AN EXPLORATION OF THE NEXUS BETWEEN ARTIFICIAL INTELLIGENCE-ASSISTED LEARNING AND UNDERGRADUATE STUDENTS' PERFORMANCE IN THE DEPARTMENT OF MASS COMMUNICATION, FEDERAL UNIVERSITY, KASHERE

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Abstract

This study examines the influence of Artificial Intelligence (AI) tools on academic performance among undergraduate students in the Department of Mass Communication at Federal University, Kashere. Guided by the Technology Acceptance Model (TAM), the research explores how students use AI platforms such as ChatGPT, Grammarly, and QuillBot, and evaluates the perceived academic benefits and challenges associated with their use. A quantitative survey design was employed, and data were collected from a total population of 250 students. Out of these, 243 valid responses were analysed using descriptive statistical methods. The findings reveal that a majority of students frequently use AI tools mainly for writing assignments, proofreading, and research tasks—with many reporting improvements in assignment quality, understanding of topics, and completion speed. However, the study also identifies key challenges including poor internet access, limited AI literacy, inaccurate outputs, and a lack of institutional policies guiding ethical AI use. While most students support the formal integration of AI tools into academic practices, the absence of structured frameworks creates uncertainty and risk of misuse. The study concludes that AI tools are positively shaping learning experiences but require institutional support, digital skill development, and clear usage guidelines to maximise their educational value while preserving academic integrity.

Keywords: Artificial Intelligence, AI tools, Academic performance, Undergraduate students, Technology Acceptance Model, Mass Communication.

Introduction

All over the world today, Artificial Intelligence (AI) is revolutionizing how students are taught and how teachers teach. In many regions, universities and schools are adopting AI-powered tools to improve academic experiences and outcomes. In Asia, for example, Chinese universities have integrated AI platforms to support students with writing tasks, provide real-time feedback, and offer personalised learning support (Qi & Li, 2023). In East Asia, particularly South Korea, AI is used to enhance language learning and help students improve their academic writing skills (Lai, 2021). In North America, universities in the United States are making use of AI chatbots and virtual teaching assistants to answer student queries and help them manage their studies more efficiently (Supriyanto, Setiawan, Chamsudin, Yuliana, & Wantoro, 2024). These examples show that AI adoption in education is gaining momentum across continents as institutions seek to make learning more accessible, effective, and engaging.

In Africa, applications of AI are on the rise, albeit at a slower pace than in some of the

developed nations. In South Africa, AI tools are said to be applied at postgraduate level where students utilize such equipment to type and edit their theses and research works (Mabungela, Nyusani, & Mthalane, 2025). In Ghana, Maanu and Larbi (2024) found that learning with the aid of AI enhanced pre-service teachers' mathematics performance if applied in a collaborative setting. In Kenya, institutions of higher education are experimenting with AI chatbots to assist students with online and distance learning, providing assistance with coursework and assignments (Adewale, Azeta, Abayomi-Alli, & Sambo-Magaji, 2024).

In Nigeria, AI-aided learning is gaining a lot of popularity, particularly in tertiary education. Nigerian students increasingly utilize software such as ChatGPT, Grammarly, QuillBot, and Google Translate to aid their studies (Ojo, 2024). Ojo (2024) reports that approximately 68 percent of Nigerian university students indicated using ChatGPT in their studies. This figure is more in Lagos, Rivers, and Oyo States as their students get better access to the Internet and appear to be more aware of AI tools (Abubakar, Falade, & Ibrahim, 2024). In Lagos State University and the University of Lagos, students in the Department of Mass Communication have been actively using AI tools in editing news stories, creation of advertising content, and preparation of social media posts (Sunday, Eze, Okonkwo, & Bashir, 2025). In Akwa Ibom State, teachers have reported that the use of Artificial Intelligence tools has improved classroom teaching and enhanced student performance in secondary schools (Udo & Effiong, 2024).

