of teachers' responses revealed their opposition to AI tools in education, as they expressed a strong preference for traditional methods that promote students' independence. Consequently, the findings suggests that the successful integration of such tools depends on ethical awareness, careful implementations, and appropriate guidance to effectively enhance students' writing skills.

2.7 The Synthesis of Findings

The findings obtained from the students' semi-structured questionnaire and the teachers' semi-structured interviews have been thoroughly synthesized. The results of both instruments were largely consistent and contributed directly to answering the research questions and supporting the assumptions regarding teachers and learners' attitudes towards the influence of ChatGPT in on EFL students' writing skills.

Teachers and students at Biskra University demonstrated a shared awereness of the growing relevance of AI tools like ChatGPT in educational context, particulary in supporting academic writing. Both group expressed generally positive attitudes toward its integration. While students recognized the tools as helpful for improving their vocabulary, grammar and

writing organization, teachers viewed it as a means to offer personalized feedback and to assist students in shaping and structuring their ideas more effectively.

Additionally, the responses from both samples confirmed that, when used responsibly, ChatGPT can be a useful aid in writing instruction. Students noted how it helped them better express themselves, refine their drafts, and become more confident in their writing. Teachers acknowledged that such tools could increase student engagement and serve as a helpful supplement in the writing process, especially for generating ideas and organizing content.

However, both teachers and students also voiced important concerns. Teachers warned against overdependence on the tool, stressing that excessive reliance on AI might hinder students' development of independent thinking and originality. Similarly, some students shared their fear of losing their authentic voice in writing or unintentionally engaging in academic dishonesty, such as plagiarism. These concerns highlight the importance of proper guidance and ethical awareness in using AI for educational purposes.

To conclude, the results answered the main research questions and supported the initial assumptions of the study. The perspectives of both students and teachers emphasized that ChatGPT, if integrated thoughtfully and ethically, can play a significant role in supporting academic writing. At the same time, they stressed the need for balance between the use of AI tools and the preservation of core educational values such as creativity, authenticity, and critical thinking.

Conclusion

In conclusion, the primary focus of this study is to illuminate both teachers' and learners' attitudes regarding the impacts of using ChatGPT on students' academic writing skills. Additionally, it incorporates practical suggestions from teachers on how these

technologies can be effectively integrated into the learning process. To fulfil the research objectives, a qualitative study with interpretive paradigm was employed, Two data gathering tools were used to attain valuable results: questionnaire distributed to Master one and face to face interview with EFL teachers at Biskra University.. By analyzing the data obtained from both instruments, significant insights have been offered. These findings contribute to a better understanding of how ChatGPT can be thoughtfully and strategically employed to improve academic writing skills

General Conclusion and Recommendations

This study investigated the perceptions and attitudes of EFL teachers and learners at Biskra University towards the effect of using of AI-based tool ChatGPT on academic writing skills. With the increasing integration of artificial intelligence in educational settings, it became necessary to explore how such technologies are perceived, particularly in language learning contexts. Using a qualitative approach within the interpretivist paradigm and case study design, data were collected from EFL teachers and Master 1 EFL students at Biskra University through a semi-structured interview and a semi-structured questionnaire respectively to provide valuable insights into the practical and pedagogical implications of AI integration.

The dissertation is divided into two principal chapters. Chapter one provides the theoretical foundation of the study. It was divided into two sections. The first section focused on academic writing in EFL settings, covering definition, stages of the writing process, different types and approaches, and effective writing. It also explained the importance of teaching writing for is for EFL learners. The second section gave a detailed look at artificial intelligence, including its meaning, types, key elements, and the use of AI-based applications, namely, ChatGPT in education. It also discussed both the benefits and challenges of using ChatGPT in teaching academic writing. Chapter Two covered the practical part of the study. It explained how the research was carried out, including a review of the study's research methodology and rationale of the choice, , the tools used to collect data, the participants involved, and data analysis procedure. It has also presented the main findings of the students' questionnaires and teachers' interviews, and linked these results to the study's research questions.

Findings revealed that the majority of students view ChatGPT as a beneficial and accessible tool that supports various aspects of writing, including ideas organization, vocabulary enhancement, and time management. However, concerns were raised regarding ethical consideration, potential overreliance, and the risk of diminished creativity and critical thinking. Similarly, teachers acknowledged the potential of ChatGPT to aid students in the writing process but emphasized the need for balanced, ethical, and guided use to ensure it complements rather than replaces critical cognitive engagement.

