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Ethical Technology Practices and Detoxification Strategies among Undergraduate Students in Universities in South-South Geopolitical Zone of Nigeria

Dr. Francis Akpo Akpo¹, Dr. Uchechukwu Amadi^{2*}, Dr. Otu Michael Obuop³, Dr. Anthony Nku Obi⁴, Ugbong Moses Bekwapu⁵, Emeruwa, Charles Ann Daberechi⁶, Dr. Mabel U. Uchechukwu-Amadi⁷.

¹ORCID: 0009-0001-2672-0538, Email: akpofrancis@unical.edu.ng, Department of Educational Technology, University of Calabar, Cross River State, Nigeria.

²ORCID: 0009-0006-4143-8983, Email: uchechukwu.amadi@iaue.edu.ng, Department of Educational Technology, Ignatius Ajuru University of Education, Rivers State, Nigeria.

³ ORCID: 0009-0009-6429-6625, Email: michaelotu989@gmail.com, University of Calabar, Cross River State, Nigeria

⁴ORCID: 0009-0009-5829-0139, obianthonynku@unical.edu.ng, Department of Mass Communication /Public Relations, University of Calabar, Cross River State, Nigeria.

⁵ORCID: 0009-0008-9407-783x, mosesugbongbekwapu@gmail.com, Department of Educational Management, University of Calabar, Cross River State, Nigeria.

⁶ORCID: 0009-0009-4568-2133, ann.emeruwa@iaue.edu.ng, Department of Curriculum Studies and Educational Technology, Ignatius Ajuru University of Education, Rivers State, Nigeria.

⁷ORCID: 0000-0002-6767-6043, mabel.uchechukwu-amadi@iaue.edu.ng, Department of Educational Technology, Ignatius Ajuru University of Education, Port Harcourt, Rivers State.

Abstract

This study investigated ethical technology practices and digital detoxification strategies among undergraduate students in universities in South-South Geopolitical Zone of Nigeria. A descriptive research design was adopted, with a sample of 960 students drawn from three universities in South-South Geopolitical zone of Nigeria using multistage sampling. A researcher-structured questionnaire, validated by three experts and yielding a Cronbach Alpha reliability of 0.87, was used for data collection. Mean, standard deviation, and t-test were employed for data analysis at a 0.05 significance level. Findings revealed that

undergraduate students generally demonstrated low awareness of ethical technology practices and did not widely adopt digital detoxification strategies to manage screen time. The study concluded that universities should integrate digital ethics education and wellness programs into their curricula and student support systems. It was recommended amongst others that universities in Nigeria should generally incorporate modules on ethical technology use and digital health into General Studies or ICT-related programs.

Keywords: *Digital ethics, screentime management, digital well-being, technology detoxification, Nigeria.*

Introduction

In today's society, marked by an unparalleled dependence on digital technology, the detrimental psychological impacts of prolonged interaction with these gadgets have been a central topic in academic discussions. Although it simplifies existence, digital technology has emerged as an essential element of contemporary life. Digital technology and mobile phone utilization have profoundly influenced many facets of life, including education, economics, social relations, politics, religion, and culture. As the globe undergoes a technological surge, mobile phone technology is advancing swiftly. This technology augments learners' education and elevates academic achievement owing to its advanced connection features. The advent of mobile devices over the past ten years has integrated functionalities and apps that were once exclusive to PCs, rendering them portable and readily accessible (Uchechukwu-Amadi, Ibiede & Amadi, 2025).

The design and deployment of these technologies are crucial as they become part of daily life. Development and use of digital technologies that honor persons, protect

society, and limit damage are ethical technology activities. They value human-centered design, transparency, accountability, equity, privacy, and sustainability. This means technology must prioritize individual welfare, be clear about system processes, and be protected from misuse or bias. Businesses may ensure ethical technology use by conducting impact studies before product releases, diversifying staff to reduce blind spots, and training. Clear corporate standards and constant oversight create fair, secure, and socially acceptable systems.