This fast development of AI-supported learning in Nigeria has triggered numerous issues. Based on Abubakar, Falade and Ibrahim (2024), while nearly 72 percent of Nigerian students utilize AI tools on a daily basis for studies, just around 24 percent of universities have pronounced policies regarding how such tools are to be utilized ethically. This lack of guidance can confuse students and may lead to academic misconduct, such as plagiarism or overdependence on AI. In mass communication departments, the issue is even more serious because students are now using AI to rewrite news articles, generate blog posts, and write parts of their project reports (Ojo, 2024). This raises questions about originality, authenticity, and the real development of writing skills.

Wang and Jiang (2025) argue that though AI can be extremely useful in improving learning, it must be used prudently so that it will not kill off students' thought, writing, and creativity. Nigerian mass communication students are intended to gain good writing, media production, and critical thinking skills. If they over-rely on AI tools, these fundamental skills will be lost. The other worry is the digital gap in Nigeria. Students in southern states like Lagos and Rivers tend to have easier access to AI tools because of improved internet infrastructure, whereas students in most northern states continue to suffer from poor connectivity and limited digital resources (Jeilani & Abubakar, 2025).

This digital disparity may widen education gaps if it is not addressed. Additionally, most communications educators in Nigeria fear that students are employing AI technologies to bypass doing actual learning activities, which may undermine their long-term abilities and professional competence (Abubakar, Falade, & Ibrahim, 2024). For this reason, it is very important now to study how AI-assisted learning is affecting the academic performance of students in Nigerian universities, especially in mass communication departments where creativity, critical thinking, and originality remain at the heart of professional success.

Problem Statement/Justification

Artificial Intelligence (AI) is now changing how students learn across university campuses globally. In Nigeria, undergraduate students especially those in non-science disciplines like Mass Communication are increasingly using AI tools such as ChatGPT, Grammarly, and QuillBot to write essays, edit classwork, and complete assignments (Ojo, 2024). While these tools can support learning and improve efficiency, there is growing concern that students may become overdependent on them. In communication-related fields, where creativity, originality, and critical thinking are essential, excessive reliance on AI could weaken these core skills (Abubakar, Falade, & Ibrahim, 2024).

Although global studies have highlighted both the benefits and risks of AI use in education, there is a notable research gap in the Nigerian context. For example, Wu, Zhang, Ma, Yue, and Dong (2024) as well as Lai (2021) argue that AI improves engagement and personalises learning in Asia. Conversely, Wu, Zhang, Li, and Liu (2022) and Wang and Jiang (2025) warn that students may lose independent thinking when they overuse AI tools. In Nigeria, some attempts have been made to address this issue. A few institutions have introduced workshops or basic guidelines on ethical AI usage (Jeilani & Abubakar, 2025). In some southern states, lecturers are also beginning to educate students on responsible AI use (Sunday, Bassey, Essien, Udoh, & Paul, 2025). However, these initiatives are not widespread or institutionalised.

The existing studies in Nigeria are largely descriptive, with limited empirical evidence focused on how AI-assisted learning is directly affecting academic performance in specific disciplines like Mass Communication. Furthermore, there is no uniform policy across Nigerian universities on how AI tools should be used, especially in creative academic fields. Most students use these tools with little or no academic supervision, which often leads to poor development of independent writing, media literacy, and analytical thinking (Abubakar et al., 2024; Ojo, 2024).

This study aims to fill this empirical and policy gap by focusing on Mass Communication undergraduates at Federal University, Kashere. It will explore the actual impact of AI-assisted learning on their academic performance, especially in terms of writing quality, creativity, and critical engagement. The study will also investigate whether clear institutional policies and educational interventions are in place to support ethical and productive use of AI.

Objective of the Study

i. To find out how Mass Communication students at Federal University, Kashere, are using AI tools in their studies.
ii. To examine how the use of AI tools affects students' academic performance.
iii. To investigate the challenges associated with the use of AI tools among Mass Communication undergraduates

Literature Review

Artificial Intelligence (AI)-assisted learning refers to the use of digital tools powered by AI to support students in tasks such as writing, editing, research, and feedback generation. Common examples include ChatGPT, Grammarly, QuillBot, and AI chatbots. These tools are increasingly used by university students to improve the quality of their assignments and reduce academic workload (Qi & Li, 2023). However, while the use of AI in education is widely praised for its potential to enhance learning, scholars have warned that its unregulated use could damage essential academic skills,

particularly in disciplines like Mass Communication that require creativity, originality, and independent thinking (Wu, Zhang, Li, & Liu, 2022).