This study contributes to the growing body of research on the use of ChatGPT in education by examining the diverse attitudes and perceptions of both students and teachers. It emphasizes the importance of promoting digital literacy, ethical awareness, and autonomous learning strategies when incorporating AI tools into academic writing instruction.

Ultimately, the results affirm that ChatGPT can serve as a powerful aid in language development; its effective use relies heavily on thoughtful integration, clear pedagogical frameworks, and continuous reflection on its limitations and implications.

Limitations of The Study

This study faced several limitations that hindered the researcher from conducting the study as was initially intended. Formerly, the research was designed to involve a sample of 30 EFL students; however, only 22 participants responded to the questionnaire, which limited the amount of data collected and may have influenced the sample's representativeness. Furthermore, the study aimed to conduct interviews with ten (10) teachers. However, due to their limited availability, only five (5) teachers participated in the interview, which was deemed insufficient for meaningful qualitative analysis. These were the prevalent constraints encountered by the researcher.

Recommendations for Teachers

1. Motivate learners to employ AI-based applications for brainstorming, structuring their ideas, and obtaining guidance on language mechanics such as grammar, vocabulary and spelling.
2. Reinforce the value of academic integrity by promoting ethical and responsible AI usage to prevent instances of plagiarism.
3. Organize instructional sessions and training programs that demonstrate effective strategies for integrating AI tools into the writing process.
4. Encourage consistent writing practice to help students gradually refine their academic writing abilities.

Recommendations for Students

1. Use AI for helpful feedback on grammar, clarity and word choice to improve academic writing.
2. Make use of AI-assisted referencing tools to manage citations correctly and ensure compliance with academic writing conventions.
3. Be mindful not to depend excessively on AI.
4. Engage in frequent writing activities both within and beyond academic settings to develop stronger writing proficiency.

References

- Alhalangy, A. G. I., & AbdAlgane, M. (2023). Exploring the impact of artificial intelligence on the EFL context: A case study of Saudi universities. *Journal of Intercultural Communication*, 23(2), 41–49. <https://doi.org/10.36923/jicc.v23i2.125>
- Altakhaineh, A. R. M. (2010). The main characteristics of good academic writing in English, language discourse functions, and challenges that Arab students face (Unpublished M.A. thesis). University of Salford. Retrieved from <https://www.academia.edu/4855845/>
- Amita, P. (2024). Research paper on artificial intelligence & its types. *International Journal for Research Trends and Innovation*, 9(10). <https://www.ijrti.org/papers/IJRTI2410020.pdf>
- Baidoo-Anu, D., & Owusu Ansah, L. (2023). Education in the era of generative artificial intelligence (AI): Understanding the potential benefits of ChatGPT in promoting teaching and learning. *Journal of AI*, 7(1), 52–62. <https://doi.org/Insert>
- Barrot, J. S. (2023). ChatGPT as a writing partner: An exploratory study. *Journal of Language Teaching and Research*, 14(1), 42–52. <https://doi.org/10.17507/jltr.1401.05>
- Bell, J. (1999). *Doing your research project: A guide for first-time researchers in education and social science* (3rd ed.). Open University Press.
- Boru, T. (2018). *RESEARCH DESIGN AND METHODOLOGY*. December.
- Bryman, A. (2016). *Social research methods* (5th ed.). Oxford University Press.
- Burns, E., Laskowski, N., & Tucci, L. (2022). What Is Artificial Intelligence (AI)? SearchEnterpriseAI (Blog).

- Chen, L., Chen, P., & Lin, Z. (2020). Artificial intelligence in education: A review. IEEE Access, 8, 75264–75278. <https://doi.org/10.1109/ACCESS.2020.2988510>
- Creswell, J. W., & Creswell, J. D. (2018). Research design: Qualitative, quantitative, and mixed methods approaches (5th ed.). SAGE Publications, Inc
- Dawadi, S., Shrestha, S., & Giri, R. A. (2021). Mixed-methods research: A discussion on its types, challenges, and criticisms. Journal of Practical Studies in Education, 2(2), 25–36. <https://doi.org/10.46809/jpse.v2i2.20>
- Dhanya, M., & Alamelu, C. (2020). Methods and significance of pre-writing activities in acquisition of writing skills. Solid State Technology, 63(2s), 9344–9350.
- Frydrychová Klimová, B. (2013, January). The importance of writing [Research paper]. Paripex – Indian Journal of Research, 2(1), 9–11. <https://doi.org/10.15373/22501991/JAN2013/4>
- Gocen, A., & Aydemir, F. (2020). Artificial intelligence in education and schools. Research on Education and Media, 12(1), 27–32. <https://doi.org/10.2478/rem-2020-0003>
- Glover, I. (2024). What is AI and what can it do for language education? AI & Learning Journal, 3(1), 5–10.
- Harmer, J. (2001). How to teach English: An introduction to the practice of English language teaching (7th impression). Pearson Education Limited.
- Hasan, M. K., & Akhand, M. M. (2010). Approaches to writing in EFL/ESL context: Balancing product and process in writing class at tertiary level. Journal of NELTA, 15(1–2), 77–88.

