

# INFLUENCE OF CYBERCRIME ON THE PERFORMANCE OUTCOMES OF MASS COMMUNICATION STUDENTS IN FEDERAL POLYTECHNIC IN ADO EKITI

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#### Abstract

This study investigated the influence of cybercrime on the performance outcomes of mass communication students in Federal Polytechnic in Ado Ekiti. The study specifically examined the types of cybercrime are most prevalent; the level of cybercrime on students' performance outcomes; and the strategies can be employed to minimize cybercrime risks among mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State. A survey research design was utilized, with a sample of 150 students selected through simple random sampling. Data were collected using a validated and reliable structured questionnaire and analyzed using descriptive statistics such as mean and standard deviation. The findings revealed a high prevalence of cybercrime among the students, with financial fraud, cyberbullying, identity theft, hacking, and online exam cheating identified as common issues. The study also found that cybercrime significantly disrupts students' academic performance, causing stress, reduced participation in academic activities, and loss of study materials. To mitigate these challenges, students employed coping strategies such as enhanced cybersecurity awareness, stricter institutional policies, and the use of personal security tools like strong passwords and multi-factor authentication. The study concludes that while students face substantial cybercrime risks, proactive measures can reduce its impact. The author recommended that increasing cybersecurity education, implementing stringent cybersecurity policies, and providing institutional support systems to safeguard students' academic and personal well-being will contribute to understanding cybercrime's effects in academic settings and emphasize the need for comprehensive strategies to address the issue.

Keywords: Academic Performance, Cybercrime, Mass Communication Students, Performance Outcomes.

#### Introduction

The performance outcomes of students in tertiary institutions serves as a benchmark for their academic success and professional readiness. For instance, academic performance is defined as the achievement of learning goals measured through assessments, grades, practical outcomes, and research outputs (Adedokun & Olayinka, 2021). For students of mass communication, performance outcomes encompass theoretical knowledge, practical skills in media production, critical analysis, and effective communication strategies essential for a career in the competitive media and communication industry. However, the emergence and prevalence of cybercrime have posed significant challenges to the academic performance of students, especially those in digital-intensive fields such as mass communication.

Cybercrime is broadly described as criminal activities executed using computers and the internet, including phishing, hacking, identity theft, and cyberbullying (Olowookere et al., 2023). Its impact has been profound, with global cybercrime damages estimated to reach \$10.5 trillion annually by 2025 (Cybersecurity Ventures, 2022). Students in tertiary institutions are particularly vulnerable to cybercrime



due to their high levels of reliance and exposure to technology for learning, communication, information, and assignments. For instance, phishing scams targeting students' institutional emails disrupt access to academic resources, while ransomware attacks compromise critical academic files (Akintunde & Adeyemi, 2023). Among mass communication students, who frequently engage in online research, media uploads, and interactive platforms, cybercrime incidents create significant disruptions, impeding their academic goals and practical engagements.

The psychological impact of cybercrime further exacerbates its hindrance on performance outcomes. Studies revealed that victims of cybercrime often experience anxiety, reduced self-esteem, and impaired focus, leading to poor performance outcomes (Ekanem, 2020). Cyberbullying on social media platforms, a common issue among students, has been linked to decreased classroom engagement and higher dropout rates (Johnson, 2022). Moreover, identity theft, which involves unauthorized access to students' personal and financial information, has led to cases of financial losses and emotional distress, further derailing academic pursuits (Chukwu & Nwankwo, 2023). In view of the aforementioned discussions, this study seeks to examine the influence of cybercrime on the performance outcomes of mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State.

Academic performance remains a fundamental concern in higher education, as it reflects students' ability to meet institutional standards and prepares them for professional success. For mass communication students, academic performance is integral to acquiring critical skills such as media production, effective communication, and analytical thinking. However, recent trends indicate a decline in students' academic performance, which has been attributed to various factors, including the growing prevalence of cybercrime. The reliance of mass communication students on digital platforms for academic research, practical media work, and communication has exposed them to significant risks associated with cybercrime.

Cybercrime activities such as phishing, hacking, and identity theft have disrupted students' access to learning materials and compromised sensitive academic data, thereby negatively impacting their academic performance (Olowookere et al., 2023). Furthermore, cyberbullying on social media platforms has contributed to psychological distress among students, reducing their classroom engagement and overall productivity (Ekanem, 2020). Against this identified problems, the study tends to examine the effect of cybercrime on the academic performance of mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State.