Several international studies have reported the benefits of AI in learning. Qi and Li (2023), for example, found that Chinese students who used AI tools received faster feedback and were more engaged in their learning. Similarly, Lai (2021) noted that Taiwanese students preferred AI-assisted learning because it allowed them to learn at their own pace. Wu, Zhang, Ma, Yue, and Dong (2024) also observed that AI-supported platforms helped students build stronger habits in self-directed learning. While these studies offer valuable insight, they were conducted in technologically advanced countries and mostly in STEM-related disciplines. As such, their relevance to a developing country like Nigeria especially in a field such as Mass Communication remains questionable.

Also, Ojo (2024) conducted a study involving students from Lagos, Rivers, and Oyo States and reported that 68 percent of respondents use ChatGPT and similar tools to support their writing. However, the study did not examine the effects of this usage on students' ability to write independently or think critically. These raises concerns in the context of Mass Communication, where strong writing and editorial skills are vital. Also, most of the findings from southern Nigeria may not reflect the realities of students in Northern Nigeria, who may have less access to digital tools and weaker internet connectivity factors that could shape their experience with AI learning tools.

Further, Mabungela, Nyusani, and Mthalane (2025) studied postgraduate students in South Africa and found that AI tools were mostly used for editing theses and correcting grammar. While this suggests that AI can improve technical quality, it also supports concerns raised by Wang and Jiang (2025), who warned that students may lose the ability to write creatively and originally when they rely too much on automated tools. This risk is particularly critical in Mass Communication where original content creation is a core requirement for success in journalism, advertising, and media production. Ethical concerns around AI use in higher education are also growing. According to Abubakar, Falade, and Ibrahim (2024), although 72 percent of Nigerian students use AI tools, only 24 percent of universities have policies to guide ethical use. Jeilani and Abubakar (2025) further found that many students across Nigerian institutions lack knowledge of what constitutes AI plagiarism, which increases the likelihood of academic dishonesty. In Mass Communication, where professional ethics are a key part of the curriculum, this trend is alarming. Moreover, while some reports suggest that AI tools have had a positive effect in secondary schools in southern Nigeria (Sunday, Bassey, Essien, Udoh, & Paul, 2025), there is a noticeable lack of empirical research focused on universities in the northern region of the country. As Jeilani and Abubakar (2025) note, institutions in Northern Nigeria often face infrastructural challenges such as poor internet access and low digital literacy, which could significantly affect how students use or even access AI tools.

From the reviewed literature, it is evident that most studies have focused on either postgraduate students, southern institutions, or science-based courses. There is little evidence on how AI tools are influencing academic performance, particularly in writing, creativity, and critical thinking, among Mass Communication undergraduates in Northern Nigerian universities. This represents a clear empirical and contextual gap, which this study aims to address by focusing specifically on students in the

Department of Mass Communication, Federal University, Kashere. It will also consider the presence or absence of institutional support or guidelines that shape responsible use of AI in learning within this context.

The Nexus between AI-Assisted Learning and Undergraduate Students' Performance

Several international studies have explored the connection between AI-assisted learning and students' academic performance. For instance, Chung, Hwang, and Chen (2024) conducted a quasi-experimental study in Taiwan to measure the impact of AI-based learning platforms on undergraduate performance in online courses. Their results showed that students who used AI tools performed better in tests compared to those who used conventional resources. However, it is important to note that the study was situated in a technologically advanced environment with high digital literacy and infrastructure, which may not reflect realities in Nigeria, particularly in under-resourced institutions in Northern regions. Also, the study focused on general academic courses, not Mass Communication, where creativity and originality are crucial.

Similarly, Mousavi, Tajadini, and Ghaffarzadeh (2023) examined the effect of AI writing tools like Grammarly and QuillBot among English language students in Iran. Their mixed-method findings revealed improvements in grammar and essay structure, but also warned of overdependence, with students becoming less confident in correcting errors without AI support. While their conclusion that AI tools are useful for technical writing is valid, its relevance to Mass Communication where critical and creative thinking must be independently developed remains limited unless properly integrated with active teaching methods. In addition, the cultural and academic context in Iran may differ significantly from Nigeria, especially in terms of access to digital tools and policy enforcement.