Technology affects politics, economics, education, and daily life, making these duties crucial. It may increase inequality, distrust, and unethical behavior. Carefully implemented innovation benefits all parties. All benefit from such improvements. Frequent digital use makes this task more compelling. It provides connectedness and convenience, but "digital natives," who use cellphones, social media, and digital jargon, overuse it (Fomsi, 2021). Screen time might cause academic deterioration, anxiety, depression, and sleep difficulties. More than 4.48 billion people use social media, including teens. Digital consumption

threatens public health. This emphasizes digital ethics and purity.

Digital detoxification is often used to focus on real-life situations. Disconnecting from technology reduces stress and prevents device addiction. Through detoxification, students may focus on their studies without distractions from technology, especially cellphones. Technology addiction is not a disease, but some experts say it can cause medical, psychological, social, and academic concerns (Scott, 2025). In essence, although cellphones have undeniably simplified life in several ways, the technology they encompass has grown ubiquitous in our daily routines. Digital health and wellbeing represent an essential aspect of digital citizenship. This factor underscores the significance of ergonomic awareness and the cultivation of healthy technology usage practices (Uchechukwu & Onah, 2026). Students should be educated about behaviors that could adversely affect their physical and mental health, including extended screen time, inactivity, and excessive gaming. According to Winnick (2016), the average person engages with their smartphone approximately 2,617 times per day. This ongoing engagement presents

a considerable distraction, especially for undergraduate students who are now in their learning and developmental stage. Research demonstrates that the formidable processing capacity of mobile devices, commonly carried by individuals, can serve as a distraction, even for the most self-disciplined adults, not to mention students. Research in education indicates that the utilization of mobile devices and social media while learning can impede comprehension and adversely affect academic achievement (Jacobson & Fortse, 2011). Subsequent study indicates that the sheer presence of cell phones, regardless of whether they are powered off, face down, or concealed, can impair cognitive functions (Ward, Duke, Gneezy & Bos, 2017). This obstacle and the associated adverse effects of technology have led to the development of several concepts and terminologies designed to mitigate the detrimental tendency of technological overuse. A significant concept in current debate is the practice of ethical technology and digital detoxification, commonly known as digital detox.

Digital Ethics

Digital ethics is progressively acknowledged as an essential element of social contracts governing student conduct, delineating permissible and impermissible digital actions (Edenberg & Jones 2019). These ethics transcend colleges, impacting professional and familial behavior when students integrate into the wider society. Inappropriate or unlawful digital behavior can compromise proper conduct, resulting in disciplinary or legal repercussions, with instances such as fraud and plagiarism enabled by mobile devices (Omonijo & Nnedom 2012). These concerns underscore the significance of ethical technology practices that prioritize accountability, equity, and the respect for human dignity. Internet-based platforms facilitate worldwide engagement but also pose concerns including cyberbullying, cyberattacks, and cyberstalking. The anonymity provided by digital environments has increased potential for wrongdoing, resulting in novel forms of criminal or immoral behavior (Omonijo 2012). Ethical frameworks are crucial for guiding ethical ICT usage, ensuring that technology promotes trust, safety, and equity in educational, professional, and social environments.

As these technologies become essential to daily life, their design and implementation hold critical importance. Ethical technology practices encompass the creation and application of digital tools that respect persons, protect society, and reduce harm. They fundamentally promote human-centered design, transparency, accountability, equity, privacy, and sustainability. This indicates that technology should be built with a focus on individual wellbeing, backed by clear explanations of system functions, and safeguards against misuse or bias. Implementing impact evaluations before to product launches, diversifying people to address blind spots, and offering training can aid organizations in ensuring the ethical application of technology. Explicit corporate standards and ongoing oversight guarantee fair, secure, and socially acceptable systems.