- Jauharsyah. (2023). Improving students' writing skills through the "Here and Now" strategy (An experimental research on the second year of students at SMAN 1 Bireuen in academic year 2022/2023) (Undergraduate thesis, Ar-Raniry State Islamic University). Faculty of Education and Teacher Training, Department of English Language Education.
- Johnson, A. P. (2024). The five-step writing process. Minnesota State University.
<https://www.teaching-reading.com>
- Khalidi, K. (2017). Quantitative, qualitative or mixed research: Which research paradigm to use? *Journal of Educational and Social Research*, 7(2), 15–22.
<https://doi.org/10.5901/jesr.2017.v7n2p15>
- Kivunja, C., & Kuyini, A. B. (2017). Understanding and Applying Research Paradigms in Educational Contexts. *International Journal of Higher Education*, 6, 26-41.
<https://doi.org/10.5430/ijhe.v6n5p26>
- Kumar, T. (2021). Approaches in teaching writing skills with creative writing: A TESOL study for Indian learners. *TESOL International Journal*, 15(5), 78–89.
- Kvale, S., & Brinkmann, S. (2015). *InterViews: Learning the craft of qualitative research interviewing* (3rd ed.)
- Lehr, F. (1995). Revision in the writing process (ERIC Digest No. ED379664). ERIC Clearinghouse on Reading, English, and Communication.
<https://eric.ed.gov/?id=ED379664>
- Mondal, B. (2020). Artificial intelligence: State of the art. In V. E. Balas, V. Sharma, & A. K. Solanki (Eds.), *Recent trends and advances in artificial intelligence and Internet*

- of Things (Vol. 172, pp. 389–402). Springer. https://doi.org/10.1007/978-3-030-32644-9_32
- Nesba, A. (2022). Ameliorating the writing skill among the university English language students. *El-Quari'e Journal of Literary, Critical and Linguistic Studies*, 5(1), 741–749. <https://www.asjp.cerist.dz/en/article/190616>
- Pattier, D. (2024). ChatGPT and education: A systematic review. Universidad Complutense de Madrid. <https://orcid.org/0000-0003-3426-922X>
- Patton, M.Q. (2015). *Qualitative research & evaluation methods: Integrating theory and practice* (4th ed.). SAGE Publications
- Pham, N. N. H. (2025). The use of ChatGPT in EFL students as a learning assistant in their writing skills: A literature review. *International Journal of AI in Language Education*, 2(1), 38–54. <https://doi.org/10.54855/ijaile.25213>
- Purnamasari, D., Hidayat, D. N., & Kurniawati, L. (2021). An analysis of students' writing skill on English descriptive text. *English Education: Jurnal Tadris Bahasa Inggris*, 14(1), 101–114. <https://ejournal.radenintan.ac.id/index.php/ENGEDU>
- Rao, P. S. (2019). Teaching effective writing skills to the English language learners (ELLs): A study in ELT. *Alford Council of International English & Literature Journal (ACIELJ)*, 2(2), 75–90. <http://www.acielj.com>
- Rao, P. S. (2017). Developing writing skills among the EFL/ESL learners. *Research Journal of English (RJOE)*, 2(3), 52–58. <https://www.rjoe.org.in>