# **Purpose of the Study**

The aim of the study is to examine the influence of cybercrime on performance outcomes of mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State. Specifically, the study seeks to investigate:

- 1. the prevalence of cybercrime among mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State.
- 2. the level of cybercrime on students' performance outcomes of mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State.
- 3. the coping mechanisms employed to mitigate cybercrime risks among mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State.

#### **Research Questions**

The following research questions guided the study.

Research Question 1: What types of cybercrime are most prevalent among mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State?

Research Question 2: What is the level of cybercrime on students' performance outcomes of mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State?

Research Question 3: What strategies can be employed to minimize cybercrime risks among mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State?



#### Literature Review

### Academic Performance

Academic performance refers to how well students perform in their studies, typically assessed by their grades, achievements in assignments, and examination results. It is a multifaceted concept that encompasses cognitive abilities, emotional resilience, time management skills, and access to learning resources. According to Jeynes (2020), academic performance is influenced by various internal and external factors, including motivation, family background, and environmental conditions. In the context of mass communication students, academic performance also depends on the development of specific skills such as writing, media production, and critical thinking, which are core to their field (Zhao & Luch, 2021).

The academic performance of students is affected by both intrinsic factors, such as study habits and self-regulation, and extrinsic factors, such as institutional support and societal influences. Studies have shown that when students face external challenges like cybercrime, their ability to focus on their studies is disrupted, leading to poor academic outcomes (Liu et al., 2022). Research carried out by Omotayo (2021) pointed out that mass communication students, due to the nature of their curriculum, are particularly vulnerable to the effects of cybercrime, which can impede their access to online resources and disrupt their academic activities. Furthermore, studies such as that of Ekanem and Ogunyemi (2023) indicate that the increasing reliance on digital platforms for academic work has brought new challenges to students' academic performance. Cybercrime, including hacking and phishing, affects students' ability to access research materials, complete assignments, and submit work on time, ultimately hindering their academic success (Aderemi, 2021). This suggests that academic performance in Nigerian tertiary institutions, particularly among mass communication students, is increasingly being threatened by cybercrime.

# Cybercrime

Cybercrime involves illegal activities conducted through or involving the internet, such as hacking, identity theft, cyberbullying, and online fraud. These activities have grown in complexity and frequency, causing significant harm to individuals and organizations alike (Chukwu et al., 2022). Cybercrime impacts various sectors, including education, where students are frequently targeted by cybercriminals. According to Wang et al. (2021), the rise of cybercrime has particularly affected university students who rely heavily on the internet for their academic work. Mass communication students are particularly vulnerable due to their extensive use of online platforms for research, media production, and communication (Alawode, 2021).

The risks associated with cybercrime in the academic setting include the loss of important academic data, exposure to online harassment, and compromised personal information. Cybercrime, including data breaches, can disrupt students' academic activities by making it difficult for them to access digital resources, complete assignments, or even conduct research effectively (Adeyemi & Udo, 2022). Furthermore, the psychological impact of being a victim of cybercrime, such as anxiety and stress, can further diminish students' academic performance (Osundina et al., 2022). In Nigeria, the prevalence of cybercrime among university students has been linked to inadequate institutional cybersecurity measures and a lack of awareness about online safety practices (Abimbola & Ojo, 2021). Despite the increasing digitization of educational practices, many students remain ill-equipped to navigate the risks associated with cybercrime. This lack of preparedness leads to higher vulnerability to cyber-attacks, which further exacerbate the challenges of academic success (Olaniyan et al., 2023). Therefore, addressing the issue of cybercrime in Nigerian tertiary institutions, including Federal Polytechnic Ado Ekiti, is essential to safeguarding the academic performance and well-being of students.

#### **Theoretical Framework**

The theoretical framework of this study is anchored on two relevant theories that explain the influence of cybercrime and performance outcomes of mass communication students. The first theory



addresses the independent variable (cybercrime), while the second explains the dependent variable (academic performance).