In Saudi Arabia, Alkhalaf and Alshammari (2024) explored how AI-based feedback systems influenced students' practical skills in communication courses. Their findings suggested that AI-supported feedback improved student performance in media content development. However, students with weak foundational skills tended to rely too heavily on AI outputs. This raises a serious concern for Mass Communication education, where foundational writing, analysis, and storytelling abilities should be cultivated manually before any AI support is introduced. Although the researchers recommended policy frameworks for AI use in communication courses, they did not consider socio-economic or digital inequality barriers, which are particularly relevant in Nigeria.

A more discipline-specific study by Ibrahim and Saleh (2023) in Egypt evaluated the effect of AI-based personalised learning systems on Mass Communication students. The research reported improvement in writing and critical thinking, suggesting that AI systems tailored to individual learning needs can deepen academic outcomes. However, there was little discussion about how these AI systems were adapted to support media-related coursework or the risks of cognitive offloading where students become passive recipients rather than active learners. Moreover, the assumption that departments can easily invest in such AI systems overlooks the financial and infrastructural limitations facing most Nigerian public universities.

Khan and Ahmed (2024), in a qualitative case study in Pakistan, analysed how AI chatbots influenced understanding of complex media theories among undergraduate students.

Their findings showed that AI improved student motivation and concept clarity. Yet, a key weakness was students' tendency to trust AI-generated answers without verification, which potentially undermines critical thinking. This issue is especially important for Nigerian Mass Communication students, who must engage in fact-checking and source validation as part of media ethics training. While the study's recommendation to include AI usage training is useful, it still assumes that institutions have the capacity to develop such curriculum, which is not always the case locally. From this review, it is evident that although international studies suggest that AI-assisted learning tools can improve performance, many of them fail to address core issues relevant to Nigeria. These include digital access disparities, lack of institutional policies, and the unique demands of media and communication training.

Theoretical Framework

This study is guided by Technology Acceptance Model (TAM) that help to explain how AI-assisted learning affects student performance. The Technology Acceptance Model (TAM) was first introduced by Fred Davis in 1986 as part of his PhD work at MIT. The model was officially published in 1989 in the journal Management Information Systems Quarterly (Davis, 1989). Davis created TAM to help explain why people choose to accept or reject new technology. The model was built on ideas from the earlier Theory of Reasoned Action by Fishbein and Ajzen (1975), but TAM focused more on how users behave with computers and other digital tools. The central principle of TAM is extremely straightforward: if an individual thinks that a technology is helpful and simple to use, then they will find it more acceptable and make use of it. Since it was introduced, TAM has been employed in numerous research studies to describe the acceptance of various technologies, such as AI-supported learning tools utilized by university students today (Venkatesh & Davis, 2000).

One of the founding presumptions of TAM is that individuals' behavior with respect to new technology relies primarily on two factors: Perceived Usefulness and Perceived Ease of Use (Davis, 1989). Perceived Usefulness refers to an individual's perception that the use of the technology will enhance his/her performance. For example, if a student thinks that using ChatGPT will help them write better essays or complete tasks faster, they will be more likely to use it. Perceived Ease of Use means that the person believes the technology is simple to use and does not require too much effort. If a student finds an AI tool very complicated, they may avoid it, even if it is useful (Venkatesh & Davis, 2000).

One of the criticisms of TAM is that it overemphasizes individual choice and does not take into account a greater social or cultural context (Bagozzi, 2007). Sometimes, students may be forced by lecturers to use a specific AI tool, or they could be pushed by their peers to utilise it despite disbelieving in its effectiveness. These situations are not explained by TAM as they are behaviorally driven by forces outside personal acceptance.

For this current study, TAM is very useful because it helps to explain why many Mass Communication students are adopting AI-assisted learning tools. The model suggests that when students believe that AI tools can improve their academic performance (Perceived Usefulness) and that these tools are simple to use (Perceived Ease of Use), they will be more likely to use them regularly. It will help this research delve deeper into how AI-supported learning is affecting the performance of students and recommend how teachers can direct students to employ these technologies in a well-balanced and responsible manner.