Technology impacts politics, the economy, education, and daily life, making these duties indispensable. It may intensify inequality, erode trust, or negatively impact unethical persons. Carefully implemented innovation can benefit all parties. All benefit from such improvements. The pervasive utilization of digital technology makes this task more

urgent. It provides connectivity and convenience; yet, "digital natives," who engage with cellphones, social media, and digital language, often exhibit excessive dependence on it (Fomsi, 2021). Excessive screen use may lead to academic deterioration, anxiety, depression, and sleep disruptions. Over 4.48 billion users engage with social media, including adolescents. Thus, internet usage is a public health issue. This highlights digital cleansing and ethical considerations.

Digital detoxification is often viewed as a means to focus on real-life situations free from distractions. Temporarily disengaging from digital devices enables individuals to mitigate stress caused by constant connectivity and avert device dependency. By implementing detoxification, students can concentrate on their academic endeavors without the distractions posed by modern devices, especially telephones. While technology addiction is not officially recognized as a disorder, some experts argue that excessive interaction with technology and devices may lead to physical, psychological, social, and intellectual problems (Scott, 2025).

In a nutshell, while cellphones have undoubtedly streamlined several aspects of living, the technology they embody has become pervasive in our daily activities. Winnick (2016) states that the average individual interacts with their smartphone roughly 2,617 times daily. This continuous involvement constitutes a significant distraction, particularly for undergraduate students who are now in their educational and developmental phase. Research indicates that the substantial processing power of mobile devices, frequently possessed by individuals, can operate as a distraction, even for the most self-disciplined adults, let alone students. Educational research suggests that the use of mobile devices and social media while learning can hinder understanding and negatively impact academic performance (Jacobson & Fortse, 2011). Subsequent research demonstrates that the mere presence of cell phones, irrespective of their operational status, orientation, or concealment, can hinder cognitive functioning (Ward, Duke, Gneezy & Bos, 2017). This challenge and the related negative impacts of technology have prompted the creation of many concepts and terminologies aimed at alleviating the

harmful inclination of technological misuse. A prominent topic in contemporary discourse is the practice of ethical technology and digital detoxification, frequently referred to as digital detox.

Digital Detoxification

Digital detoxification refers to a temporary cessation from electronic devices, such as smartphones, aimed at alleviating stress or improving face-to-face social interactions (Oxford Dictionaries, 2019). In contrast to permanent detoxification treatments for substances such as narcotics or alcohol, digital detox is designed as a voluntary and deliberate hiatus, akin to fasting, intended to enhance awareness of excessive usage and foster self-optimization (Syvertsen & Enli, 2019; Vitinius et al., 2018). Meier and Reinecke (2020) enhance this description by contextualizing digital detox within a hierarchical taxonomy of computer-mediated communication, proposing that it may encompass abstaining not only from devices but also from particular applications, branded media, features, interactions, or message kinds. Consistent with behavior change strategies (Michie et al., 2013), digital detox is best characterized as a

purposeful approach to mitigate aversive inputs and promote better digital practices.

Notwithstanding its increasing popularity, the efficacy of digital detoxification remains ambiguous, as no comprehensive evaluation has consolidated empirical evidence about its results. Current research presents fragmented results, raising inquiries over its contribution to fostering long-term well-being in the digital age. Scholars contend that digital detox should be perceived not as a ban but as a conscious, balanced interaction with technology, allowing users to reap the advantages of digital gadgets while alleviating the adverse consequences of excessive use (Benerjee, 2019).

Distraction-Conflict Theory

Distraction-Conflict Theory, introduced by Baron (1986), asserts that attentional conflict occurs when various stimuli vie for constrained cognitive resources. Distractions impede concentration on primary tasks, generating a conflict between addressing the distraction and engaging in the main activity. The sheer presence of individuals or items can enhance motivation and stress by inducing attentional conflict, even in the absence of active participation (Zhou & Liu,

2013). Baron asserted that handling various stimuli elevates cognitive load, which might hinder attention, accuracy, and working memory, thus diminishing efficacy and heightening stress (Coursaris et al., 2012). In academic settings, mobile devices serve as distractions; notifications and social media vie with lectures and study activities, impairing performance. Structural and capacity interference (Costa & Friedrich, 2012) elucidates why multitasking with digital gadgets frequently exceeds attentional capacity. Increased motivation stemming from attentional conflict may result in tension, indecision, and dissatisfaction (Bavel et al., 2020).