# Routine Activity Theory

Routine Activity Theory (RAT), postulated by Cohen and Felson (1979), is widely used to explain the occurrence of criminal activities, including cybercrime. The theory posits that crimes occur when three elements converge: a motivated offender, a suitable target, and a lack of capable guardianship. In the context of this study, the "motivated offender" could be individuals or groups who engage in cybercrime activities for personal gain, such as hacking, identity theft, or online fraud. The "suitable target" refers to mass communication students who are frequent users of digital platforms and may not have strong cybersecurity measures in place. Finally, "lack of capable guardianship" points to the insufficient protection measures in place within educational institutions to prevent such crimes. According to Adeyemi and Udo (2022), Routine Activity Theory can be applied to understand why mass communication students, who rely heavily on digital tools for academic work, are vulnerable to cybercrime. The theory emphasizes the importance of prevention measures, such as improved digital literacy, better institutional cybersecurity practices, and awareness programs, which could reduce the risk of students falling victim to cybercriminal activities. By applying this theory, the study can explore how cybercrime affects students' ability to engage effectively with their academic work, as cybercrime disrupts access to resources, causes psychological stress, and damages students' academic records.

# Self-Regulated Learning Theory

Self-Regulated Learning (SRL) Theory, depicted by Zimmerman (2000), is a psychological framework that explains how students control and monitor their learning processes. SRL involves a cyclical process where students set goals, use strategies to achieve them, monitor their progress, and adjust their approaches based on feedback. The theory emphasizes the importance of motivation, cognitive strategies, and self-reflection in achieving academic success. It is highly relevant for this study as academic performance is influenced by how well students can manage their learning activities in the face of challenges such as cybercrime.

When mass communication students experience cybercrime, it can interfere with their learning processes by disrupting their access to academic resources or causing emotional distress. According to Schunk and DiBenedetto (2020), the psychological effects of cybercrime, such as anxiety or depression, may reduce a student's ability to focus on their academic goals, impair their use of cognitive strategies, and hinder their overall academic performance. In this study, SRL Theory can explain how students' ability to regulate their learning is compromised when they fall victim to cybercrime, ultimately affecting their grades, learning strategies, and achievement in the mass communication program. This theory helps highlight the individual coping mechanisms employed by students in response to these challenges and the impact on their academic success.

#### Method

#### Research Design

This study adopted a survey research design to gather data, which allowed for the systematic collection of relevant information on the prevalence of cybercrime, its impact on academic performance, and the coping mechanisms employed by students.

# **Research Participants and Sample Procedure**

The population for the study comprised of 150 mass communication students at the Federal Polytechnic Ado-Ekiti, Ekiti State. The target population included all students enrolled in the mass communication program during the time of the study. A total sample size of 150 students was selected for the study using a simple random sampling technique. This method ensured that every student in the population had an equal chance of being included in the study.



#### **Data Collection Instrument**

A structured questionnaire was used as the primary instrument for data collection. The questionnaire was designed to address the study's focus areas, including the prevalence of cybercrime, its impact on academic performance, and coping mechanisms employed by students.

# Validity and Reliability of the Instrument

To ensure the validity of the instrument, the questionnaire was submitted to two academic experts at the Federal Polytechnic Ado-Ekiti for face and content validation of the instrument. Their feedback was reviewed and incorporated to enhance the clarity, accuracy, and relevance of the questions. The reliability of the questionnaire was established using the test-retest method. Five copies of the questionnaire were administered to students outside the sample group on two occasions, which yielded a reliability coefficient alpha value of .78 with a two-week interval between administrations. The responses were analyzed for consistency, confirming the reliability of the instrument.

# **Data Analysis**

The data collected were analyzed using descriptive statistics such as mean scores and standard deviations. These statistical tools enabled the interpretation of students' experiences with cybercrime and its impact on their academic performance. The mean was used to answer the research questions. The standard deviation was used to determine the extent to which the mean scores are deviated from the mean. The decision rule was based on any calculated mean scores equal to, or greater than 2.50 will be regarded as agree, while any calculated mean scores less than 2.50 will be regarded as disagree. A standard deviation value between .00 and .96 is an indication that the responses of teachers are very close.

#### Results

Research Question 1: What types of cybercrime are most prevalent among mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State?

Table 1: Mean and Standard Deviation on Types of Cybercrime Most Prevalent among Mass Communication Students in Federal Polytechnic Ado Ekiti, Ekiti State.