Methodology

This study adopted a quantitative research design using a census approach. The aim was to examine the influence of AI-assisted learning on the academic performance of undergraduate students in the Department of Mass Communication at Federal University, Kashere, Gombe State, Nigeria. The choice of the census method was informed by the relatively small size of the study population, which made it feasible to involve all students without the need for sampling.

The total population comprised 250 undergraduate students from 100 to 400 level. This figure was obtained from the department's official academic records for the 2023/2024 academic session. Since the number was manageable, all 250 students were included in the study, ensuring comprehensive data coverage.

Data was collected using a structured questionnaire designed by the researcher and validated by academic experts in mass communication and educational research. The questionnaire contained only closed-ended questions, grouped into four sections. These covered: (1) the extent of AI tool usage (e.g., ChatGPT, Grammarly, QuillBot), (2) the impact of AI on writing, creativity, and critical thinking, (3) ethical concerns and misuse, and (4) the availability of institutional guidelines on AI use.

Questionnaires were distributed physically during lecture periods with permission from course lecturers, and students were given time to fill them in and return on the same day. Out of the 250 distributed, 215 valid questionnaires were retrieved, giving a response rate of 86 percent.

The data collected was analysed using descriptive statistics with the help of the Statistical Package for the Social Sciences (SPSS) Version 25. Analysis included frequency counts and percentages to summarise student responses and identify trends related to AI-assisted learning and academic performance.

Data Presentation

This session presents and explains the data collected from the respondents. The data was gathered through structured questionnaire and analysed using simple descriptive statistics. The results are shown in tables, with each table followed by a brief explanation. A total of 250 questionnaires were distributed to Mass Communication students at Federal University, Kashere, but 243 were retrieved and found valid for analysis, giving a response rate of 97.2%. The data analysis was done using SPSS (Version 25) and is presented in tables, followed by simple and clear explanations. The results are arranged according to the research questions, beginning with the demographic profile of respondents.

Demographic Characteristics of Respondents

This section shows the background details of the respondents in terms of their level of study, gender, and age group. These details help to understand the spread of the responses across different categories of students.

Table 1: Demographic Profile of Respondents

Demographic Variable	Category	Frequency (n)	Percentage (%)
Level of Study	100 level	62	25.5%
	200 level	64	26.3%
	300 level	59	24.3%
	400 level	58	23.9%
Gender	Male	127	52.3%
	Female	116	47.7%
Age Group	16–20 years	69	28.4%
	21–25 years	121	49.8%
	26–30 years	42	17.3%
	Above 30 years	11	4.5%
	Total Responses	**243**	**100%**

Source: Author's Construct/Field Data Analysis, 2025

From the table above, the highest number of respondents came from 200 level (26.3%), followed closely by 100 level (25.5%), 300 level (24.3%), and 400 level (23.9%). This shows a fairly balanced representation across all levels of study, which is important in understanding AI tool usage among students at different academic stages. On gender, male respondents were slightly more than female respondents. Males made up 52.3% while females made up 47.7%. This near-even distribution suggests that the opinions gathered reflect both male and female perspectives fairly. As for age, most of the students were between 21 and 25 years (49.8%), followed by those aged 16 to 20 years (28.4%). A smaller number of students were between 26 and 30 years (17.3%), and just 4.5% were above 30 years. This shows that the majority of the students are in their early twenties, which is typical for undergraduate programmes in Nigeria.

Use of AI Tools in Academic Activities

This section presents the responses related to Research Question One, which is to find out how Mass Communication students at Federal University, Kashere are using Artificial Intelligence (AI) tools in their academic work. The analysis covers the types of AI tools used, frequency of use, purposes for use, how students first heard about these tools, and whether they believe AI tools have helped their studies.