The hypothesis, when applied to digital detoxification, justifies the reduction of gadget usage to alleviate attentional conflict and cognitive overload. Eliminating or restricting digital distractions enables pupils to enhance concentration, productivity, and overall well-being. Consequently, distraction-conflict theory emphasizes the significance of detoxification measures in alleviating the adverse academic and psychological impacts of ubiquitous mobile technology.

Statement of problem

Smartphones, social media, and online platforms provide increasing difficulties for students in the digital era. These tools offer numerous educational advantages; yet, excessive use may result to digital addiction, subpar academic performance, mental health issues such as anxiety and depression, and ethical violations including cyberbullying, plagiarism, and breaches of privacy. Research indicates that numerous Nigerian students engage in problematic internet usage; nevertheless, there is a paucity of evidence regarding how undergraduates manage ethical technological practices such as data handling and digital citizenship, as well as their implementation of detoxification techniques like screen-time limitations or digital fasting to mitigate these dangers. Rapid urbanization and inadequate regulatory frameworks result in young folks spending 7-10 hours daily on digital devices. Educational institutions jeopardize the perpetuation of a technology dependence that adversely affects learning, well-being, and society in the absence of explicit ethical standards and detoxification strategies. This study investigates the critical gap by analyzing

ethical technology practices and detoxification strategies among undergraduate students in universities in South-South Geopolitical Zone of Nigeria.

Aim and Objectives of the Study

This study is aimed at investigating ethical technology practices and digital detoxification strategies among undergraduate students in universities in South-South Geopolitical Zone of Nigeria. Specifically, the objectives of the study were to:

1. examine undergraduate students' awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria.
2. identify the common digital detoxification strategies adopted by undergraduate students to manage screen time and technology use in universities in South-South Geopolitical Zone of Nigeria.
3. examine the impact of ethical technology practices on digital well-being among undergraduate students in universities in South-South Geopolitical Zone of Nigeria

Research Questions

The following understated research questions were answered in this study:

1. What is the level of undergraduate students' awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria?
2. What are the common digital detoxification strategies adopted by undergraduate students to manage screen time and technology use in universities in South-South Geopolitical Zone of Nigeria?
3. To what extent do ethical technology practices impact the digital well-being of undergraduate students in universities in South-South Geopolitical Zone of Nigeria?

Hypotheses

The following hypotheses were formulated to guide this study:

1. There is no significant difference in the mean responses of undergraduate students on the awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria based on ownership.
2. The mean responses of undergraduate students in universities in South-South Geopolitical Zone of Nigeria on the common

digital detoxification strategies adopted to manage screen time and technology use will not differ significantly based on ownership.

3. The mean responses of undergraduates in universities in South-South Geopolitical Zone of Nigeria on the impact of ethical technology practices on digital well-being will not differ significantly based on ownership.

Method

This study adopted a descriptive survey research design. Descriptive studies collect data that describe the characteristics of persons, events, or situations. The population of the study comprised eight thousand seven hundred and fifty-one (8751) undergraduate students in the Faculties of Education in three Universities in South-South Geopolitical zone of Nigeria. This population is doubly significant as they are both consumers of digital technology and future mediators of digital ethics for the next generation of learners. Their awareness and practices will directly influence how they model and teach responsible technology use in Nigerian classrooms. A sample of 960 undergraduate students was selected using a multistage sampling procedure. At the first

stage, three universities with adequate ICT facilities needed for a study of this kind were purposively selected in the South-South Geopolitical zone of Nigeria. At the second stage, stratified sampling technique was employed to group the population by university, faculty of education and department, ensuring adequate representation from each institution. At the third stage, purposive sampling was used to focus on 400-level students, as they are at the final stage of their programme and have had sufficient exposure to technology-enhanced learning. At the final stage, simple random sampling technique was applied to select 960 students proportionately from the identified strata. The 400 level students were deemed appropriate for this study based on the fact that they have encountered technology and are at the verge of entering the technology-driven world of work. Other selection criteria were the ICT literacy level of students, individual student consent as well as students with smartphones.