- Ribeiro, R., & Vala, H. (2020). Data privacy in AI-driven education. *Education and Information Technologies*, 25(4), 3399–3415
- Rohman, D . G. (1965). Pre-writing : The stage of discovery in the writing process. *College Composition and communication*, 16(2), 106-112. <https://doi.org/10.2307/354885>
- Rofiqoh, R., Basthomi, Y., Widiati, U., Puspitasari, Y., Marhaban, S., & Sulistyo, T. (2022). Aspects of writing knowledge and EFL students' writing quality. *Studies in English Language and Education*, 9(1), 14–29. <https://doi.org/10.24815/siele.v9i1.21169>
- Sadiku, M. N. O., Ashaolu, T. J., Ajayi-Majebi, A., & Musa, S. M. (2021). Artificial intelligence in education. *International Journal of Scientific Advances*, 2(1), 1–11. <https://doi.org/10.51542/ijscia.v2i1.2>
- Shahata, L. H. A. (2025). The impact of a writing program on improving descriptive essay skills among CFY students. *Open Journal of Modern Linguistics*, 15(2), 183–200. <https://doi.org/10.4236/ojml.2025.152012>
- Song, C., & Song, Y. (n.d.). Enhancing academic writing skills and motivation: Evaluating the effectiveness of ChatGPT in AI-assisted language learning for EFL students [Unpublished manuscript]. School of Foreign Studies, North Minzu University; School of Public Administration, Central South University.
- Sumakul, D. T. Y. G., Hamied, F. A., & Sukyadi, D. (2022). Artificial intelligence in EFL classrooms: Friend or foe? *LEARN Journal: Language Education and Acquisition Research Network*, 15(1), Article 1. <https://so04.tci-thaijo.org/index.php/LEARN/index>
- University of Sydney. (n.d.). Types of academic writing. Retrieved from <https://www.sydney.edu.au/students/writing/types.html>

- Vera, F. (2023). Integrating artificial intelligence (AI) in the EFL classroom: Benefits and challenges. *Revista Electrónica Transformar*, 4(2), [no page numbers].
<https://orcid.org/0000-0002-4326-1660>
- Yaacoub, C., Hoteit, R., & Zhai, X. (2023). The pedagogical impact of ChatGPT in course design. *AI & Education Journal*, 2(1), 45–60.
- Yenduri, G., Ramalingam, M., Selvi, G. C., Supriya, Y., Srivastava, G., Maddikunta, P. K. R., Raj, D., Jhaveri, R. H., Prabadevi, B., Wang, W., Vasilakos, A. V., & Gadekallu, T. R. (2024). GPT (Generative Pre-Trained Transformer): A comprehensive review on enabling technologies, potential applications, emerging challenges, and future directions. *IEEE Access*, 12, 54608–54649.
<https://doi.org/10.1109/ACCESS.2024.3389497>
- Yun, W. S., & Surianshah, S. (2024). A review of the scholarly works on ChatGPT use in education: Bibliometric analysis. *International Journal of Technology in Education (IJTE)*, 7(3), 650–666. <https://doi.org/10.46328/ijte.823>
- Widdowson (2001) Widdowson, H. (2001). *Teaching language as communication*. Oxford: Oxford University Press.
- Zhuang, X. (2007). Reflective thinking on communicative teaching in writing. *US-China Education Review*, 4(5), 19–24.

Appendix 1: Students' Questionnaire

Student's Self-report Questionnaire:

Dear Master One Students, You are kindly invited to complete the present questionnaire which has been tailored to collect data for the accomplishment of a master's dissertation titled "The Effect of Artificial Intelligence Based-Applications ChatGPT on EFL students Writing Skill". Your responses will contribute to understand the benefits and challenges associated with AI-assisted writing. All responses will be kept confidential and used for research purposes only.

Your participation is greatly appreciated.

Section 1: Personal Information

1. Gender:

☐ Male ☐ Female

2. Age: ____

3. How do rate your English writing proficiency?

☐ Beginner ☐ intermediate ☐ advanced

4. Have you utilized ChatGPT or any other AI-based tool for academic writing?

☐ Yes ☐ No

5. How often do you engage with ChatGPT for academic writing tasks?

☐ Never ☐ Rarely ☐ Sometimes ☐ Often ☐ Always

Section 2: AI and Writing Skill Development

6. To what extent do you agree that ChatGPT helps improve your academic writing?

☐ Strongly Agree ☐ Agree ☐ Neutral ☐ Disagree ☐ Strongly Disagree

7. Which aspects of writing do you find ChatGPT most helpful with? (Check all that apply)

☐ Grammar and syntax

☐ Vocabulary enhancement

☐ Sentence structure

☐ Idea organization

☐ Coherence and cohesion

☐ Generating content

8. Do you believe ChatGPT has improved your confidence in academic writing?

☐ Yes ☐ No ☐ Not sure

9. Has the use of ChatGPT decreased the time you allocate to writing assignments?

☐ Yes, significantly

☐ Yes, slightly

☐ No difference

☐ No, it takes more time

Section 3: Challenges and Ethical Considerations

10. What primary challenges do you encounter when using ChatGPT for academic writing?

- ☐ Understanding AI-generated responses
- ☐ Dependence on AI, reducing personal writing efforts
- ☐ Difficulty integrating AI-generated content with my own ideas
- ☐ Ethical concerns (e.g., plagiarism, authenticity of work)
- ☐ Lack of trust in AI-generated content accuracy
- ☐ Others (please specify): _____