Table 2: Use of AI Tools by Respondents

Item	Response Option	Frequency (n)	Percentage (%)
AI Tool Most Frequently Used	ChatGPT	103	42.4%
	Grammarly	51	21.0%
	QuillBot	37	15.2%
	Google Bard	18	7.4%
	Turnitin AI Checker	20	8.2%
	AI Transcription Tools	10	4.1%
	Others	4	1.6%
Frequency of Use	Daily	92	37.9%
	A few times a week	87	35.8%
	Once a week	31	12.8%
	Rarely	24	9.9%
	Never	9	3.7%
Main Academic Use of AI Tool	Writing Assignments	112	46.1%
	Proofreading	53	21.8%
	Research Summaries	38	15.6%
	Generating Ideas	29	11.9%
	Transcribing Lectures	7	2.9%
	None	4	1.6%
How AI Tools Were First Known	Friends/Peers	108	44.4%
	Lecturers	19	7.8%
	Social Media	67	27.6%
	Online Tutorials/Adverts	38	15.6%
	Others	11	4.5%
AI Tools Made Academic Work Easier?	Strongly Disagree	3	1.2%
	Disagree	8	3.3%
	Neutral	28	11.5%
	Agree	129	53.1%
	Strongly Agree	75	30.9%
	Total Responses	**243**	**100%**

Source: Author's Construct/Field Data Analysis, 2025

From the table above, most students identified ChatGPT (42.4%) as the main AI tool they use for academic work. Grammarly followed with 21.0%, while QuillBot (15.2%) and Turnitin AI checker (8.2%) had smaller user groups. This shows that many students prefer ChatGPT for academic support compared to other tools. On how frequently AI tools are used, 37.9% said they use them daily, and another 35.8% use them a few times a week. Only a few students (3.7%) never use AI tools. This indicates that AI tools are already widely accepted and integrated into students' regular academic routines.

Regarding the main academic use, nearly half of the respondents (46.1%) use AI tools mostly for writing assignments. Others use them for proofreading (21.8%) and summarising research work (15.6%). Only a small group uses them for transcription or idea generation. This shows that most students rely on AI to help with writing-related tasks. As for how students first heard about AI tools, 44.4% said through friends or peers, while 27.6% learnt through social media. A small number heard about it from lecturers (7.8%), showing that formal classroom exposure is still limited. Finally, most students agreed (53.1%) or strongly agreed (30.9%) that AI tools have made their academic work easier. Only 4.5% disagreed. This shows that students see AI as a helpful and time-saving tool in their academic journey.

Based on the analysis, it can be concluded that Mass Communication students at Federal University, Kashere, are actively using AI tools in their academic work, with ChatGPT being the most preferred. The tools are mostly used for writing assignments and proofreading, and many students engage with these tools on a daily or weekly basis. Most of them became aware of AI tools through informal sources like peers and social media rather than through lecturers or academic training. Importantly, the majority of respondents agreed that AI tools have made their academic tasks easier. This shows that AI tools have become an essential part of students' learning and academic support, especially in writing-related tasks, though there is still limited formal integration into classroom instruction.

Impact of AI Tools on Academic Performance

This section addresses **Research Question Two,** which seeks to examine how the use of AI tools affects the academic performance of Mass Communication students at Federal University, Kashere.

Table 3: Perceived Impact of AI Tools on Academic Performance

Item	Response Option	Frequency (n)	Percentage (%)
Has academic performance improved since using AI tools?	Yes	167	68.7%
	No	36	14.8%
	Not sure	40	16.5%
Main contribution of AI tools to academic performance	Helped with better understanding of topics	66	27.2%
	Improved assignment quality	78	32.1%
	Increased speed of completing tasks	54	22.2%
	Helped overcome writing or grammar difficulties	35	14.4%
	No noticeable difference	10	4.1%
	Total Responses	**243**	**100%**

Source: Author's Construct/Field Data Analysis, 2025

From the data above, a large number of students (68.7%) believe that their academic performance has improved since they started using AI tools. Only 14.8% said there was no improvement, while 16.5% were unsure. This shows that the majority of students have seen positive academic changes linked to AI usage. When asked how AI tools have helped, most students (32.1%) said that their assignment quality improved. This was followed by students who reported that AI tools helped them better understand topics (27.2%) and complete tasks faster (22.2%). A smaller number (14.4%) said the tools helped them with writing or grammar problems. Only 4.1% of the students felt that AI tools made no real difference.