A researcher-developed questionnaire, titled 'Ethical Technology Practices and Detoxification Strategies among Undergraduate Students in Universities in Rivers State Questionnaire (ETPDSUSURSQ)

was constructed using the Likert scale format. The questionnaire contained two sections structured to elicit responses that answered the research questions posed to guide the study. The first section, Section A, elicited demographic data on the respondents' institution and gender. Section B had several parts which elicited information on the variables of the study. The instruments were structured on modified Likert scale of 4-point rating: Very High Extent (VHE), High Extent (HE), Low Extent (LE) and Very Low Extent (VLE) scale of responses. Considering the criterion mean score = $(4+3+2+1)/4 = 10/4 = 2.50$ when calculated mean score greater than the criterion mean score of 2.50, were

considered as high extent and the calculated mean score less than the criterion mean score, were considered as low extent. This instrument was used for data collection. The instrument was validated by three experts and a reliability analysis using Cronbach method yielded an alpha coefficient of 0.87. Data analysis was done using mean, standard deviation to answer the research questions and t-test was used to test hypotheses.

Results

Research Question 1: What is the level of undergraduate students' awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria?

Table 1: Mean and standard deviation values of undergraduates' awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria.

S/N	Items	Mean	SD	CM	Decision
1	I am aware that ethical technology practices promote fairness and non-discrimination in digital spaces	1.51	0.95		LE
2	I understand that protecting personal data and privacy is a key aspect of ethical technology use	1.54	0.96		LE
3	I am familiar with the importance of transparency in how digital technologies and platforms operate	1.17	0.52		LE
4	I know that accountability is essential when using technology to avoid misuse or harm	1.59	0.89		LE

5	I am aware that ethical technology practices include respecting intellectual property and avoiding plagiarism.	1.13	0.43	2.50	LE
6	I understand that excessive or irresponsible use of digital devices can negatively affect well-being	1.51	0.93		LE
7	I am familiar with the concept of sustainability in technology, such as reducing e-waste and conserving energy	1.65	0.98		LE
8	I know that ethical technology practices require responsible use of social media to prevent cyberbullying and harassment	1.09	0.71		LE
9	I am aware that universities encourage students to adopt ethical technology practices in academic work	1.67	0.87		LE
10	I understand that ethical technology practices contribute to building trust in digital interactions and communities	2.01	0.76		LE
Grand Mean		1.49	0.80		Low Extent

Data presented in Table 1 shows the level of undergraduate students' awareness of ethical technology practices in South-South Geopolitical Zone of Nigeria. On the basis of the reported grand mean value for all items examined, it can be seen that undergraduates reported that their awareness of ethical technology practices was to a low extent. Furthermore, on the basis of the grand mean of 1.49 (SD = 0.80) reported, it can be seen that university undergraduates' awareness of ethical technology practices in South-South Geopolitical Zone of Nigeria was to a low extent.

Research Question 2: What are the common digital detoxification strategies adopted by undergraduate students to manage screen time and technology use in universities in South-South Geopolitical Zone of Nigeria?

Table 2: Mean and standard deviation values of common digital detoxification strategies adopted by undergraduates to manage screen time and technology use in universities in South-South Geopolitical Zone of Nigeria.