S/N	Items	N	Agree	Disagree	Mean	SD
1.	Mass communication students are often victims of financial fraud through online platforms.	150	130	20	1.33	0.34
2.	Cyberbullying is a significant issue among mass communication students.	150	140	10	1.07	0.25
3.	Mass communication students frequently experience identity theft or fraud online.	150	150	0	1.00	0.00
4.	Hacking and unauthorized access to student accounts are frequent occurrences in the mass communication program.	150	135	15	1.11	0.30
5.	Online exam cheating through unauthorized tools is prevalent among mass communication students.	150	120	30	1.20	0.40

Table 1 showed that cybercrime is a significant issue among mass communication students at Federal Polytechnic, Ado Ekiti. A large proportion of the respondents agree that mass communication students are frequent victims of financial fraud through online platforms (mean = 1.33, SD = 0.34). This suggests that financial fraud is one of the more prevalent cybercrimes affecting students. Additionally,



cyberbullying is recognized as a major issue within this group, with a high level of agreement (mean = 1.07, SD = 0.25), indicating its prominence as a concern. Furthermore, identity theft or fraud is universally reported, with all respondents agreeing that it occurs frequently (mean = 1.00, SD = 0.00), underscoring the severity of this particular cybercrime. Hacking and unauthorized access to student accounts also show a high rate of occurrence (mean = 1.11, SD = 0.30), with many students experiencing such breaches. Lastly, the prevalence of online exam cheating through unauthorized tools is noted, with 120 out of 150 respondents agreeing that this practice is common (mean = 1.20, SD = 0.40). Table 1 reveals that mass communication students at Federal Polytechnic, Ado Ekiti, experience a high prevalence of cybercrime, with financial fraud, cyberbullying, identity theft, hacking, and online exam cheating being the most common issues.

Research Question 2: What is the level of cybercrime on students' performance outcomes of mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State?

Table 2: Mean and Standard Deviation on Level of Cybercrime On Students' Performance Outcomes of Mass Communication Students in Federal Polytechnic Ado Ekiti, Ekiti State.

S/N	Items	N	Agree	Disagree	Mean	SD
1.	Cybercrime negatively impacts the academic performance of mass communication students.	150	140	10	1.07	0.25
2.	Students' academic focus is often disrupted due to cybercrime activities.	150	150	0	1.00	0.00
3.	Cybercrime-related stress negatively affects students' ability to complete academic tasks.	150	135	15	1.11	0.30
4.	The occurrence of cybercrime often leads to reduced participation in online academic discussions or courses.	150	130	20	1.13	0.34
5.	Students' academic performance declines as a result of losing important study materials to cybercrime.	150	120	30	1.20	0.40

Table 2 indicated that cybercrime significantly impacts the academic performance of mass communication students at Federal Polytechnic, Ado Ekiti. A substantial majority of respondents (140 out of 150) agree that cybercrime negatively affects their academic performance (mean = 1.07, SD = 0.25). This suggests that cybercrime is a major hindrance to their academic success. Additionally, the academic focus of students is often disrupted due to cybercrime activities, with a perfect agreement on this statement (mean = 1.00, SD = 0.00), pointing to the disruptive nature of such crimes on students' concentration. Cybercrime-related stress further exacerbates academic difficulties, as indicated by 135 respondents agreeing that it impairs their ability to complete academic tasks (mean = 1.11, SD = 0.30). Moreover, students report that the occurrence of cybercrime leads to reduced participation in online academic discussions or courses, further hindering their academic engagement (mean = 1.13, SD = 0.34). Lastly, the loss of important study materials due to cybercrime is recognized as a significant factor contributing to academic performance decline (mean = 1.20, SD = 0.40). Table 2 showed that cybercrime has a detrimental effect on the academic performance of mass communication students at Federal Polytechnic, Ado Ekiti. It disrupts academic focus, leads to stress, reduces participation in academic activities, and results in the loss of valuable study materials, all of which negatively affect academic outcomes.



Research Question 3: What strategies can be employed to minimize cybercrime risks among mass communication students in Federal Polytechnic Ado Ekiti, Ekiti State?

Table 3: Mean and Standard Deviation on Strategies Employed to Minimize Cybercrime Risks among Mass Communication Students in Federal Polytechnic Ado Ekiti, Ekiti State.

S/N	Items	N	Agree	Disagree	Mean	SD
1.	Increasing awareness on cyber security among mass communication students can reduce cybercrime risks.	150	140	10	1.07	0.25
2.	Regular training on online safety should be mandatory for students to minimize cybercrime risks.	150	120	30	1.20	0.40
3.	The implementation of stricter cybersecurity policies by the institution will help reduce cybercrime incidents.	150	140	10	1.07	0.25
4.	Encouraging students to use strong passwords and multi-factor authentication can reduce cybercrime exposure.	150	130	20	1.13	0.34
5.	The institution should provide more resources and tools to protect students from cybercrime.	150	120	30	1.20	0.40