These results revealed that AI tools are making a clear and positive contribution to students' academic activities, especially in terms of improving written work and helping them complete tasks more efficiently. In conclusion, the findings under Objective Two show that the majority of students believe the use of AI tools has improved their academic performance. Most students linked this improvement to better assignment quality, improved understanding of topics, and faster task completion. This shows that AI tools are not only widely used but are also having a measurable positive impact on how students' study and perform academically, particularly in writing-based coursework.

Challenges Associated with AI Tool Usage

This section presents the results related to **Research Question Three**, which investigates the challenges Mass Communication students face while using AI tools.

Table 4: Challenges Students Face While Using AI Tools

Item	Response Option	Frequency (n)	Percentage (%)
Main challenge faced when using AI tools	Poor internet access	74	30.5%
	Lack of knowledge on how to use them	52	21.4%
	Inaccuracy of AI responses	45	18.5%
	Over-dependence on AI	39	16.0%
	Lack of university guidance or policy	27	11.1%
	Others	6	2.5%
Do lecturers accept AI-assisted work?	Yes	88	36.2%
	No	107	44.0%
	Not sure	48	19.8%
Should AI tools be officially allowed and guided in academic work?	Strongly disagree	7	2.9%
	Disagree	15	6.2%
	Neutral	30	12.3%
	Agree	115	47.3%
	Strongly agree	76	31.3%
	Total Responses	**243**	**100%**

Source: Author's Construct/Field Data Analysis, 2025

The table shows that the biggest challenge students face when using AI tools is poor internet access (30.5%), followed by lack of knowledge on how to use the tools (21.4%). Other notable challenges include inaccurate or unreliable AI responses (18.5%) and over-dependence on the tools (16.0%). Only a few students (11.1%) cited the lack of formal university guidance or policy as a barrier. This reveals that many of the issues are related to access and technical skills rather than institutional rejection.

On whether lecturers accept AI-assisted academic work, most students (44.0%) said no, while 36.2% said yes, and 19.8% were not sure. This shows that there is still uncertainty and inconsistency in how AI-supported work is treated within the department.

However, when asked if AI tools should be officially allowed and guided within academic settings, a large number of students were in support. 47.3% agreed and 31.3% strongly agreed, meaning that most

respondents want clear approval and direction from the university on using AI tools. Only a few students opposed this idea (9.1% combined). From the analysis it revealed that that while AI tools are widely used, students face several challenges such as poor internet access, limited understanding of how to use AI effectively, and occasional inaccuracies in AI-generated responses. Many students also observed that their lecturers do not currently accept AI-assisted work. Despite these obstacles, the majority of students strongly support the idea of officially allowing and guiding the use of AI tools in academic activities, indicating a need for proper institutional frameworks and digital literacy training.

Discussion of Findings

This section presents the discussion of major findings from the quantitative survey conducted among Mass Communication students at Federal University, Kashere. The discussion is organised according to the three research objectives and draws upon existing literature reviewed in Chapter Two, with insights guided by the Technology Acceptance Model (TAM).

Research Objective One: How are Mass Communication Students Using AI Tools in Their Studies?

The analysis (see Table 2) shows that a large proportion of students (42.4%) use ChatGPT, followed by Grammarly (21.0%) and QuillBot (15.2%), with most students using these tools daily (37.9%) or a few times weekly (35.8%). The primary academic purposes include writing assignments (46.1%), proofreading (21.8%), and summarising research (15.6%). These findings demonstrate that students are not only aware of AI tools but are actively integrating them into core academic tasks.

This aligns with the Perceived Usefulness aspect of TAM, which proposes that a user is more likely to adopt a system when it enhances their performance. Here, students view AI tools as helpful in completing tasks more efficiently and with better quality. The tools' regular use and choice of functions also suggest a high level of Perceived Ease of Use, as students are selecting platforms that are accessible, quick to learn, and meet immediate academic needs.

However, the results also show that informal sources like friends and peers (44.4%) and social media (27.6%) are the main sources of awareness. Only a small percentage (7.8%) reported learning about AI tools through lecturers. This gap suggests that while students have embraced AI tools personally, formal academic systems in the university are yet to catch up in guiding or institutionalising AI use. According to Alimisis (2023), institutions that delay integration of educational technology leave students navigating the space without ethical or academic direction.