S/N	Items	Mean	SD	CM	Decision
1	I deliberately set specific time limits for my daily smartphone use.	2.25	0.84		Disagreed
2	I avoid using digital devices during lectures or study sessions to stay focused.	2.20	0.81		Disagreed
3	I schedule regular breaks away from screens to rest my eyes and mind.	2.13	0.98		Disagreed
4	I turn off notifications to reduce distractions from social media and messaging apps.	3.28	0.86		Agreed
5	I consciously avoid using my phone before bedtime to improve sleep quality	2.31	0.87	2.50	Disagreed
6	I engage in offline activities as alternatives to screen time	2.24	1.02		Disagreed
7	I practice no-phone zones to limit device use	2.06	1.06		Disagreed
8	I uninstall or temporarily disable apps that consume excessive time	3.18	0.92		Agreed
9	I use digital well-being tools or apps to monitor and regulate my screen time	2.20	0.87		Disagreed
10	I intentionally disconnect from social media platforms for short periods to reduce stress	2.44	0.96		Disagreed
	Grand Mean	2.23	0.82		Disagreed

Result of the common digital detoxification strategies adopted by undergraduate students to manage screen time and technology use in universities in South-South Geopolitical Zone of Nigeria is displayed in Table 2. From the table, it was shown that the grand mean was 2.23 with a standard deviation of 0.82. Based on the grand mean rating of 2.23 (SD = 0.82), it indicates that the respondents reported a disagreement on the

adoption of common digital detoxification strategies to manage screen time and technology use in South-South Geopolitical Zone of Nigeria.

Research Question 3: To what extent do ethical technology practices impact the digital well-being of undergraduate students in universities in South-South Geopolitical Zone of Nigeria?

Table 3: Mean and standard deviation values of the extent to which ethical technology practices impact the digital well-being of undergraduates in universities in South-South Geopolitical Zone of Nigeria.

S/N	Item	Mean	SD	CM	Decision
1	Ethical technology practices help me maintain a healthy balance between academic work and digital device use	2.34	0.85		LE
2	Following ethical technology guidelines reduces my risk of experiencing stress or anxiety from excessive screen time	2.78	1.04		HE
3	Awareness of ethical technology practices improves my ability to use digital devices responsibly	2.45	0.70		LE
4	Practicing ethical technology use positively impacts my sleep quality and overall well-being	2.91	1.00	2.50	HE
5	Ethical technology practices help me avoid distractions from mobile phones and social media during lectures	2.62	1.14		HE

6	Respecting privacy and data protection rules enhances my sense of safety in digital environments.	1.78	1.02	LE
7	Ethical technology practices encourage me to limit unnecessary screen time and focus on productive activities	2.75	0.78	HE
8	Adopting ethical technology behaviors improves my academic performance and concentration	2.81	0.93	HE
9	Ethical technology practices reduce my likelihood of engaging in harmful online behaviors such as cyberbullying or plagiarism	2.60	0.87	HE
10	Ethical technology practices contribute significantly to my digital well-being as a university student	2.78	0.65	HE
Grand Mean		2.58	0.90	HE

Data presented in Table 3 shows the mean and standard deviation values of the extent to which ethical technology practices impact the digital well-being of undergraduates in universities in South-South Geopolitical Zone of Nigeria. Based on the grand mean of 2.58 (SD = 0.90), it therefore indicates that ethical technology practices impact the digital well-being of undergraduates in South-South Geopolitical Zone of Nigeria to a high extent.

Hypothesis 1: There is no significant difference in the mean responses of undergraduate students on the awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria based on ownership.

Table 4: Summary of t-test on the difference in the mean responses of undergraduates on the awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria based on ownership.

Ownership	N	Mean	SD	df	t	p	Decision
Federal	320	24.46	5.15	95	0.40	0.0483	Retain H ₀₁
State	640	24.05	5.14	8	4		p>0.05

From the analysis shown in Table 4, it can be observed that undergraduate students from federal-owned universities (n=320) had a mean of 24.46 (SD = 5.15), while those from state-owned universities (n = 640) reported a mean score of 24.05 (SD = 5.15) on the extent awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria based on ownership. When these values were subjected to independent sample test analysis, a t-value of 0.404 was obtained with a corresponding p-value of 0.0483, which was lesser than the chosen alpha of 0.05.

This therefore indicates that there is no significant difference in the mean responses of undergraduates on the awareness of ethical technology practices in universities in South-South Geopolitical Zone of Nigeria based on ownership. The null hypothesis was therefore retained.