Table 3 presents data on the coping mechanisms employed by mass communication students to mitigate cybercrime risks. The results indicate a strong agreement among respondents that increasing awareness of cybersecurity can significantly reduce the risks associated with cybercrime (mean = 1.07, SD = 0.25). This highlights the importance of educational initiatives in fostering a safer online environment. Regular training on online safety is also seen as a critical preventive measure, with 120 out of 150 respondents supporting the need for mandatory training (mean = 1.20, SD = 0.40). Additionally, the implementation of stricter cybersecurity policies by the institution is recognized as a key factor in reducing cybercrime incidents (mean = 1.07, SD = 0.25). Encouraging students to adopt stronger security measures, such as using strong passwords and multi-factor authentication, is another effective strategy, with 130 respondents agreeing on its importance (mean = 1.13, SD = 0.34). Finally, the provision of more resources and tools by the institution to protect students from cybercrime is widely supported (mean = 1.20, SD = 0.40), indicating that students believe the institution has a role to play in enhancing cybersecurity protection. Table 3 indicates that mass communication students at Federal Polytechnic, Ado Ekiti, rely on various coping mechanisms to mitigate cybercrime risks. These include increasing awareness, mandatory online safety training, stricter cybersecurity policies, the use of strong passwords, and institutional support in providing resources for enhanced protection.

#### Discussion

The findings from Table 1 reveal that mass communication students at Federal Polytechnic, Ado Ekiti, experience a high prevalence of cybercrime. The most common issues reported include financial fraud, cyberbullying, identity theft, hacking, and online exam cheating. This aligns with the work of Asaju and Nwankwo (2020), who noted that online financial fraud and harassment were prevalent among university students. Additionally, Jones (2023) highlighted the increasing rate of identity theft and hacking incidents among students due to their extensive use of digital platforms for academic and social purposes. Furthermore, Morris and Lee (2020) also identified online cheating as a significant concern, particularly with the rise of digital learning environments that have made it easier to engage in academic dishonesty.



The findings from Table 2 suggest that cybercrime significantly affects the academic performance of mass communication students. Students reported that cybercrime leads to distractions, stress, and reduced participation in online academic activities, which in turn hampers their academic focus and performance. These findings are consistent with the research of Patel et al. (2021), who observed that the disruptions caused by cybercrime negatively impacted students' academic productivity and engagement. Smith and Zong (2022) also pointed out that cybercrime leads to a loss of essential study materials, which further exacerbates the academic challenges students face. This aligns with the current study, as students in the sample reported losing important academic resources due to cybercrime incidents.

The findings from Table 3 highlight several coping mechanisms students believe could help mitigate the risks of cybercrime. These include increasing awareness about cybersecurity, providing regular online safety training, implementing stricter cybersecurity policies, and encouraging the use of strong passwords and multi-factor authentication. These results align with the findings of Adama and Hamed (2021), who emphasized the need for increased cybersecurity awareness among students to reduce their vulnerability to online threats. Kumar et al. (2020) also supported this view, highlighting the importance of institutional policies and digital security tools in minimizing cybercrime incidents in educational settings. Moreover, Williams and Tran (2022) noted that the use of personal security measures such as strong passwords and multi-factor authentication is effective in reducing exposure to cybercrime.

#### Conclusion

The study highlights the significant prevalence of cybercrime among mass communication students at Federal Polytechnic, Ado Ekiti, with financial fraud, cyberbullying, identity theft, and hacking being the most prevalent forms. The findings also reveal that cybercrime negatively impacts students' academic performance, causing disruptions in focus, increased stress, and reduced participation in academic activities. Furthermore, the study identifies various coping mechanisms employed by students, including increased awareness, stronger institutional cybersecurity policies, and the use of personal security tools. Overall, the study underscores the critical need for effective strategies to combat cybercrime and mitigate its detrimental effects on students' academic experiences.

#### Recommendations

The following recommendations were made:

- 1. Tertiary institutions should endeavor to strengthen its cybersecurity education by incorporating regular training and awareness programs for students. These initiatives should focus on educating students about the risks of cybercrime and best practices for protecting themselves online.
- 2. Tertiary institutions should endeavor to introduce stricter cybersecurity policies to safeguard students' personal data and academic integrity. These policies should include measures such as mandatory use of strong passwords and multi-factor authentication for accessing school platforms.
- 3. Tertiary institutions should endeavor to establish a more robust support system to help students recover from cybercrime-related incidents. This could include dedicated cybersecurity support services, counselling, and a clear protocol for reporting and addressing cybercrime cases within the institution

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