Research Objective Two: How Does the Use of AI Tools Affect Students' Academic Performance?

As shown in Table 3, 68.7% of students reported improved academic performance since using AI tools. Most of them linked this improvement to better-quality assignments (32.1%), clearer understanding of topics (27.2%), and faster task completion (22.2%). These outcomes directly reflect both PU and PEOU, which TAM identifies as crucial to continued use and satisfaction with technology tools.

This finding supports earlier work by Dizon (2020), who found that AI writing assistants like Grammarly and QuillBot improved student outcomes in writing-intensive disciplines. In the current study, students believe that AI enhances learning and helps

reduce stress related to workload. In line with Davis (1989), when users perceive that a system improves their academic output with minimal effort, they are more likely to integrate it into their routine.

Interestingly, only a small number (4.1%) said AI made no difference to their performance, which further confirms a strong general acceptance of AI in the academic context. However, there is also a risk of over-reliance, especially in areas where students use AI without critically engaging with its content or understanding its limitations. This calls for deeper digital literacy integration into academic programmes, as pointed out by Bashir and Awoyemi (2022), who warned that blind dependence on AI could weaken critical thinking.

Research Objective Three: What Challenges Are Associated with the Use of AI Tools Among Students?

Findings from Table 4 show that poor internet access (30.5%) and lack of knowledge on how to use AI tools (21.4%) are the two most reported challenges. Others include inaccuracy of AI responses (18.5%) and over-dependence on AI tools (16.0%). These challenges reveal that while AI tools are perceived as useful and easy to use, external and internal barriers still exist.

This observation is consistent with the external variables component of TAM, which notes that even if users find a system easy and useful, technical barrier like infrastructure, digital divide, or lack of institutional support can limit effective use. As noted by Ndubuisi and Salihu (2023), Nigerian students often face connectivity problems that disrupt seamless use of online academic tools.

In terms of institutional readiness, 44.0% of students said their lecturers do not accept AI-assisted academic work, while 36.2% believed they did. Despite this, a strong majority (78.6%) of students either agreed or strongly agreed that AI tools should be officially allowed and guided in university academic work. This shows a high level of demand from students for formal academic frameworks that address AI use.

According to TAM, this suggests that while students accept AI tools, there is a lack of institutional alignment, which can limit long-term and ethical usage. Without clear guidelines, students may continue to use AI tools in ways that conflict with academic integrity policies or miss opportunities to learn how to use them responsibly.

Conclusion

Based on the discussion of findings, the study concludes that AI tools are widely accepted and actively used by Mass Communication students at Federal University, Kashere, especially for writing assignments, proofreading, and improving academic performance. The findings showed that students find these tools both useful and easy to use, which confirms the key principles of the Technology Acceptance Model (TAM) specifically, that perceived usefulness and ease of use influence the adoption of technology. While many students reported better academic outcomes since using AI, the study also discovered major challenges, including poor internet access, limited knowledge of AI functionality, and the lack of institutional support or clear policies regarding AI use. Despite these issues, students strongly supported the idea that AI tools should be formally integrated into academic systems with proper guidance. Therefore, the study concludes that AI has great potential to improve learning if supported by structured policies, digital training, and ethical guidelines within the university system.

Recommendations

Based on the findings the study recommends that:

1. The university management and the Department of Mass Communication should develop an AI Literacy Integration Policy that formally introduces students to responsible and effective use of AI tools in their coursework. This should be embedded in general studies or digital communication courses.
2. The university should adopt a Guided AI Adoption Framework that supports students in using AI tools to enhance learning without compromising academic integrity. This framework should include departmental-level policies that allow regulated use of AI tools in assignments and projects, with clear limits to prevent misuse.
3. To address access and usage challenges, the institution should invest in improving digital infrastructure and inclusive access policies. This includes expanding campus internet connectivity, offering subsidised or free data bundles to students, and establishing an on-campus Digital Support Unit where students can receive hands-on help with AI tools.

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