Hypothesis 2: The mean responses of undergraduate students in universities in South-South Geopolitical Zone of Nigeria on the common digital detoxification strategies adopted to manage screen time and technology use will not differ significantly based on ownership.

Table 5: Summary of t-test on the difference in the mean responses of undergraduate students on the common digital detoxification strategies adopted to manage screen time and technology use will not differ significantly based on ownership

Ownership	N	Mean	SD	df	t	p	Decision
Federal	320	22.47	5.16	95	0.78	0.0434	Retain H ₀₂
State	640	22.00	5.37	8	3		p>0.05

From the analysis shown in the Table 5, it can be observed that undergraduate students from federal-owned universities (n=320) had a mean of 22.47 (SD = 5.16), while those from state-owned universities (n = 640) reported a mean score of 24.05 (SD = 5.37) on the common digital detoxification strategies adopted to manage screen time and technology use. When these values were subjected to independent sample test analysis, a t-value of 0.783 was obtained with a corresponding p-value of 0.0434, which was lesser than the chosen alpha of 0.05.

This therefore indicates that there is no significant difference in the mean responses of undergraduates on the common digital detoxification strategies adopted to manage screen time and technology use. The null hypothesis was therefore retained.

Hypothesis 3: The mean responses of undergraduates in universities in South-South Geopolitical Zone of Nigeria on the impact of ethical technology practices on digital well-being will not differ significantly based on ownership.

Table 6: Summary of t-test on the difference in the mean responses of undergraduate students on the impact of ethical technology practices on digital well-being will not differ significantly based on ownership

Ownership	N	Mean	SD	df	t	p	Decision
Federal	320	22.35	5.19	95	0.77	0.0442	Retain H_0
State	640	22.00	5.47	8	9		$p > 0.05$

From the analysis shown in the Table 6, it can be observed that undergraduate students from federal-owned universities (n=320) had a mean of 22.35 (SD = 5.19), while those from state-owned universities (n = 640) reported a mean score of 22.00 (SD = 5.47) on the impact of ethical technology practices

on digital well-being. When these values were subjected to independent sample test analysis, a t-value of 0.779 was obtained with a corresponding p-value of 0.0442, which was lesser than the chosen alpha of 0.05. This therefore indicates that there is no significant difference in the mean responses

of undergraduates on the on the impact of ethical technology practices on digital well-being. The null hypothesis was therefore retained.

Discussion of Findings

The results suggested that undergraduates at universities in South-South Geopolitical Zone of Nigeria had a limited awareness of ethical technological practices, as evidenced by a grand mean of 1.49 (SD = 0.80). This result aligns with the research conducted by Okoye and Nwankwo (2020) and Fajobi et al. (2021), which indicated that Nigerian undergraduates typically demonstrate a restricted understanding of digital ethics, especially concerning plagiarism, data privacy, and responsible social media usage. Nevertheless, this data contradicts Oyigan, Okiy and Emojorho (2025), who reported moderate to high awareness among undergraduates in South-Western Nigerian universities, ascribed to a more robust institutional focus on ICT training and digital literacy initiatives. The variance indicates that regional disparities in institutional policies and access to ICT courses may explain the differences in awareness levels. The analysis of the hypothesis indicated no significant difference in the mean replies of

undergraduates regarding understanding of ethical technological practices in universities in South-South Geopolitical Zone of Nigeria based on ownership. The finding corresponds with Oyigan, Okiy and Emojorho (2025) who indicated that institutional ownership exerted no influence on students' ethical awareness about ICT, as both university categories encounter analogous issues, including insufficient ICT infrastructure and restricted training opportunities. Ibrahim, Yusuf and Bukar (2021) observed that government institutions typically exhibit marginally elevated awareness levels attributable to superior finance and access to ICT resources. The absence of a substantial difference in the current study may indicate that both federal and state colleges experience analogous contextual constraints, hence rendering ownership an inconsequential factor.