11. Do you think AI tools like ChatGPT can negatively impact students' creativity and critical thinking?

- ☐ Yes ☐ No ☐ Not sure

12. Do you believe AI tools should be integrated into academic writing courses?

- ☐ Yes ☐ No ☐ Maybe

13. What limitations or challenges did you encounter when using ChatGPT?

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.....

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Appendix 2: Teachers’ Interview

Teachers interview

I appreciate your willingness to participate in this interview .The purpose of this discussion is to gain your perspectives on the application of AI tools,specifically ChatGPT, in the context of EFL Academic Writing .

A. General Perceptions

1.What is your general opinion about using AI tools like ChatGPT in academic writing?

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B. Impact on student’s Writing Skill Development

2. Depending on your experience, does ChatGPT enhance or hinder EFL students’ writing skill ? How so ?

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3. Which Specific writing aspects (e.g., grammar, coherence, vocabulary) do you think ChatGPT improves ?

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C. Challenges and Ethical Consideration

Question Four: What potential challenges and ethical dilemmas do you perceive in employing ChatGPT for academic writing ?

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D. Pedagogical Integration

Question Five: Would you support the integration of AI tools like ChatGPT into academic writing programs ? Please explain why.

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6. Are there ethical dilemmas (shuch as plagiarism or excessive dependence on the use of ChatGPT)

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ملخص الدراسة

في ظل التقدم التكنولوجي السريع، ظهرت أدوات الذكاء الاصطناعي مثل ChatGPT كمصادر مؤثرة في البيئات التعليمية، لا سيما في دعم تطوير مهارات الكتابة لدى المتعلمين. تهدف هذه الدراسة إلى استقصاء مواقف المعلمين والمتعلمين تجاه تأثير ChatGPT على مهارات الكتابة. تسعى هذه الدراسة إلى استكشاف تصورات وآراء كل من المعلمين والطلاب فيما يتعلق بفعالية الكتابة بمساعدة الذكاء الاصطناعي، وحدودها، بهدف فهم مدى إمكانية أن يشكل ChatGPT أداة مفيدة في التغلب على تحديات الكتابة مثل القواعد اللغوية، استخدام المفردات، وبنية النص. تم اعتماد منهجية بحث نوعية باستخدام تصميم دراسة حالة. تم جمع البيانات من خلال استبيان تم توزيعها على 22 طالبًا في السنة الأولى من الماستر تخصص اللغة الإنجليزية كلغة أجنبية، بالإضافة إلى مقابلة أجريت مع 5 أساتذة في نفس التخصص. كشفت النتائج أن الطلاب يرون بشكل عام أن ChatGPT أداة داعمة وسهلة الوصول لتعزيز كتاباتهم. ومع ذلك، لا تزال هناك مخاوف من الاعتماد المفرط على الذكاء الاصطناعي وما يترتب على ذلك من تأثيرات على التفكير النقدي والأصالة. كما أقر المعلمون بفوائد الذكاء الاصطناعي في توجيه الطلاب خلال عملية الكتابة، لكنهم شددوا على ضرورة دمجها بشكل متوازن وأخلاقي. تُسهم هذه الدراسة في تقديم رؤية قيمة حول كيفية الاستخدام الفعال للذكاء الاصطناعي في السياقات الأكاديمية لتعزيز كفاءة الكتابة، وتشجيع الاستقلالية لدى المتعلمين، ومعالجة الصعوبات الشائعة في الكتابة، مع الأخذ في الاعتبار التداعيات التربوية والتحديات المرتبطة باستخدام الذكاء الاصطناعي في التعليم العالي. كما تؤكد الدراسة في الوقت ذاته على أهمية توجيه الطلاب لاستخدام هذه الأدوات بشكل مسؤول ومدرّس كجزء من مقارنة تعليمية متوازنة.

الكلمات المفتاحية: ChatGPT، الذكاء الاصطناعي، الكتابة باللغة الإنجليزية كلغة أجنبية، الكتابة الأكاديمية،

تصورات المتعلمين، تصورات المعلمين.