The results indicated that undergraduates at universities in South-South Geopolitical Zone of Nigeria predominantly opposed the implementation of standardized digital detoxification techniques to regulate screen time and technology usage. This indicates that students infrequently employ structured methods, including regular

breaks, application limitations, or mindfulness practices. The findings correspond with the research of Radtke, Apel, Schenkel, Keller, and von Lindern (2021) and El-Khoury et al. (2020), which indicated that Nigerian undergraduate students frequently exhibit a deficiency in awareness and discipline regarding screen time management, instead resorting to informal coping strategies. In contrast, Oyigan, Okiy and Emojorho (2025) revealed a greater adoption of digital detox techniques among undergraduate students in South-Western Nigerian universities, attributing this to institutional campaigns on digital health and student-led efforts.

The investigation revealed no substantial disparity in the implementation of digital detoxification techniques between federal and state universities. This study corroborates Oyigan, Okiy and Emojorho (2025), who noted that institutional ownership exerted no influence on students' technology management habits, as both types of colleges have analogous issues, including insufficient wellness programs and restricted institutional assistance. Conversely, Ibrahim, Yusuf and Bukar (2021) discovered that federal universities exhibited

marginally greater implementation of digital detox measures owing to superior access to ICT resources and wellness programs.

The results suggest that ethical technology practices significantly influence the digital well-being of undergraduate students at universities in South-South Geopolitical Zone of Nigeria. This indicates that responsible technology use, including privacy respect, plagiarism avoidance, and the maintenance of healthy online conduct, positively impacts students' digital well-being. Recent research corroborates this finding. Agim, Adebite, and Edeh (2024) discovered that undergraduates at Nnamdi Azikiwe University who followed ethical technology practices exhibited enhanced academic integrity and less digital stress. Bandekaji et al. (2024) asserted that cultivating ethical online learning settings in Nigeria improves students' feeling of responsibility and well-being in the digital era. These results align with the current study. Neagu and Vieriu (2025) indicated a moderate correlation between digital engagement and psychological well-being among technical university students in Romania, implying that contextual elements like institutional focus on digital ethics and regional disparities in ICT integration may

account for variations across different environments.

The investigation revealed no substantial difference between federal and state institutions regarding the stated effects of ethical technology practices on digital well-being. This finding corresponds with Oyigan, Okiy and Emojorho (2025) who noted that institutional ownership exerted minimal impact on students' digital well-being outcomes, as both university categories frequently encounter analogous challenges, including inadequate ICT infrastructure and ineffective enforcement of digital ethics policies. Conversely, Ibrahim, Yusuf and Bukar (2021) discovered that federal institutions exhibited somewhat greater effects attributable to superior finance and organized ICT initiatives.

Conclusion

This study investigated undergraduates' awareness of ethical technology practices, their implementation of digital detoxification techniques, and the degree to which these practices affect digital well-being in universities in South-South Geopolitical Zone of Nigeria. The findings indicated that understanding of ethical technological practices was predominantly insufficient,

and students did not extensively implement organized digital detox measures to regulate screen usage. Nonetheless, ethical technology practices were discovered to substantially improve students' digital well-being, underscoring their significance in promoting healthy academic and personal digital experiences. The study highlighted the necessity for institutions to incorporate digital ethics education and wellness programs into curricula and student support systems to adequately prepare undergraduates for responsible and healthy participation in the digital landscape.

Recommendations

Based on the discussion of findings and conclusion of the study, the following recommendations are made:

1. Public universities in Rivers State should embed courses or modules on ethical technology practices and digital well-being into General Studies or ICT-related programs.
2. Universities should organize regular workshops, seminars, and awareness campaigns on digital detoxification strategies and ethical technology practices. These initiatives can be student-led or supported by ICT units, focusing on practical approaches to managing screen time,

reducing digital stress, and promoting balanced technology use.

3. Universities should develop and enforce clear policies on ethical technology use, including guidelines for online learning, plagiarism prevention, and responsible social media engagement.

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